I:1ाIO ANI
7. FH:
Endlimann

# in Kadio <br> <br> and Clectromicos 

 <br> <br> and Clectromicos}

Rises to new heights
of service
to see

## you through!

FOR MORE than twenty years, LAFAYETTE RADIO CORPORATION has been a major supplier of radio and electronic components and equipment to American civilian, industrial and military life. Now, as one of the world's largest radio supply organizations, we are ever striving to rise to new heights of service, that we may do our share in maintaining and making secure the American way of life.
With the cooperation of the leading manufactur-
ers in the field, Lafayette stocks are kept exceptionally complete. Our shelves are constantly being replenished-our search for additional merchandise never ends. We are always motivated by the desire to supply you with what you want, when you want it. If we haven't an item you need at the moment, our vast coverage of the field enables us to get it for you-and in a hurry. As always, we maintain our money-back guarantee of satisfaction.

## CHICAGO and ATLANTA . . For Faster Service!

LAFAYETTE RADIO CORP. maintains two complete organizations strategically located in Chicago and Atlanta. Difficult as it is to maintain our motto of "Same-Day Delivery" in these times, we still manage to live up to it in the vast majority of cases. Both Chicago and Atlanta are equipped with Teletype service for your greater convenience; call CG 320 for Chicago, AT 398 for Atlanta.
Both Chicago and Atlanta maintain stafts of experienced expediters to assist you with your priority problems and to assure fastest possible deliveries. In addition, our technical advisers, radio technicians and engineering staff are always at your disposal without charge or obligation.

We have a special division which devotes its entire time to providing super-speed service for war-time industry and the Armed Services. A constant flow of radio and electronic equipment to the military and naval forces with urgent requirements, helps break bottlenecks and speed needed equipment. Bids and advancequotations are invited. Our Special Schools Division has been expanded and enlarged to provide consultation service to schools and colleges on radio training and engineering programs. Lafayette's Special Training Kits are meeting with everwidening demand. Brochures describing our kits, for use in educational programs, available on request.

## IMPORTANT NOTICE!

Lafayette Radio Corp plans for the postwar electronic era call for many new and starting developments and innovations. Reserve your copy now of the Lalayette postwar catalog to be issued as rapidly as conditions permit

# How to Obtain 

## RADIO PARTS AND ELECTRONIC EQUIPMENT

Because of the vital role of radio and electronics in this war, the problem of supply in these fields is undeniably a major one. Therefore, a dependable source of radio and electronic supplies is of paramount importance to American industry, striving to meet production schedules, and to radio dealers and servicemen, working night and day to keep America's radios playing.

The services of LAFAYETTE RADIO CORPORATION in CHICAGO and ATLANTA, the nation's outstanding supplier of radio equipment, can be tremendously helpful to all who require radio and electronic equipment. We are happy in these critical times, and always, to offer our knowledge, our experience and every facility at our command in order that all of us, working together, may hasten the day of victory.

## DEALERS and SERVICEMEN! YOU CAN STILL GET RADIO REPLACEMENT PARTS!

Because radios in the home are such an important factor in maintaining morale and keeping the public well informed, our government is vitally interested in keeping the radio sets of the nation in perfect operating condition. To facilitate the obtaining of necessary replacement parts for this purpose the WPB has issued Limitation Order L265.

## HERE'S THE SIMPLIFIED WAY TO GET NEEDED RADIO PARTS

This order makes it possible for you to obtain radio parts and electronic equipment to be used in YOUR OWN radio or to RESELL merely by contributing the part (s) which are to be replaced to your local salvage drive and signing ONE of the forms below... form No. I if the equipment is for your own equipment, form No. 2 if you are obtaining the parts bs equipment for resale.

## INDUSTRIAL ORGANIZATIONS GOVERNMENT AGENCIES SCHOOLS AND COLLEGES

Your Radio and Electronic Needs Speedily Supplied
Lafayette Radio Corporation has the "knowhow" and the "know-where" that makes for fast delivery of vitally needed radio and electronic parts. That's why so many procurement men, purchasing agents, expediters for industry, government agencies, the armed forces, experimental laboratories, training schools, etc., look to us FIRST. We can and do supply what they need TODAY-when their need is greatest. Our complete stocks, our years of experience in knowing where and how to get merchandise in a hurry, our extensive procurement facilities are at your complete disposal. Call, write, wire, telephone or teletype -and your problems are on their way to a speedy solution.

For detailed ordering instructions see page 103.
Kindly copy on your order the form below which applies to your purchase.

Form No. 1
(Radio parts for your own equipment)
I (we) hereby certify that the part(s) specified on this order are essential for presently needed repair of electronic equipment which I (we) own or operate.

Signature and Date
Address. . . . . . . . . . . . . . . . . . . . . . . . . . . . .
City and State.

## Form No. 2 <br> (Radio parts for resale)

I (we) hereby certify that I (we) am entitled to purchase the items specified on the accompanying purchase order under the provisions of Limitation Order L-265, with the terms of which I (we) am familiar.

## Signature and Date

Address
City and State




# W) GENERAL (g) ELECTRIC ELECTRONIC EINDUSTRIAL TUBES 

## Transmitting Tubes

| $\begin{aligned} & \mathbf{G - E} \\ & \text { Type } \end{aligned}$ | Tube | Max. Diss. | Net Each |
| :---: | :---: | :---: | :---: |
| 203A | Triode | 100 W. | 510.00 |
| 211 | Triode | 100 W. | 10.00 |
| 242 C | Triode | 100 W . | 12.00 |
| 800 | Triode | 35 W. | 10.00 |
| 8014 | Triode | 20 W. | 2.50 |
| 802 | Pentode | 13 W. | 3.50 |
| 803 | Pentode | 125 W. | 25.00 |
| 805 | Triode | 125 W. | 13.50 |
| 806 | Triode | 1000 W . | 22.00 |
| 807 | Tetrode | 30 W. | 2.25 |
| 809 | Triode | 30 W | 2.50 |
| 810 i | Triode | 150 W . | 13.50 |
| 811 | Triode | 55 W | 3.50 |
| 812 | Triode | 55 W . | 3.50 |
| 813 | Tetrode | 100 W . | 22.00 |
| 814 | Tetrode | 65 W . | 17.50 |
| 815 | Triode | 25 W. | 4.50 |
| 829A | Dbl. Tetrode | 40 W | 19.50 |
| 833 A | Triode | 300 W . | 76.50 |
| 835 | Triode | 100 W . | 15.00 |
| 836 | Diode |  | 11.50 |
| 837 | Pentode | 12 W . | 2.80 |
| 838 | Triode | 100 W . | 11.00 |
| 843 | Triode | 15 W . | 2.90 |
| 845 | Triode | 75 W. | 10.00 |
| 860 | Tetrode | 100 W . | 32.50 |
| 866 872 | Rectifier Rectifier |  | 1.50 |
| 8772 | Rectifier Rectifier |  | 9.00 |
| 1613 | Pentode | 10 W | 1.80 |
| 1614 | Tetrode | 21 W. | 2.80 |
| 1616 | Diode |  | 5.75 |
| 1619 | Tetrode | 15 W . | 2.20 |
| 1623 | Triode | 30 W | 2.50 |

## Resistor Type Ballasts

| G-E <br> Type | Max. <br> Volts | Maz. <br> Amps. | Net <br> Each |
| :---: | :---: | :---: | ---: |
| FB-50 | 8 | 0.275 | $\mathbf{S 3 . 5 0}$ |
| B-25 | 16 | 1.16 | 3.00 |
| B-47 | 18 | 2.35 | 3.75 |
| B-46 | 18 | 3.25 | 4.00 |
| B-6 | 21 | 1.01 | 4.50 |
| B-4 | 125 | 1.36 | 25.50 |

## Vacuum Switches

| G-E <br> Type | Type | Amp. | Net <br> Each |
| :---: | :---: | :---: | :---: |
| FA-6 | SPDT | 10 | 57.25 |
| FA-15 | SPDT | 8 | 6.25 |

## Cold-Cathode Glow Tubes

| $\begin{aligned} & \mathbf{G - E} \\ & \text { Type } \end{aligned}$ | Max. DC V. | $\begin{gathered} \text { Max. } \\ \text { Ma. } \end{gathered}$ | Net Each |
| :---: | :---: | :---: | :---: |
| $75-30$ | 75 | 30 | \$125 |
| 105-30 | 105 | 30 | 1.25 |
| 150-30 | 150 | 30 | 1.25 |

## How Electronic Tubes Work

 A General Electric book that fully illustrates and explains the anode, grid, etc. Explains the difference between the gas-filled and high-vacuum tubes (space charge and ionization). Gives the why and wherefore of the Kenotron, Pliotron, Phanotron, 1 gni tron, Glow Tube, etc. 23 pages.
## Power and Special Purpose Tubes

| $\begin{aligned} & \text { G-E } \\ & \text { Type } \end{aligned}$ | Tube Type | Cath. Volts | Net Each |
| :---: | :---: | :---: | :---: |
| 816 | Rectifier | 2.5 | \$1.00 |
| 828 | Beam | 10.0 | 17.50 |
| 830 B | Triode | 10.0 | 10.00 |
| 840 | Pentode | 2.0 | 6.00 |
| 842 | Triode | 7.5 | 3.25 |
| 864 | Triode | 1.1 | 1.00 |
| 868 | Phototube |  | 3.70 |
| 884 | Triode | 6.3 | 2.00 |
| 885 | Triode | 2.5 | 2.00 |
| 2AP1 | Cath. Ray | 6.3 | 6.25 |
| $\begin{aligned} & 3 P A 1 / / \\ & 906 \mathrm{P} 1 \end{aligned}$ | Cath. Ray | 2.5 | 13.50 |
| 3AP4 |  |  |  |
| 906 P 4 | Cath. Ray | 2.5 | 18.25 |
| $\begin{aligned} & 5 \mathrm{AP}_{4} \\ & 1805 \mathrm{P}_{4} \end{aligned}$ | Cath. Ray | 6.3 | 27.50 |
| 5BP1/ | Cath. Ray |  | 27.50 |
| 1802P1 | Cath. Ray | 6.3 | 24.75 |
| ${ }_{1802 P 4}$ | Cath. Ray | 6.3 | 27.50 |
| $7 \mathrm{AP4}$ | Cath. Ray | 2.5 | 36.00 |
| 9AP4/ |  |  |  |
| $1804 \mathrm{P4}$ | Catk. Ray | 2.5 | 62.60 |
| 12AP4 |  |  |  |
| 1803 P 4 | Cath. Ray | 2.5 | 75.00 |
| 917 | Phototube |  | 3.40 |
| 918 | Phototube |  | 2.30 |
| 919 | Phototube |  | 3.35 |
| 920 | Phototube |  | 2.70 |
| 921 | Phototuhe | . . . | 2.00 |
| 922 | Phototube |  | 2.00 |
| 924 | Phototube |  | 2.00 |
| 925 | Phototube |  | 2.00 |
| 926 | Phototube |  | 3.00 |
| 927 | Phototube |  | 3.70 |
| 928 | Phototule |  | 2.00 |
| 931 | Phototube |  | 12.00 |
| 954 | Pentode | 6.3 | 4.50 |
| 955 | Triode | 6.3 | 3.00 |
| 956 | Pentode | 6.3 | 4.50 |
| 957 | Triode | 1.25 | 3.00 |
| 958 | Triode | 1.25 | 3.00 |
| 959 | Pentode | 1.25 | 5.00 |
| 991 | V. Reg. |  | . 90 |
| 1603 | Det.-Amp. | 6.3 | 4.75 |
| 1608 | Triode | 2.5 | 4.00 |
| 1609 | Pentode | 1.1 | 1.60 |
| 1610 | Pentode | 2.5 | 2.00 |
| 1612 | Pentagrid | 6.3 | 2.00 |
| 1621 | Pentode | 6.3 | 1.50 |
| 1622 | Beam | 6.3 | 1.40 |
| 1626 | Triode | 12.6 | 1.60 |
| 1629 | El. Ray | 12.6 | . 75 |
| 1631 | Beam | 12.6 | 2.00 |
| 1632 | Beam | 12.6 | 2.00 |
| - 1633 | Tw. Triode | 25.0 | 1.50 |
| 1634 | Tw. Triode | 12.6 | 2.00 |
| 9001 | Pentode | 6.3 | 2.50 |
| 9002 | Triode | 6.3 | 2.00 |
| 9003 | Pentode | 6.3 | 2.50 |
| 9004 | UHF Diodes | 6.3 | 2.00 |
| 9005 | UHF Diodes | 6.3 | 2.20 |

## Industrial Tubes <br> Pliotrons

Grid-controlled high vacuum tubes with one or more grids for controlling plate current. Created to produce the high frequency waves used in radio broadcasting.

| $\begin{aligned} & \text { G-E } \\ & \text { Type } \end{aligned}$ | Max <br> Volts | Diss. Watts | Net Each |
| :---: | :---: | :---: | :---: |
| PJ-7 | 350 | 10 | \$5.50 |
| PJ-8 | 350 | 10 | 5.50 |

## Thyratrons

Grid-controlled gaseous discharge rectifier tubes with one or more grids to control the starting of the plate current. Will run d-c motors directly from a-c lines. Can hold desired motor speed constant regardless of changes in the load.

| $\begin{gathered} \text { G-E } \\ \text { Type } \end{gathered}$ | Avg. Amps | Peak Amps. | Net Each |
| :---: | :---: | :---: | :---: |
| 2051 | 0.75 | 0.375 | \$1.15 |
| 2050 | 0.1 | 0.500 | 1.90 |
| FG-97 | 0.5 | 2.0 | 15.50 |
| FG-17 | 0.5 | 2.0 | 6.00 |
| FG-27A | 2.5 | 10.0 | 17.00 |
| FG-33 | 2.5 | 15.0 | 16.25 |
| FG-57 | 2.5 | 15.0 | 15.00 |
| FG-95 | 2.5 | 15.0 | 19.00 |
| FG-105 | 6.4 | 40.0 | 38.00 |
| FG-172 | 6.4 | 40.0 | 35.00 |
| FG-41 | 12.5 | 75.0 | 125.00 |
| GL-414 | 12.5 | 100.0 | 92.00 |

## Phanotrons

Gaseous-discharge-rectifier tubes without a grid, therefore, no control over the plate current. General purpose a-c to d-c rectifier for use where current requirements are about 30 amperes or less.

| $\begin{gathered} \text { G-E } \\ \text { Type } \end{gathered}$ | Avg. Amps. | Peak <br> Amps. | Net Each |
| :---: | :---: | :---: | :---: |
| FG-32 | 2.5 | 15 | \$11.00 |
| FG-166 | 30.0 | 150 | 85.00 |

## Ignitrons

High-peak-Current gas-filled tubes with a mer-cury-pool cathode. Supply heavy current for use in spot or seam welding for many types of metal. Used in place of rotating machinery for changing a-c to $d-c$.

| G-E <br> Type | Max. <br> Amps. | Net <br> Each |
| :--- | :---: | ---: |
| GL-415 | 22.4 | $\mathbf{S 3 3 . 0 0}$ |
| FG-271 | 56.0 | 55.00 |
| FG-235A | 140.0 | $\mathbf{9 5 . 0 0}$ |
| FG-258A | 355.0 | $\mathbf{2 2 0 . 0 0}$ |

## Phototubes

Both gas-filled and high-vacuum types. No grid. Used in applications requiring great stability and instant response to light changes. Extremely sensitive.

| $\begin{aligned} & \text { G-E } \\ & \text { Type } \end{aligned}$ | Kind | Anode Volts | Net Each |
| :---: | :---: | :---: | :---: |
| PJ-22 | Vacuum | 200 | \$2.60 |
| PJ-23 | Gas | 90 | 2.60 |
| FJ -401 | Gas | 90 | 6.75 |
| GL-441 | Vacuum | 200 | 7.50 |
| GL-923 | Gas | 90 | 1.25 |
| GL-929 | Vacuum | 250 | 3.00 |
| GL-930 | Gas | 90 | 2.00 |



## DeForest-Sancbria CATHODE RAY TUBES

DeForest-Sanabria Cathode Ray Tubes are manufactured under rigid inspection and control and are built to meet U. S. Government requirements for cathode ray tubes. They feature hard glass envelopes, which permit operation at more than double the normal rated voltage, and provide greater safety in handling. Four pillar electron gun support with nine times the rigidity of conventional types insures long life and accuracy when used in equipment
subject to extreme vibration. In addition to the standard types listed below, quick deliveries can be made on similar types with finer or broader trace and with special types of screens, including non-burnable. TYPE 5BP1 5 CP 1 5HP1 7AP1* 7BP1

SCREEN
PRICE $\$ 24.75$
28.00 20.00
36.00
40.00
*Replacement for DeForest-Sanabria 7" Oscillograph.

## (1RG) TRANSMIITIING AND TECIAL DIIRPOSE BES



As one of the largest distributors of RCA tubes, we carry as complete a stock as possible under existing conditions. Deorders bearing sufficiently high priority rating
O-Oscillator; R-RF Power Amplifier; C-Class B Modulator; B - Beam Power Amplifier; A AF Power Amplifier; S - Screen Grid Pow

| $\begin{aligned} & \text { Thye } \\ & \text { No. } \\ & \hline \end{aligned}$ | Watts Diss. | Deserintion | Net Price | $\begin{aligned} & \text { Tive } \\ & \text { No. } \end{aligned}$ | $\begin{aligned} & \text { Wates } \\ & \text { Diss. } \end{aligned}$ | Description | $\begin{aligned} & \text { Nel } \\ & \text { Price } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 203A | 100 | R. C, T | \$10.00 | 842 | 12 | A. T | \$ 3.25 |
| 204. | 2.50 |  | 85.00 | 843 | 15 | T, R. | 1.65 |
| 211 | 100 | T, R. C, | 10.00 | 845 | 100 |  | 10.00 |
| 800 | 35 |  | 10.00 | 849 | 100 | T, C, A, R | 127.00 |
| 801A | 20 | T, R, A, C | 2.50 | 850 | 100 |  | 37.50 |
| ${ }^{802}$ | $13^{3}$ | P, R. O, A | 3.50 | 858 | 100 | T. R | 16.40 |
| 803 | 125 | P, R | 25.00 | 860 <br> 865 <br> 8 | 100 | S. R | 21.50 |
| 804 | $50^{*}$ |  | 15.00 | ${ }^{865}$ | 15 |  | 7.95 |
| 805 | 125 | T. R.C |  | 1602 |  |  | 275 |
| ${ }_{80}^{806}$ | $225^{*}$ | T. R.C | 22.00 | ${ }_{1}^{1608}$ | ${ }^{25}$ | ${ }_{\text {T, }}$ T, R, O, C | 4.00 |
| 807 | $30^{*}$ | ${ }_{\text {B, }}^{\text {B, R, }}$ | 2.25 7.75 | 1610 1613 | 10 |  | 2.00 1.55 |
| 808 809 | $30^{\circ}$ | R, ${ }_{\text {R, }}^{\text {R, }}$, C C | 7.75 2.50 | 1613 1614 | 10 | R, R, R , | 3.5 |
| 810 | 150* | T. C, R | 13.50 | 1619 | 18. | B, R.A.C, 0 | 4.75 |
| 811 | 35. | T. C. R | 3.50 | 1623 | ${ }^{30}{ }^{*}$ | R, C, T, 0 | 2.50 |
| 812 813 | ${ }^{35} 5^{*}$ |  | 3.50 22.00 | 1624 1525 | $\stackrel{25}{30}$ | B, A. ${ }_{\text {B, }}$ | 2.40 2.25 |
| 813 814 | ${ }_{6}^{100} 5^{\circ}$ | B. ${ }_{\text {B. }}^{\text {R }}$ | ${ }_{1}^{22.00}$ | ${ }_{1626}$ | , |  | 2.50 |
| 815 | $25^{*}$ | B', R, | 1.50 | 1627 | 150 | T, C, R | 13.50 |
| 826 | 60 | T, 0 | 19.00 | 1628 | 40 | T, R, O | 32.00 |
| ${ }^{827 R}$ | 800 | B. R | 135.00 | 1631 | 16 |  | 200 |
| 888 | ${ }^{80} 0^{\circ}$ | B, R. A | 17.50 | 1632 | 5.5 |  | 2.00 |
| ${ }^{829}$ | 40 | \% ${ }_{\text {R }}$ | 19.50 | ${ }^{1633}$ | 2.5 | T, | 1.50 |
| ${ }_{8398}^{8308}$ | 60 | ${ }^{\text {T. }}$ C, | 17.00 | ${ }_{8000}^{1634}$ | 150. |  | 2.00 13 |
| ${ }_{8}^{832 A}$ | ${ }_{450}{ }^{15}$ | R. ${ }_{\text {R }}^{\text {R }}$ R | 17.00 76.50 | 8000 8001 | ${ }_{75}^{150}$ | T, R, ${ }_{\text {R }}$ O, C | 13.50 27.50 |
| ${ }_{834}^{833}$ | ${ }^{4.50}{ }^{4}$ | ${ }_{\text {T, }}^{\text {T, }} \mathrm{O}$, | 76.50 12.50 | 8001 <br> 8003 | 100 | T, R' | 1200 |
| 837 | 12 | $\stackrel{1}{4}$ | 2.80 | 8005 | ${ }^{85}{ }^{*}$ | T, R. | 7.00 |
| ${ }^{838}$ | 100 | т. C, $\frac{1}{\text { r }}$ | 11.00 | 8007 | 9 | ${ }_{\sim}^{1, R}$ | 3.50 |
| 84 | 15 | R. ${ }^{\text {P }}$ T | 3.25 | 8012 | 47 | T. R | 9.00 |
| Type | Screen Net |  | CATHODE RAY TUBES |  |  | Type Screen Net |  |
| 902 |  | $2^{\circ} 57.50$ |  |  |  | 907 | 548.75 |
|  |  | 5. 52.50 |  |  |  | $9283^{\circ}$ | 18.00 |
| ${ }^{905}$ 3AP1/906-P1 <br> 5BPI 802-P1 |  | ${ }^{5} .13 .50$ | 41045 |  |  | 913 | 4.00 |
|  |  | $5^{\circ} 24.75$ |  |  |  | 914 | 85.00 |
| CATHODE RAY RECTIFIERS AND GAS TRIODE |  |  |  |  |  |  |  |
| $\begin{aligned} & \text { TyIe } \\ & 878 \\ & 2 \times 285 \\ & 2 \mathrm{~K} 3 \mathrm{G} \end{aligned}$ |  |  |  |  | 884 | Gas Tri | 52.00 |
|  |  |  |  | 1.00 | r 885 | Gas Trioce | 2.03 1.90 |
|  |  |  |  | 1.30 | 2051 | Gas Tetrode. | 1.15 |


| Type | Des. | 1'eak <br> Volts | Net | Type | Des. | l'eak Volts | Net |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 217 A | Hi-Vac | 3,500 | \$20.00 | 869A | Merc-Vap | 20,000 | \$125.00 |
| 217c | Hi-Vac | 7.500 | 20.00 | 872 | Merc-Vap | 7.500 | 7.50 |
| 816 | Merc-Vap | 5,000 | 1.00 | 872A | Merc-Vap | 10,000 | 7.50 |
| 836 | Hi-Vac | 5,000 | 11.50 | 1616 | Hi-Vac | 5,500 | 5.75 |
| 866866 A | Merc-Vap | 10,000 | 1.59 |  |  |  |  |

EXPERIMENTAL TELEVISION TUBES


HYTRON TUBES

| $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ | Purpose | $\underset{\text { Folts }}{\text { Fil }}$ | Plate Volts | Plat Ma. | $\begin{aligned} & \text { C.C.S. } \\ & \text { Diss. } \end{aligned}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| HY-24 | Triode | 2.0 | 180 | 20 | 2 W | \$1.50 |
| HY-30Z | Triode | 6.3 | 850 | 90 | 30 W | 2.75 |
| HY-312 | Twin-Triode | 6.3 | 500 | 150* | 30 W | 3.50 |
| HY-40 | Triode | 7.5 | 1000 | 125 | 40 W | 3.75 |
| HY-40Z | Triode ${ }^{\text {a }}$ | 7.5 | 1000 | 125 | 40 W. | 75 |
| HY-51A | Triode | 7.5 | 1000 | 175 |  |  |
| HY-518 | Triode | 7.5 | 1000 | 175 | 65 W | 4.75 |
| HY-517 | Triode | 7.5 | 1000 | 175 | 65 W | 4.75 |
| HY-12317 | Twin Tri | 6:12 | 500 | 150* | 30 W | 4.5 |
| 8014801 | Triode | 7.5 | 600 | 70 | 20 W | 2.5 |
| HY-60 | Beam | 6.3 | 425 | 60 | 15 W . | 2.7 |
| HY-61/807 | Beam | 6.3 | 600 | 100 | 25 W. | 2.2 |
| HY-65 | Beam | 6.3 | 450 | 63 | 15 W | 3.0 |
| HY-69 | Beam | 6.3 | 600 | 100 | 40 W | 3.9 |
| MY-1269 | Beam | 6:12 | 750 | 120 | 40 W. | 4.5 |
| 865A /865 | Tetrode | 7.5 | 1000 | 75 | 25 W. | 7.5 |
| HY-75 | Triode | 6.3 | 450) | 100 | 15 W | 3. |
| HY-114B | Triode | 1.25 | 180 | 15 | 2 W | 2.2 |
| HY-615A | Triode | 6.3 | 300 | 20 | 3.5 W | 2.2 |
| $8664 / 866$ 866 | M.V. Rect- | 2.5 | 3165 | $500+$ |  |  |

866 Jr.

- Both Iriodes. $\ddagger$-Shielded Filament. $t$-l'er pai


## HYTRON Bantam Junior Miniatures



## EIMAC POWER TUBES

> We can
Type
No.
35T
35TG
75T
100TL
100TH
$250 T L$
250TH

Watts
240
240
300
400
400
800
800
Your Cost Each
$\$ 6.00$
6.75
9.00
13.50
130
24.50
24.50
Mercury Vapor Rectifiers $\$ 7.50$
KY21* $\left\{\begin{array}{l}\text { Peak Inverse } \\ \text { Peak Plate }\end{array}\right.$ 10.00 -Grid control.
Heintz-Kaufman
GAMMATRONS

$\begin{array}{lccc}\text { Type } & \text { Watts } & \text { Plate } & \text { Fil. } \\ \text { No. } & \text { Diss. } & \text { Volts } & \text { Vits. } \\ \text { 24 } & 25 & 2000 & 6.3 \\ \mathbf{5 4} & 50 & 3000 & 5.0 \\ \mathbf{2 5 4} & 100 & 4000 & 5.0 \\ \mathbf{3 5 4 C} & 150 & 4000 & 5.0 \\ \mathbf{2 5 7} & 75 & 4000 & 5.0 \\ \mathbf{4 5 4 H} \dagger & 250 & 5000 & 5.0 \\ \mathbf{8 5 4 H} \dagger & 450 & 6000 & 7.5 \\ \text { \#-Single Class Tule "C" } & \text { R.F }\end{array}$
Power
Outp.
89
210
450
750
225
900
1800
Max.
Freq. Freq. Your
Cost
$\$ 4.75$ $100 \mathrm{MC} \quad \$ 4.75$ - High-Mu types (Low-Mu on special order)

TAYLOR TUBES

| Type | Watts |
| :--- | :---: | :--- | :--- |
| T-4iss. | Description |
| T-40 |  |

# EBALIAST TUBES and CORDS 

Line Cord Resistors


Flexible, sturdy cords for AC-DC radios, feld supplies, phono oscillators, etc. Voltage drop ratings are at .3 amps. This value sub-
tracted from your line voltage tracted from your line voltage
gives voltage applied to tube filaments.

| No. | Ohms | Voltage Drop |
| :--- | :--- | ---: |
| C5322 | 135 | 40.5 volts |
| C5332 | 150 | 45.0 volts |
| C5331 | 160 | 48.0 volts |
| C5323 | 180 | 54.0 volis |
| C5330 | 200 | 60.0 volts |
| C5324 | 220 | 66.0 volts |
| C5325 | 250 | 75.0 volts |
| C5329 | 280 | 84.0 volis |
| C5242 | 310 | 93.0 volts |
| C5326 | 330 | 99.0 volis |
| C5241. | 360 | 108.0 volts |
| C5320. | 535 | $* 78.75$ volts | *This cord used in 3 -way portable sets. Voltage drop calculated for 15 amp. drain

Any Above

## UNIVERSAL Resistor Cozd

## ¢f:

A replacement cord for all makes of receivers. One cord fits any istance. Any normally used one cord. Complete instructions supplied with each cord. 1deal C5321-
$65^{4}$ Each

## Special AC-DC Cords

## With Pilot Light Tap

 Like above, but 4 -conductors, with pilot light tap. Tinned leads. Stock Total Tapped at YourNo. Ohms Ohms Cost $\begin{array}{cccc}\text { No. } & \text { Ohms } & \text { Ohms Cost } \\ \text { c5334 } & 160 & 24\end{array}$ $\left.\begin{array}{lll}\text { C5334 } & 160 & 24 \\ \text { C5335 } & 180 & 25 \\ \text { C5336 } & 200 & 40 \\ \text { c5337 } & 200 & 25 \\ \text { C5339 } & 280 & 40\end{array}\right\}$ Each

## Special Line Cords

 For "Wireless" Players Same in appearance as above, but has fourth wire for antenna or "radiation wire" for wireless phono-oscillator, inter-communi-cators, etc. 37 or 76 tu
Your
554 C5328-270 ohms. For 647 and 2525 tube combination. St $\boldsymbol{S}$

## 220 Volt to 110 Volt

Line Cord Resistors


European or Standard Plug American cord equipped with standard male plug and female receptacle; European type resistor cord has foreign plug and standard receptacle. Indispensabe to servicemen abroad. Can be used on shavers, handblowers, small radios (up to 7 tubes) and small appliances.
C5243-Standard Each. 7 -

## Note On Ballast Tubes Due to scarcity of materials it may be necessary to substitute

 lass or metal type tubes for type made only when unavoidable be- 


## TRUTEST Ballast Resistors

For use in all AC-DC midget sets. The 185R and $K 55$ types are for $2-6.3$ and $2-25$ volt tubes; types volt tubes. Shpe, wt. 1 lb. Any Type Listed Below, Your Cost Each

$$
\text { Lots of } 10 \text { (Ass't.), Each. }
$$

No. Type C7037 140R8* $\begin{array}{ll}\text { C6868 } & 165 R 4^{*}(X 49) \\ \text { C6869 } & 165 R 8^{\circ}(5042)\end{array}$ C6865 185R ${ }^{(50) N 2)}$ C 6866 185R4*(180KB) C6867 $185 \mathrm{H} 8^{\circ}(50 \mathrm{X} 3 \mathrm{~T})$ C7039 BM49B C7039 BM49B 7041 C9265 C7041 C9266 C6860 \{2VR215\} L 55 B
K 42 B

| No. | Type <br> K55B |
| :---: | :---: |
| C6870 | $\{3613$ |
|  | 115.53 |
| C6871 | K55C(5536) |
|  | (K55D] |
| C6872 | 3614 |
|  | 115.22 |
| C6873 | K49B(115.41) |
| C6874 | K49C(16040) |
|  | (K49D) |
| C6875 | \{3334 |
|  | (115.28) |

Indicates glass or metal type, 4-prong; others metal, octal hase

## JFD Adjustable Ballast Kit

Handy kit of adjustable AC-DC ballasts designed to replace more than 2700 different types of ballast tubes not in use. Kit cantains 2 type "A $A$," 2 type "B," and 1 type "C" tubes and tools. Includes 80 -page Belt and Ballas
data. 2 lbs.
C6862-Your Cost
s3.23
REPLACEMENT TUBES FOR ABOVE
Replacement tubes for above kit. Wt. 8 oz . each.



## AMPERITE AC-DC Ballast Tubes

By using these fine regulators, tubes are kept to within $5 \%$
of their correct voltage, even if the line varies from 85 145 volts. Furnished complete with starting resistor that saves 145 volts. Furnished complete with starting resistor
nilot lights and tubes. All KL. types are octal base. *Asterisk indicates special $\mathbf{C n i t}$. Each.
Any Type Below. Your Cost REPLACES ALL AC-DC BALLASTS
 $\stackrel{\mathrm{No}}{\mathrm{N}, \mathrm{i}} \mathrm{i}$ ${ }_{C 12238}$ C12238
C12224 C12225 3-40 C12227 320R4* C12237 KL-5.5H C1222
$4 \mathrm{P} 45 \mathrm{C} 12228 \quad \mathrm{E} 157^{\circ}$ C12236 KL-50II C12221 65R4* C12233 KL-25 C12229 KL-50S1 C12450 200R* Cl 2235 KJ-25I, C12230 KL-50S2 Cl2452

## B

Typo
KL-75 L55B KL50E C12225 200R* $\begin{aligned} & \text { C1 } 2235 \\ & \text { C12232 }\end{aligned}$ REPLACES AL-45 C12223 KL 50 OB 3 V51DJ ${ }^{\circ}$


## Tyne $\mathrm{KL}-25$ KL .25 H

KL .25 H
KL .45
KL-50H
$\mathrm{KL}-75$
$\mathrm{KL}-75 \mathrm{H}$
KL-50S1
KL-50S2

| $\begin{aligned} & \text { P1 } \\ & \text { Beg } \\ & \mathbf{K}, \end{aligned}$ |  |
| :---: | :---: |
|  |  |
| , |  |

No. Type C7042 $\mathrm{K} 80 \mathrm{~B}(60-92 \mathrm{~A})$ C7043 LA2C(69-2037) C7044 L42D C6876 $\left\{\begin{array}{l}\text { LA9B } \\ 2 \text { L゙R22 }\end{array}\right.$ C6877 L49C(69-2037) C6860 L55B C6870 $\left\{\begin{aligned} \mathrm{Y}-\mathrm{TU}-9 \\ \hline\end{aligned}\right.$ K 55 B

JFD Resistance Cord Replacement Adapter


For Replacing All Untapped ( 3 wire) Resistance Power Cords. This adapter permits the use of an adjustable JFD type B ballast or any standard exact duplicate plug-in resistor tube, in place of following types of 3 -wire Untapped Resistance Power Cords: 135 ohms $\mid{ }^{220}$ ohms $\mid 330$ ohms 160 ohms 250 ohms 350 ohms 180 ohms 290 ohms 390 ohms 200 ohms 300 ohms 535 ohms Each adapter is individually packed, with complete hardware and simpl

## Your Cost

s1.32

## JFD Resistance Cord <br> Replacement Adapter

For Replacing All Tapped (4 wire) Resistance Power Cords. Same as above, but to be used in place of the following types of 4 -wire Tapped Resistance Power Cords

160 ohms tapped at 24 ohms 180 ohms tapped at 24 ohms 200 ohms tapped at 24 ohms
280 ohms tapped at 40 ohms Each adapter is individually packed, with complete hardware and simpi
Your Cost
$\$ 1.32$

## ICA Universal

## Resistovolt

An automatic voltMaintains a con: stant potential of 110 or 220 volts $A C$ or DC preventing tube burnouts, and assuring more stable performance. Easy to install-just plug in between line cord and wall outlet. For sets of from 5 to 9 tubes, Wt. $11 b$

## "Cage" Ballasts For Crosley Radios



These high quality ballasts duplicate the original units ley late model receivers. All have perforated metal shells and octal bases. Shpg. wt: 1 lb . C12131 For Model Type | C12132 | 576,676 | 42520 |
| :--- | :--- | :--- | C12133 647,647A 44338 Any Type Above,

Your Cost Each.... In lots of 5. Each


## PIIOT LIGHTS SmANEON BULBS

Genuine EVEREADY-MAZDA Pilot Light Bulbs


Both pilot and flashllight type bulbs are listed below. receivers. Bead colors aid in
rent identifying bulb types. Ever-eady-Mazda bulbs are standard in most makes of radios.
Tubulay Bulb, Miniature Screw Base (A)

| Stock | Type | Bead Color | Volts | Amps. | Ea. | 10 For | 100 For |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C12274 |  | Pink |  |  | 15c | \$0.88 | 58.14 |
| C12250 | 41 | White | 2.5 | . 50 | 9 c | . 54 | 4.90 |
| C12251 | 42 | Green | 3.2 | . 35 | 12c | . 71 | 6.47 |
| C12254 | 40 | Brown | 6-8 | . 15 | 9 c | . 54 | 4.90 |
| C12252 | 46 | Blue | 6-8 | . 25 | 9 c | . 54 | 4.90 |
| Tu | ar | ulb, | atur | Bay | net | ase |  |
| C12260 | 43 | White | 2.5 | . 50 | 9 c | . 54 |  |
| C12259 | 49 | Pink | 2.0 |  | 15c | . 88 | 8.14 |
| C12283 | 45 | White | 3. | 35 | 12c | . 71 | 6.47 |
| C12249 | 44 | Blue | 6-8 | . 25 | 9 c | . 54 | 4.90 |
| C12284 | 47 | Brown |  |  | 9 c | 54 | 4.90 |
| C12437 | 49A | White | 2.2 | . 12 | 18 c | 1.03 | 8.10 | Round Bulb, Miniature Screw Base (C)

## $C 1227$

Round Bulb, Miniature Bayonet Base (D)
${ }_{C 12268}^{C 12261}$

## FLASHLIGHT BULBS

G-31/2 (C) is small round. G-41/2 is llarge round. TL-3 (E) is lens bulb. P-31/2 (not illustrated) is pre-focused miniature flange type bulb. Stock No. Type $\quad \begin{aligned} & \text { Bead } \\ & \text { Color }\end{aligned}$

Color Volts Amps. Ea. 10 For 100 For C12201 14(G-31) C 12201 14(G-3 $\begin{array}{lll}\text { C12202 } & 605(\mathrm{G}-41 / 2) & \text { Brown } \\ \mathrm{C} 12203 & 222(\mathrm{TL}-3) & \text { White }\end{array}$ $\begin{array}{lll}\text { C12203 } & 222(\text { TL-3) } & \text { White } \\ \text { C12204 } & 112(\text { TL-3 } & \text { Pink } \\ \text { C1205 } & & \end{array}$ C12205 233 (G-31/2) Purple $\begin{array}{ll}\mathrm{C} 12206 & \mathrm{PR2}(\mathrm{P}-35 \text { ) } \\ \mathrm{C} 12207 & \mathrm{PR} 3(\mathrm{P}\end{array}$
C12207 PR3 (P-3, 3 ) Green


10 SO. 54
.54
.54
.59
.54
.54
.54
.76
.76
.59

## GE NEON GLOW LAMPS



## CANDELABRA BASE 110-120 V. Pilot Lights

 Genuine GE Mazda lamps. TyC122576 waits.
Each....
$5^{c} \quad \begin{gathered}3 \text { watts. } \\ \text { Each... }\end{gathered} 5^{\circ} \mathrm{c}$
Type c-7. As above, but cone shape watts. Nvailable in White Frosted Either Type, Each

## Tubular Candelabra Base

110-120 Volt Pilot Lamp


A brand new 4 -watt lamp that is ideal for use behind small panel openings, dials, etc. Looks just like a radio pilot C12272-10 for 3.30 .
Each.

## VICTOR Pilot Bulb

Intermediate base. frosted bulb. $110 / 120$ volts. c12253.
Carton of 10, \$1.35. Each
Theater Exciter Lamps For sound-on-film. Each measures $31 / 8{ }^{\circ}$ long, $1^{\prime \prime}$ diameter; equipped with single-contact bayonet base. Factory single-
tested

| Type | Volts | Amps. Your Cost |  |
| :---: | :---: | :---: | :---: |
| 105 | 10 | 5.0 | Any Type |
| 107 | 10 | 7.5 | 4.0 |
| 854 | 8.5 | 4.0 | $\mathbf{c}$ | Type T-5; 15 volts, 1 am- 75 c

pere. Your Cost, Each.....


## Dial Light Coloring

Kit of colors, Red, Green, Blue and of solvent. Each in screw top, wide mouth bot-C15185-
Your Cost, Per Kit

## MALLORY Panel Light

A convenient reflector for panel mounting. Miniature screw base. Mounts insingle $1 /^{\circ}$ hole. $\mathbb{C}$


## Jewelled PilotBrackets

Fine quality jewelled pilot brackets, for amplifiers, transmitters, etc. All have faceted jewels, highly polished nickelplated steel brackets. Standard lewelled brackets have $1 / 2^{\circ}$ hole. Jumbo brackets have a $4^{\circ}$ jewel, requir ing V Mole. Available Screw base sockets.
$\quad$ Base
Type
Min. Serew
Min. Bt.
Cand.

Standard Size
Green Stock No.
Min. Serew Min . Bt C6433 16 c C6456 18e C6432 16c C6427 C6454 18c Faceted Jewels only C6430 12c C6429 12c Amber C6434 16c C6458 18e C6428 19e

C6431 12e Assembly With $3^{\circ}$ " Jewel Each

 | Cand. C6333 C6334 | C6335 |
| :--- | :--- | :--- | :--- | :--- |

Front Removable Jewel Brackets
 $1116^{\circ}$ hole. $45^{\circ}$ jewel remov able; bulb can be replaced screw base. Fit tubular bulbs only C6418-Red C6417-Green Any Type C6425-Opal Any ${ }^{\text {Each. }}$

C6408-Red
C6410-Amber
Any Type,
Each.
C6411-Opal

## Giant 1" Jewel Brackets

1 diameter faceted jewels. Candelabra takes 3 or 6 -watt 110 V . bulb.

|  | Candelabra | Miniature | Bayonet |
| :---: | :---: | :---: | :---: |
| Color | Base | Base | Base |
| Red | C6403 | C6404 | C6405 |
| Opal | C6321 | C6324 | C6327 |
| Green | C6322 | C6325 | C6328 |
| Amber | C6323 | C6326 | C6329 |
| Any Type | Above, |  | $70^{\text {c }}$ |



Trutest Bull's Bye Takes candelabra base bulbs type S-6. For panels up to $1 / 2$ thick. diameter glass jewel with set
$\qquad$
of 4 color discsJewel bezel. C14174-Your Cost. C14175-Similar to above, but with green faceted Elther Type, Your Cost Each..... 5 .

## $1^{\prime \prime}$ Enclosed Pilot Light

Underwriters' A pproved
single unit socket assem-
single unit socket assem-
bly unaffected by heat. All
porcelain and brass con-
struction. For standard S6
lamp, removable from front of panel. Single $1^{*}$ hole for mounting required. Faceted red or green jewel held in highly polished chromed brass. C14141-Red Jewel
Either Type, Your Cost
\$1.0 :


Miniature Base Bayonet Base Candelabra Base

| A C6510 | C6488 | Cas |
| :---: | :---: | :---: |
| B $\mathbf{C} 6511$ | C6489 | C6557 |
| C | C6512 | C6490 | Sc ea., 10 foc 47 c 6c ea., 10 for 57 c Be ea., 10 for 75 c 100 for $\$ 4.23 \quad 100$ for $\$ 5.10 \quad 100$ for $\$ 6.75$ Phono-Compartment Light

A clever on-off push-button switch and socket Which may be
mounted so that compartment is illuminated when if is is lifted when
door opened. For Miniature Bayonet base bulb. Size $11 / 2 \times 3 \times 11 /{ }^{3}$. Bulb not supplied.
C6445-
Your Cost
$\begin{array}{cc}\text { Each Lots of } 10 \\ 8 \mathrm{c} & \$ 1.65\end{array}$


## STANDARD "C" BATTERIES

Dependable, long life batteries especially designed for "C" supply in receivers, ampifiers, etc. Also used in test equipment. ing posts or with sockets to take standard battery plugs. Others avail ing posts or with sockets to
abbe only with binding posts. $\frac{\text { able only with }}{\text { Stock No. }}$ Posts ${ }^{\text {Stock }}$ Sockets $\dagger$

## C19866

C19867 C19827 $C 19868$ C19862 C19826


| Shpg. W't. Liss | Unit Pkg. | Single Each |
| :---: | :---: | :---: |
| 1 | 4 | 31 c |
| 2 | 10 | 30c |
| 1 | 4 | 48c |
| 2 | 4 | 71e |

Has spring clips. Tapped at $3,41 / 2,16,2212 \mathrm{~V} .+$ Less plug.

## NOTE: Plugs for batteries above are listed at right. SPECLIL PURPOSE BATTERIES

FOR TEST INSTRUMENTS AND LABORATORY USE

| Stock No. | $\begin{aligned} & \text { Burgess } \\ & \text { No. } \end{aligned}$ | Terminals | Volts |  | $\begin{aligned} & \text { Shpg. } \\ & \text { Wt. } \end{aligned}$ | $\begin{aligned} & \text { W-D-H } \\ & \text { Size } \end{aligned}$ | $\begin{gathered} \text { Your } \\ \text { Cost Ea. } \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Radio "A" Batteries |  |  |  |  |  |  |  |
| C19844 | F2BP | Screw |  |  | 12 oz . |  | \$0.34 |
| C20678 | 2 FBP | Screw | $11 / 2$ |  | 2 oz . |  | . 34 |
| C20679 | 2F2BP |  |  | 1 lb | . 5 oz . |  | . 60 |
| C20680 | F4BP | Screw |  | 1 lb. | . 6 oz . | $2^{31} \mathrm{x}^{25}{ }^{51} \times 3^{\frac{5}{16}}$ | . 42 |
|  |  |  |  |  |  |  |  |
| C20682 | A15ST | Strap | $221 / 2$ |  | 5 oz . |  | 0 |
| C20683 | X30X | Screw |  |  | 2 oz . | $2^{13}{ }_{16} \times 1{ }^{3}{ }^{6 \times 411}$ | 1.80 |
| C19865 | Z30N | Screw |  | 1 lb . | . 4 oz | $3 \times 17 \times 417$ | 1.15 |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| C20685 |  |  |  |  |  | 11 | $\begin{array}{r} .30 \\ \hline \end{array}$ |
| "A" and "B"' BATTERILS FOR ILEARING AIDS |  |  |  |  |  |  |  |
| Stock No. | Bursess No. | Ter |  | Volts | $\begin{aligned} & \text { Shps. } \\ & \text { W. } \end{aligned}$ | Size | YourCost Each |
| "A" Batteries |  |  |  |  |  |  |  |
| C20688 | 1ES | Metal | Cap | $11 / 2$ |  |  | S0.071/2 |
| C20689 | 2ES | Metal |  | 1 | 5 oz . | $2^{13} 16^{\text {x }} 1^{5}$ /6 diam. | .071/2 |
| C20690 | CE | 2-Hole S | Socket |  | 5 oz . | $23 \times 1$ diam. |  |
| C20691 | TE | 2-itole S | ocket | 41\% |  | 37.8 $\times 1$ ! 16 diam. | 19 |
| Standard "B" Batteries |  |  |  |  |  |  |  |
| C20693 | W22E | 3-Hole S | ocket |  | 7 oz . | $2^{2} 86 \times 1{ }^{86} 3^{311} 3^{10}$ | 1.13 |
| C20694 | XX30E | 3-Hole S | ocket | 45 |  | x ${ }^{16 \times 3}{ }^{297}$ | 1.35 |
| For Carbon Hearing Alds-Universal Batter |  |  |  |  |  |  |  |
| C20695 | T2R | Uni. Fle Bloc | xible |  | 12 oz . | $1{ }^{1 / 16} \times 23^{\frac{8}{16}} \times 4$ 1/16 | . 36 |
| C20696 | T3R | Uni. Fle | xible | $41 / 2$ | 12 oz . | 13/6x $31 / 6 \times 4$ 1/tu | . 45 |
|  |  |  |  |  |  |  |  |
| For Western Electric Ortho-Technic Models |  |  |  |  |  |  |  |
| C20697 | C3WE | 4-Hole S | ocket |  | 12 oz | $1{ }^{2} 16 \times 31 /{ }^{1} \times 2 / 4$ | . 43 |
| C20699 | T2WE | 4-Hole S | ocket |  | 9 oz | $1816 \times 27$ ¢x 4 1/6 | . 45 |
| C20698 | T3WE | 4-Hole S | ocket | $41 / 2$ | 12 oz | $1{ }^{3} / 4 \times 31 / 64{ }^{1 / 4}$ | . 51 |

# BURGESS BATTERIES 

Due to War Production Board orders, dry battery types have been reduced to a minimum. Some of the batteries listed on this page are available only with a priority rating and it is therefore advisable to include your highest authorized preference pating with your order, to expedite delivery.

## LIGHT DUTY "B" BATTERIES

Small light weight batteries particularly designed for use in portable equipment including radios, test equipment. aircraft. etc. All with binding post terminals. Some have insulated terminals, others plain brass, All give exceptionally long service for their weight.

| $\begin{aligned} & \text { Stock } \\ & \text { No. } \end{aligned}$ | Burgess No. | Terminals | Volts | Dimensians H. W. D. | Shlig. Wt. I.bs | $\begin{aligned} & \text { Unit } \\ & \text { Pkg. } \\ & \hline \end{aligned}$ | $\underset{\substack{\text { Single } \\ \text { Each }}}{ }$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C19861 | 5308 | insulatad | 45 |  | 4 | 5 | 1.16 |
| C19863 | 4156 | brass | 221/2 | $3 \times 33 / 0 \times 2916{ }^{\circ}$ | 2 | 4 |  |

## STANDARD AND HEAVY DUTY 45 Volt "B" Batteries

Super B batteries have oversized cells and are built to give maximum service. Both Regular and Super types available with Fahnestock clips or with sockets for standard battery plugs. Plugs not included.

Standard Duty 45 V . B's (Tapped at $221 / 2 \mathrm{Y}$.)

| $\begin{array}{r} 8 \text { stoo } \\ \text { Clip } \\ \text { Cl9829 } \end{array}$ | No. Sockrt C19825 | $\begin{aligned} & \text { By } \\ & \text { No. } \\ & 2308 \end{aligned}$ | rgas Type Regular | $\begin{aligned} & \text { Dimensions. } \\ & \text { II. W. W. }{ }^{1} \text {. }{ }^{22^{7}} . \end{aligned}$ |  | Sbpes. Wt. 8 lbs | Linit Pkg. 6 | $\left\lvert\, \begin{gathered} \text { Single } \\ \text { Each } \\ \$ 1.33 \end{gathered}\right.$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Heavy Duty 45 V . B's (Tapped at $221 / 2 \mathrm{~V}$.) |  |  |  |  |  |  |  |  |
| $\begin{aligned} & \mathrm{C} 19831 \\ & \text { C19832 } \end{aligned}$ | C 19824 C 19822 | $\left\lvert\, \begin{aligned} & 10308 \\ & 21308 \end{aligned}\right.$ | Regular Super |  | 4* $43 / 2$ | $\underline{12} 12$ lbs. | 6 | $\begin{array}{r} \$ 1.85 \\ 2.23 \end{array}$ |
| IGNITION |  | AND | GENERAL |  | UTILITY : |  | BATTETIES |  |
| Stock No. | BurgessNo. |  | Volts | Shpg. Wt. | Size |  | Your Cost Each |  |
| $\begin{aligned} & \text { C19858 } \\ & \text { C19846 } \\ & \text { C19847 } \end{aligned}$ | $\begin{aligned} & 4 \mathrm{FH} \\ & 4 \mathrm{~F} 2 \mathrm{H} \\ & 4 \mathrm{~F} 4 \mathrm{H} \end{aligned}$ |  | $11 / 2$ 6 | $\begin{aligned} & 11 / 2 \mathrm{lbs} . \\ & 3 \\ & 7 \text { lbs. } \\ & 7 \mathrm{lbs} . \end{aligned}$ |  |  | $\begin{array}{r} 50.33 \\ .77 \end{array}$ |  |


| Standard Battery Plugs |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Fit any make of dry bateery. Check specifications carefully. When in doubt, give make and model number of battery on your order so that we can determine the correct type of plug you will require. |  |  |  |  |
| No. | Illus. | Description | L'sed With | Each |
| C20591 | (1) | 3-prong "B" | 45 V. "B" Batte |  |
| C20592 | (2) | 3 -prong " C " | 412 V " ${ }^{\text {c" }}$ Batterins |  |
| C20593 | (3) | 5-prong " C " | $22^{\prime \prime} \mathrm{V}^{\text {V }}$ "C" Batterics |  |
| C20590 | (4) | 2-prong "A" | $41_{2} \mathrm{~V}$. "A" Batteries |  |
| C20595 | (5) | 2-prong "A" | $11,2{ }^{1}$ "A" Batterics |  |
| C20596 | (6) | 3-prong " $B$ " ${ }^{\text {P }}$ |  |  |
| C20597 | (\%) | t-prong "Ad $\mathrm{B}^{\prime \prime}$ | Comb. $11 / 2$ V. " $A$ " \& 00 V. "B" pachs |  |
| C20598 C20599 | (8) | ${ }_{\text {2-prong }}$ "-prong "Ad ${ }^{\text {a }}$ " | 6 V. "A" Batteriss. Comb. 6 V. "A"d 90 V. "B" packs |  |



# ${ }^{\circ} \boldsymbol{*} P$ POWER SUPPPIV EQUIPM ENI <br> PINCOR "Gold Crown" Heavy Duty <br> <br> JANETTE Converters 

 <br> <br> JANETTE Converters}
 with separate a.c. and d.c. windings; good regulation of output voltage; quiet operation. Other ratings and input and output voltages available. Write for details. 110 Volts D.C. to 110 Volts A.C.

## Stock Output Input Wt. No. Watts Watts Lbs.

 c17229 C1729 C17211ATR DC to AC Inverters
 Models
For 6
12
32
110
and
220
Volts
D.C.

Especially recommended for use with radio receivers, phono-radio combinations and ment. Exceptionally well filtered. Designed for quiet, long-life operation. Standard models are equipped with ten-contact plug-in vibrators. A.C. output. Both Intermittent and Cont inuous output wattages are indicated. Size of Standard model $95 \times 6110 \times 1 / 2 \mathrm{hpg}$. wt. Standard models 18 lbs .
Stock D.C. Volts Watts Your
No. Input Int. Con.

| $\mathbf{C 1 7 2 4 2}$ | 6 | 85 | 75 | $\$ 17.0$ |
| :--- | ---: | ---: | ---: | ---: |
| $\mathbf{C 1 7 2 4 3}$ | 12 | 125 | 100 | 17.0 |
| $\mathbf{C 1 7 2 4 4}$ | 32 | 150 | 100 | 17.6 |
| $\mathbf{C 1 7 2 4 5}$ | 110 | 250 | 150 | 17.6 |
| $\mathbf{C 1 7 2 4 6 *}$ | 110 | 325 | 225 | 23.2 |
| $\mathbf{C 1 7 2 4 7}$ | 220 | 250 | 150 | 17.6 | 17.61 28 lbs.

## VESTA 2 and 6 Volt

 Storage BatteriesLong-live stor forradio
equipment and lishting molded leak proof contain ers and over sized cells Bushings are molded in to prevent corrosion and acid seephandle.

## 6-Volt Batterie

No. Plates Amps. Irs. Lbs. Ea.

| C21099 | 13 | 92 | 105 | $35 \$ 6.55$ |
| :--- | :--- | ---: | ---: | ---: |
| C22098 | 15 | 106 | 120 | 42 |

$\begin{array}{llllll}\text { C22098 } & 15 & 106 & 120 & 42 & 7.35 \\ \mathbf{C 2 1 0 9 7} & 17 & 124 & 145 & 50 & 8.15\end{array}$

## 2-Volt Battery

Single cell. For 2 -volt farm receiv300 hour operation at 0.5 amp . drain 19 plates. Rechargeab 22 ths. C21096-Each
$\$ 5.45$

## Hydrometer

Live red rubber bulb and nozzle beaded float. Wr. Cost.... 30 个

Gas-Electric Plants
$\star$ Economical Operation $\star$ Compact Design '"Power Co." Electricity $\star$ Light Weight
Heavy Duty 110 V. A.C. Plants. Single cyl inder, 4-cycle air cooled engines. They answer
the ever-increasing demand for generators of the ever-mereasing demand for generators of
greater output with attending low first cost
 economical operation and minimum space requirements. Electricity anywhere at anytime. The result of many years of developmental work and tests by "Pincor" engineers. 600 Watt model has 1 h.p.
engine ( 7 hours on 1 pallon); 1000 Watt model has $2 \mathrm{~h} . \mathrm{p}$. engine $(4-5$ engine ( 7 hours on 1 gallon): 1000 Watt model has $2 \mathrm{~h} . \mathrm{p}$. engine ( $4-5$
hours per gallon). Electric start ( 12 v . battery). Aux. rope starter Stock No. Watts Wt. Lbs. Your Cost $\begin{array}{lrlr}\text { C19894 } & 600 & 190 & \$ 157.96 \\ \text { C19895 } & 1000 & 225 & 228.36\end{array}$

BATTERY BOOSTER Dry disc rectifier type 4 to 2 amperes tapering
charge. Has external circuit breaker with
quick front reset. Per forated for thorough
ventilation. With $6-\mathrm{ft}$ cord for light socket cord with clamp-on receptacle for dash nounting. Dimen.: $6 \times 3$ Yys kle. For 115 volts, $50 / 60$ cycles a.c Cli5696 Your Cost
\$6.24

## Model 5535 Charger

 A.C. cord, 6 ft. D.C ceptacle for dash
$115 \mathrm{~V} .50 / 60$ cycles ${ }^{7} 12$ ths. Your Cost $\$ 9.02$
$\left\lvert\, \begin{aligned} & \text { Model } 107 \text { Heay-Duty Charger } \\ & 10 \text { to } 7 \text { ampere charg- }\end{aligned}\right.$

For charging any 6-volt battery at
hone. Delivers full 5 amperes and tapers off as battery charges, thus preventing damage to cells due to over charging. Has receptacle for attaching to car and ammeter so that battery can
 be charced without removing it from car. With tube and all accessories. For $110 \mathrm{v},. 60 \mathrm{cyc}$. C15699-
Your Cost
$\$ 12.25$

## TUNGAR Bulbs

We can supply Mallory aviation rectifier battery chargers to answer the need for a practical and economical unit to charge 12 and 21 Volt Mallory magnesium-copper sulfide dry disc method of rectification.

$\qquad$

## MALIORY Vibrapacks

Flexible, heavy-duty vibrator power supplies for supplying high voltage direct current from a storage battery or similar d.c. sousce. Fo use with receivers, amplifiers, transmitters. etc. Four voltage outputs in 25 volt steps. Efficient and compact. Tube rectifier type is required where " $B$ " minus cannot be at ground potential.


Used in battery chargers, "A" eliminators, etc. Can replace Rectigon bulbs of equal rating. Individually tested. Shpg. wt. 2 lus


## MALLORY VP-540 Filtered Vibrapack

 A complete "B" power unit that operates from any 6 volt storage battery and delivers 250 volts at 60 ma., closely matching the power requirements of most auto, marine and aircraft receivers. The self rectifying unit is fully fittered. Complete with overall Cize: $7^{1}$ C6059-
$\$ 14.24$


From 110-115V. D.C. To 110 Volts A.C.



## Genuine Mazda 6-Volt <br> Edison Base Bulbs

Edison base light bulbs for use in 6 -volt lightin
cuits. Inside frosted
C12256 25w Draws 2.5 A
Either Type,
Each



The watchword of today -the watchword of Victory-is SPEED. Speed in productionspeed in management-speed in aching peak efficiency all can be bell Tha through instant communication throus why industrial plants everywh the finest amplithe country have adopted field, LAFAYETTE, fying equipment in tion schedules. to help meet producation between departInstant communication of personnel-ments-prompt loc instructions-reliev= faster transmission
hese are only a few of the ways in which P.A. will assist in your plant.

Sound systems aiso play a vital part in military camps and training schools today. They speed up administra instruction, expedite announce recreation and drills. furnish music problem may be entirely difYour sound pundreds of others we ferent from for various users throughout have solved there is LAEAYETTE equipthe world. Bul be best suited to meet your ment that will rindoor or outdoor work. Call, needs for eith or teletype us today and we'll help pu.A. to work for you-and Victory.

Because Lafayette offers a complete P. A. line, with a model available for every application, selection of the proper amplifier for a particular project is a simple matter indeed. Whether you need just a small spesker system, many large speakers or a combination of both, there is a Lalayette amplifier that will meet your requirements perfectly. Possibly, you may have some unusual sound problems or you may be in doubt concerning the most suitable system for your use. If so, call, write, teletype or wire our Sound Consultation Division. Our engineers are at your service without obligation, of course, to supply you with rec. ommendations, quotations or any other sound data you may require,

How to Select System Components
The type of microphone or microphones for use with your system can best be determined by a careful reading of the microphone listings on pages 16, 17 and 18. Speakers, batiles, irumpets, driver units, etc., will be found on pages 20,21 and 22. The descriptions are, of necessity, confined by space limitations, but should prove adequate to aid in making correct selection of component parts for your P. A. system.
In addition, a listing of excellent Inter Communication Equipment for all office, factory or other use, will be found on pages 14 and 15.

On the following pages gou will find Lafayette amplifiers varying in output from 6 watts to 100 watts. These units are simple to install. By following the instructions supplied any electrician, maintenance man or radio technician can set up any Lafayetle amplifier and system and be certain of perfect operation in a majority of cases.

The chart below has proved beneficial to many in selecting amplifiers and systeme for various locations. This chart is accurate for all normal conditions of nolse level. Where nolse level is higher for a given location, select the next larger size amplifier; where noise level is lower the next smaller size will suffica. If in doubt, please consult our engineers.

| Room | Outdoor | Seating | Amplifier |
| :---: | :---: | :---: | :---: |
| Volume | Area | Capacity | Wattage |
| $50,000 \mathrm{cu} . \mathrm{ft}$. | 3,000 sq. ft. | 500 | 5 to 8 |
| $80,000 \mathrm{cu} . \mathrm{ft}$. | 4,000 sq. ft. | 800 | 12 to 16 |
| 150,000 ou. ft. | 5,000 sq. ft. | 1,500 | 18 to 24 |
| $200,000 \mathrm{cu}$. ft . | 20,000 sq. ft. | 3,000 | 26 to 36 |
| $300,000 \mathrm{cu} . \mathrm{ft}$. | 40,000 sq. ft. | 5,000 | 30 to 40 |
| $500,000 \mathrm{cu} . \mathrm{ft}$. | 60,000 sq. ft. | 2,500 | 45 to 65 |
| 700,000 cu. ft. | 75,000 sq. ft. | 10,000 | 75 to 100 |



## amplifier

## TECHNICAL SPECIFICATIONS

POWER OUTPUT: 14 watts normal (Less than $5 \%$ distortion); 25 watts peak. GAIN: Microphone inputs 125 db .; Phono input 85 db .
FREQUENCY RESPONSE: 40 to 12,000 cycles plus or minus 1.5 db .
INPUT CIRCUITS: Three input channels; 2 microphone, 1 phono.
INPUT IMPEDANCES: All microphone and phonoinputs high impedance. (Model EL 14 has one low impedance microphone channel of 50,200 , or 500 ohms, and one microphone channel and one phono channel of high impedance.)
OUTPUT IMPEDANCES: $4,8,15,250$, or 500 ohms.
SPEAKER FIELD SUPPLY: For two 500 ohm tield speakers.
TUBES: 2-7B4, 1-7F7, 1-7N7, 2-6L6G, 1 -
SY4G. volts, $50-60$ cycles A.C.
DIMENSIONS: $14^{\prime} \times 73^{\prime} \times 8^{\prime \prime}$

## $\star$ Three Inputs-Two Mikes and One Phomo © Full Range Electronic Mixing of all Inputs $\star$ 6L6 Push-Pull Beam Power Output $\star$ Built-in Field Supply

The new Lafayette Model El4 14 watt amplifier incorporates a wealth of high-quality, high performance features.
Three separate input channels for two microphones, and one phono pickup, all of high impedance, are provided. Model EL 14 is supplied with one low impedance microphone channel for installations which require the use of extremely long microphone lines. The remaining microphone input, and the phono remaining microphone input, and the phono
input, are high impedance. In both models, input, are high impedance. In both models,
each microphone channel has individual preeach microphone channel has individual prefully mized simultaneously.
Bass and treble tone compensator permits adjustment to meet all acoustic conditions. Push pull 6L6G beam power output assures ample volume with well-rounded tone quality. Output impedances of $4,8,15,250$ or 500 ohms are available at a terminal strip and at two built-in speaker sockets. Outputimpedance at speaker sockets may be instantly changed at speaker sockets may be instantly chang

Field supply for two 500 ohm field speakers is provided at the speaker sockets, but PM speakers or driver units may be used without any changes. Handsome grey wrinkle finish cabinet with illuminated sloping control panel. Measures $14^{\prime \prime} \times 7^{1} 4^{\prime \prime} 8^{\prime \prime}$

## Lafayette 14 Watt Amplifier

 Model E14-Lafayette 14 watt amplifier as described above, complete with tubes and input and output connectors, but less micron phone and speakers. (See pages 16 to 22). Your Cost\$42.04

## Low Impedance Amplifier

 Model EL14-Lafayette 14 -watt amplifier similar to above, but with first microphona input of 50,200 or 500 ohms. Tap can be set to desired impedance. Shpg. wt. 25 lbs.\$52.23

## Cafuyte

30amplifier

## $\star$ The Low-Cost DeLuxe Amplifier $\star$ Beam-Power Output-Electronic Mixing * Three Input Channels-Full Range Controls

The new Lafayette Model E30 30 watt amplilier truly marks a new path in the tield of lowcost, fine quality units. Available in both high and low impedance models, this seven tube bigh gain amplifier uses a pair of 6L6G bearn-power output tubes to provide plenty of power with excellent quality. Three input channels, two for microphone and one for phono permit wide flexibility of operation. Each input is individualiy controlled and all can be mixed and used simulianeously. A can be mixed and used simulianeously. A provide complete variation of tone to match provide complete variation of tone to matich conditions. A variable impedance all acoustic conditions. A variable impedance output strip furnishes impedances of $4,8,15$,
250 , or 500 ohms at the two speaker sockets 250 , or 500 ohms at the two speaker sockets and insures easy and correct matching for any number of speakers. Built-in field supply for
two 500 ohm field speakers. PM speakers or driver units may also be used without any circuit changes.

An illuminated sloping control panel, handsomely etched in bright modern colors, matches the smart streamlined cabinet design.

## Lafayette $\mathbf{3 0}$ Watt Amplifier

Model E30-Lafayette 30 watt amplifier as described above, complete with tubes and input and output connectors, but less microphone and speakers.

## .w. 30 be Your Cost 2 aー <br> Low Impedance Amplifiex

Model EL30-Lafayette 30 -watt amplitier, similar to above, but with first microphoze input of 50,200 or 500 ohms. Tap can be set to desiredimpedance. Shpg, wt. 301 lbs Your
Cost...................... $\$ 5.5$
Microphones and speakers for the above Microphones and speakers for the above
amplifiess are Listed on pages 16 to 22.

## TECHNICAL SPECIEICATIONS

POWER OUTPUT: 30 watts normal (Less than $5 \%$ distortion); 40 walts peak. GAIN: Microphone inpuis 129 db .; Phono input 89 db . input 89 db FREOUENCY RESPONSE: 40 1012,000 cycles plus or minus 1.5 db . INPUT CIRCUITS: Three input channels; Two microphone, one phono.
INPUT IMPEDANCES: All microphone and phono inputs high impedance. (Model EL. 30 has one low Imp. microphone channel of 50,200 , or 500 ohms, and one microphone and one phono channel of microphone and
high impedance.) 500 ohms available at terminal strip or at two speaker sockets.
SPEAKER FIELD SUPPLY: For two 5000 ohm field speakers.
TUBES: 2-7B4, 1-7F7, 1-7N7, 2-6L6G, 1-5Y4G.
POWER CONSUMPTION: 130 watts, 117 volts, $50-60$ cycles A.C. DIMENSIONS: $15^{\prime \prime} \times 73 / 4 \times 91 / 4^{\prime \prime}$.

# Safayette 5 4Ts amplifier 

$\star$ Exclusive Lafayette Dual Construction $\star$ Two Complete 35 Watt Power Amplifiers $\star$ Units May be Used Separately in Emergency

The Lafayetto Model E75 is a dual unit consisting of two soparate 35 watt power amplifiers, each with its own driver Slage, Power Supply, Separate Fired Bias Rectifiers, Inverse Foedback and Separate Master Gain Controls. It may be used as two separate 35 watt power amplifiers-driven by preampliber common to both-or the outputs of both amplifiers may be paralleled to deliver 70 watts. Exceptionally well suited for all high power installations such as Skating Rinks, Athletic Fields, Stadia, Large Auditoriums, Drills Halls, Armories, Factories, etc.
As an emergency feature the dual amplifier design of Model E75 safeguards against com. plete breakdown. In the event of tube burnout, condenser or transiormer failure, etc., half the power ( 35 watts) is still available in the amplitier section not affected. The tapped output transformer of each amplifier is connected to separate marked terminal strips. Two microphones and phono may be mixed simultaneously through the three high impedance inputs. Each input has its full range volume control. A Low Impedance Model EL75 is available at a slight additional cost for installations where it is necessary to run long microphone lines or for other special applications.
A complete variation of the overall tone is made possible by the Bass and Treble compensator, to compensate for all acoustic conditions. Insures far more flexibility of tone range than is possible through ordinary tone controls.

May be operated by remote control; any two input channels may be mixed and volume regulated at any distance. Advanced design remote control circuit not subject to hum, loss or frequency discrimination.
For sound system components to be used with this amplifier see Microphones on pages 16 , 17, 18, Speakers on pages 20,21, Baffles and Trumpets on page 22.
Use any high impedance crystal, dynamic, or velocity microphone, PM speakers, PM driver nits, or speakers with AC field exciters.

## Lafayette $\mathbf{7 0}$ Watt Amplifier

Model E75-Laiayette 70 watt amplifier as described above, complete with tubes. In metal cabinet, $171 / 8 x 10 x^{1}$ 68 lbs.

## Your Cost

\$95.55

## Low Impedance Amolifier

Model EL75-Lafayette 70 watt amplifier, similar to above, but with first microphone input channel equipped for low impedance. Uses special high fidelity input transfosmer, mounted right on chassis. Humless. Tapped ai $50,200,500$ ohms. With tubes. Shpg. wt. 70 lbs . Your Cost
s105.84

## R-MOTE CONTROI

Model SRCSO-Remote control for use with either of the above amplitiers. Complete with 50 ft . of cable and plugs. Shpg. wt. 4 lbs . Your Cost. ......................... $\$ 6.47$

## TECHNICAL SPECIFICATIONS

POWER OUTPUT: 70 watts (less than $4 \%$ distortion) normal 100 watts peak.
INPUT CIRCUITS: Three input channels two Microphone inputs; one phono inpul. INPUT IMPEDANCES: Microphone channels
-high imped ance $500,000 \mathrm{ohms}$. (Low impedance channels available in Model EL-75 provides taps of $50,200,500$ ohms). Phomo input -high impedance 500,000 ohms.
DUAL OUTPUT CIRCUITS: Tapped output of each amplifier connected to marked terminal strips.
GAIN: Microphone Inputs; 124 db . Phono Input; 95 db .
FREQUENCY RESPONSE: 30 to 14,000 eycles per second +1 db .
REMOTE CONTROL PROVISION: Built-in provides complete mixing and fading any two of the 3 available inputs from remote point. CONTROL PANEL: Siz controls: 2 microphone; 1 phono; 2 Master Controls; 1 Bass and Treble compensator.
TUBES 14: 2-7B4, 2-7F7, 2-6F6G, 4-6L6G 2.5 K4G, 2-5W4GT

POWER CONSUMPIION: 290 watts. 117 volts, $50-60$ cycles A.C.
DIMENSIONS: $171^{\prime} \times 10^{\prime} \times 121 / 2^{\circ}$

## Satapelt

 were
# Booster Omplifier 

## $\star$ Converts Any Small Amplifier Into A High Pawer Job <br> $\star$ Requires Only Two Watts Driving Power <br> $\star$ All Oversize Components For Perfect Regulation

The Lafayette 100 watt Booster lends itself ideally to large instal lations such as stadia, ball parks, ship-yards, airports, auditoriums, convention halls, etc.
Embodies all the latent circuit developments. Has four 6L6 beam power tubes arranged in a special push-pull parallel circuit which will deliver 100 watts of andistorted power output. All transformers and componenis are generously designed to give the excellent regulation so necessary in this type of circuit.
Despite the power output, surprisingly little driving power is necessary - two watts will do a perfect job. Thus any existing small system may be easily convertad into a bigh power installation.
Input 15,50, 250 and 500 ohms; output $500,250,166,125,100,84$ and 72 ohms. Separate secondary for voice coil with taps at 15 , 9,4 and 2 ohms to enable the matching of any combination of speakers or lines. Connections on terminal strips.

## LAEAYETTE 100-Watt Booster Amplifier

## Safayette

18

## amplifier

## TECHNICAL SPECIEICATIONS

POWER OUTPUT: 18 watts normal
(Less than 5\% distortion); 24 watts peak
GAIN: Microphone input 115 db . Phono inputs 70 db
FREOUENCY RESPONSE: 50 to 10,000 cycles plus or minus 3 db INPUT CIRCUITS: Two phono, One Microphone Channel. INPUT IMPEDANCES: All microphone and phono inputs high
impedance.
OUTPUT IMPEDANCES: $2,4,8,16,250,500$ ohms with variable selector.
selector. $1.6 J 7,1.6 S C 7,1.6 \mathrm{FBG}, 2.6 \% 7 \mathrm{G}, 1.6 \mathrm{~W} 5 \mathrm{G}$.
CURRENT DRAIN: 6 volt D.C. 14 amps., 117 volts A. C. 110 watts.
DIMENSIONS: $131 / 4^{\circ}$ deep, $141 / 0^{\circ}$ wide, $81 / 6^{\circ} \mathrm{high}$.

* For 6 Volts D.C. 110 Volts A.C. Use $\star$ Low Curent Drain-High Output $\star 3$ Input Channels-Mixing \& Fading

Ideal for use in trucks or cars, for both indoor and outdoor use. Automatic change over from D.C. to A.C. Operates equally well on either ype of current. Low current drain on battery (only 14 amperes) makes this a highly popular amplitier for sound truck use. Separate "standby" switch permits the tube filaments to remain heated for instant operation while the high voltage supply is cut off to conserve battery supply between announcements, etc.
Mixing and fading control provided for use with any two inputs. Base-treble tone control for acoustic matching. Smartly styled cabinet inished in light qrey wrinkle with triple-toned sloping control panel and studio knobs
For Microphones, Speakers, bafles, trumpets, etc., for use with above see pages 16 to 22 . Use any high impedance crystal, dynamic or velocity microphone, and PM speakers or driver units. Now available without phono motor only.

## 18 Watt Mobile Universal Amplifier

Model 422T-Lafayette 18-24 watt Mobile Universal Anplifier, as described above, complete with all tubes. For 6 volts D.C. or 110 volts described above, complete with all tubes. For Your Cost (less phono motor).
54.30
$\star$ For Police, Military \& Civilian Defense $\star 6$ Volt D.C. and 110 Volt A.C. Operation * Output Equals Ordinary 15 Watt Amplifiers The Lafayette Model E66 is a definite departure in the mobile amplifier field. It has been especially designed for use in police and military cars, safoty cars, etc. Compact, inexpensive and simple to install and operate. Has extremely low current drain but amazingly high acoustic oulput.
This model can be used on either a 6 -volt storage battery or on 117 volls A.C. Modern in design and extremely simple to install. Requires no more room in a car then a radio or a small heater.
The amplitier utilizes push pull output and has sland-by switch which reduces current drain and keeps unil reads for immediate use.
This amplitier will deliver sound output equivalent to that of a 15 watt amplifier when used with the specially developed University folded exponential reflez speaker listed b. Jow. This all-metal completely exponentherproof trumpet may be easily mounted under the hood or on the weatherproof trumpet may be easily mounted under the hood or on hige fender or top of an automobile. Othertypes of PM speakers and any high impedan

## 8-Watt Universal Mobile Amplifier

Model E66-Lafayette 8-watt Mobile Amplifier, as complete with tubes, Shpg. wt. 18 lbs
Your Cost
C24015-Heavy duty "Booster" speaker with mounting bracket and rubber rim. Shpg. wt. $8 \frac{1}{2}$ lbs. Your Cost
$\$ 32.05$
POWER OUTPUT: 8 watts
GAIN: Microphone inputs 110 db .; phono input 75 db . HUM: A.C.-Minus 45 db . D.C.-Minus 62 db . INPUT CIRCUITS: 1 Microphone input; 1 phono input all high impedance.
OUTPUT IMPEDANCE: 4, 8, 15 ohms available at 5 -prong speaker socket.
POWER CONSUMPTION: 6.3 volts storage battery; 7 amps.; 117 volts A.C.; 50 watts.
TUBES: 1-7F7, 1.6F6G, 1-6AD7G, 1.724.
DIMENSIONS: $53 / 4$ " wide, $7 \frac{7 / 4}{}{ }^{*}$ deep, $61 / 4$ high.

## TECHNICAL SPECIFICATIONS

POWER OUTPUT: 32 watts normal (less than $5 \%$ distortion); 40 watts peak GAIN: Microphone inputs 120 db .; Phono input 31 db .
FREQUENCY RESPONSE: 30 to 12,000 cycles plus or minus 1 db .
INPUT CIRCUITS: Three input channels; Two microphone, One phono. All High Impedance
OUTPUT IMPEDANCE: $4,8,15,250,500$ ohms
CURRENT DRAIN: 6 voltD.C. 23.5 amps., 117 volts A.C. 120 watts. TUBES: 3-7B4, 2-7F7, 2-6L6G, 1-5X4G.
DIMENSIONS: $16^{\circ}$ long, $16^{\circ}$ wide, $10^{1 / 4}$ high.


## t Triple Range Electronic Tome Corrector * 3 Channel Input-Two Mikes, One Phono - Enclosed Built-In Phono <br> + Autormatic AC to DC Changeover

The De Luxe Lafayette Model EX $32-6$ Universal Mobile Amplifier is recommended for use wherever the finest in sound is required. Completely self contained in one compact unit; amplitier and phono assembly with hinged cover as well as automatic changeover for use on six volt D.C. or 115 volt A.C. power supply.
Electronic mixing of both microphone channels and phono input simultaneously. The Triple Range Electronic Tore Corrector offers complete control of bass, treble and middle register. This assures complete mastery over every possible acoustic situation.
A constant speed motor insures smooth running operation on either 6 volt D.C. or 115 volts A.C. An Astatic crystal pickup with shock-proof arm is used.
Use any high impedance crystal, dynamic or velocity micrn phone, and PM speakers or driver units.
For Microphones, Speakers, trumpets, etc. for use with above amplifiers see pages 16 to 22.

## 32-Watt Deluxe Mobile Amplifier

Model EX32-6 Lafayette 32 watt de luxe mobile amplifier as described above, complete with tubes. \$11.
Shpg. wt. 60 lbs. Your Cost........ 24 Shpg. wt. 60 lbs. Your Cost.
Hydrometer to indicate condition of battery under load Your Cost

## Intercommunication Systems STANDARD

## Master Selective Systems



Master Selec. consist of a sina gl Ma Station and up to ten Sub-Stations. Master Stations can call each Sub-Sta tion individually tion individually or all Sub-Sta and can listen in on any Sub-Station at any time. Sub Stations may anewer or originate a call to the Master, but cannot communicate among thernselves. Press-totalk switch on SubStations is used when originating a call to the Master, but is not used when answering a call. Person at Sub-Station may answer a a distance of 25 to 50 feet from the unit A system may be built up starting with the Mater Station and one Sub-Station, and Sub-Stations added as required.

## Super-Selective Systems



Super-Selective Systems consist entirely of Mas. ter Station units. Any station may converse with any other station at will, and several separate two-way conbe held at the same time with same ume with and without cross.talk. There can be abso lutely no eavesdropping by other stations Stations may call other stations even though power is not turned on at station called and volume on incoming calls may be ad justed at each station. In systems using Privacy Earphone, Talk-Listen switch is not operated. A system may be built up starting with two stations and stations added as requised up to a total of ten in all.
Combination Master Systems


Fig. III Combination Master Systems Consist of Master Stations, Stalf Suations, and Sub.Stations in any combinacan call and converse with any other Mas. ter or directly connected Staff Station or Sub-Station, and each Master may have its own private network of Staff Stations and Sub-Stations which cannot call or be called by any other Master. Master Stations may listen in on directly connected Sub-Stations at any time, but cannot listen in on Staff Stations. Staff Stations can originate calls to Masters, but cannot listen in at will nor interrupt when Masters are speaking. SubStations cannot originate callo but can an${ }^{8}$ wer when called. Both Staff Stations and Sub-Stations can be answered at distances of 25 to 50 feet from the units, but cannot communicate among themselves. A system may be built up starting with two stations (at least one must be a Master) and stations added as needed up to a total of ten in all.

## TALK-A-PHONE STANDARD SYSTEMS

The Standard Intercommunication Systems listed below are the most economical units available today. They feature SILENT OPERATION-which shuts out at the Master noises from Sub-Stations not in use; the Master from a whisper to full room the Master from a whisper to full room
volume; FAR REACHING POWER person volume; FAR REACHING POWER person called at Sub-Station or Staff Station can answer at distances of 25 feet from the unit Sub-Stations and Staff Stations may be operated at distances of up to 2000 feet from the Master units. Output from Master Stations is 1 watt, and they can be operated for as little as 15 C per month in electric current. Master Station Units are housed in attractive walnut wood cabinets measuring $93 / 4^{\circ} \times 53 / 4^{\prime} \times 8^{\prime}$. Sub-Stations and Staff Stations have metal cabinets, $53 / 4{ }^{3} \times 3^{3} / 4^{\prime \prime} \times 7^{\prime \prime}$ For operation on $110-115$ volts AC or DC

## Master Selective System

 See Fig. IModel LP5-Standard Master Station com plete with tubes and instructions. For opera tion with from one to live Sub-Stations. Less cable. Shpg. wt. 8 lbs . $\$ 19.95$ Yaur Cos Model LP10-Same as above, but for operation with from one to ten Sub-Siations. Your Cost... . . . . . . . . ............. $\mathbf{\$ 2 4 . 9 5}$ Model RS3-Standard Sub-Station, for use with either of the above. Shpg. wt. 4 lbs. Your Cost................. $\$ 7.25$ C16000 Cable for connecting Sub-Stations
to Masters. Per 10 tt ............... 45 c

## Super-Selective System

Model LP100 See Fig. II
Station. From two Super-Selective Master systera. With tubes and instructions in a less cable. Shpg. wt. 8 lbs. $\$ 2350$ Your Cost
Model LP110 Same as above, but from Cost ten may be used in a system. Your
C16001-Cable for connection between LP 100 units. Per 10 ft ....................85e C16002 Cable for connection between LP110 units. Per 10 ft ................... $\$ 1.30$

## Combination Master System

 Model LP67-Standard Cofer Station for Complete with tubes and instion system. less cable. Shpg. wt. 8 lbs. \$25.50 Model LP

77-S...... 10 1 Model RS31 Si. Your Cost .... 529.75 originate calls to lbs. Your Cost.................... 58.75 Model RS35-Standard Statt Station, can originate calls to up to 5 Masters . Shpg. wt. 4 originate calls to up to 5 Masters. Sh pg. Wt. 4
lbs. Your Cost................. Model RS2 Standard Combination Sub-
Station. Your Cost Station. Your Cost ............. $\$ 6.75$ C16003-Cable for use between up to 3 Masters. Per $10 \mathrm{ft} . . . . . . . . . . . . . . . .85 \mathrm{c}$ C16004 Cable for connecting Sialf Stations to Masters. Per 10 ft ..........85c C16005-Cable for connecting Sub-Stations to Masters. Per 10 ft

## TALK-A-PHONE DE LUXE SYSTEMS

The DeLure Intercommunication Systems incorporate all the features of the Standard Systems listed above, and in addition are considerably more powerful. The Master Stations have a full $21 / 4$ watt output, SILENT OPERATION, to eliminate noises from Sub-Stations not in use; variable volume control adjustable at each Master from a whisper to full room volume; PRIVACY EARPHONE (optional) which disconnects speaker when lifted to insure absolute listening privacy. Extra power allows person at Sub-Station or Staff Station to answer at distances of 50 feet from the unit. 3000 feet of cable may be used between stations. Master Stations are housed in beautifully tinished choice walnut wood cabinets, finished both back and front, measuring $12 \times 61 / 3^{\prime \prime} \times 5{ }^{3} 8$. Sub-Stations and Staff Stations are in matching walnut wood cabinets $21 / 2^{\prime \prime} \times 33^{\prime \prime} \times 61^{\prime \prime}$. For operation on $110-115$ volts AC or DC.

## Master Selective System

 (See Fig. 1)Model KR40-DeLuze Master Station, for use with up to ten Sub-Stations, complete with tubes and instructions but less cable. Shpg. wt. 10 lbs.
Your Cost.
\$34.95
Model KR40C-Same as above but with Privacy Earphone. Your Cost ... $\$ 43.50$ Model RU43--DeLuxe Sub-Station, for use with either of above. Shpg. wt. 4 lbs. Your Cost............................. 25 C16000 Cable for connecting Sub-Station to either type Master. Per 10 ft . . . . . . . . 4 jc

## Super-Selective System

 (See Fig. II)Model KS60 DeLuxe Super-Selective Master Station. From two to ten may be used in a system. Complete with tubes and instructions, but less cable, $\$ 34$ Model KS60C-Same as bove Privacy Earphone. Your Cost... . $\$ 43.50$ C16002 Cable for connecting stations. Per $10 \mathrm{ft} . . .$.

## Combination Master System

## (See Fig. III)

Model KC87-DeLuxe Combination Maser Station, for use in 10 station system. Complete with lubes and instructions, but less cable. Shpg. wt. $10 \$ 38,5$ Model KC87C-Same as above, but with Privacy Earphone, Your Cost.... 546.95 Model UC82-DeLuxe Combination SubStation. Shpg. wt. 4 lbs. Your Cost $\$ 11.25$ Model UC201-DeLuxe Combination Stafd Station, to call 1 Master with volume control. Shpg, wt. ${ }^{4} 4$ lbs. Your Cost . . $\$ 12.95$ Model UC205-Same as above, but to call up to 5 Masters. Your Cost...... $\$ 14.95$ C16003- Cable for inter-connecting up to three Masters. Per 10 ft . . . . . . . . . . . . . . 85e C16006-Cable for inter-connecting up to
six Masters. Per 10
ft ................ C16004-Cable for connecting Stalf Stations to Masters. Per 10 ft .............. 85 c C16005-Cable for connecting Sub-Siations to Masters. Per 10 ft ..

# the Chief intercom For AC-DC Installations 

$\star$ Uni-Trans Control<br>$\star$ Powerful Amplifier<br>$\star$ Hold-A-Matic Push Button Control<br>$\star$ Amazing Versatility $\star$ Stylized Cabinets



## TALK-A-PHONE "Chief" Systems

"Chief" Intercommunication Systems offer all the advantages and features of the DeLuxe Sys. tems plus the added Glezibility of Hold-A.Matic Push Button Control and the unique Uni-Trans Control. The instantaneous, positive operating pushbulton system enables any number of stations in Master Selective Systems to hold a conference without danger of eavesdropping from other stations in the network. The UniTrans insures uninterrupted one way transmission of speech-ideal for dictation, etc. because no other station in the network can interfere. Full power output of $21 / 4$ watts allows persons at Staff Stations or Sub-Stations to answer at distances of up to 50 feel from the units, and permits the use of up to 3000 feet of cable between stations with undiminished volume. Master Stations are housed in matched wood cabinets of harmonious design measuring $15^{\prime \prime} \times 61 / 2^{\prime \prime} \times 7^{\prime \prime}$. Staff Stations and Sub-Stations have matching
wood cabinets measuring $71 / 2 \times 33 / 4 \times 61 / s^{\prime}$. For wood cabinets measuring $71 / 2^{\prime} \times 33 / 4$ " $^{2} 61 / \mathrm{s}^{\prime \prime}$. For Operation on $110-115$ volts AC or DC.

## Master Selective System-Fig. I

Model C410 Chief Master Station for use with up to ten Sub-Stations, complete with tubes and instructions but less cable.

## Your Cost

Moder
$\$ 4125$
Earphone. Your Cost
Prvacy
$\$ 50.25$
Model Puas
either Ra--Chief Sub-station, for use with
either of the above. Shpg. wt. 4 lbs.
Your Cost............................ 511.25
C16000 Cable for connecting Sub-Stations to
Master. Per 10 ft.
45 c
Super-Selective System-Fig. II
Model C610 Super-Selective Master Station, for use in ten station system, complete with tubes and instructions, but less cable. Shpg. Yt. 14 Cost.
$\$ 41.25$ Madel C610

Cvacy Earphone, Your Cost. ith Pri-C16007-Cable for interconnecting stations Per 10 ft

## Combination Master System Fig: III

Model C810-Combination Master Station, for use in 10 station system, complete with tubes and instructions, but less cable. Shpg. wt 14 lbs.
Your Cost
Model CS810C Same as above, but with Privacy Earphone. Your Cost
$\$ 55.95$ Model UC201-Staff Station to originate calls to 1 Master. With Volume Control. Shpg. wt. 4 lbs . Your Cost.
s12.95
Model UC205 Same as above, but to originate calls to up to 5 Masters, Your Cost .... $\$ 14.75$ Model UC82-Sub-Station. Cannot originate calls to Masters. Shpg. wt. 4 lbs ,
Your Cost
511.25

C16006 Cable for interconnecting up to 6 Masters. Per 10 ft..................... $\$ 1.70$ C16004 Cable for connecting Staff Stations to Masters. Per 10 ft. . . . . . . . . . . . . . . . . . . . . . 85 s C16005-Cable for connecting Sub-Stations to Masters. Per 10 ft . . . . . . . . . . . . . . . . . . . . . 30 c

## TALK-A-PHONE "Super Chief" Systems

"Super Chifef" Intercommunication Systems, the answer to today's great demand for splitsecond communication, offer supreme versa tility of operation, absolute privacy, high power
output finest voice reproduction, beautiful output, finest voice reproduction, beautiful ntyling, and these many new features; Busy Signal Light: Red light indicates that the station called is busy; Call Waiting Light: Amber light ing voice to break into conversation; Uni-Trans. Control, for uninterrupted one-way speech; Hold-A-Matic Push Button Control, for instant and positive operation; Privacy Earphone, (optional) for absolute listening privacy; Indi: (optional) tor absolute listening privacy; IndiStall Stations; Full AC operation, for depenStability and extra power. Master Stations have dability and extra power. Master Stations have full 5 watt undistorted output. Master Stations choice wood cabinets which will fit inlo any modern arrangement. Size $15^{\prime \prime} \times 6^{\prime \prime} 2^{\prime \prime} \times 7^{\circ}$. Sta4 Stations and Sub-Stations in matching wood cabinets, $71 /{ }^{\circ}{ }^{\circ} \times 31 /{ }^{\prime \prime} x 6^{1 / 4}$. For operation on 110 valts 60 cycle AC anly.
Master Selective System-Fig. I Incorporates all the Super Chiof features, including Busy Signal and Call Waiting Lights. When Master is talking to a Sub-Station, and another Sub-Station calls, Call Waiting Light
at Master indicates another station has called without allowing voice to break into conversa tion. At the same time, Busy Signal Light on Sub-Station indicates the Master is busy. As soon as first conversation ends, lights go ot and new coaversation can start.
Model CS1410-Super Chief Master Station for use with up to ten Sub-Stations, complete with tubes
Shpg. wt. 16 lbs . instructions but less cable. Vour Cost.
$\$ 70.50$ Model CS1410C-Same as above, but with Privacy Earphone. Your Cost. Model US703--Sub-Station for use with elther of above. Shpg. wt. 4 lbs. Your Cost . $\mathbf{\$ 2 0 . 5 0}$ C16008 Cable for connecting Sub.Stations to Master, Per $10 \mathrm{ft} .4 . . . . . . . . . . . . . . . . . . . . . . . . .85 c$
Super-Selective System-Fig. II The most efficient system for executives and department heads. Busy Signal and Call Waiting Lights form complete privacy protection so that several stations may hold a conference with absolutely no interference or eavesdropping from other stations. When the Privacy Earphone is used in the system, units operate just like a telephone-no need to use the Talk-Listen switches. Several separate uninterruptable and completely private two-way conversations may be held simultaneously.
Model CS1010-Super Chief Super-Selective Master Station, for use in up to ten station
system, complete with tubes and instructions, but less cable. Shpg. wt. 16 lbs. $\$ 70.50$ Model CSioioc-sime as above but with Privacy Earphone. Your Cost. . . . . . . . 579.50 C16009-Cable for interconnecting either of above stations. Per 10 tt.
\$2.95

## Combination Master System-

## Fig. III

Includes all the Super Chief features combined with supreme versatility never before achieved in intercom systems.
Model CS1810-Super Chiel Combination Master Station, for use in ten station system, complete with tubes and instructions, but less cable. Shpg. wt. 16 lbs . Your Cost?
\$79.50 Model CS1810C-Same as above but Privacy Earphone. Your Cost........ $\$ 88.25$ Model US901-Staff Station to call 1 Master. Shpg. wt. 4 lbs. With Busy Signal Light and Volume Control. Your Cost............. $\mathbf{\$ 2 0 . 5 0}$ Model US905-Same as above, but to call up to 5 Masters. Your Cost $\quad \$ 26.50$ C16009-Cable for interconnecting Masters. Per 10 ft. . . . . . . . . . . . . . . . . . . . . . . . . . . . $\$ 2.95$ C16010-Cable for connecting Staff Stations to Masters. Per 10 ft. ............................ 85 e Systems of up to 100 stations, using any Talk-a-Phone model are avallable. Complete information and prices on request-

HOW TO ORDER CABLE. For Master Selective Systems, Measure the distance between each Sub-Station and the Master Station, and order cable equivalent to the total of these distances. For Super-Selective Systems, measure the distance between the first Master and the second, the second and the third, etc., untilyoureach the last station in the system. Order cable equivalent to the total of these distances. For Combination Master'Systems, measure distance from first Master to second, second to third, etc., until you reach the last Master In the system. Order Inferconnecting cable for Masters equivalent to the total of these distances. Then measure the distance between each Sub-Station or Staff Station and the Master or Masters to which it ls to be connected and order cable equivalent to the total of these distances.

(A) Model T-3

A new and improved semi-directional crystal mike with superb response. Tilting head; tilts from horizontal to vertical. Output- 52 db ., response 30 to $10.000 \mathrm{cjse}^{2}$. Standard plug and 30 to 10,000 cjIs. 5 tandard plug and
connector, with $3 / 8^{-}-27$ thread, spring connector, with $3 / 8 "-27$ thread, spring
cable protector and $15-\mathrm{ft}$. cable. cable protector and 15 -ft. cable. screen grille. High impedance.
C13670-Wt. 3 lbs. \$14. 70 Mike and Stand
C13525-Model GT-3-T-3 mike as above with Grip-To-Talk Stand.
Shpg. wt. $5 \mathrm{lbs}. . \$ 17.64$
Your cost.........
(B) Model D-104

A favorite for communications use. Has a new type Graphoil crystal ele ment with improved shock mounting. Output. -48 db .; response rises grad ually from 500 to 4000 c.p.s. Solid bronze case finished bright chrome. With plug and connector for $5 / /^{\prime \prime}-27$ thread, spring cable protector and 7 ft. cabl
2 lbs. c13363-Your Cost $\$ 13.23$ Model GD-104: D-104 mike on "Grip-10-talk" desk stand described on page
C13358 C13358-
Your Cos
(C) Model N-30

A model with excellent frequency re sponse that makes it highly desirable for use in sound systems. Careful en gineering, efficient manufacture and rigid laboratory control to provide perfect satisfaction. Ideal for all-round public address use. High impedance. Tilting head permits adjustment to directional or non-directional positions. Concentric cable connector provides for quick interchange of cables Chrome finish. $15-\mathrm{ft}$. cable. Shpg
Model N-30. Wide-Range C13401-
Your Cost
(D) L-1 Lapel Mike

Small watch case model using the dual-diaphragm principle Bimorph crystal cartridge bar ometrically compensated and shockproof mounted. Developed to meet especially difficult pickup conditions where the speaker or artist requires a wider latitude of movement than can be tolerated with a microphone in fixed position. Equipped with a Spring Clip. Oquipped with a Spring Clip. Output -62 db. Response: $30-$
10,000 c.p.s. $11 / 2^{\circ}$ diameter. 15-ft. cable. Statuary bronze Hiph impedance. $\$ 14.70$
C13429-Ea....

## ASTATIC Model JT-30-TT

Incorporates an "Ebonite" treated sealed Bimorph crystal element in an acoustically designed cartridge case. Output is -52 db . Pleasing bass response. Case $2^{\frac{1}{4}, 6^{\prime}}$ diam, $3^{\prime \prime} \mathrm{h} .3_{16^{\prime \prime}} \mathrm{d}$. Finished in two-tone gray. Mounted on a combination hand or desk stand with diecast base and locking wood handle. Excellent for use with home recording outfits, etc. Especially well suited for use with portable and permanently installed sound systems or communication equipment. High impedance. All purpose mike.


## KAAR Type 4-C Microphone

 *Superb Voice Quality*Moisture Proof Single button carbon type housed in a black molded bakelite case. Direct action. The design is such as to minimize any loss of efficiency due to the angular position of the microphone. High "Push-to-1alk" the microphone cable and can be used for conthe microphone cable and can be used for controlling various circuits in the transmitter and receiver. Holder furnished. Mike measures $23 / 8^{\circ}$
diam. by $131^{\prime \prime}$ deep over braclet Suiteh diam. by ${ }^{13 / 4}$ dends ${ }^{110}$ above case $32^{\circ}$ bracket. Switch explied with 3 -way mike plug. Shpg. wt 9 oz C13449
$\$ 11,50$


## UNIVERSAL Model W

Single button Carbon, high sensitivity, light weighn compact design. Ideal detectaphone, used on small ransmitters. communicating systems; experimenters avorite. Clear-cut response to all voice frequencies (Out put level. -38 db ). Screw terminals. 200 ohm imped ance. Black bakelite case. $178^{\circ} \mathrm{d} .012^{\prime \prime}$ thick. Shpg. Wt C13443-Your Cost.
\$2.35

## AR-1 AIRCRAFT Microphones

 Single button carbon mikes which operate in any posi-tion where a light weight rugged unit is required. Heavy duty DPST press to talk, switch. Will operate in any cimate. Moisture proof. $4^{\prime}$ cord. $183^{\prime \prime}$ diam., $114^{\circ}$ thick Button impedance 200 ohms. Shpg AR-IS. For closed cab
Model AR-IM. For
$\$ 20.58$ ...................... $\mathbf{\$ 2 0 . 5 8}$ c13446Your Cost
\$20.58

## AIRCRAFT TYPE Hand Set

For aircraft. amateur, mobile or pack transmitters and Two-Way Phone Systems. May be used anywhere. Rugged. light weight construction. Low priced, dependable instrument. Furnished in black bakelite with $6^{\circ}$ cord. 200 ohm single button Microphone and 500 ohm Magnetic type receiver to match line impe C13596-Your Cost
\$7.35

## Tlectro-Voice Microphones


(A) Model 612

Frequency response 40 to 9,000 cis. Output level: - 56 db . The head is tiltable through a $90^{\circ}$ arc. Convenient on-offswitch. Cableconnector part of stand coupler not subject to strain when head is tilted. Available in head is tilted. Available in
chrome or gun-metal. 20 - ft . cable supplied. High imcable supplied. High im Clach..... \$18.7 Gunmetal Model. C13788.
Your Cost \$1 $\$ 70$
(B) Model 605 A new low-costdynamic that provides excellent quality, Frequency response 45 and 8.000 cps .. excellent for P A and recording. Out put level: and recording. Output level: -57 db . Head has fixed tilt of $22^{\circ}$. Available in chromium or gunmetal finish. With 8 -ft. cable. High impedance. Shpg. wt.' 5 lbs. C13785
Your Cost 17.5 C13786-Gunmetal Finish. Your
Cost........ $\$ 177$
(C) Model 630

A popular priced dynamic with excellent characteris tics. Pure piston-acting diaphragm to eliminate spurious frequencies. Frequency response 40 to 10,000 cys Output level: -55 db . Tiltable. Built-in on-of switch $20-\mathrm{ft}$ cable. Shpg. wt. 5 l bs High impedance.
C13505-Chromium Finish Your Cost \$17. 5
Gunmetal Finish.
C13506 $\$ 1$. 77

## (D) Model V-1

 A real high-fidelity velocity microphone. Excellent for P.A., recording, etc. Small in size, yet highly flexible in operation. Carefully en gineered under rigidly supervised testing. Frequency response $40-10.000 \mathrm{cps}$. Output level: -65 db . May be tilted for non-directional use. Zero cavity resonance. reduced feedback. On-of switch, $20-\mathrm{ft}$. cable. Gunmetal finish, chrome trim Built-in xformer. Wt. 6 lbs High impedance. $\$ 16.17$(E) MODEL V2

A wide-range hich impedance velocity microphone that will provide long and trouble-free service with amazing accuracy of reproduction of both speech and music. No inductive hum pickup to within $18^{*}$ of a power supply. With rubber mounted shock absorber. $20^{\circ}$ cable and locking cradle. Response: 35-11,000 c.p.s. substantially flat. Output: -64 db .
C13740 Your
Cost.

* ATLANTA 3, GA. 265 Peachitree St. II


## AMPERITE Microphones

"PG" Pressure Gradient Dynamics (1) \#Eliminates Feedback \#Uni-Directional \#Flat Response New sunerior elipsoid pickup pattern. Eliminates feedback urouble because it has lowest feedback point of all diaphragm tyre microphones. Free from annoying peaks, giving studio quality reproduction. Range 40 to 11,000 c.p.s. Output level- -56 db . Station-tyre cable connector, built-in "on-off" switch. Case is designed according to modern acoustic principles with satin chromium finish. Rugred, not affected by temperature, altitude or humidity. Has unusually high output.
C13610-PGH. High Impedance
C13613-PCl. 200 Chms
Your Cost, Either of Above
\$18.82
C13611-PGA11. As above, but 70 to 8000 c.p.s. 12 High Impedance
Your Cost.
C13607-Plastic Baffic for PG Microphone.


## Velocity Microphones

(2) With Acoustic Compensator. Feature hand-hammered ribbons. Alnico magnets. standard "station type" cable connector assemblies, built-in "On-Off" switch, felt carrying case. Guaranteed for three years. Built-in Acoustic Compensator-push knob up to increase years. Buit-in Acoustic Compensator-push knob up to increase highs down to increase lows. Range C13668-RBHD. Hi-Impedance.
C13665-RBMK. 200 Ohms...
Your Cost $\$ 2 \div 70$
Either Type (3) Standard Models

Similar but range: $60-8000$ c.p.s. Output:- 68 db. 12 -ft. cable.
C13598-RSHK. Hi-Impedance
C13595—RBSK. 200 Ohms.......... Either Type $\$ \$ 8.89$

## (4) Economy Velocity

Amperite quality at a very low price. Excellent response. Output: - $i 8 \mathrm{db}$. Shock absorber, swivel, carrying bag. Chrome finish. RAL200 ohms. RAH- 2000 ohms impedance. Wt. 7 lbs .
C13619-RAH ( 12 -ft. cable)
Either Typ


KONTAK MIKES For Musicians
Faithfully reproduce the vibrations of any musical instrument. They reproduce the entire audible range without introducing any annoying peaks. Used extensively by many famous name bands. Have been used by the Phitadelphia Symphony Orchestra to re-enforce a mandolin solo. Increase timbre-create new effects. Avaitable, as illustrated at left above, without hand volume control and also with this control as illustrated at right. Model KR is a special hi-output model that will work on phono inputs of most amplifiers and radio reccivers (built after 1935). Other models are for use on regular mile channels. All are high immedance (available in 200 ohms impedance on order only). Average shpg. Wt. 4 Ibs, cach. ${ }^{\text {Models Without Volume Control ( } 1 \times 3 \times 1 \text { ) }}$

|  | models | Without Volum | e Control (1x3xa) |  |
| :---: | :---: | :---: | :---: | :---: |
| Stock No. | Model | Range $40-9000 \mathrm{c} . \mathrm{p} .8$ | $-30 \mathrm{db}$ |  |
| C13661 | K1 | 40-9000 c.p.s. |  | 4 |
| C23675 | SKH | 40-6000 c.p.s. | -40 db. 15-ft. | 7.06 |
| C13698 | KR | 40-6000 c.p.s. | Spec. 15-ft. | 7.06 |
|  | Model | with Volume | ontrol ( $3 \times 1 \times \frac{5}{8}$ |  |
| C13690 | KKH | 40-6000 c.p.s. | -30 db . | 10.58 |
| C13691 | KKHH | 40-9000 c.p.s. | -30 db . $25-\mathrm{ft}$. | 16.46 |

"KF" Foot Volume Control
Provides smooth control of volume by foot action. For any high impedance Kontak mike. Size: $9 \times 21 / 2 \times 21 / 2^{2}$. Supplied with $15-\sqrt{2}$. cable. C13663-Your Cost Each

## Bridge Clamp

For guitars, mandolins and similar instruments. Simplifies installation of Kontak microphones on string instruments. Adjustable from "16" 10 1/4". C13686 Your Cost Each.
C13687-Your Cost Each
LGP Input Transformer
Matches 50 or 200 ohms to hi-impedance input. Standard for close talking microphones; Laboratory for voice and music. $\$ 3$ C13608- Standard-Your Cost Each.

Replacement Ribbons (Not Shown
Velocity Microphones RBHK, RBMK, RSHK RBSK. 2 to a package.
C13566-Standard. Each
.73c C13567-Super. Each. . . . . . $\$ 1.03$

## American munamic : <br> Model D7T <br> A good quality moving-coil dynamic with a semicommunication type response suitable for general PA work. Compact- $2 \times 236^{\circ}$. Output: -56 db . (below IV. bar). IIi-impedance. Semi-directional. Equipped with $121 / 2 \mathrm{ft}$. cable. Fits -27 threaded stand. Wt. 3 Ihs <br> C13486-Hi-Impedance C13487-200 ohms. <br> Either Type, Each <br> $\$ 1435$ <br> Model D9AT Unidirectional Mike A pressure-velocity comhination microphone with pickup only from the front, broad frequency response and high output plus the usual dymamic microphone qualities of ruggedness, immunity to weather conditions and circuit adaptability. Averare output approximately $-5-1 \mathrm{db}$. Response growl to 10.000 c.p.s. Size: $7 \times 2 \frac{1}{2} \times 2 \frac{1}{4}$ deep. Sat in chrome finish. $25-\mathrm{ft}$. shielded rubber covered cable. Standard ${ }^{5}{ }^{\circ}-27$ thread. Equipped with swivel and standard co <br> C13572-200 ohms impedance $\$ 24$ <br> Model RC Crystal Mike <br> Chrome and walnut finished Mike. With cable and spring protector for cable at mike. Wide range, semi-directional. Output-52 db. Twopiece removable desk stand easily converted into a hand mike. Mike can be mounted on floor stand. 5 "-27 thread. Suitable for home-recording, PA, ctc. Wt. $11 / 2$ libs. <br> ctc. C1347t- With 7 -ft. cable. Your Cost............. <br> $\$ 5.85$

## SOSHURE MICROPHONES



## UNIDIRECTIONAL MICROPHONES

$\star$ Greater output without feedback
$\star$ Eliminates reverberations and background noises
$\star$ Permits closer placement of mike and speakers

(A) Model 556 DYNAMIC

Super-Cardloid. Has the most unidirectional pattern in the limacon family. It is twice as unidirectional as the Cardioid, from the standpoint of receiving front sounds and rejecting rear sounds, yet has wide-angle front pick-up. This new pick-up pattern decreases pick-up of reverberation and random noise $73 \%$. "Ultra" wide range frequency response from 40 to 10,000 cycles assures excellent reproduction. Moving coil unit is highly immune to mechanical vibration and wind noises. Furnished complete with 18 inch cable. Shpg, wt. 6 lbs.
C13564-Model 556B.
C13568 Model S56A. 35-50 ohms A
(B) Model 730B "Uniplex" Uni-Directional Crystal A true uni-directional mike-sensitive at the front, dead at the rear,
Solves feedback, room and background noise and reverberation probSolves feedback, room and background noise and reverberation problems. Ideal for use in theatres, night cluhs, restaurants, churches, etc. High quality-wide range response. Average front to rear discrimination about 15 db . Output level 63 db . below 1 volt per bar. Triple moisture-proofed Grafoit Bimorph crystal. Head diameter 31/3. depth $31 / 8^{\circ}$. Fits standard $8 / 8^{\prime \prime}-27$ threaded stand. 25 ft . cable and connector. Shpy. wt. 4 lbs.
C13679-Model 730B.
Similar to above but especially designed for voice reproduction. Ideal for
C13699-Model 730SH. With 7 -fit. cable.
(C) Model 55 "Unidyne" Uni-Directional Dynamic Famous Shure "Cardioid" Dynamic-dead at rear. The answer to many a difficult installation. Eliminates feed back problems and provides greater usable output. Response: $40-10,000$ c.p.s. Ideal for high quality broadcast. P.A. and Recording. High output: 55.5 db . below 1 volt dimensions: $41^{\circ}$ high, $34^{\circ}$ wide and $316^{\circ}$ deep. High impedance model with buit-in transformer. Shpg. wet. 5 lbs.
\$29.11 C13672-Model 55A-Low Impedance. Same as 55C but $35-50$ ohms impedance. Recommended where long lines are necessary. Cable length practicaly cost.
$\$ 27.54$
C13664-Model 55B. Same as 55A but for 200-250 oh cable
s29.11
C13673-Cable type transformer to match 55 B or 55 C to hi-imped. $\$ 7.06$ C13665-Model 55CV. Special voice model for speech and singing.
 Your cost

## MODEL S36A Desk Stand

Streamlined die-cast base with rubber feet for stable support at correct height. Takes Shure connector or any standard type mike, concealing plug in base. Others mount as shown in illustration. Ornamental button on front can be removed and a switch or volume control substituted. Adapter plate and tubing provided for other type microphones. Iridescent gray finish. Base $21 / 2^{\prime}$
C13602-(Less Mike). Cl3602-(LLess
\$2.35
Model S32D Desk Stand
Popular design and quality construction. Modernistic style beautifully finished in iridescent gray and polished metal. Height adjustable from $7^{\circ}$ to $11^{\prime} 6^{\prime \prime}$ diameter base. Slandard $5 \%^{\circ}-27$ thread for mike. Wt. 4 ths. (Less Mike) C13643YOUR cost.
$\$$ : $01 \begin{aligned} & \text { the free } \\ & \text { C13638 } \\ & \text { Your }\end{aligned}$

## QMIKE SANOSSACCASSORIIES

## Crystal Mike Cable

Flexible stranded tinned copper single conductor; tinned copper braid shield; cotton wrap and lac quered braid, rubber overall. Out side diameter $280^{\circ}$ C20842-Per Foot. C1633-50-Foot Roll C16334-100-Foot Roil
Low Impedance Crystal And Velocity Mike Cable


Consists of two conductors, color coded in a closely woven tinned cop per shieldink with outer covering of C16079-Per Fon C16201-50-Foot Roil C16202

3 and 5 Conductor Shielded Cable

Three color-coded stranded conduc tors in tightly woven tinned copper shield. $\frac{1}{3}$ outer covering of high percentage rubber. C16206-50-Foot Roll $61 / 2^{4}$ 53.09 Similar to above, but 5 -c C16100-100-Feet $\$ 9.00$. 10 \& Your Cost per Foot


## Microphone Fittings

 Brass, chrome finish. Threaded $5{ }^{\circ}$ (A) Couples two fittings threaded 8 \%
Ci1770- 24
(B)Connectstwocables with female
connectors, tal i--g ple. nector and cable $38^{\circ}$



High Quality Floor Stands
Adjustable smoothly and noiselessly, and provided with wear ever, sure-grip
automatic friction clutch locks for firmly locking the The hardened fibre bushing in the clutch is practically indestructible. Has gauge metal, triple chrome plated. Has standard mikes. Extends from $35^{\circ}$ to $68^{\circ}$. Has 10 Shp. wt. 19 lbs. $\$ 40 \leq 5$
C13647-Each....


## Lecturer's

 Microphone Neckstand For lecturers, demonstrators, around the neck and leaves hands no matter which way the lecturer faces. Fits any mike. Weighs only 12 oz. 56 " -27 thread on flexible C13451-Each
## AMT?

AMERICAN Carbon Hand Microphones Model SB: Sensitive
$(\because$ single bution carbon
mike on handle for casy
hand operation. Opperates in any position.
Black crackle finish. Resistance 200 ohms.




TRUTEST Two-Brition Carbon Mike High quality 2 -button carbon mike. Range: $45-7000$
c.p.s. Heavy chrome plated frame. Pure 24 k . gold contacts. Duraluminum diaphragm C13420-Your Cos
Glvilition Connectors and Phrers


## Single Contact Mike Connectors

 Pressure type compact connec tors for use with single conductor shell forsecond contact. Con shell forsecond contact. Conred connections are pressed together by tightening coupling ring. Plated metal shells. Insulation is special tissue base aminate bakelite. Cable shield casily grounded through shell by soldering to cable protector. Accommodate cables up to $1 / 4^{\circ}$ in diameter.Type MC1F-Female cord con-
nector. (A). nector. (A).
Type PC1M-Male chassis connector. Same as MCIM, but for
chassis mty. (C). Type MC1F-A-Right angle female cord connector with spring cord protector. Use with PCIM. SP-PCIM or CL-PCIM. 3 S
 Type SP-PC1M-Sameas PC1M a heary coil spring. (D). 24
Type CL-PC1M-Closed circuit chassis connector. Closes circuit automatically when mil connected. (D) C13268-Each
$2 \div 4$

## Phone Plug Adapter



Makes a standard phone plug out of the MCIF cable connector. No soldering or wiring required. C13388-MC1P
Your Cost.........44

## Microphone Switch

Attaches between male and female of any of the above connectors. Push-to-talk or stide switch for permanent connection C13357-MC1S Your Cost


## Banquet Stand

Two-Tone Model. Heavy brass chrom ed tubing; black wrinkle finished base, $536^{\circ}$ diam., with rubber bumpthread to fit all stan dard microphones 832" high. Less

## $\$ 1.25$

Your Cost

## 1

 and ring. 8 springs supplied. Overall height $9^{\prime \prime}$. Removable ring. wrinkle finish Your \$1 $\$ 7$DeLuxe Banquet Stand Same as above, but with $1^{\circ}$ rever-
able round ring. Height
all. Shpg. wt. 5 lbs. $\$ 2$
C13542- Your Cost.

## Microphone Springs

 Cilmall Made of steel C13402-Set of 8$\qquad$
17 C Your Cost.

JENSEN Type "J"' Coaxial Hi-Fi Speakers


Efficient dual speaker assemblies with cone type "tweoter". mounted in the cone assembly of the "woofer". Provide true high-fidelity response. and are ideally suited for FM and fine AM receivers, for broadcast and recording monitoring, etc. The $15^{\circ}$ models incorporate a built-in two channel network providing high and low-pass channels with attenuation of $10-12 \mathrm{db}$ per octave; also furnished with four-position Hish Frequency Control Switch on a $36^{\circ}$ cable, ("roll-of"" control of high range). $12^{\circ}$ model has simple bridging type network that affords good wide-range per formance; no range control switch with this model These units can be used with "CA" or "BR" en losures listed below

## Model JAP-60. 15"/ Speaker

Professional type for FM-AM broadcast monitoring, transcription playback, reference standard for laboratories, etc. Range 50 to $12000-$ 15000 c.p.s. Efficiency 3 db higher than other $15^{\circ}$ models. Input impedance 500 ohms. Max. input 14-15 watts. Integral two-channe network. With 4-position H.F. control
$\$ 41.16$

## Model JHP-52. $15^{\prime \prime}$ Speaker

For all general applications such as FM and AM receivers, fine phonographs, broadcast and recording monitoring, etc. Range 50 to 12000 5000 c.p.s. Maximum input 1214 watts. Input impedance 500 ohms. Integral 2-channel network. With 4 -position H.F. control. C19002-Your

## Model JCP-40. 12" Speakex

Excellent modernizing unit to replace $12^{\circ}$ speakers in radios and phono-
radio combinations. Range 50 to $10000-12000$ c.p.s. Max. input $8-10$ radio combinations. Range 50 to 10000-12000 c.p.s. Max. input 8-10 watts. Input impe C19008-Shpg. wt. 16 lhs. Your Cost
\$17.35
JENSEN "CA" Bass Reflex Enclosures


Handsomely designed and finished. Constructed throughout of genuine striped walnut. Excellent for Jensen coaxial speakers above, or for
high-fidelity radio, phono or Public Address in-high-idelity radio, phono or Public Address in-
stallations. Styled to go with practically any stallations. Styled to go with practically any
surrounding. Incorporate Bass Reflex principle, Model CA-12: For $12^{\prime \prime}$ speakers. Size: $27 \% / 4$ wide, $311 / 2^{\prime \prime}$ high, $12^{\prime \prime}$ deep. Sh C18945Your Cost s27.10 Model CA-15: For $15^{\circ}$ speaker C18946 Your Cost
$\$ 31$

## JENSEN Model BR Peri-Dynamic Enclosures With Bass Reflex



Improved speaker housings providing finer
reproduction than that offered by dinfinite reproduction than that offered by "Ininite")
tafles. Incorporate both ". Peri-Dynamic. "Bass Rellex" feat ures, insuring crisp, clear reproduction of all notes. Made solidily of $13,16^{\circ}$ plywood. Finished in double coat of rich brown lacquer. stipped knocked down, all hardwase furnished.




## JENSEN MT8-C High-Fidelity Reproducer

Comprises a high quality $8^{\circ}$ PM speaker housed in a BR enclosure (as shown above). Handles 6 watts continuously. Recommended for all applications where substantially flat response is required from about 50 to 10.000 c ..ps. Ideal for broadcast work, auditoriums, for fine radio receivers, etc. Voice coil impedance 6 ohms. Enclosure has Bass Reflex reature constructed of plywood with brown lacquer finish. Size: $17,3 \times 24 \times 113 / 3$. For floor or wall mounting (brackets supplied). ${ }^{\text {Shipg }}$. wt. 40 Ibs
$\$ 20.34$ C18948-8" PM Speaker only (PM8CT). Your Cost. $\$ 7.50$ C18949-8 $8^{\circ}$ Dynamic (G8RT). 2500 ohm field. Your Cost.

## 9-Watt Model MT-12C

Like the above, but for use where greater power handling capacity is required. Has $12^{\circ}$ PM speaker and handles 9 watts comtinuously.
 C19001-Enclosure with $12^{\prime}$ PM Speaker Your Cost Complete.
\$28.52 C19000-12 ${ }^{\circ}$ PM Speaker only (PM12CT). Your Cost....... 510.44 C19006-12' Dynamic (G12RT). 2500 ohm field. Your Cost. 7.35

## Transformers For Above

C1917 -Matches voice coil to 500 ohm line. Each $\$ 1.47$ C19181-Universal Line ( $500 / 1000 / 1500 / 2000$ ohms). Each... . C19183-Universal Tube (any tube, single or p.p.). Each

## JENSEN PM \& Field Coil Dynamic Concert Speakers

A series of heavy-duty hishly efficient speakers for use in all types of radios, phonographs and public address equipment. All are designed so that they may be used in Jensen BASS REFLEX enclosures and cabinets. Field coil models
have hum bucking coils. All models less have hum bucking coils. All models sess
output fransformer. A complete listing of suitable transformers will be found below. Frequency response range of all models neets the accepted standard for high fidelity performance.

## Permanent Magnet Types

| No. | Model | Size | Watts | V.C |  |  | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C19076 | PM8-C | $8^{\circ}$ | ${ }^{\text {W }}$ | 6 oh | hms | libs. | $\text { S } 6.47$ |
| C19088 | PM10-C | $10^{\prime \prime}$ | 9 | 6 oh | hms | lbs. | 7.94 |
| C19092 | PM12-C | $12^{\prime \prime}$ | 10 | 6 ol | hms | lbs. | 9.1 |
| C19071 | PM12-H | $12^{\circ}$ | 12 | 8 oh | ms | libs. | 13.82 |
| C19069 | A12-PM | $12^{\circ}$ | 15 | 80 | hms | lbs. | 24.11 |
|  |  | Fiel | Coil | Ty |  |  |  |
| Stock | Model | Size | Cap. | Field | V.C. | Shpg. | Your |
| No. | No. | In. | Watts | Ohms | Imp. | Wt. | Cost |
| C19068 | A-12 | 12 | 15 | 860 | 8 ohms | 18 lbs. | \$14.70 |
| C19070 | A-12 | 12. | 15 | 2500 | 8 ohrns | 18 llss . | 14.70 |
| C19072 | B12-X | $12^{\circ}$ | 14 | 1250 | 8 ohms | 16 lbs. | 12.05 |
| C19074 | B12-X | $12^{\prime}$ | 14 | 2500 | 8 ohms | 16 lbs. | 12.05 |

$8^{\prime \prime}, 10^{\prime \prime}$ and $\mathbf{1 2}^{\prime \prime \prime}$ Standard Dynamics High quality dynamics ideally suited for radio re ceivers, P. A. work, etc. Employ heavy field pots, dance 8 ohms at $400 \mathrm{c} . \mathrm{p} . \mathrm{s} .8^{2}$ models have power capacity of 6 watts, $10^{\circ}$ models- 8 watts, $12^{\circ}$ models -9 watts. All less output transformers. (See listing below)
Stock No


## Series "S" Dynamics <br>  <br> Standard Replace. ments. Ail less output transformers (see listing under Serics " s " PM), excepting $\mathrm{No} \mathrm{Cl} \mathbf{C l}^{2977}$ Which in- cludes 45000

 ohm translormer tomatch 43 , etc. No. Model Sizo Ohms Each C18956 H4-S Size Ohms$4^{*}=450$
$4^{*}=3000$ Each
$\$ 1.88$ C18957 114-8 C18958 H5-S C18978 115-S C18977 H5-S C18979 H5-S C18980 H6-S $\qquad$ 1.88
1.94 C18980 H6-S
C18981 116-S

$$
\begin{aligned}
& 5 \\
& 6 \\
& 6 \\
& 6 \\
& \hline
\end{aligned}
$$

$6^{\circ} 1800$ tap 300
C18982 H6-S C18983 F8-RS C18984 Fg-RS C18959 F8-RS

$$
\begin{aligned}
& 6 \text { volt } \\
& 8 * 2500
\end{aligned}
$$

- 1000
${ }_{8}^{5} .18000$ tap - 5276

C18985 G10-RS $\left.10^{*} 2500\right\} \quad\{4.85$ C18986 G10-1RS $10^{\circ} 1250$ C18928 G12-RS 12* 1250 8987 G12-RS 12 " 2500


## Universal Matching Transformers

Match Jensen speakers to any output tubes, single or push-pull, or to
universal line ( $500,1000,1500$, and 2000 ohms). Shps wh. universal line (500, 1000, 1500, and 2000 ohms). Shpg. wt. 4 lbs.

| No. | Type | For |  |
| :---: | :---: | :---: | :---: |
| C19022 <br> C19023 | Univ. Line Univ. Tube | PM-8C, PM-10C, PM-12C. G12RS, PM19GS $\}$ | \$1.82 |
| C19024 | Univ. Line | A12, B12X, PM 12 B |  |
| C19025 | Univ. Tube | A12 B12X PM |  |
| C18964 | Univ. Line | C8-RS, Cib-RS | $\$ 1.82$ |
| ${ }^{\text {C13965 }}$ | Univ. Tube | C8-RS, C10-RS, C12-R, PAH-8, FAB-8 | 1.02 |
| C18966 C18967 | Univ. Line | PM10GS, G10-RS......... |  |
| C18967 |  | ............ |  |

[^0] specifications for price and delivery Information.

## Lafayette Rq中harement SPEAKERS



## LAFAYETTE PM Speakers

High quality permanent magnet all-purpose speakers Fach matches in sensitivity a comparable field coil type. Have high permeability magnets; one piece seamless cones; plated metal frames. Voice coil impedance $6-8$ ohms. All supplied less output transformer.

| Stock | Diam | v.c. | Wattage | Depth | Shpz. | Your |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | eter | Dia, | Nor.-Peak | In, | Wt. |  |
| C19268 | 33/20 | \% | $21 / 2$ |  | 2 lbs . | S1.98 |
| ${ }^{C 19269}$ |  | \% | $3{ }^{3} \quad 43 / 3$ | ${ }_{215}$ | ${ }_{3}{ }^{3} \mathrm{lbs}$ bs. | ${ }^{2} \mathbf{2} .04$ |
| C19270 | $6^{\prime \prime}$ | : | 6 | ${ }^{215} 18^{16}$. | 3 lbs . | 2.51 <br> 3.04 |
| C19271 | 8 |  | 8 | $3{ }^{18}$ | 4 lbs. | 3.04 <br> 4.38 |
| C19290 | $10^{\circ}$ |  | 10 | $61 / 2^{\circ}$ | 6 lbs. | 4.38 5 |
| C19272 | $12^{\prime \prime}$ | $1{ }^{\prime}$ | 12 | $6{ }^{9} / 0^{\circ}$ | 7 lbs . | 5.35 |



A quality line of speakers for general replacement purposes. Also good for light public address work. They have a practically flat response, when properly bafted, covering from 100 to 4500 c.p.s. Formed one-piece cones. Models with universal tube matching transformers will match any single or push-pull output tubes. Connection chart included.

## $31 / 2^{\prime \prime}$ and $4^{\circ}$ Diameter Models

For call systems, hearing aids and midget radios. Less transformer. Shpg. wt. 3 lbs. $33 / /^{\circ}$ No. $4^{\prime \prime}$ No. Field Each $\begin{array}{llll}\text { C19265 } & \text { C19116 } & 2750 \text { ohms }\end{array}$ C19273 Universal orms former for any of the above models. ...65c (1) $5^{\circ}$ Dlameter Models All less transformers. Average wt. 3 lbs Stock No. Field Stock No. Field C19261- 6 ohms C19262- 450 ohms cl9263- 3000 ohms c19264-1800 tapped Your Cost, Each
$\$ 1.39$
Special Transformers for $5^{\prime \prime}$ Models $\begin{array}{ll}\text { Stock No. Impedance For Tubes } \\ \text { C19286 } & 2,000 \text { ohms } \\ 25 B 6,25 L 6, ~ e t c . ~\end{array}$ C19287 1.000 ohms 25A6, 43, etc C19288 10,000 ohms 41, 6CGG, 6A4. Your Cost Each,
$49^{\circ}$
6 " Diameter Models
All equipped with universal tube matching transformers. Average shpp. wt. A lbs. Stock No. Field Resistance
C19122
C19165 ohms (for auto sets)
1000 ohms Each C19109 1800 ohms tapped C19166 800 ohms tapped
2500 ohms
$\$ 2.31$
$8^{*}$ Dlameter Models
All equipped with universal tube matching translormers. Shipg. wt. each 6 lbs . Stock No. Field Resistance Each C19307 1000 ohms 1 $\left.\begin{array}{c}\text { C19283 } \\ \text { C19292 } \\ 1800 \text { ohms tapped at } 300 \\ 2500 \text { ohms }\end{array}\right\} \$ 3.21$

## $10^{\circ}$ Diameter Models

 All equipped with universal tube matching transiormers. Shpp, wt. each 7 lbs . Stock No. Field Resistance 1000 ohms \}
$\$ 438$
12" Dlameter Models
All equipped with universal tube matching transformers. Shpg, wt. each 9 lbs. Stock No. Field Resistance $\$ 5$ Each $\left.\begin{array}{ll}\text { C19294 } & 1000 \text { ohms } \\ \text { C19295 } & 2500 \text { ohms }\end{array}\right\}$

Small itlustration shows cast aluminum alloy baffle and sound deflector plate
used in Chandilier Baffe.

## KAINER

Chandelier Baffle For Uniform Coverage

Designed to replace multiple wall speaker installations where desirable. Ideal for Restaurants, Clubs, Cabarets and Dance Halls where the necessity of projecting sound close to the performers is importantrecommended only for ceiling heights above 12 ft. Suspended from ceiling with link chain or sash cord-easy to install. Accommodates any heary dury 12 P.M. spea $32^{\prime \prime}$. Height $17^{\circ}$. Shpg, wt. 29 lbs.
$\$ 17.54$

## Kainer De Luxe All-Steel Projector

Constructed of heavy spun steel alloy and will accommodate all types of $12^{*}$ speakers with or without transformers. Rear housing has back pressure reiease. Overall length, 20 , bell, 0pening. Finished in haked art metal grey. opening. Finished in haked art metal grey, extension can be attached is welded to the haffle. Firture is tapped to fit standard $34^{\circ}$ pine. Base, which is oblainable separately,
has a tilting dos-toothed adjustment, with swivel and lock nut. Shpg. wt. 13 lhe C20077-Model J-12
Your Cost (less base)
\$8.82


C20078-Bracket with base only. Your Cost

## EOSPEAIFRR UNIISSPROJIECTORS

## JENSEN Hypex Projectors

Especially suitable for speech reproduction and commercially acceptable music reproduction. Sturdy steel encased unit, plus reffex
 all weather conditions. Finished in durable baked twotone gray lacquer. Increased efficiency in the region above acoustic cut-off.
Type $\mathrm{H}-20$. Horn only. Bell diam. $203 / \mathrm{s}^{\circ}$, Dept, $1633^{\circ}$. Acoustical length, 1 ft . Nominal acoustic cut-off, 165 cps. Stand coupling 181/ lbs . C18926-Your Cost
$\$ 16.76$
Type H24. Horn only. Bell diam, $24 \frac{8}{6}$. Depth, $2013^{\circ}$. Acoustical length, 5 inal acoustic cut-off, 140 cps . Shpy. wt. 21
lhs.
C18927-Your Cost....... $\$ 20$ Stands and Supports
Adjustable Stand. Sturdy cast fitting with three-leg base, for mounting projector on wall or other surface. Horizontal and vertical adjustment. Your Cost
$\$ 2.94$ Adjustable Support. Provides adjustment when projector is mounted
on pipe mast. pipe thread on both ends.
C18525 Your Cost. Jensen Type "U" Annular Driver Units
 Normal type. Rated at 15 W.average Normal voice or music
Deph 37/ Wt. 11 lb
C18919-Your Cost
s21.17 UF-20-Field Coil type, 1250 of-ms. Cion. 10 Your Cost
\$21.17
C18921 Your Cost as above, but for 6-Volt (1.6 amp.) battery. ..................................... 521.17 C18921 Your Cos Fixed Impedance Transformers, encased in metal cans; will not mount C18922-500 to 16 ohms. Core size, $7 / \mathrm{x}^{7} / \mathrm{B}^{\circ}$

Each $\$ 2.94$


Peri-Dynamic Projector
All steel. Speaker enclosure is sealed to the bulkhead with a neoprene gashet. Entirely
weatherproof. Lensth overall $30^{\circ}$, bell dia. $24 \mathrm{~K}^{\circ}$. Shpp
C19045-
Your Cost.
$\$ 23-52$
PAH-8 PM SPEAKER: Handles 15 to 25 watts. Has heavy magnel, ${ }^{7}$ diaphragm and pecially fine middle register. Less transformer. Shpp. wt. 8 lbs.
C19050- Your Cost
\$1176
FAB-8 DYNAMIC SPEAKER: Like above, but field coil type. Field resistance 1250 ohms. Requires 10 watts excitation. \$ 10 lbs. C18931 Each. 7 . Projector with PM Speaker. Less stand. SPH-81. \$3575 C19004-Shpg. wt. 30 libs. Your Cost Projector with Dynamic Speaker. SFB-81 C18932 Less Stand. Wt. 32 lbs. Your Cost
$\$ 35-35$ C19005-EA-5 Stand only. Adjustable. Wi, § lhs. Each ........ $\$ 2.94$
C19041-Waterproof cover for proj. bell (ST-5i(0). Each........ $\mathbf{\$ 1 . 1 8}$


## UNIVERSITY Reflex Projectors

## With "Rubber Tire" Rims

 High efficiency exponential air column type projectors with heavy-gauge all-metal spun horns. Ultra compact and easy to install. Incorporate design features that insure superior acoustic results. Non-resonant rubber rims with each unit. Easily handle 25 watts of audio power. All furnished complete with universal " $U$ "' type mounting bracket. Finished in battleship grey. All are $100 \%$ water-proof-suitable for outdoor use. Less driverunits (listed below). units (listed below)
Stock Model

| Stock | Model | Bell | Length | C.P.S. | Shpg | Your |
| :---: | :---: | :---: | :---: | :---: | :---: | ---: |
| No. | No. | Dia | In. | Cutoff | Wt. | Cost |
| C20049 | PH* | $21^{\circ}$ | $16^{\circ}$ | 140 | 9 lbs. | $\$ 14.26$ |
| C20047 | LH** | $25^{\circ}$ | $21^{\circ}$ | 115 | 12 lbs. | 23.08 |

UNIVERSITY "Baby Bull" Projector


A dual-driver 50-watt unit ideal for air raid alarm systems and other National Defense work. Super-
power covers long distances and overcomes high power covers long distances and overcomes high by dust cover (use drivers listed below). Overall length $27^{\circ}$; bell dia. 31". With universal type "U" c24018-Less both driver units. Your Cost.
\$38.07

## UNIVERSITY Dxivex Units

 Buitt to the highest standards of electrical and mechanical tolerances. All employ Alnico magnets to insure peak efficiency. Other features include: rim centering for perfect alignment and greater efficiency; breakdown proof diaphragm suspension; heat dissipating voice coil; sealed diaphragm conseruction makes the balance of the unit waterproof. All have standard thread to fit all standard projectors.| Stock | Model | Cap. | V.C | Rance | Shpg | Your |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C21303 | MD8 | 12 | Imped. |  | 4 lbs . | 512.94 |
| C21301 | SAH | 25 | 15 ohms | 70-5000 | 6 lhs . | 19.40 |
| C21302* | PAH | 25 | 15 ohms | 60-5500 | 12 llss. | 31.16 |

*-Heavy duty model; relative acoustic output 93 .


Compact intercommunicator "booster" speaker having extremely hifh projecting Clear sound output overcomes industrial factory background noises. "Booster" effect of speaker gives same results as added "booster" amplifiers. Impedance 8 ohms; power capacWith mtg. bracket and rubber, depth $71 / 2^{\prime \prime}$. lbs.
C19348-Your Cost
\$15.52 Model CR-4: Heavy duty model, similar to above, that has a power capacity of 20 -watts.
8 ohms. Bell $11^{\circ}$ dia.; depth $8^{\circ}$. Shpg. wt. 8 lbs. C24015-Your Cost.

## UNIVERSITY $360^{\circ}$ Radial Projectors

"Infinite Baffle" sealed acoustic chamber is responsible for the added bass response afforded; cone is properly loaded.
uniform coverage in all horizontal ions $\left(360^{\circ}\right)$. Easily mounted; single point suspension. Projection angle is about $15^{\circ}$ down for most effective sound placement. Other features: All. Metal weatherproof construction; "rubler tire" rims; "floating rubber" cone mounting; back pressure

| No. | Model | Cone | Diam. | Iteight | Weight | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C24016 | RBP8 | $8{ }^{\prime \prime}$ | 17* | 8 | 15 lts . | 511.52 |
| C24017 | RBP12 | 12" | $26^{\prime \prime}$ | $10^{\prime \prime}$ | 27 lbs. | 17,29 |

Cax-Top Horn Carrier


Consists of a waterproof varnished plywood plat form with sturdy angle irons secured to four suction cups. Doubly secured by strans that anchor to the drip rail over the teel tops with fabric center up to $411 /$ " $^{\circ}$ wide. Easy to instal! $6 x$ $46 \frac{1}{2}{ }^{\circ}$. Shps. wt. 8 lbs.
C20085-
Your Cost
\$4.31
As above, but $8^{\circ}$ wide.
C20028
Your Cost


# (1) Carron SPEAKER REPLACFMFNTS 



## CARRON EXACT DUPLICATE REPLACEMENT SPEAKER CONES

Seamless one piece cones that duplicate the original units. Feature enduring, non-resonant quality, Voice coils are accurately wound and firmly attached to cones and are also exact duplicates of the originals. Only Popular numbers are listed below: we can supply on
order any cone not shown below- give make and model of receiver, order any cone not shown below-give make and model of receiver, order any cone not show old cone with voice coil and spider attached.
Stock Carron

Model No.

## 4 * Speaker Cones

C19365 1623 Belmont 510
C19365 1623
C19563 1562 Emerson AX211, 4X5-324
Emerson C1275, 6J5, 368U
20366
C19367 1528 QTX3) Quam.-Michols (paper Spider)
C19368 1614 Utah 4A100
C19369 1616 Utah 4A106A
C19370 1619 Zenith 49AG385
C19371 1620 Zenith 49U334
Your Cost, Each.

## 5" Speaker Cones

C19411 1417 Airline 62-475, Arvin 18
C19553 1450 Airline 62-518, Crosley A157 C19437 1415 Airline 62-236, Belmont 666 $\begin{array}{lll}\text { C19437 } & 1415 & \text { Airline 62-236, Belmont } \\ \text { C19438 } & 1473 & \text { Airline 62-274, Belmont } 425\end{array}$ C19438 1322 Ariston A (Detrola 140) $\begin{array}{lll}\text { C19439 } & 1322 & \text { Ariston A (Detrola 140) } \\ \text { C19440 } & 1286 & \text { Belmont 580, Emerson } 250 \mathrm{~W}\end{array}$ C19441 1626 Chevrolet 985538 (Spkr. 41045) C19442 1491 Chevrolet 985425
C19443 163.1 Chevrolet 985538 (Spkr. 42391) C19444 1503 Chevroiet 985426
C19445 1373 Crosley 516
C19446 1589 Crosley 719E, C-648- 1
C19448 1369 Delco 631A, 640, Crosley 515 C19543 1489 Emerson A130, A132, A148. 149 C19449 1319 Emerson BA199, BA201, BM-
C19462 1584 Emerson D-L 330
C19578 1013 Jensen T3 (Crosley 175, 343)
$\begin{array}{lll}\text { C19463 } \\ \text { C19464 } & 1353 & \text { Jensen PMSDS, H5S } \\ \text { Oxford } 5 \text { A (Detrola 4F, 4J, etc.) }\end{array}$
$\begin{array}{ll}\text { C19464 } & 1353 \\ \text { C19465 } & 1198 \\ \text { Oxford } 5 \text { A (Detrola 4F, 4J, etc.) }\end{array}$ C19465 1198 Guam-Nichols (Aetra 1151W) C19466 Cost, Each

## 6" Speaker Cones

C19525 1020 Admiral 5X, 6M, 6B, 6A, 5A C19558 1204 Airline 62-177, 62-173, Arvin
C19467 1325 Bosch 505, 430J, 430
C19468 1590 Cadillac C-8-53,-52 -56
C19513 1211 Crosley 159, 634, 656, 716
C19697 1379 G.E. A53, E62, ^63. U70 C19697 1379 G.E. A53,
C19469 1627 Jensen PM6C, G6R
C19470 1400 Jensen PMGG:S
C19576 1285 Jensen F6R (Belmont 777) C19471 1606 Motorola 28D
C19640 1081 Rola F5
C19472 1281 Rola DP5B (Colonial R11553) C19473 1581 Utah 6B103

## Your Cost, Each

## Speaker Cones

C19474 1583 Chevrolet $985-536$
C19626 1067 Majestic G10B, G10C, 151 C19475 1604 Motorola 500, 29B, 258 C19476 1643 Motorola 450-Spler. No. 50B C19484 1605 Motorola 400-Spkr. No. 50B-
$C 196481083$ Rola F6, F8
Your Cost, Each

## \$1.03

## $8^{7}$ Speaker Cones

C19689 1347 Chevrolet 985301 (Rola) C19548 1254 Grunow 650, 651. 661. 8А4
C19612 1.111 Jensen G8R, PM8C
C19612 1200 Magnavox $154 \mathrm{D}, 4 \mathrm{CC}, 158$
C19508 1414 Stewart Warner R10. 102A
Your Cost, Each
$\$ 1.32$

## 10 " Speaker Cones

C19501 1000 Atwater-Kent No. 15142, 55 C19782 1001 Atwater-Kent No. 14374 C19507 1367 At.-Kent No. 26243-711, 112 C19532 1060 Majestic $G 3,90,91,102$
Your Cost, Each.

$12^{\prime \prime}$ Speaker Cones
C19509 1256 Grunow 901, 902,"1101, 15
C19510 1035 Jensen D7, D8 ( $111_{6}^{\prime \prime}$ )
C19512 1603 Jensen PMil2GS
C19701 1384 Jensen PM12C

Stock
No.
Carron
No.
No. Model No.
12. Speaker Cones-Contfinued
C19641 1366 Jensen A12
C19615 1316 Magnavox 132, 162 (Zenith
C19514 1390 Magnavox 302
$C 195331062$ Majestic G5, 131, 132 C19518 1611 Oxford 12AMP,12MS1,12MS2 C19588 1315 Rola G12
C19520 1642 Utah 12PG17A, 12J43-B
C19521 1664 Utah G-12-P. 12P1115-C
C19522 1483 Utah GT13, F12P
C19523 1457 Utah 1220 , CU29
$\begin{array}{lll}\text { C19523 } & 1316 & \text { Zenith 862, } 1162,811,812 \\ \text { C19574 } & 1099 & \text { Zenith Pt. No. } 49-27,50,52,70\end{array}$
C19574 1099 Zenith Pt. No. 49-27, 50, 52. 70
Your Cost, Each....................... $\$ 1.70$

7 Speaker Cones
$C 195161557$ 1708, F194D
C19681 1246 34B, L. (Pt. No. 36-3157)
C19528 1467 37-38B, $F$ ( PL . No. 36-3546)
Your Cost
59 ¢
Each
$\begin{array}{lll}\text { C19547 } & 1079 & \text { Speaker Cones } \\ \text { 20, } 21 \text { (Pt. No. 02625) }\end{array}$ Vour Cost.
 C19400 1078 87, 40,41,65 (1?. No. 36-317) Your Cost,
Each.
$82^{4}$
C19551 1539 39-40, 39-45 (Pt. No. 36-4089) Your Cost
$\$ 1.32$

## For RCA Sets

C19406 1236 Speaker Cones 100 (P1. No,
C19554 1091 M34, M105 (Pt. No. 9023)
Your Cost, Each
C19410 1225 R37. R38, R38P (Pi. No. 9128) Your Cost.
C19405 1124 R32, 52. RE45, E35 (Pt. No.
Your Cost... io .
C19403 $1088 \quad 34,35,39,50,80, ~ R E 20(P t$
Your Cost No. 8558)

C19556 1517 Speaker cones ${ }^{12}$ No. 31275 Your Cost
$\$ 1.18$

## SPEAKER REPAIR SERVICE

Send in your old speaker for reconditioning Our speaker engineers will replace entire con with a new one-piece genuine CARRON seamless cone, align voice coil and eliminate dust particles and ot her causes of noisy reproduction. Your speaker will be put in excellent condition. Approximate cost of repairs as follows:
$4^{\prime \prime}$ to $6^{\prime \prime}$ speakers
S1.40
$7^{\prime \prime}$ to $9^{\prime \prime}$ speakers
$10^{\prime}$ to $12^{*}$ speakers.............
$13^{*}$ and over, not to exceed

UNIVERSAL FIELD COILS
Permit servicink many
speakers for which no speakers for which no exact duplicate is available. Have two resist-
ance ranges, one with windings in series, other in parallel. All supplied with spacing washers, tubes and directions fq outside diameter确 as possible. $78^{\circ}$ smaller OD is
Dimensions

| Type <br> A B C $\mathbf{D}$ $\mathbf{E}$ | Pole Piece Min.-Max. $10-11 /{ }^{\circ}$ $130^{\circ}-196^{\circ}$ $13,10{ }^{\circ}=1110^{\circ}$ 13 10 $\qquad$ | Coil Out. Dia. $21 /{ }^{\circ}$ $210^{\circ}$ $21 / 2^{\circ}$ 2 $21 /{ }^{\circ}$ | Coil Length Min.-Max. <br>  17\% - $21 \%^{\circ}$ $11 /{ }^{\prime \prime}-11 /{ }^{\prime \prime}$ 11/8"-11/8" |
| :---: | :---: | :---: | :---: |
| Stock No. | Tyive (See Above) | Paralle! Resistance | Series Resistance |
| $\begin{aligned} & \text { C19750 } \\ & \text { C19751 } \\ & \text { C19752 } \\ & \text { C19753 } \\ & \text { C1975 } \end{aligned}$ | $\begin{aligned} & \hat{\mathbf{A}} \\ & \mathbf{A} \\ & \hat{1} \\ & \mathbf{A} \end{aligned}$ | $\begin{gathered} 375-460 \\ 560-690 \\ 675-825 \\ 900-1100 \\ 1125-1375 \end{gathered}$ | $1500-1800$ $2250-2750$ $2700-3300$ $2600-4400$ $4500-5500$ |
| C19755 C19756 C19757 C19758 C19759 | $\begin{aligned} & \mathbf{B} \\ & \mathbf{B} \\ & \mathbf{B} \\ & \mathbf{B} \\ & \mathbf{B} \end{aligned}$ | $\begin{gathered} 375-460 \\ 560-690 \\ 675-825 \\ 900-1100 \\ 1125-1375 \end{gathered}$ | $1500-1800$ $2250-2750$ $2700-3300$ $3600-4400$ $4500-5500$ |
| C19760 C19761 C19762 C19763 C19764 | $\begin{aligned} & \mathbf{C} \\ & \mathbf{C} \\ & \mathbf{C} \\ & \mathbf{C} \\ & \mathbf{C} \end{aligned}$ | $\begin{gathered} 375-460 \\ 560-690 \\ 675-825 \\ 900-1100 \\ 1125-1375 \end{gathered}$ | $1500-1800$ $2250-2750$ $2700-3300$ $3600-4400$ $4500-5500$ |
| C19765 C19766 C19767 C19768 C19769 | $\begin{aligned} & \mathrm{D} \\ & \mathrm{D} \\ & \mathrm{D} \\ & \mathrm{D} \\ & \mathrm{D} \end{aligned}$ | $\begin{aligned} & 375-460 \\ & 560-690 \\ & 675-825 \\ & 900-1100 \\ & 1125-1375 \end{aligned}$ | $\begin{aligned} & 1.500-1800 \\ & 2250-2750 \\ & 2700-3300 \\ & 2600-4400 \\ & 4500-5500 \end{aligned}$ |
| $\begin{aligned} & \text { C19770 } \\ & \text { C19771 } \\ & \text { C19772 } \\ & \text { C19773 } \\ & \text { C19774 } \end{aligned}$ | $\begin{aligned} & \mathbf{E} \\ & \mathbf{E} \\ & \mathbf{E} \\ & \mathbf{E} \\ & \mathbf{E} \end{aligned}$ | $\begin{gathered} 375-460 \\ 560-690 \\ 675-825 \\ 900-1100 \\ 1125-1375 \end{gathered}$ | $\begin{aligned} & 1500-1800 \\ & 2250-2750 \\ & 2700-3300 \\ & 360-4400 \\ & 4500-5500 \end{aligned}$ |
| ANY Your | $\begin{aligned} & \text { II ABOI } \\ & \text { st, Each. } \end{aligned}$ |  | $2.00$ |

## Midget Speaker Field Coils

 Fit most midgetspeakers. Impregnated Aprox. size: 111 a $3 / 4$
C19477-1000 ohms C19478-1500 ohms C19479-2500 ohms C19480- 3000 ohms

## Replacement Field Coils

We can supply any standard or special field coil on order. Mease submit all necessary information, or send sample.

## Cone Centering Shims <br> Fexible celluloid shims that will last. Sixteen shims in a handy leatherette folder. Contains four each of the following sizes: $.0125^{\prime \prime} .010^{\circ}$. $.0075^{\circ}$ and C19649- <br> Your Cost, Kit of 16. <br> 35 <br> Cement Kit <br> An efficient radio repair cement kit for speaker cones; voice coils. r.f. coils and chokes. One bottle of all purpose cement, and one bottle of thinner. Complete with brush. C19499-Your Cost.



## 3/4" Celotex Speaker Baffles

Fine grade, ${ }^{3 \prime}$ thick. Five sizes supplied, specify hole Shpg. wt. 2 lbs . per sq. ft.

| No. | Size | Hole | Each |
| :---: | :---: | :---: | :---: |
| C19714 | 12x $1^{2}$ | 5,7 or ${ }^{9}$ | \$0.35 |
| C19715 | 18× $18^{\circ}$ | 7 or 9 | 0 |
| C19716 | $24 \times 24 *$ | 7 or 9 | 0 |
| C19717 | $36 \times 36^{\circ}$ | 9 or 120 | 2.15 |
| 19718 | 48×48* | None | 4.50 |

Speaker Grille Cloth Handsor
length. Per Yard, Your cost.
$\$ 1-5$

# PRCORDDNG BLANKS:CARTRIDGES 



## Wilcox-Gay Recordio Discs

Lightweight, flexible discs for use with home recorders. Non-inflammable. Excellert recording quality. Coated both sides. Each has label each side
C11979-SIX 61/52 Discs... . . . . . . . . . . . . . . 60 c
C11980-SIX $8^{\circ}$ Discs.
. $\$ 1.00$
Gould-Moody Class Base Discs
Professional quality blanks having a perfectly unifrrm coating of highest grade celiulose nitrate on smooth glass base. Mirror-like surface will permit recording with utmost fidelity and lowest noise level to produce professional results.
C11986- $10^{\circ}$ size.
.73c
c11987-12" size..

## AUDIODISCS

## "RED LABEL" Glass Base

Faultlessly coated and carefully selected to the highest standards of quality. Primarily for professional use. "Acetate" coatedon thin, flexible glass. Double-sided with 3 drive pin holes. For all applications requiring the ultimate in
disc perfection. disc perfection.


## YELLOW LABEL" Glass Base

"Acetate" coated on thin flexible glass. Intended primarily for amateur, school or home use. Doubled sided. Labelled.

## C11997-10*. Each

. $\$ 0.80$
C11998- 12 $^{\prime \prime}$. Each.
C11999-16*. Each.

## RECORDISC Recording Blanks

 The Yellow Label and Green Label Discs listed below are coated with a slow-burning compound which is approved by the Underwriters Labora tories. For all practical purposes this coating is substantially equal to Cellulose nitrate coating and for home recording is more than adequate. Shavings are NON-INFLAMMABLE.
## Green Label

Newly developed fibrous thermoplastic base to replace steel. Thicker than steel or bond base discs, they will not warp or bend. Overall thickness $.078^{\circ}$, with $.005^{\circ}$ coating of slow burning compound on both sides. Average 200 plays on each side with low noise level.

## C11972-61/2" <br> C11973-8

## Yellow Label

Paper composition base especially selected for uniformity and flatness. Coated on both sides with slow-burning surface compound.
C11969-SIX 61" Discs.
. $\$ 0.50$
.80
1.20

## Blue Label

These blanks have the same type thermoplastic base as the Green Label discs, but are coated with a mirror-like professional cellulosenitrate compound. Will record with lower noise level and greater brifliancy. Coating .005' on both sides. Overall thickness $.078^{\circ}$. Shavings are inflammable.
C11982-61120
C11983-
$8^{\circ}$
$C 11983-8^{\circ}$
C11984-10.
$.20 c$
$.27 c$

Books on Recording Technique The following worth-while books on recording techniques are listed on page 78. How to Make Good Recordings. C19991-Your Cost
Techniques of Recording-Goldsmith C20268 2.00 Your Cost

C11971-SIX $10^{\circ}$ Discs


## CRYSTAL PICKUP REPLACEMENT CARTRIDGES



A comprehensive lineup of replacenent cartridges for all standard makes of crystal pickups as recommended by the manufacturers. Each and every cartridge is precision made and individually tested for rated frequency response and output voltage. New cartridges can be obtalned only if you return your old cartridge for which we wlll allow you 20c. Your cooperation is not only necessary in order to obtain another cartridge but helpful to the war effort.

| For Lightweight Pickups |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stock No. | Make | Model Type | Description | Size | sure | pu | Each |
| C13963 | Astatic | LP-6 A | *Flat 2-hole mount | $21 / 3 x^{8 / 8}$ | 1-oz. | .85V. | \$4.70 |
| C13964 | Astatic | LPP-21 A | *Flat 2-hole mount | $21 / 2 \times$ | 1-oz. | 85V. | 4.70 |
| C13965 | Astatic | 1-40 B | Flat 2 -hole mount | $21.2 \times 3$ | $11 / 0$-oz. | .6V. | 2.35 |
| C13966 | Webster | N3 B | Flat 2 -hole mount | $214 \times 8$ | 11/502. | .7V. | 2.35 |
| C13968 | Shure | W42A B | Flat 2 -hole mount | $21 / 2 \times$ | 1-oz. | 1.4 V . | 2.35 |
| C13970 | Webster | W4 D | Side hole mount | 21/48 | $11 / 102$. | . 7 V . | 2.85 |
| C13971 | Webster | W5 D | *Side hole mount | $21 / 4 \times 8{ }^{\circ}$ | 11/1-02. | .7V. | 3.53 |
| For Standard Pickups |  |  |  |  |  |  |  |
| C13407 | Astatic | B-1 D | Lugs-bakelite case | 214 ${ }^{5}$ | 23/1-oz. | 2.5 V . | 2.94 |
| C13406 | Astatic | B-2 D | Univ. terminals | 2119 | 23 -oz. | 2.5 V . | 2.94 |
| c140 | Astatic |  | $3^{\circ}$ leads. Bakelite case | $21 /{ }^{1}$ | $2 \%$-oz. | 2.5 V . | 2.94 |
| C13973 | Astatic | L-26 B | Flat 2-hole mount | $21 / 2{ }^{3} 10$ | 23100z. | 1.4 V . | 2.35 |
| C233 | Astatic | M-22 B | \$Flat 2-hole mount | $21 / 10$ | 2\%-oz. | 2.9 V . | 2.94 |
| C13393 | Shure | W20C D | 7For 94, 98, 99, 910B PU's | 21 ¢ | 21 -oz. | 3.0 V . | 2.35 |
| C13974 | Shure | W27C D | Universal mount Bake. |  | $21 / 4-o z$. | 3.0 V . | 2.94 |
| C13975 | Shure | W40A B | Flat 2-hole mount |  | 2-oz. | 3.0 V . | 2.35 |
| C540 | Webster | T1 D | Side hole mount | 21/8x $62^{\prime \prime}$ | $21 / 3-\mathrm{zz}$. | 2.0 V . | 2.85 |
| C13976 | Webster | $\dot{C} 2$ $\mathbf{C}$ | Flat, 2 -hole flange mount | 17/8×1" | 21/2-oz. | 2.0 V . | 2.12 |
| *Include | needle. $1 \$$ | tal case. $\ddagger$ | "07" Pickup. |  |  |  |  |
| RCPA Crystal Cartridges |  |  |  |  |  |  |  |
| C215 | No. 31050 | For Models | 9842 |  | 2.7-oz. | $11 / 2 \mathrm{~V}$ | 2.20 |
| C13424 | No. 31156 | For Models | 9844, 9850 |  | 3 ozz . | $11 / 2 \mathrm{~V}$ | 2.50 |
| c280 | No. 33122 | For Models | 9868. R93F, VA-21 |  | $2.7-0 \mathrm{z}$. | 112 | 2.20 |
| c277 | No. 33217 | For Model 98 | 891 |  | $2.7-\mathrm{oz}$. | 11 V . | 2.20 |
| C249 | No. 35171 | For Models | 9869, 9908, 9909D, 9910, 9911 |  | 3-oz. | 13.25. | 2.50 |

.

High quality, wide response record cutter ideal for use in home recording equipment Standard replacement for thousands of magnetic cutters which are in service today, and
with a few minor circuit chantes, will replace with a few minor circuit changes, will replace
crystal cutting heads and provide more lasting crystal cutting heads and provide more lasting service. Designed to operate directly from voice coil winding of output transformer, with stiff noving, but highly sensitive, recording element to permit cutting of practically all recording materials. Exceptionally rugged and stable under all climatic conditions. Will match $4-8 \mathrm{ohm}$ voice coil windings. No mounting $4-8$ ohm voice coil windings. No mounting
brackets are provided, but tapped mounting brackets are provided, but tapped mounting replaced. Size $2 \pi / 4 x^{1 /} \times 3$ with needle screw replaced. Size $2 x x 1,4 x$ with needle screw
and 4 -inch flexible leads. Less stylus. Shpg. we 8 oz .
C13799
Your Cost
In 100 lots, Each.
$\$ 4.95$


THE RECORD BOOK
-By David Hall. A 900 page complete guide to all recorded music. it lists the works of ing a critical. impartial giv alysis of more than 7000 alysis chore thats. Filarged Fdition Containg all of the important recordings released up to the first of the year. with embossed silver binding makes it an excellent gift item.
C20002-Shp. wt. 4 lbs.
$\$ 1.98$

## "GREEN LABEL" Glass Base

Finest grade of recording blank made by Presto. Smooth surface and minimum surface noise. Consists of a heavy base of plate glass and coated by a special compound used exclusively by Presto. Used by research laboratories to demonstrate the capabilities of retories to demonstrate the capabilities of re-
cording equipment. Standard recording blank for a majority of the larger broadcasting stations and recording studios. Overall thickness . $104^{\circ}$

## C11991-10 <br> C11993-16.

## 

 We have listed the most popular lypes of recording discs a vailable today. Where possible, complete stocks are maintained to insure speedy delivery. We can Supply All Presto and Audio Discs. Write 4 for our quantity discounts to schools, $\langle$ studios, institutions. et
## Gummed Record Labels

Neatly printed. Have spaces for title, date and name of recorder. Fit all discs; adhere firmly C431-Package of 50

## Stroboscopic <br> SpeedChecker <br> Placed on turntabie <br> with a bulb (AC)

indicates correct
speed at 78 or $331 / 3$ r.p.m.
C197-Each................................

$\because \mathrm{C} 446$
GREEN FLYER Automatic Stops

## For any Green Flyer motor with $8^{\circ}$

urntable
C135-Each
$72^{\text {4 }}$

## 20 PHONO NEFDIIS. PICKUPS



PHONO NEEDLES for Standard Commercial Records (J) High fidelity, shadow tested steel needle. Each good 10

C430A-Package of 12. Your Cost
C430B-Package of 30. Your Cost
(J) RCA steel phonograph needles.

C159-Half Tone (Pkge, of 75) Any
C153-Full Tone (Pkge, of 100) Package 10 Packs C160-Extra Loud (Pkge. of 100) (J) RCA Chromium needles. Green shank. 25410 Packs Package of 6
.... (J) RCA Tunstone needles. 8) 25 (P157-Extra Loud (Pkge. 8) 10 Packs C157-Extra Loud (Pkge. of 8)
C158-Full Tone (Pkge. of 8)
(1) Lafayette Chrome plated individually shadowsaphed (J) Lafayette Chrome plated individually shadowgraphed needles. Good for 15 plays each.
C440-Package of 6 . Your Cost (J) Green shank shadowgraphed needles. Good for C432-Package of 100 . Your Cost. $15^{4}$ $38^{\circ}$ (J) Automatic Record Changer needles. Each good for 10 C193-Package of 10 .
(K) RCA Red Seal records. 10 Packages for . . . . . . . . . . . . . . . . . $\$ 1.50$ C142-Package of 50. Your Cost.
$23^{4}$

## GENERAL PURPOSE PLAYBACK NEEDLES

For playing home recording dises or standard commercial records (Victor, Decca, Columbia, Bluebird, etc.). (J) Transcription metal alloy needle. Long life, high-fidelity. Semi-permanent self-lubricating point. 40 to 50 hours on standard C286- lour cost
(J) Red shank steel needles for acetate recordings. Individually shadow tested. CA33-Package of 100 . Your Cost (K) Filter point highly polished surgical steel necdle. Shad tested. Low surface noise. 10-15 plays.
C209-Package of 12 . Your Cost C209-Package of 12. Your Cost.
c222-Package of 35 . Your Cost. 84 $.21 c$ C226-Package of 200. Your Cost $\$ 1.20$ (L) Sapphlre playback-Special Valuel Permanent needleplays 2000 commercial records with minimum wear. Excellent
frequency characteristics.
CA8 Your Cost Each. . . . . . . . . . . . . . . . . . . . . . . .

RCA-VICTOR "ONE GRAND" NEEDLE

## GREEN FLYER

## Dual-Speed Motor

## 



Powerful, governor controlled, gear drive motor with the ability to maintain a uniformity of speed under normal variations in voltage and load. Lever type speed resulator and lever shift to
or 3315 RPM. Fully enclosed with silent helical cut gears running in a bath of oil in a sealed 60 Cycles AC. Furnished with mounting brackets; $10^{\circ}$ turntable. Available with Priority only.
100 -Your Cost 91200 Needle Cups
Antique bronze finish. $11 / 4^{\prime}$ di ameter.
C130-Open
Each...
C131-Closed
C131
Each
Cactus Needle Sharpener

devic lizes your own pho no turntable to provide tive power. Provides a sharp, smooth point that is accurately made. Will point and polish any C260Your Cost

## PRONO PTCKUPS

## AUDAX Microdyne



Model D-38H-New relay-action principle places resonance of moving system beyond audibility, eliminating harsh peaks. Exciter inertia several hundred times less than in ordinary pickups. Flat
within $\pm 2 \mathrm{db}$ to 7500 cycles. within $\pm 2 \mathrm{db}$ to 7500 cycles.
Rising bass curve to about 8 db Rising bass curve to about 8 do
at 50 cycles. Exceptionally low vibratory momentum. Tip pressure about 39 grams. May be
used with JEWEL POINT. Black and chrome finish. 121/3 long. 500 ohm imp.
c13458- $\$ 29.25$


## 

High (1.4 V.) output combined with low ( $1-0 z$.) weight make this
one of the finest pickups at its price! Response $60-7000$ cycles. $8{ }^{\circ}$ arm for up to $12^{\circ}$ records.
Mahogany color plastic. Bimorph crystal. With set and thumb screws. Ship, wt. 9 oz.
C13417-Nodel 97 A .
C13426-Model 95A
above, but 2 oz . pressure and 3-volt output.
Your Cost Each, \$3.23
Replacement Cartridges-Mode
97 A use W42A. 95 A use W40A

BRUSH Crystal Pickups


Modef PL-20: By eliminating the usual needle chuck and se
screw and employing a very small permanent. polished sapphire stylus instead of the conventional needle, the mechanical impedance of the vibratory system has been brought to a very low value. Response is virtually flat (within c.p.s., with a very slightly risine characteristic to $10,000 \mathrm{c} . \mathrm{p} . \mathrm{s}$. Will drive a conventional two-stage amplifier. $14^{\prime \prime}$ overall. Taupe and bronze finish. For up tol $6^{\circ}$ records. C13462- Cost.... $\$ 20.8$ WEBSTER
Crystal Pickups
Excellent design and performance Balanced to track at less than 202, $12^{\circ}$ records. Brown finish. Shpg. C523-Model AE-10 ural sapphireneedle. $\$ 3$. 7 C529-As above, but ece needle Your Cost

## Our Cost

C530-Series "80" Pe
7000 c.p.s. $2 \frac{1}{2}-\mathrm{oz}$. pressure. Less needle.

## Your Cost

\$2.91
NOTE: For pickups not listed herein, give us your specification availability, price, etc.

NEW! WALCO Floating Needle
 reotects
records Th $\quad$ e tion and w i d e guard absorb all
possible possible shocks
prevent: ing the chipping of the jewel or the record. Surface noise and distortion are reduced 10 an absolute minimum by an incenious damping arrangement which eliminates needle talk. New design minimizes record wear and eliminates the necessity of frequent needle changes. This needle will improve any phonograph, adding wide range reprocombinations.
C113-Your Cost. $\$ 7$ Lafayette Cactus Needle Sharpener A new and im
proved type of needle sharpener that makes a smooth accurately shaped point record brush. Wi, 1 Ib. © C274

Pickups listed on this page are available on priority only. Include your highest authorized preference rating with your orders

## PECORDABUMS SCABNEIS

Economy Record Albums


Never before have you been offered quality record album with pockets for TWELVE records at this astoundingly low price. Well made, finished in brown. Index on inside front cover. Save still more by buying in lots of by buying in lots of
six. Our stock is limsix. Our stock is limited so order now!
Shpg. wt. 2 lbs. each. Stock No. Size Pockets Each Six For C21886

LIMITED QUANTITY-ORDER NOW!

## Lafayette

## Record Lubricants

RENEWER: For acetate records. Cleans, lubricates and protects. Thin film of lubricant reduces friction. Hardens and preserves acetate rec ords. 2 -ounce bottle
RENEWER: Same as above but ior cial records such as RCA Victor, Columbia,
Decca, etc.
C394--2-oz. bottle. Your Cost
C395-1/2-0z. rial size
RECORD-EASE: Applied to record 19c before cutting, increases stylus life. Reduces surface noise. For use on non-inflammable discs only. 2 -oz. bottle.
C424-Your Cost
354

## Grid-Cap Phono Adapter

Permit quick and convenient connection of phoro pick-ups to grid cap ol detector or first audio tubes. Clips for connections.
C11643-For Glass Tubes C11644-For Metal Tubes
 Your Cost Each.

## Phono-Mike Adapters With Switch

For connecting record players or mikes (hi-imp.) to phonomike terminals. Includes a shiclded switch for changing from phono to radio. Instructions included. C11607-For sets with 5-prong detector (27, 56, etc.) or 1 st a.f
C11608-For 6 -prong tubes ( $42,43,48$, etc.) C11609-For metal tubes (6B8, 6C5, 6F6, etc.) used as first audio.
C11610-For screen grid detectors (24A, 35, $57,6 \mathrm{C} 6,6 \mathrm{D} 6$, etc.). Not plug-in. Cap fits on tube.
C11617-Grid-cap adapter for metal or "GT" tubes (6J7, $6 \mathrm{R} 7,6 \mathrm{K7}$, etc.). ${ }^{\text {C11618-Adapter for SSQ7, 12SQ7, 6SR7, }}$
12SR7, etc. 6SC7, 12SC7.
Your Cost Each, Any Above Type $: 89$


ICA Phone Tip Pling and Jack
Single prong shielded plug used exiensively for mike or phono pickup and other connections. The phono jack mounts in rear of panel through "8" hole and is $11 / 0$ between centers. $7 / 4$
C11773-Plug. Each.... 10 For-Plug, Each 10 For.
C11774-Jack, Each
10 For


Phono Motor Lubricant and Grease For all phono motors, record ubricant

## . .65c 13 c

$\$ 1.20$

Models 906 and 909 are designed for those whose record storage requirements necessitate up to 24 albums or 288 records. Many record enthusiasts whose immediate needs do not require 24 albums for storage prefer this model because it provides storage space for their future record purchases. Both models are identical as to storage space. design, construction and finish. the only difference is that Nodel 909 comes complete with doors. Where desired the top of cabinet may be used for record player. Cabinet measures 28 in . wide, $16 \frac{1}{2} \mathrm{in}$. deep and 33 in . high. Shpg. wt. with doors 65 lhs.-without doors 53 lbs. Available in either walnut or mahogany finish, specify choice when ordering.
Model 906 - Record Cabinet WITHOUT DOORS.

## Your Cost

\$22.75
Model 909-Record Cabinet WITH DOORS.
Your Cost
\$29.95

## Superior Quality DELUXE Albums



Flat opening type with strip-back type of construction. of construction.
Heavy kraft pockets. Heavy kraft pockets.
Overall covering of Overall covering of Gold embossed Gothic design on back. Beautiful in appearance and unusually sturdy in construction, it is a truly superior album in every way. Both $10^{\prime}$ and $12^{\prime \prime}$ sizes have
 lbs. each.

| 12 pockets. Shpg. wt. 3 lbs. each. |  |  |  |
| :--- | :--- | :--- | :--- |
| Stock No. | Size | Pockets | Each |
| C21888 | $10^{\circ}$ | 12 | $\mathbf{S 1 . 2 9}$ |
| C21889 | $12^{\circ}$ | 12 | 1.39 |

## Safayette

## Record Carrying Cases

These cases provide the best protection you can give your records. Strong plywood case covered with attractive, durable, black fabrikoid. Sturdy, comfortable carrying handle. Strong hardware. Complete with lock and key. Neatly lined with heavy felt. Shpg. wt. 4 lbs.

C22345 Holds 50 ten-inch records $\$$ Your Cost
C22346-Holds 50 twelve-inch
2.50
$\$ 2.85$
$\begin{array}{ccccc}\text { C20203 } & \text { C20206 12 } & 12 & 1.49\end{array}$
 is just the thine for bleached and light colored just the Wt 2 . 2 lbs.

| *Alligator | *Pigskin | Size | Pockets | Each |
| :--- | :--- | :---: | :---: | ---: |
| C20202 | C20205 | $10^{*}$ | 12 | $\mathbf{\$ 1 . 2 9}$ |
| C20203 | C20206 | $12^{*}$ | 12 | 1.49 |



DUMONT 3 Inch Oscillograph Model 164E. Emprey) (green) Cathode Ray Tube. Ampli fied sweep uses 885 as saw-tooth oscil lator. Separately controlled horizon tal amplifier has gain of 40 and vertical amplifier has grain of 50 . response grom 75 to 100000 from 5,5 100,000 Provision for ap plying signals direct to deflection plates (not necessary to remove from cabine With tubes. Shpy, wl c21557-Your Cost $5^{\text {F }}$ Model 208: Shpg, w C21782-Your Cost

## RCA 5 Inch Oscillograph

## Model 158-D

 Specialized instruSpecialized instru-ment ideal for inment ideal for industrial concerns.
Also suited for teleAlso suited for tele-
vision servicing. 5 screen reproduces image of unusual clarity. Special attenuator prevents changes in frequency characterislevels. Synchronization for either negative or positive peaks. Vertical amplifier sensitivity 04 volts R.M.S. /inch, range 5 cycles to 500 kc ; horizontal amplifier . 56 volts R.M.S./ inch, range 5 cycles to 100 kc . Sweep from 4 to 22,000 cycles. In metal cabinet, $14148 x$ 19 $1 \%^{\circ}$. For $110-120$ volts, $50 / 60$ cycles. With tubes, C-R tube and special input cable.
30 lbs.
C21438-Your cost...... $\$ 1000$



## RCA Model 155C Oscillograph

$3^{\circ}$ Model 155C: Employs 906P1 tube and two 6SJ7's for vertical and horizontal amplifier stages, one 6C8G timing oscillator stage and two $5 Y 3 G T / G$ rectifier tubes; total of 6 tubes. Bar knob controls all located on front panel. 20 volts (RMS) per inch deflection without amplifier; 0.5 volt (RMS) per inch with amplifier. Amplifier response flat from 10 to 60,000 c.p.s. Amplifier gain 40 db . Timing frequency from 10 to 60,000 c.p.s. Operates on 110 volts, $50 / 60$ cycles a.a Wrinkle lacquer metal case has etched pane.
Size: $15 \times 8 \times 14^{\text {. }}$. Complete with tubes and instructions. Shpg. wt. 32 lbs.
C21447-Your Cost.......... $\$ 780$

HICKOK Signal Tracing 3 Inch Oscillograph. Model REO-5

Has built-in wide
band FM oscillator,
demodulator, video
amplifiers, signal
tracer and visual vac-
uum tube volmeter
with ranges from 0.2
to 1000 volts. Provi-
sion for audible moni-
toring with auxiliary
speaker or head
phones. Ideal for FM,
AM, or television
servicing. Frequencies ternally amplified and viewed on the $3^{\circ} \mathrm{C}-\mathrm{R}$ screen. Has built-in return trace eliminator, calibrated screen, phasing control and variable width sweep. Complete with 10 uhe $11 \times 13 \times 15 \%^{\circ}$ Shpg. wt. 50 lhe c21441-Your Cost Complete

SUPREME Model 5463 Inch Oscilloscope
Laboratory type oscilloscope for all radio, PA and television testing. Produces single or double image
alignment patterns. Linear amplifier response from 15 to $90,000 \mathrm{c} . \mathrm{p} . \mathrm{s}$. Linear sawtooth oscillator 15 to over 30,000 cycles. Tube lineup: 1-3 cathode ray tuhe, $2-6 C 6$ tubes for vertical and iming oscillator circuit and 2.80 rectifier tubes in a specially designed power supply. Vertical Wmplifier compensated to pass 60 cycle Square instruct cycles a.c. Complete with tubes and
instructions. Shpg. wt. $25 \mathrm{lbs} . \$ 80.85$
c21598-Your Cost........... $\$ 0$.


## PORTABLE VOLT-OHM MIILIIMMETERS

## SUPREME Model 542M Pocket Multi-Meter

A compact test instrument that incorporates a highly sensitive meter. 1 loused in a metal case
with snap-on cover, $31 / 2 \times 61 / 4233^{\circ}$. 1 las pin jack terminals. Following ranses provided: DC Mil-llamperes- $0 / 0.3 / 6 / 30 / 150 ;$ DC Volts- $0 / 6 /$, $30,300 / 1500$ AC Volts-0. 630 /
$150 /(500 ;$ Decibels- -6 to +10, +8 to $+21,+22$ to $+38,+34$ to ranges. $3^{\circ}$ square meter has knife edge pointer and
movement ( 5000 ohms per volt). Four Ohmmeter ranges up to 2 mesohms operate from scli-contained
batteries (furnished). Shpy. wi. C21733-
C24733-
Your Cost

## SUPREME Model 543M Tester

Similar in appearance to the model 542 M listed above. Has $3^{\circ}$ meter with knife-edge pointer. Sensitivity 1,000 ohms Fer volt. Ranges:
DC Volts $0 / 15 / 150(f 00,3000$. AC Volts- $0 / 15 / 150 / 600 / 3000$. DC.



DEPENDABLEMod.446-A
A.C.-D.C. Multitester


Has 1000 ohms juer volt sensitivity. Ranges: IC Volts-0/5,50/250/
500 2500 DC Milliamseres-0 $10 / 100,10(0)$ DC Amps- $0 / 1 / 10$.
AC Yolts $-(10 / 10 / 100 / 500 / 1000$. AC Volts- $0 / 10 / 100,500 / 1000$
Ohms-0/500 $100,000 / 1 \mathrm{Meg}$ Decibels $-810+15 .+12$ to $+3.5,+26$ to $+49,+32$ to +55 . Output rankes same as AC volts
Size: $3 \times 81 / 25^{\circ}$. Shpg. wt. 5 lbs
St


DEPENDABLEModel 411


3" meter- 200 microamp movement. 34 ranges. Meter ranges are: $0 / 10 / 100250 / 1000 /$ 5000 DC Volts; $0 / 200 \mathrm{DC}$ Micro-
amperes: $-10 / 100 \mathrm{DC}$ Milliamperes; ${ }^{\prime} 10 / 100$ DC Milliamperes; $01 / 10250+69$ in five stages; $0 / 400 \quad 10,0 \mathrm{kN})$ olims and megohms: $0+10 / 100250 / 1000$ 5000 AC Volis: 0.000 AC Mil liamperes; $0,2.6,5,25 \mathrm{AC} \mathrm{Am}$ peres; Output Meter same as $\Lambda$ C Volts. In hardwood case $776 \times 572$ C21673-
Your Cost...

RADIO CITY Model 419 Multitester
Employs well known R.C.P. system of AC measurements to insure higher accuracy, greater rugsedness and more sensitivity than that obtainable with the copper-oxide rectifier met hod. Practically linear scales,
easily legible. IIas $416^{\circ}$ meter with D'Arsoneasily legible. Has $43 /$ s $^{\prime \prime}$ meter with D'Arsonval movement having 500 microampere sensitivity; meter is fused for protection. Specllicatlons: 2000 ohms/volt sensiAC volts $0 / 10 / 100 / 500,1000 / 5000$; DC Current $0 / 10 / 50 / 250 / 1000 \mathrm{ma}$. $0 / 1 / 5 / 25$ amps.: Capacity of $03 / .3 / 3 / 30 / 300 \mathrm{mld}$. ;
Low Ohms $0 / 100$ ( 2 ohm center) Ohms Low $15,000 / 150,000$ on self-contained latter-
 ies; $0 / 1.5 / 15$ megs on built-in power supply;
Inductance $.25 / 1000 \mathrm{mh}, .25 / 100 / 1000 / 10,000$ herrys. Open face hench type
C21741-

## Your Cost Each

PORTABLE MODEL 419-P


DEPENDABLEModel 418 A.C.-D.C. Multitester

C.I. A.C.-D.C. Pocket Volt-Ohm-Milliammeter Model 421 A . Multi-range
portable instument Wire
mound multi-
wliers cali-
pla Naneres

SUPREME 571 Oscillator
Produces six cypes of signals : C.W.: (2) 400 cycle, $30 \%$
standard audio modulated R.F (3) 400 cycles,
$75 \%$ high level audio modulatternal audio modulatedR.F. (5) External
frequency modrequency mod-
ulated R.F.; (6) audio note for testing audio amplifiers, etc. Five R.F. ranges, 65 kc to 20.5 mc on fundamentals, over 60 mc on harmonics densers, ironcore coils; accuracy within $1 / 3$ of $1 \%$. Non-shorting ladder type attenuator. Oak case: $101 / 4881 / 8 \times 8$ in. With output cable, C21667
Your Cost
\$48.41
TRIPLETT 1632 Sig. Generator
Continuous
coverage
from 100
compren kc to 120 mc. Metered output plier and pattenuator. Output available at
end of coax-
 ial cable. Provision for external modulation at AF or RF Positive vernier dial tuning control. Perme-
ability adjustments and tubular air-trimmers ability adjustments and tubular air-trimmers
used for maximum accuracy and stability used for maximum accuracy and stability.
Streamlined metal case $15 \times 9 \times 63^{3}$; silver-gray suede electro-enamel finish, three tone panel. Complete with accessories. C21789 C21789
Your Cost

Special! WIEN BRIDGE Audio Oscillator Kit


Resistance-capacity tuned audio ose. employing radically new Wien Bridge circuit incorporating both dovenerative and regenerative necessary to re-calibrate. Degenerative feedback maintains constant output amplitude throughout range from 20 to 10,000 cycies, With no appreciable drift. Waveform is essentially sinusoidal throughout the entire range. Calibrated dial supplied with kit eliminates
need for oscilloscope or calibrated oscillator. Independence from line voltage fluctuations assured by VR 150-30 voltage regulator tube. Supplied with gray wrinkle finish metal cab-
inet with many parts mounted, and with power supply and voltage regulator circuits completely wired. Tubes supplicd: 6SJ7, 6J5,
$6 \times 5$ and VR $150-30$. Shpg. wt. 12 lbs. C20369-Kit complete with tubes, hardware and instructions. $\$ 17$

## RADIO CITY 703 Sig. Gen.

 Useful test fre-quencies 95 kc
to 100 mc quencies 95 kc
to 100 mc ; fundamentals to 25 mc. AF modulacycles, also a vailable separately for audio tests. 5-steplad-


## EIECTRONIC MULTITESTERS

## Electronic Multitester



Provides 27 vacuum tube operated ranges, and has voltage regulated power supply. $412^{\prime} 2^{\prime}$ microammeter curacy of $2 \%$ at full scale; meter unusually well protected. Ranges: D.C. Vac. Tube Voltmeter, sensitivity 160 meg. on high and 16 meg on low ranges, $0 / 6 / 30 / 150 / 600 / 1500 /-$
6000 : A.C. Vac. Tube Voltmeter. same sensitivity as above, $0 / 3 / 6 /$;30/150/600/1500/6000; Vac. Tube Ohmmeter meg. $/ 10$ meg. $/ 100$ meg. $/ 1000$ meg.- no test leads to short and no resetting when changing ranges; Vac. Tube Capacity Ranges 0/:
$.001 / .01 / .1 / 1 / 10 / 100 / 2000 \mathrm{mfd}$. Al ranges are direct reading. I Ias additional 3 volt A.C. range with special
6 volt A.C. scale on dial. Supplied 6 volt A.C. scale on dial. Supplied
with high voltage test lead, signal tracing probe, high freq, probe, resistance and capacity lead. Gray wrinkle finish metal case $93 / 4 \times 91 / 4 x$ 7hpg. With tubes and batteries. $101 b s . \$ 4,5.55$
c21793-Each...
We will be glad to furnish mantest Instruments on request

PRECISION EV-10
V-T Multi-Range Tester


Employs $816^{\prime \prime}$ meter and a voltag regulated power supply. Ranges eight zero-center vacuum-tube volt meter ranges $0 / 3 / 6 / 12 / 60 / 300 /$ $600 / 1200 / 6000$ volts at 13 to 133 meg. input resistance; six circuit tivity as above, using coaxial cable for measurement in AVE, AFC, FM
and television circuits $0 / 3 / 6 / 12 /-$ and television circuits $0 / 3 / 6 / 12 /-$
$60 / 300 / 600$ volts; resistance $0 /-$ 2000/200,000 ohms and 0/2/20/ $200 / 2000$ megohms; eight A.C. and volt to 6000 vanges at 1000 ohms 600 microamps, 0/3/12/60/300/ 1200 ma., $0 / 12$ amperes; output ranges from -26 to +70 db . Shpg wt. 20 lbs.
C21765-Model EV-10MCP
black ripple metal case with handle
$12 \times 10^{2} 2 \times 6^{\circ}$.
Model EV-10P, as above, in hard wood portable case with removable c21766-Each compartment.

HICKOK Electronic A.C.-D.C. Mrilitester
 Employs rugged $5^{\circ}$ square meter which can-
not be burned out by overload on not be burned out by overload on any voltare or resistance scale. This instrument is ideal for alignment of
discriminator circuits in FM recrivers and, due to its extremely high input impedance, does not require cuit parts Rances A.C. Volte cir.5/2.5/10/250/1000 at constant input impedance of 2.5 megohms; D.C. impedance of 14 megohms; Resist 1000 megohins: D.C. Milliamperes test $/ 10 / 250 / 1000$. With shielded los.
Your Cost.....
RF-10 PROBE: for Precision EV- $\$$ 10 (at left). For measurement of R.F. and U.F.F. voltages. With 955
acom tube.
C27784-Each... $\$ 1$

HICKOK MODEL 19X Microvolt Signal Generator trolled cali brated output
from 100 kc to 30 mc on fundamentals with an accuracy of bet-Self-contained vacuum tube volumeter and ter give complete measurementof receiver
gain-per-stage
 selectivity and sensitivity. Calibrated output ranges on RF, $1 / 2$ to 100,000 microvolts on all ranges. AF, 0 to 1.0 volt at 400 cycles. Output ranges from -10 to $+6,+6$ to $+22,+22$ to Supplied complet antenna, cables and instructiontained dummy cin718-Your Cost
$\$ 94.08$

## HICKOK Model 188X

 Signal Generator kc to 100 mc .150 kc standard sweep from 1000 kc to 133 mc ; 30 kc sweep for visual alignment cycles fixed and 100 to 10,000 cycles variable with accuracy within 5\%. Power Level meter range from -10 to +38 db . Synchronized
sweep voltage for oscillograph use. Provision for VR-130 voltage regulator. For $110 / 120$ volts. $40 / 60$ cycles. With tubes, cables and vils, tions.Casel3x13x7* Wt. W6ibs, $\$ 72132$

## RCA Junior Volt-Ohmist

 mechanical instrument secure from ings are shock. Accurate readline voltage ays provided despite are: D.C. Volts, at 11 megohm in put impedance, $0 / 3 / 10 / 30 / 100 /-$ $300 / 1000$; A.C. Volts, at 1000 ohms/volt, $0 / 10 / 30 / 100 / 300 / 1000$; Resistance in five ranges from . 1 0 hm to 1000 megohms. Meter is ${ }^{4} 3^{\circ}$ square and accurate to within makesit unnecessary to reverse switch makesit unnecessary oreverse leads wi any time. Supplied complete with tuhes and test leads, including Signal Tracer type probe. Portable


- $A$ A NOTE: Testers listed here
are available on priority
only. Please Include your
highestauthorized prefer-
ence rating with your or-
ders.
$\nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla \nabla$


## SPRAGUE DeLuxe "TEL-OIMIKE/



"Tel-Ohmike" provides a simple, accurate means for measuring

capacitance and resistance and incorporates a built-ln d.c. voltmilliameter. It will measure capacitances on direct reading scales Checks paper, mica, oil, wet and electrolytic condensers. Measures d.c. resistance from 15 ohm to 5 megohms, and insulation resistance up to 1,000 megohms. Provides power factor and leakage tests. Built-in power supply (up to $\mathbf{1 0 0 0 v}$.) permits checking under direct working conditions. A niagic eye ${ }^{*}$ indicates circuit resonance. The volt-milliameter has a switch providing 8 ranges: $0 / 15 / 50 / 500$ 1500 volts d.c. and $0 / 1.5 / 15 / 50$ d.c. ma. Switch and pin-jacks permit use of volt-milliameter for externat measurement. Attractive pontable case $1713 / 29 \times 6^{\circ}$. For 110 volts, $50 / 60$ cycles a.c
Your Cost
\$49.95

MODEL TC3 Tube Checker or all standard


10k. ${ }^{2}$ octal. miniature series spare positions for future use.
Features PMT switch system,
permits placing oroper voltage on proper pin.
Fil 117. Has 18 lever telephone type switches. Shorts, line and output, all checked using one control. $3^{\circ}$ val type meter; accuracy $2 \%$. Slide drawer chart. Patented short test detween every element including between every element including
cathode to heater. DC voltmeter range, $0-10-100-1000$. Size: $8 \times 141 / 2 x$ $141 / \mathrm{Sh}$ Sh. wt. 20 lbs.
Your Cost...... $\$ 50.00$ Model TC3P: Portable nodel, brown leatherette covered wood
case, with cover. Wt. 22 lbs. case, with cover. Wt. 22 ibs.
czis14-
Your Cost........
C. I. Model 431 AC-DC Volt-Ohm-Milliameter


Pocket size multirange instrument strap. 400 microRanges: AC; 0
Ranges: AC,
$15-150 \mathrm{~V}$ : DC
$30-300-1500 \mathrm{~V}$.
$30-300-1500 \mathrm{~V} .0$
150 ma . DC
Ohms:
cell testins
accuracy, 59 自 $x^{29}$. $x$ ? test leads. Wt. 3 lbs. $\$ 18.82$
IC. I. 432 DC Volt-Ohmmeter Ranges: $0-3-30-300-600 \mathrm{~V}$. DC.
Res: $1 \mathrm{M}-10 \mathrm{M}-100 \mathrm{M}$ to 1 Meq , (uli scale. Wire wound shunts and multipliers $1 \%$ accurate. 100 microamp. movement. Wire wound rheostal. Wt. 4 Ibs. $\$ 27.4 .4$
C21502-Each..

## CI 271 Volt-Ohmmeter

 type meter in black bakelite case with metal back. Ranges: $(1-3.30-300$ V. D. .
$0-10.000$.
0.2 Range changed by Phone tip and jacks. Resistors $3 \%$ ac-
curacy. Two standcuracy. Two stand-
ard flashlight cells Supplied with inclosed in case. polarity marked prods. $188 \times 27 / 4 \mathrm{x}$
3/2, Shp. wt. 3 its. $\$ 3.19$
c21503-Your Cost.

TRIPLETT Model 1612 Tube Tester

mits jo readings at a chart per- Tests all present day tubes including loktals, Bantam, Jr., miniatures and midgets; also test ballasts and pilot bulbs. 19-step filament range from 1.1 to 110 volts. Has noise test jack and separate line voltage meter Neon indicator for shorts
and leakages, etc. Steel case: and leakages, C21685 Your Cost

## \$32.18

MODEL 1613-Same as above, in Portable casc. $151 / 2 \times 115 / 8 \mathrm{x}$ , most

RADIO CITY Model 309-P Tube Tester


Tests all MINIA TURE G21 Shpg. wt. 22 lbs.

## c21639-

Your Cost
Complete..... $\$ 8880$

## Counter Model

Model 530C-Same as above but counter type. Size: 14x16x C21640-
Your Cost
$\$ 58.80$
SUPREME 589-P Portable Tube and Battery Tester


Modern in design-efficient in operation, yet at a real low price. Mas eight sockets for all $4,5,6$,
7,8 prong loktal, Bantam single ended, midget, television. single-ended, midget, television, magic eye and hearing aid ballasts, pilot lights and Christmas tree lights. Hot neon tests or interelement leakage and shorts. Tests for internal opens.
Phone jack for noise test. All fila Phone jack for noise test. All fila-
ment voltages from .75 to 117 . Vernier power line adjustment. Supreme patented switching sys tem automatically re-connects all sockets for possible future tube base connection layout. Roller chart lists all sectional and complete tulse tests. One year's chart revision service Iree. Battery "B" batteries under load. 1landsome airplane luggage case $111 / 4 \mathrm{x}$ instructions Shpe wh
cziv53-s. Shp.
C2753-
Your Cost.

## IICKOK Model 530-P Tube Tester

Dynami calibrat

## $0-3000$ 6000

15000 and
as 1 s.o.
"Good".


C21644- $\begin{aligned} & \text { Your cost..... \$21, }\end{aligned}$
37.23

## BE-50"' Capacitor Analyzer



For measuring all important characteristics of capacitors. Incorporates a "Wien" bridge with single stage of amplification and visual "eye" for measurements Has built-in power supply (for 110 V., 60 cycles AC) (or making leakage and insulation resistance and electrolytic condensers, air 00001 to 240 mfds . Measures power factor, leakage, tests for

$$
\text { anors, etc. Uses } 12 A 7 \text { and } 6 E 5 \text { tube }
$$ $61 / 2 \times 12 \times 9{ }^{2}$ Shpk. wt. 11 lbs.

$\$ 29.28$

## "BN" Capacitor Bridge listed on Page 32.

## Capacitor Decades

 Accurate standwide covering a racity For BN.. C with Type Bridge or similar precise unit. Ca0001 to 11.1 mfd . Calibration chart with each. Rating 600 V . DC-220 V. AC; Tolerance $\pm 5 \%$. Walnut Bakelite case, dim.: $3 \frac{5}{8} \times 5 \times 3^{\text {. }}$. Wt. C21729-. 011 mfd. in .0001 steps. C21730-1.1 míd.Your $\operatorname{Cos} t$ Your Cost. Each Above. c21731-10....... $\$$ S.3 Your Cost........ \$11,20

## RCP Master Analyst



Push-button analyzer. Cable plugs into receiver socket for measuring itance of components. Permits curitance of components. Permits curcircuit at same time. Has 7 sockets 8 adapters and cable with latch type plug. $9 \sqrt{9} \times 7 \times 3 \frac{1}{6}$ C10534-
Each.
\$20.33
RCP Appliance Tester Model 417: Pocket size for
all types of equipment
drawing up to 6000 watts. Ranges: AC
and DC Volts $0 / 250$; Amps. Watts: $0 / 30 /$ $120 / 600 / 3000$
 $60 / 240 / 1200$

6000 at 240 volts. Power factor correction chart and line voltage correction curves supplied. Wood case | 10478 |
| :--- |
| C10 |

Each
$\$ 12.69$
Flodel 417-P:A A above, in portable
C10477-Your Cost
$\$ 14.65$
TRTPLETT 696 Rattery
Tester
Choice of 11 loads.
Checks 9 DC volt-
age ranges, $2,4,8$
$10,25,50,75,100$
150 v . Lifetimeguar-


## D. C. Ammeters Wilh <br> External Shunt

These precision instruments incorporate the finest materials, and are assembled by skilled cases; terminals molded
Ammeters with current transformers, a vailable on application

| Range Amps. | 221-2" No. | Round | $\begin{aligned} & 321-3^{\prime \prime} \\ & \text { No. } \end{aligned}$ | Round Ejach | $\begin{gathered} 426-4 \\ \text { No. } \\ \hline \end{gathered}$ | Square Each | $\begin{gathered} 626-6^{\circ} \\ \text { No. } \end{gathered}$ | Square Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0-50 | C10926 | \$ 4.87 | C10937 | 5.78 | C10948 | \$ 7.03 | $C 10959$ | 58.46 |
| $0-75$ | C10927 | 4.87 | C10938 | 5.78 | C10949 | 7.03 | C10960 | 8.64 |
| 0-100 | C10928 | 7.18 | C10939 | 8.10 | C10950 | 9.34 | C10961 | 10.78 |
| 0-150 | C10929 | 7.18 | C10940 | 8.10 | C10951 | 9.34 | C10962 | 10. |
| 0-200 | C10930 | 7.18 | C10941 | 8.10 | C10952 | 9.34 | C10963 | 10.78 |
| 0-300 | C10931 | 7.74 | C10942 | 8.65 | C10953 | 9.90 | C10964 | 11.34 |
| 0-400 | C10932 | 8.99 | C10943 | 9.90 | C1095 | 11.14 | C1096 | 12. |
| 0-500 | C10933 | 10.26 | C10944 | 11.17 | C10955 | 12.42 | C10966 | 13.85 |
| -0-600 | C10934 | 11.50 | C10945 | 12.42 | C10956 | 13.65 | 10967 | 15.09 |
| 0-800 | C10935 | 14.01 | C10946 | 14.93 | C10957 | 16.17 | C10968 | 17.61 |
| 0-1000 | C10936 | 17.61 | $C 10947$ | 18.52 | C10958 | 19.77 | C10969 | 21.20 |

NOTE: We can supply any Triplett equipment not listed here on special order, at regular dealers prices.

## 1000 Ohms-per-Volt Foundation Meters

$0-1$ d.c. milliammeter Foundation Instruments with internal resistance of 100 ohms ( 1000 ohmspolts: 0-i-10-50-250 millizmperes; low ohms to 500 ; high ohms to 100,000 . Shpg. wt. each,
C11442-Model 321. 3" Round C11388-Model 326. 3' Square C11278-Model 421. $4^{\prime \prime}$ Square C11297-Model 521. 5* Round C11285-Model 726. $7^{*}$ Square

Each 5.39

SHUNTS AND RESISTORS FOR ABOVE INSTRUMENTS Resistors, on bakelite, for $0-10-50-250-500-1000$ volts. C11368-Your Cost
Shunts for 0-1-10-50-250 ma.; current limiting resistors high ohms and shunt for low ohms C11369-Mounted on hakelite. Your Cost C11370-Zero adjust. rheostat for ohms ranges. Each Multi-Deck Selector Switch (2 decks). With knob. C11371-Your Cost


Power Level Indicators
 For measur ing noise P.A.. theaters, broad-
cast sta tions, etc. Rangereads
up 6 a down 10 db . Zero db at
1.73 volts,
500 ohm lines, 6 milliwaits. StandModel 321.3 . dia. C11446-Each.
\$8.46 Modid 1421 In $^{4}$ Ss. $\$ 14.21$
Decibel Meter Kit: Includes C11446 $3^{\circ}$ meter, selector switch. 9 wire-wound multipliers on bakelite board, hook-up wire and diagrams.
C114s- Each \$17.09
AMPHENOL Unwired


## Adapters

 Make yourownadapt er, to meet your reBases a vailable in alltypes. Bases are drilled with st hole on side for bringing out eads or fastening metal tube grid cap stud. Bases and tops driled or self tapping screws for holding plied with each base. Available in plack only:

Thermo-Ammeters with External Couple

any range, specify. Each $\$ 2.87$
 Loktal *7C top fits only 7L, and 8L bases. tharge dia, base. Fits 7 cumb. top Adapt. Tops $12 \mathrm{C} \mid$ Adapt. Bases 12 Cach

## Side Stud Only

U'sed in above adapter hase


## TRIGLET/ <br> ROUND AND square case PANEL METERS



Incorporate precision engineering, the finest materials and workmanship. Molded cases, all terminals molded in. Sapphire jewels in adjustable screws. Accuracy within $2 \%$
D.C. Milliammeters-Round and Square Case

| 1 | $\left.\right\|_{221} ^{2} \text { Round }$ | $\left\|\begin{array}{c} 2^{\prime \prime} \text { Square } \\ 227 \mathrm{~A} \end{array}\right\|$ |  | $\left\lvert\, \begin{gathered} 3^{\prime \prime} \text { Round } \\ 321 \end{gathered}\right.$ | $\left\lvert\, \begin{gathered} 3^{\prime \prime} \text { Square } \\ 327 \mathrm{~A} \end{gathered}\right.$ |  | $\left\lvert\, \begin{gathered} 4^{7} \text { Square } \\ 426 \end{gathered}\right.$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Range | No. | No. | Each | No. | No. | Each | No. | ch |
| 0-1 | C11208 | C11288 | \$4.15 | C11200 | C11320 | \$5.03 | C11336 | \$6.47 |
| 0-1.5 | C11209 | C11289 | 4.15 | Cl1201 | Cl1321 | 5.03 |  |  |
| 0-3 | C11415 | C11290 | 4.15 | C11411 | C11322 | 5.03 |  |  |
| 0-5 | C11416 | C11298 | 3.23 | C11412 | C11323 | 4.15 | C11337 | 5.39 |
| $0-10$ | C11210 | C11299 | 3.23 | C11202 | C11324 | 4.15 | C11338 | 5.39 |
| 0-15 | C11211 | C11300 | 3.23 | C11203 | C11325 | 4.15 | C11339 | 5.39 |
| 0-25 | C11398 | C11306 | 3.23 | C11394 | C11326 | 4.15 | C11340 | 5.39 |
| 0-50 | C11212 | C11309 | 3.23 | C11204 | C11327 | 4.15 | C11341 | 5.39 |
| $0-100$ | C11213 | Cl1311 | 3.23 | C11205 | C11328 | 4.15 | C11342 | 5.39 |
| 0-150 | C11417 | C11312 | 3.23 | C11413 | C11329 | 4.15 | C11343 | 5.39 |
| 0-200 | C11214 | C11313 | 3.23 | C11206 | C11330 | 4.15 | C11344 | 5.39 |
| 0-250 | C11418 | C11314 | 3.23 | C11414 | C11331 | 4.15 | C11345 | 5.39 |
| 0-300 | C11287 | C11315 | 3.23 | C11395 | C11332 | 4.15 | C11346 | 5.39 |
| 0-500 | C11215 | C11316 | 3.23 | C11207 | C11333 | 4.15 | C11347 | 5.39 |
| 0-750 | C11400 | C11317 | 3.23 | C11396 | C11334 | 4.15 | C11348 | 5.39 |
| 0-1000 | C11401 | C11318 | 3.23 | C11397 | C11335 | 4.15 | C11349 | 5.39 |

D.C. Microammeters-Round and Square Case

 | $0-200$ | C11432 | $\ddot{C l} 11350$ | $\$ 7.55$ | C11434 | C11356 | 8.62 | C11360 | 10.66 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |


A.C. Voltmeters-Round and Square Case

| Range | No. | No. | Each | No | No | Each | No. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 0-5 | C11280 | C11449 | \$3.23 | Cil273 | C11459 | \$4.15 | C11466 | \$5.39 |
| 0-10 | C11281 | C11454 | 3.23 | C11274 | C11460 | 4.15 | C11467 | 5.39 |
| 0-15 | C11282 | C11455 | 3.23 | C11275 | C11461 | 4.15 | C11468 | 5.39 |
| 0-25 | C11283 | C11456 | 3.23 | C11276 | C11462 | 4.15 | C11469 | 5.39 |
| $0-50$ | C11284 | C11380 | 3.23 | C11277 | C11381 | 4.15 | C11382 | 5.39 |
| 0-150 | C11286 | C11457 | 4.15 | C11279 | C11463 | 5.03 | C11470 | 6.47 |
| $0-300$ | C11409 | C11458 | 5.22 | C11406 | C11464 | 5.95 | C11383 | 7.03 |
| 0-15-150 |  |  |  | C11408 | C11465 | 6.66 |  |  |


| D.C. VOLTMETERS <br> Model 321-1000 Ohms/Volt |  |  |
| :---: | :---: | :---: |
| No. | Range | Each |
| $\begin{aligned} & \mathrm{C} 1240 \\ & \mathrm{C} 11241 \end{aligned}$ | $\begin{aligned} & 0-10 \\ & 0-50 \end{aligned}$ | $\$ 5.95$ |
| $\begin{aligned} & \overline{\mathrm{C} 11242} \\ & \mathrm{C} 11243 \end{aligned}$ | $\begin{aligned} & 0-100 \\ & 0-150 \end{aligned}$ | 6.30 |
| C11244 | $0-500$ | $\$ 7.91$ |

## D.C. VOLTMETERS

125 Ohms per Volt
Model 321 Model 221





 | C11404 | 6.66 | $0-500$ | C11405 | 5.59 |
| :--- | :--- | :--- | :--- | :--- | :--- |

## METER DIMENSIONS

| MLIER DIMENSIONS |  |  |
| :---: | :---: | :---: |
| Model | Flange Box | Dis. |
| 221, 231, 241 | 21115 | $2^{35}$ |
| $227 \mathrm{~A}, 237 \mathrm{~A}$ | $2{ }^{3}$ 8x ${ }^{3} 3 / 8{ }^{\prime \prime}$ | 2\%. |
| 321, 331, 341 | $31_{2}$ | 23: |
| $327 \mathrm{~A}, 337 \mathrm{~A}, 347 \mathrm{~A}$ | $3 \times 3^{\circ}$ | 23. |
| 426, 436 | 4)144 | 31 |
| 521, 531 | $51 /{ }^{\prime \prime}$ | $43 / 5$ |
| 626, 636 | $6 \times .51$ ² | $4^{1} 2^{\circ}$ |
| 726, 736 | $7^{172} \times 66^{20 .}$ | $3{ }^{1}{ }^{\text {a }}$ |


A.C. MILLIAMMETERS

| M |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| No. | Each | Ms. | No. | Each |
| C11419 | \$4.87 | 0-10 | C11420 | \$3.95 |
| C11265 | \$4.15 | 0-15 | C11269 | \$3.23 |
| C11266 |  | 0-25 | C11270 |  |
| C11267 |  | 0-50 | C11271 |  |
| C11268 | \$ 4.15 | O-100 | C11272 | 3 |
| C11421 |  | 0-250 | C11423 | , |
| C11422 |  | O-ind | C114 |  |

A.C. AMMETERS

| Model  <br> No.  <br> No. Each | Amps. | $\begin{array}{l}\text { Model } 231 \\ \text { No. }\end{array}$ | Each |
| :--- | :--- | :--- | :--- |



 C11431 $\overline{56.47}$ (0-50 $\quad$ C11385 $\$ 5.59$

## D.C. AMMETERS

| With in | $\begin{aligned} & \text { rnal si } \\ & 322 \end{aligned}$ | nt. |  |  |
| :---: | :---: | :---: | :---: | :---: |
| No. | Each | Amps | No. | Each |
| C11216 |  | 0-1 | C11223 |  |
| C11372 |  | 0-3 | C11376 |  |
| C11217 |  | O-5 | C11224 |  |
| C11218 |  | 0-10 | C11225 | . 23 |
| C11373 |  | 0-15 | C 11377 |  |
| C11374 |  | 0-25 | C11378 |  |
| C11375 |  | 0-30) | C11379 |  |

Front Illuminator
Shiclded front
dial light that
fits on lower part
of model 321 and
331 meters. No
glare. Complete
with 6.3 volt bulb.
clizer
Each.................

#  

STERLING Meters


Efficient panel meters overall. Plated flanges. Sensitive, accurate movenients. Binding post terminals on backs of cases. F flush 1

## D.C. Voltmeters

 C10903-0.3 volts C10904- $0-6$ volts.C10905- $0-10$ volts. C10905-0-10 volts C10908-0-25 volts C10907- 0.50 voles C10911-0-75 volts. C10914-3-0-3 volts C10915-0-8-160 volts.

## High Resistance Type

C10913- 0.50 volt

## D.C. Ammeters

C10898-10-0-10 amps C10880- $0-15 \mathrm{amps} .$. C10881-0-30 amps


## READRITE Square

and Round Meters
Model 55, round with clamp, nickeled. Model 95 , square, black enameled. Both require $2^{3} e$ hole. DC molarized vane solenoid type; AC racy within $5 \%$.


|  |  |  |  |
| :---: | :---: | :---: | :---: |
| C10890 | 0-15 | C10895 | 0-200 |
| C10891 | 0-25 | C10896 | 0-300 |
| C10892 | 0-50 | C10897 | 0-400 |
| C10893 | 0-100 | C10878 |  |
| C10894 | 0-150 |  |  |
| Your Cost, |  |  |  |
| Any Type Each.. |  |  |  |
| C10888-0-5 ma. Each...... 51.47 |  |  |  |
| C10889 | . 10 m | Each | 1.29 |
| 1087 |  |  |  |

## STERIING Pocke\{ Meters



## For Testing <br> Batteries

In nickeled finish cases $21 / 6^{\prime \prime}$ in dia., flexible plugs.

No. 42A: General tester. Red and green color chart for all standard " $\mathrm{B}^{\prime}$ ", 14,4166 and 7 k and " A " $0-100 \mathrm{v}$. scale for special " $\mathrm{B}^{\prime \prime}$ batciesif ${ }^{5}$ V. divisions.
Your Cost Each... \$3.53 No. 30: Air Cell Tester (2 volt)
C10887--
Your Cost Each..... Miniature Tube Adapters Unwired. Consist of a ned cap containing a miniature socket, attached to (1) instructions. For any tube C11537 For RCA types 1S4, 1T4, 1R11, 1S5, etc. miniature tubes. tubes (1IY113, 115, 125) 2, Either Type, Each

## Universal Output Meter

 AdapterContacts plate prong of phone tip ate $50^{\circ}$ lead c11603Each.

# ©CORNELL-DUBILIER 

| Type 86 Porcelain Cased Micas |  |  |  |
| :---: | :---: | :---: | :---: |
|  |  | Hermetically sealed in porcelain con tainers and provided |  |
|  |  |  | post |
|  |  | Mo | ng fee |
|  |  | sistance |  |
|  |  |  |  |
|  |  |  |  |
| Mounting centers $31 /^{\circ}$ apart. $3 \%$ |  |  |  |
|  |  | D. |  |
| 4144 | . 0001 | 12,500 | 3. |
| 1145 | . 00025 | 12,500 | 3.88 |
| \$154 | . 0005 | 12,500 | 3.8 |
| C4146 | 05 | 7,000 | 3.18 |
| C4147 | . 001 | 3,500 | 3.18 |
| C4140 | . 001 | 12,500 | 3. |
| C4148 | . 0015 | 12,500 | 4.59 |
| C4155 | . 002 | 3,500 | 3.88 |
| C1149 | . 002 | 7.000 | 4.59 |
| C4141 | . 002 | 12,500 | 5. |
|  |  |  |  |
| $\mathrm{Cl}_{1} 152$ | . 01 | 3,500 | 7.06 |

## C-D "Silver Mikes" <br> 

Designed for use in electronic cir cuits where frequency stability low-loss red bakelite and provided with tinned brass wire leads. All units rated 500 volts d.c. working, 1000 volts d.c. test except on
capacities higher than .0025 which are rated at 30
volts d.c. test.

Type B-7 和 $^{3}$ No. Mrd. Each No. Mid. Each
 $\begin{array}{llllll}\mathrm{C} 1353 & .0010025 & 29 \mathrm{c} & \mathrm{Cl} 1388 & .0002 & 35 \mathrm{c} \\ \mathrm{C} 1371 & .00025 & 35 \mathrm{c}\end{array}$

 | C1384 | .00007 | 29 c | C 1390 | .0004 | 53 e |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Cl |  |  |  |  |  |
| Cl |  |  |  |  |  | C1385 .0001

29c
1392 Type A- 86 Square C1393 .0015 $\$ 1.06$ C1397 .004 $\$ 1.59$ $\begin{array}{lllllll}\text { C1394 } & .002 & 1.06 & \text { C1398 } & 005 & 1.76\end{array}$ C1395 .0025 1.41

## C-D Molded Micas <br> 

Compact mica condensers in molded bakelite housings. With wire leads. Indiridually tested; will give dependable service. Type 1W (ing. A) ${ }^{18} / 6 x^{11} 16^{3}$. All are 1000 volts test, 00 volts DC working except sizes higher than .003 mfd . Which are 600 volts test, 300 volts DC working.
No. Mrd. Fig. Each

| No. | Mff. | Fig. | Each |
| :--- | :--- | :--- | ---: |
| C1355 | .00001 | B | 15 c |
| C 1356 | .00002 | B | 15 c |
| C 1357 | .001025 | B | 15 c |
| C 1358 | .00005 | B | 12 c |
| C 1359 | .0001 | B | 12 c |
| C 1360 | .00015 | B | 12 c |
| C 1361 | .0002 | B | 12 c |
| C 1362 | .00025 | B | 15 c |
| C 1363 | .0005 | B | 15 c |
| C 1364 | .001 | A | 18 c |
| C 1366 | .002 | A | 24 c |
| C 1367 | .003 | A | 29 c |
| C 1372 | .004 | A | 32 c |
| $\mathrm{C1373}$ | .005 | A | 35 c |
| C 1374 | .006 | A | 44 c |
| C 1377 | .01 | A | 53 c |


\section*{} D C 2 | C 2 |
| :---: |
| C 2 | | $C 2$ |
| :---: |
| $C 2$ |

## "DYR" By-Pass Units

 cans. Low pow-
er factor. Hermetically metal sealed. Non-

| 600 V. D.C. |  |  | 1000 V. D.C. |  |
| :---: | :---: | :---: | :---: | :---: |
| Stuck No. | $\begin{aligned} & \text { Your } \\ & \text { Cost } \end{aligned}$ | Cap. Mfd. | $\begin{aligned} & \text { Stock } \\ & \text { No. } \end{aligned}$ | Your Cost |
| C3011 | \$1.23 | . 1 | C3035 | \$1.32 |
| C3012 | 1.29 | 25 | C3036 | 1.35 |
| C3014 | 1.59 | 1.0 | C3037 | 1.94 |
| C3015 | 2.12 | 2.0 |  |  |
| C3007 | 1.56 | .1-. 1 | C3038 | 1.65 |
| C3008 | 1.82 | .5-. 5 | C3039 | 2.29 |
| $\mathrm{C}^{\text {C003 }}$ | 1.76 | .1-.1-. 1 |  |  |
| "rA" High Capacity Low Voltage Units |  |  |  |  |
|  |  |  |  |  |

ment ."An picture sound equipetc. In round aluminum cans with lug terminals on molded bakelite
covers. External cardboard sleeve provided. No. Mfd. Volts C2560 1000 C2 $\begin{array}{lllll}18 & 18 & 13 \times 41 & 2.12 \\ \text { C2566 } & 2000 & 25 & 134 \times 46 & 2.82 \\ 1000 & 35 & 134 \times 418 & 2.82\end{array}$
"TLA" DYKANOL "A"
Filter Capacitors
In Sealed aluminum $\mathrm{m} / \mathrm{d} .600 \mathrm{v}$. and 1 mfd . 1000 v . are $27 / 9^{\circ}$ high). Mount in any position. Dykanol dielectric
No


## "TQ" DYKANOL "A" Oil-Filled Condensers

| Designed to stand up os |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| under conditions of severe transient volt |  |  |  |  |
|  |  |  |  |  |
| ages and line surges and |  |  |  |  |
| continuous duty opera- |  |  |  |  |
| tion. In cylindrical aluminum containers, with |  |  |  |  |
|  |  |  |  |  |
| 2 insulated terminand universal $\mathrm{m}^{\prime}$ t |  |  |  |  |
|  |  |  |  |  |
| bracket. May be mount- 0re fo |  |  |  |  |
| ed in a | ny p | osition. |  |  |
| No. | Mid. | Wkg.V. |  |  |
| C2962 | 2 | 600 | $21 /$ | \$2.35 |
| C2963 |  | 600 | $2^{3} \times 1 \times 2$ | 3.17 |
| C2964 | 1 | 1000 | 11/382 | 1.94 |
| C2965 | 2 | 1000 | 21/2x2 | 2.65 |
| C2966 | 4 | 1000 | 3)/82 | 3.35 |
| C2967 | 1 | 1500 | 2\%982 | 2.47 |
| C2968 | 2 | 1500 | 35/6x2 | 3.35 |
| C2969 | 1 | 2000 | $31 / 8 \times 2$ | 3.18 |
| C2970 | 2 | 2000 | $41 / 8 \times 2$ | 3.53 |
| C2971 | 4 | 2000 | $43 / 8 \times 3$ | 4.94 |
| C2972 | 1 | 3000 | 318 | 6.35 |
| C2973 | 2 | 3000 | 51/43 | 7.64 |

mounting bracke makes these con densers a better DYKANOL filled and impregnated. tension terminals.

| Shng. <br> No. | Mifd. | Wkgr, V | 111. | Each |
| :---: | :---: | :---: | :---: | :---: |
| C 2994 | 1. | 600 | $2^{1}$ : | 52.47 |
| C2995 | 2 | 600 | 27** | 3.00 |
| C2996 | 4 | 600 | $3^{7}{ }_{16}{ }^{\prime \prime}$ | 3.88 |
| C2957 | 8 | 600 | $31{ }^{11}$ | 5.64 |
| C2997 | 1 | 1000 | $21{ }^{\circ}$ | 2.65 |
| C2998 | 2 | 1000 | $4{ }^{\circ}$ | 3.53 |
| C3004 | 4 | 1000 | 48. | 4.41 |
| C2958 | 8 | 1000 | 48 | 6.35 |
| C2959 | 10 | 1000 | 48.8 | 7.06 |
| C2999 | 1 | 1500 | 4 | 3.18 |
| C3000 | 2 | 1500 | 4170 | 4.41 |
| C3005 | 4 | 1500 | 48\% | 5.88 |
| C2960 | 8 | 1500 | 430 | 8.82 |
| C3001 | 1 | 2000 | 37/40 | 3.88 |
| C3003 | 2 | 2000 | $4^{\circ}$ | 4.59 |
| C3021 | 4 | 2000 | $3 \%$ | 6.35 |
| C3019 | 1 | 3000 | $3{ }^{3}$ | 8.53 |
| C3020 | 2 | 3000 | 48 | 10.58 |
| C3022 | 2 | 5000 | 6 | 22.64 |

High Speed Photo-Flash DYKANOL Capacitor 25 mfd ., rated for op-
eration at 2000 volts D.C. I woormoreunits may be used to provide any desired multiple of this value in speed flash lamps for making stroboscopic
 l case $68 \times 10$ mel

# ALL－PURPOSE CONDENSERS＠ 

liExtromely compactetched foil dry electrolytics with color coded leads．May be mounted in any position
either above or below －either above or below sub－panel．Seamlessdrawn metal can equipped nished withlong insulated． color coded leads．Dual units have separate
ounting nut supplied．

## 450 Volts DC Working

| ${ }^{450}$ Volts DC Wor |  |  |  |
| :---: | :---: | :---: | :---: |
| No． | Md． | Ins． | Cos |
| C1295 |  |  | c |
| c1296 | 8 | 12 | 76 |
| C1297 |  | ${ }^{2}$ | \＄1．00 |
| C1298 | 16 | $\times 3$ | 1.12 |
| C1299 | 4－8 | $12 \times 3$ | 1.03 |
| C1300 | 8－8 |  | 1.15 |
| C1354 | 8－16 |  | 1.35 |
| C1302 | 8－8－8 | 120643／2 | 1.65 |
| 600 Volts D．C．Warking |  |  |  |
| ock |  |  |  |
|  | Mid． | In | Cour |
| 1050 |  |  | S1．8 |
| C1051 | 16 | $13 / 2 \times 11 / 2$ |  |

High Voltage Dry to Replace Wet Electrolytics
 Iligh Formation－l ligh Voltagedry electrolytics
espuctally designed to replace wets．Designed with mounting feet for upright mounting to re－
place inverted can type units．A vailable in three universal types．The 10 mid．dry unit will re－ from 4 to 12 mfd ． 20 mfld ．replaces replaces wets from 24 to 10 mid ．

C1053
 ＂UP＂Dry Electrolytics
 Dry Electrolytics electrolytics．llemnetically sealed in aluminum cans witelite insulating cover． Cin negative．Projecting tongues for vertical 1akelite mounting plate． Tongues have wire holes． Feature low leakage and power factor，dependable perature range．


[^1]
## ＇BLUE BEAVER＂

Type BR Dry Electrolytics
Extremely small and very handy to use．Feature：Electro－Chemica etching that eliminates corrosion；Hi－Formation Process that af fords higher voliage breakdown；Hi－Pressure Centrifuge that pro－ vides better impregnation and gives a lower power factor．

| No． | Mid， | kg，ilts． | da | Each | No． | Mfr | Whg．Vil |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1090 | 10 | 25 | ${ }^{86} \times 11^{10}$ | 29 c | C11 | 40 | 150 | ， |  |  |


| C1090 | 10 | 25 | $88^{81} 1{ }^{15}$ | 29 c | C1104 | 40 | 150 | ${ }^{3} \times 2$ | 50 c |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1091 | 20 | 25 | 8 （x）${ }^{1 / 6}$ | 32c | C1105 | 4 | 250 | $8 \times 1 / 4$ | 32 c |
| C1092 | 25 | 25 | 68x11／6 | 35. | C1106 |  | 250 | 5181：180 | 35 e |
| C1093 | 50 | 25 | $8 \mathrm{~S} \times 17 \%$ | 44 e | C1107 | 12 | 250 | $5 \times 2 \times 2$ | 47 c |
| C1094 | 5 | 50 | $\left.{ }^{8} \mathrm{fx}\right)^{1} \frac{1}{6}$ | 29 c | C1108 | 16 | 250 | ${ }^{3} \times 11^{11 / 16}$ | 53 c |
| C1095 | 10 | 50 | 5／8x116 | 32 c | C1109 | 20 | 250 | $3 \times 1{ }^{11 / 6}$ | 59 c |
| C1096 | 20 | 50 |  | 35 | C1110 | 40 | 250 | $7 \times 2{ }^{1}$ | 68 c |
| C1097 | 25 | 50 | 8.8170 | 41 c | C1111 | 4 | 450 | $8,8 \times 1 \%$ | 41 c |
| C1098 | 50 | 50 | $8881{ }^{110}$ | 50c | C1112 | 8 | 450 | $\int_{\text {－} 220}$ | 44 c |
| C1099 | 4 | 150 | $56 \times 11 / 6$ | 29e | C1113 | 12 | 450 | $78 \times 2$ | 53 c |
| C1100 |  | 150 | $35 \times 16$ | 32 c | C1114 | 16 | 450 | \％ $2^{21 / 2}$ | 65 |
| C1101 | 12 | 150 | 36x13何 | 35 c | C1115 | 20 | 450 | $1 \times 21 \%$ | 71c |
| C1102 | 16 | 150 | 年11\％ | 41 c | C1055 | 30 | 450 | $1 \times 3$ | 85 |
| C1103 | 20 | 150 | $56 \times 11 / 16$ | 44 c | C1116 | 8 | 500 | $78 \times 11$ 石 | 62 c |
| C1054 | 30 | 150 | $3 \times 2$ | 47c | C1117 | 16 | 500 | $1 \times 2 / 2$ | 20 |


＂BRE＂Dual Beavers（Com．Neg．） vided with sturdy center mounting strap；only color－coded leads．
No．Mid．Wikg．Vlts．In．Each No．Mrd．Wkg．VIts，In．Each C1118


 | C 1122 | $8-8$ | 150 | $x 21$ | 59 c | $\mathbf{C 1 1 2 7}$ | $8-8$ | 450 | 1 | $\times 23$ | 76 c |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| C 1123 | $8-16$ | 150 | 14 | 1622 | 62 c | Cl 128 | $8-16$ | 450 | $116 \times 3!$ | 97 c |

| Type BRS Dual Beavers（Common Positive） |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No． | mid． | kg． 7 Tts | In． | Each | No． | Mid． | Mikg． V It | In． | Ea |
| $\overline{\mathrm{C}} 1200$ | 4－8 | 150 | ${ }^{8} \times \times 21 / 2$ | 68 e | C1204 | 16－16 | 150 | $1 / 2$ | 88. |
| C1201 | 8.8 | 150 | ${ }^{13}$ | 71 e | $\mathrm{Cl205}$ | $20-20$ | 150 | 1027 ${ }^{2}$ | 97 c |
| $\mathrm{Cl}^{2} 202$ | 4－12 | 150 | ${ }^{11 \% \times 21}$ | 71 c | C1207 | $30-10$ | 150 | ${ }^{1354 \times 2} \times 2$ | 97 c |
|  | 8－16 | 150 |  |  | C120 | 30－20 |  |  |  |

## General Electric Industrial Capacitors




|  | No． | Mid． | W．V． | Size In， | Each |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | C3768 | 1 | 600 | $3^{16} \times 1 \times 2^{3}$ | \＄2．20 |
|  | C3769 | 2 | 600 | $41 / 3 \times 1 \times 2^{3}$ | 2.70 |
|  | C3770 | 4 | 600 |  | 3.47 |
|  | C3753 | 1 | 1000 |  | 2.35 |
|  | C3754 | 2 | 1040 |  | 3.18 |
|  | C3755 | 4 | 1000 |  | 3.97 |
|  | C3756 | 1 | 1500 |  | 2.85 |
|  | C3757 | 2 | 1500 | 51／0 $\times 1310 \times 31 / 2$ | 3.97 |
|  | C3758 | 4 | 1500 | $57.811 .44^{8} / 4$ | 5.41 |
|  | C3759 | 1 | 2000 | 417／2x $1^{\frac{1}{7} \times 1631 / 2}$ | 3.50 |
| Pyranol fllled high voltage | C3760 | 2 | 2000 | $5{ }^{5} \times 114 \mathrm{4} 438$ | 4.12 |
| capacitors in hermet ically sealed | C3654 | 4 | 2000 | 53 ¢ $\times 21 / 4 \times 5$ | 5.73 |
| metal containers with pre－ | C3651 | 1 | 3000 | $5{ }^{57} \times 2 \times 21 \times 5$ | 7.59 |
| mounted rigid base brackets． | C3652 | 2 | 3000 | $6^{3}+x^{3} 3^{3} \times 5$ | 9.53 |
| Porcelain insulators． | C3653 | 4 | 3000 | $6{ }^{37} 12 \times 4916$ | 13.99 |

Pyranal fllted hich voltage capacitors in hermetically sealed mounted rigid base brackets． Porcelain insulators

SANGAMO X＇mitting Micas For low and high jower transmitters，power sup plies，power amplifiers，etc．Employ the finest ruby mica dielectric．Completely cased in molded bake－
lite housings with tapped $6 / 32$ screw terminals on each end．Size： $186^{\prime \prime}$ long， $1 / 2^{\prime \prime}$ thick and $1{ }^{18} 10^{\circ}$ wide （varies slightly with capacilance．）




## SANGAMO Economy Micas

 Type BE $\quad 2 \frac{1}{4} \times 1^{\circ}$ with $8^{\prime \prime}$ leads．

Cl335 20－10．25 $=00-350,1,4 \times 3,2$ 1．32
Triple Units，Sep．Sections＊ $\begin{array}{ccccc}\text { C1336 } & 8-8,20 & 230,25 & 1^{3}=33 & 1.09 \\ \mathrm{C} 1337 & 16-16,20 & 250,25 & 1^{3}-\times 3^{3}, & 1.41\end{array}$

$\underset{\substack{C 133 \\ C 127}}{ }$
Quadruple UnIt，Common Neg ．
C1341 $301-20, \quad 150,201^{3} 16 \times 29,16129$ ＊First section separate，others common ＊ Fi
ed Kraft tissues，Wax impregnated tube，wax－potted ends，oil－cooled． Conser vative DC rating．

400 Volts D．C．Whe．

No．Mrd．Ezeh No．Mfd．Each $\begin{array}{llllll}\mathrm{C} 1222 & 015 & 12 \mathrm{c} & \mathrm{Cl} 1228 & 06 & 15 \mathrm{c}\end{array}$ \begin{tabular}{lll|lll}
C 1223 \& .02 \& 12 c \& C 1230 \& .2 \& 18 c <br>
Cl 224 \& 025 \& 12 c \& C 1231 \& .25 \& 18 c

 

C1224 \& 025 \& 12 c \& C1231 \& .25 \& 18 c <br>
C125 \& .03 \& 12 e \& C1232 \& .5 \& 27 e <br>
C1226 \& .04 \& 12 e \& C1233 \& 1.0 \& 35 e
\end{tabular}

 \begin{tabular}{lll|l}
C 1234 \& .0001 \& 12 c \& C 1247 <br>
C 1235.02 <br>
\hline

 $\begin{array}{llllll}\text { C1235 } & 00025 & 12 \mathrm{c} & \mathrm{C} 1249 & .03 & 15 \mathrm{c}\end{array}$ 

C1237 \& .001 \& $12 e$ \& C1250 \& .04 <br>
C1238 \& .002 \& $12 e$ \& C1251 \& 0.

 $\begin{array}{llllll}\mathrm{C} 1240 & .004 & 12 \mathrm{c} & \mathrm{C} 1252 & .00 & 18 \mathrm{c} \\ \mathrm{Cl} 120\end{array}$ 

C1241 \& .005 \& 12 c \& C 1253 \& 1 \& 18c <br>
C 1242 \& .006 \& 12 c \& C 1255 \& 25 \& 27 c

 

C1245 \& .01 \& 12 c \& Cl 1255 \& -.5 \& 27 c <br>
\hline
\end{tabular} Oil impregnated units especially de－ signed for auto radio use

C1262 .005

| C 1262 | .005 | 27 c | C 1269 | .03 | $27 c$ |
| :--- | :--- | :--- | :--- | :--- | :--- |
| C 1264 | .007 | 27 c | C 1270 | 04 | 29 | | Cl 266 | .01 | $27 e$ | C 1271 | .04 | 29 c |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Cl 268 | .02 | 27 e |  |  |  |

## ＂EZ＂Universal Mt Dry Electrolytics



Test Volts

－
1203
． ，



## AEROVOX ${ }^{2}$



## Inverted Dry Electrolytics

Screw-muunt inverted dry
electrolytics. Supplied electrolytics. Supplied with lock-washer nut.
bushing. All have two $8^{\circ}$ color-coded leads per section for terminals. Available in single, double and
triple section units. Insutriple section units.
lated large size can.

| $\begin{aligned} & \text { C4516 } \\ & \text { C4517 } \end{aligned}$ | Mid. | $\left\lvert\, \begin{aligned} & \text { Dia }-\mathrm{Ht} \\ & 13 \times 41 \\ & 18 \times \times 11 / 2 \end{aligned}\right.$ | $\begin{aligned} & \text { Each } \\ & \$ 1.32 \\ & 1.85 \end{aligned}$ |
| :---: | :---: | :---: | :---: |
| Type GL-450-Single Section 525 V. Peak- 50 V. D.C. Wkg. |  |  |  |
| C4651 |  | 1\%\%3 | 50.62 |
| C4652 | 8 | 13x4 |  |
| C4653 | 12 | 13, ${ }^{1} 4$ |  |
| C4654 | 16 | 13 |  |
| C4577 | 20 | $1 \%$ | 1.23 |
| C4679 | 30 |  |  |
| C4580 | 40 | $18 \% \times 4$ | 2.18 |
| C4572 | 80 | 12, $\times \times 4$ | 3.00 |
| Type 2GL-450 Double Section 525 V. Peak 450 V. D.C. Whg. |  |  |  |
| C4655 | 4-4* | ${ }^{13,18 \times 4}$ | so. |
| ${ }^{\text {C4656 }}$ | 8-8* |  | 1.15 |
| ${ }^{\text {cas }} 686$ | 8-16* | 9\% $\times 4$ | 1.41 |
| C4573 | 10-10* |  | 1.38 |
| C4574 | 16-16* | 136 x |  |
|  |  |  |  |

Type 3GL-450-Triple Section 525 V. Peak- 450 V. D.C. Wkg.

 *Each section has 2 leads.


Space saving, yet full-rated canacity and voltage. Ideal for midgets, AC-DC ual units (Type PRS-A) leads plus common negative riveted center mounting strap.
Stock Cap. Wkg. Size Your Stock Cap. Wkg. Size
 Featuring separate sections with separate leads, reduced size. Smallest Wo Mid Volte Size Each No Med Folts

(IIBB) GAPAGITORS

## Type DP Capacitors

 Molded oil-impregnated papercondenser. physically interchange. cally interchange
 capacitors used in the by of mica coupling circuits of radio and radar equipment. High grade Kraft tissue and aluminum foil. Bakelite case mects Army and immersion. Dimensions: ${ }^{18} 10^{\circ} \times{ }^{18}$. $18^{6}$ $x^{1} \mathrm{H}^{\circ}$.
Stock
$C 2307$ C2308 C2309 $C 2310$
$C$
$C 2311$ $C 2311$
$C 2312$

| Cap. | Wkg. | Your |
| :--- | :--- | ---: |
| Mfd. | Volts | Cost |
| .001 | 600 | 41 c |
| .002 | 600 | 41 c |
| .005 | 600 | 41 c |
| .006 | 600 | 41 c |
| .01 | 600 | 45 c |
| .02 | 600 | 45 c |

$\$ 8.32$

## CA-355 Capacitor

$\qquad$


Filter Capacitor a \& 6EU. $3 \times 2 \mathrm{mfd}$. nevo.c. work test voltage. 458 x $1,1 \times 2 \% / 8$
c 2320 Your
$\$ 1.61$

Oilmite Capacitor
A "long life" ca-
pacitor. Lasting pacitor. Lasting
stamina is built
into all into all Tobe ca-
pacitors through manufactur their
 manufacture and is cross-checked by frequent, rigid inspections. Electrical ratings are always on the conservative side. ally eapacitors are hermeticNavy seal requirements for water immersion. 5.5 Mfd. 400 V. D.C. Type RAL $\mathbf{3 0 0}$
Your Cost 5-5-5 Míd. 100 C2315-
$\$ 6.60$
$\$ 8.75$

525 V. Peak 450 V. D.C. Wkg.

| No. | Mid. | Size-Ins. | Each |
| :---: | :---: | :---: | :---: |
| C4663 | 4 | $1 \times 2{ }^{2} 16$ | \$0.62 |
| C4664 | 8 | $1 \times 2{ }^{13}$ | . 76 |
| C4665 | 12 | $1 \times 3^{3}{ }_{16}$ | 1.00 |
| C4666 | 16 | $1 \times 33 / 4$ | 1.12 |
| C4518 | 8-8* | $18.5 \times 3$ | 1.15 |

Universal Mounting Dry Electrolytics


Nultiple units consisting of separate sections wrounded to cangative srounded to can. Selfhealing; surge proof. Complete with mounting rings for universal mounting. Exact rethe older sets (Sparton, Zenith, etc.) Shpg. wt. 2 lbs.
Type E-450-Multiple Section


- Tinitest

|  |  | Dry Electro Filter Condense <br> In heavy card containers, with vax impregnatio volt surge, 450 d.c. working vo eads and mitg. Perfectly sealed; ture proof. | ytic <br> ess <br> board <br> heavy <br> volts <br> oltage. <br> th 6 <br> ; mois- |
| :---: | :---: | :---: | :---: |
| No. | Mid. | Inches |  |
| C3331 | 2 | $23 / 6 \times 1{ }^{11} 68$ | 31 c |
|  |  | $41 / 8 \times 18$ |  |
| C3348 |  | 41 x $\times 1 / 8$ | 46 c |
| C3349 |  | $41 / 6 \times 118 \times 18$ | 62 c |
| C3350 |  | $436 \times 1818$ | 70 c |
| C3352 |  | 4) $\times 18 \%$ | 77 c |
| Multiple Units <br> All 525 -volt surge, 450 working. <br> 41/8" high. Separate sections. |  |  |  |
|  |  |  |  |
| No. | Mid. | Inches | Each |
| C3337 | 4 | $18 / 8 \times 1{ }^{\circ}$ | 64 c |
|  |  | 116x18 |  |
| C3342 |  | $1318 \times 1$ | 790 |
| C3366 | 8-8-8 |  | \$1.17 |
| TRUTEST "Tiny Mikes" |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
| Special Compact Filters For AC-DC Receivers |  |  |  |
| Tiny dry electrolytics in rectangular cardboard cartons with insulated |  |  |  |
| wire leads. All have metal tabs for quick, easy mounting. Cartons are |  |  |  |
| ully wax impregnated so as to beimpervious to moisture. Conserva- |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
| All Units Only $21 / 2^{\prime \prime}$ Long |  |  |  |
| Stock Cap. |  |  |  |
|  |  |  |  |
|  |  | x $3 / 4 \times 2$ |  |
| C3259 |  |  |  |
|  |  |  |  |
| ${ }^{\text {C3266 }} 326810$ |  |  |  |
| C3267 12 |  |  |  |
|  |  |  |  |
| C3273* 4-4 11/8x1 |  |  |  |
|  |  |  |  |
|  |  |  |  |
| *-4 leads; separate sections. |  |  |  |
| "600]' V. Surge |  |  |  |
| 475 V. Wkg. Units |  |  |  |
| No. | Mrd. | W. W. | Eac |
| C3206 | 2 | ${ }^{18 / 16} \mathrm{x}^{15} \mathrm{~B}^{16}$ | 51 |
| C3207 | 4 |  | 59 |
| C3209 | 8 | 12/8 $\times$ | 71c |

For best results, use TRUTEST filter and by-pass condensers. They are manufactured to conform with the highest standards Electrolytics are GUARA QTEED to have a power factor of from 4 Cf to 8 ; leakage less than. 1 Ma . per microfarad; all capacity ratings within R.M.A. requirements.
Always specify TRUTEST CONDENSERS the fully GUARANTEED line with a type for every service and set builder's requirement.


Shielded Paper By-Pass
Bathtub Condensers
Universal types drawn metal shield
cans. Designed for long life.

| Stock No. | Mrd. | Wkg. Volts | Each |
| :---: | :---: | :---: | :---: |
| C3263 | 1.0 | 200 | 55 c |
| C3264 | 2.0 | 200 | 65 c |
| C3269 | . 1 | 400 | 25c |
| C3270 | . 25 | 400 | 32c |
| C3271 | . 5 | 400 | 36 c |

Midget Molded Micas




New! Plastic Cased Dry Electrolyties


| New! Plastic Cased Dry Electrolytics |  |  |
| :---: | :---: | :---: |
| They"renew !Gleamin |  |  |
| plastic replaces alumnum to bring you grea |  |  |
|  |  |  |
| er efficiency. Designed |  |  |
| for inverted mounting |  |  |
| vided with palnut for |  |  |
| mounting. All are$100 \%$ moisture proof |  |  |
|  |  |  |
| and will withstand extremes of heat. Insu- |  |  |
|  |  |  |
| lated wire leads for direct connection. All are |  |  |
|  |  |  |
| rated at 450 volts d.c. wkg-; 600 volts peak. |  |  |
|  |  |  |
| 1\%/8 $\times 31 / 2^{\circ}$. Mounting nut supplied. |  |  |
| Stock | Cap. | Yoir Cost |
|  | Mfd. |  |
| C2383 | 8 | . 59 |
| C2384 | 10 |  |
| C2385 | 12 |  |
| C2386 | 16 |  |
| C2389 | 20 | 94 |
| C2390 | 24 |  |
| C2391 | 30 |  |
| C2393 | 35 |  |
| C2394 |  |  |
| C2 |  |  |
| +1 |  |  |

# - MALIORY CONDENSERS 

"Tp" Paper Tubulars


Oil treated non-inductive units, wax filled and impregnated. All triple sealed. Not affected by
humid climatic conditions. All have wire leads.

| No. | Mfd. | Volts | Each |
| :---: | :---: | :---: | :---: |
| C3896 | . 01 | 400 | + |
| C3897 | . 02 | 400 \} | 24 |
| C3898 | 05 | 400) |  |
| C3899 | 1 | 400. | 15c |
| C3818 | 2 | 400 | 84 |
| C3900 | 25 | $400)$ | $\bigcirc$ |
| C3901 | 5 | 400 | 26 c |
| C3819 | 1.0 | 400 | $35 c$ |
| C3902 | . 0001 | 600 |  |
| C3903 | . 00025 | 600 |  |
| C3904 | . 0005 | 600 |  |
| C3905 | . 001 | 600 |  |
| C3906 | 002 | (f10) | 4 |
| C3907 | . 005 | [60 |  |
| C3908 | . 006 | 600 |  |
| C3909 | . 01 | 600 |  |
| C3910 | 02 | 600) |  |
| C3820 | . 03 | 6001 |  |
| C3821 | . 04 | 600 |  |
| C3911 | 05 | (60)) |  |
| C3912 | . 06 | (800) |  |
| C3913 | . 1 | 6005 |  |
| C3914 | 25 | 600. | .. 26 c |
| C3915 | 5 | 600. | 35 c |
| C3823 | 1.0 | 600. | . . . 59c |

Mallory OilImpregnated Tubulars
 Compact oilimnrek-
nated paper dielecnated paper dielec-
iric condensers tric condensers
available in two (ant types.
OW: oil impregnated and filled. Suitable for vibrators, etc. Paper working volts d.c. Metal tules. 2000 ) wkg volts d.c. Type Ow ( $\mathbf{1 6 0 0}$ V.D.C.)
${ }^{\text {No }} 4011$ Cap. Mfd.

| C 4011 | . 0005 |  |
| :---: | :---: | :---: |
| C4012 | . 001 |  |
| ${ }_{C} \mathbf{C} 4013$ | . 002 | Your |
| C4014 $C 4015$ | . 003 |  |
| C4060 | . 005 |  |
| ${ }^{\text {C4016 }}$ | . 0006 |  |
| C4017 | . 007 |  |
| C4018 | . 008 |  |
| C4062 | . 01 | EACH |
| C4063 | . 015 |  |
| C4064 | . 02 |  |
| C4065 | . 03 |  |
| c4066 | . 0.4 |  |
| C4067 | . 05 |  |
|  | Cat |  |
| $\begin{gathered} \text { Noo } \\ \text { C402 } \end{gathered}$ | Cap. |  |
| C4022 | 005 |  |
| $\mathrm{C}_{4} 023$ | . 0075 |  |
| C4024 | . 01 |  |
| C4026 | . 015 |  |
| C4027 |  |  |
| C4028 | . 03 |  |
| C4029 | . 01 |  |
| C4030 | . 05 |  |

## MYE Technical Manual



Just released! A practical, simply bridgest heqapbebridkes thesapbe-
tween theory and practice. Designed for the Serviceman, Engineer. Amateur or Ex -
perimenter who wants the latest technical information. Hard cloth covers, 392 1rages, $81 / 2 \times 11^{\prime \prime}$
C19780
Your Cost
$\$ 2.00$

## Heavy Duty (HD) and High Surge

## (HS) Types

Especially designed for public address and theatre applications: where extra safety factor is desirable. Wooden-neck type (*) or Rectangular cartons. ( $t$ )
No. No. Type
C1053 HD682
C4054 HD $683^{\circ}$ ${ }^{C} 4054$ HD $683^{\circ}$
C4037 ITS 690t
C4057 H2 $692+$
C4058 H5 $693^{\circ}$
$\left.\begin{array}{c}\text { Mfd. Wkg. Volts } \\ 8 \\ 8 \\ 8 \\ 8 \\ 4 \\ 4 \\ 4 \\ 4 \\ 800(500(700 \\ 8\end{array}\right)$

$000(700 \mathrm{P}) .18 / x^{2} 4 \frac{1}{4}$


## Type FP and WP Compact Dry Electrolytics

## These capacitors, long considered standard for metal

 encased units, are ideal for many types of service. Light in weight, compact and provided with a complete mounting feature, they save assembly space and time. Thousands of these units have given excellent service under extreme conditions of high altitudes and humidity.| Stock | Cap. | Wkg. | Cize | Your | Stock | Cap. <br> Mrd. | Wkg. Folts | Size | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Mid |  | ${ }_{\text {cize }}$ | Cost |  |  |  | Size |  |
| C3790 | 50 | 150 | $2 \times 1{ }^{\prime \prime}$ | \$0.68 | C3665 | 20-20 | 450 | $3 \mathrm{xl}{ }^{\text {c }}$ | \$1.18 |
| C3656 | 20 | 250 | $3 x^{3}$ | . 50 | C3794 | (30-30-30) (40) | $(150)(25)$ | $2 \times 18$ | 1.18 |
| C3658 | 10 | 450 | $3 \mathrm{x}^{3}$ | 53 | C3795 | 40-40-40 | 150 | $3 \times 1$ - | 1.12 |
| C3659 | 15 | 450 | $2 \times 10$ | . 71 | C3796 | (15-15) (40) | (400)(25) | $3 \times 1 *$ | 1.18 |
| C3791 | 30 | 450 | 3x10 | . 97 | C3797 | (20-2(1-20) (20) | (400) (25) | $3 \times 1{ }^{3}$ | 1.68 |
| C3681 | 80 | 450 | $3 \times 1^{5} 8$ | 1.73 | C3668 | $(10-10)(20)$ | (450)(25) | $2 \times 10$ | 94 |
| C3661 | 20-20 | 150 | $2 \times 1{ }^{\circ}$ | . 71 | C3670 | 10-10-10 | 450 | $3 \times 1{ }^{\circ}$ | 1.12 |
| C3662 | 30-30 | 150 | $2 \times 1{ }^{\circ}$ | . 79 | C3798 | 15-15-10 | 450 | $3 \times 1{ }^{\circ}$ | 1.23 |
| C3792 | 20-20 | 300 | 3×10 | . 88 | C3673 | (15-15-10) (20) | (450)(25) | $2 \times 1^{3}-8$ | 1.35 |
| C3793 | 15-15 | 400 | $3 \mathrm{x}=$ | 1.03 | C3799 | $(20-20)(20)$ | (450)(25) | $3 \times 10$ | 1.23 |
| C3664 | 10-10 | 450 | $2 \times 1{ }^{\circ}$ | . 85 |  |  |  |  |  |



Transmitting and Television Capacitors


Type TZ capacitors are for low power transmitting, industrial and television circuits, as well as power amplifier applications. Types TX are general purpose units for commercial, amateur, broadcast, industrial and television applications. Both are conservatively rated and compact in size

| No. | Nallory | Mrd. | Wkg. V. | Size | EACH |
| :---: | :---: | :---: | :---: | :---: | :---: |
| C4004 | TZ 382 | 2 | 600 | 13/\%o.d.x3 | 51.94 |
| C4005 | , 3883 | 4 | 609 | 11/80.d.x+8/4 | 2.65 |
| C1006 | 384 | 1 | 1000 | 13\%o.d.x236 | 1.76 |
| C4007 | 385 | 2 | 1000 | 1350.d.x41/4 | 2.29 |
| C4008 | 389 | 4 | 1000 | 2 o.d. $\times 37$ | 3.35 |
| C4009 | 386 | . 5 | 1500 | 18 o.d. $\times 31 / 3$ | 2.12 |
| C4010 | 387 | 1 | 1500 | 18\%o.d.x51/6 | 2.29 |
| C.4036 | 388 | 2 | 1500 | 2 o.d. 443 | 3.35 |
| Type TX-Rectangular Can |  |  |  |  |  |
| C3976 | 801 | 1 | (600 | $2^{1}$ + o.d.x1 ${ }^{3} \times 1$ | \$2.47 |
| C3977 | 802 | 2 | 600 | 2\%40.d.x1301 | 3.00 |
| C3978 | 803 | 4 | 600 | 11/40.d.x1 ${ }^{\frac{1}{4} \times 1}$ | 3.88 |
| C3979 | 822 | 5 | 1000 | 2 o.d.x1/4x1 | 2.12 |
| C3980 | 804 | 1 | 1000 | $28 / 8$ o.d. $\times 13 / 4 \times 1$ | 2.65 |
| C3981 | 805 | 2 | 1000 | $3760 . d \times 1{ }^{3} \times 1$ | 3.53 |
| C3982 | 806 | 4 | 1000 | $4^{1 / 4}$ o.d. $\times 21 / 3 \times 1{ }^{10}$ | 4.41 |
| C3983 | 810 | 1 | 2000 | 4 o.d. x 1 $1 / \mathrm{xl}$ | 3.88 |
| C3984 | 811 | 2 | 2000 | 41/4o.d. $\times 21 / 2 \times 1316$ | 4.59 |
| C3985 | 823 | 4 | $20 \times 10$ | 4 o.d.x $3 / 4 \times 13 / 4$ | 6.35 |

## Wooden-Neck Electrolytics Type "RS"

To compensate for the shortage of aluminum can electroyy Math wet and is , thoroughly satisfactory replace ment. Has the same mounting convenience as the alument. Has he will provide convelute as isfaction Impregnated cardboard tube and threaded wooden-neck Impregnated cardboard tube and threaded wooden-neck.
Replaces most wet capaciors and all dry types. 450 wkg . Replaces most
volts. Wt. 6 o

| Stock No. | Cap. Mid | Mallory Type | Overall <br> Dimensions | Your Cost |
| :---: | :---: | :---: | :---: | :---: |
| C3963 | 8 | $21 \overline{2}$ | 13/8x276 | \$0.76 |
| C3964 | 8 | 213 | $1 \times 276^{*}$ | 76 |
| C3965 | 12 | 214 | 19892\%" | 1.00 |
| C3966 | 12 | 215 | $1 \times 23$ \% | 1.00 |
| $\overline{C 3967}$ | 16 | 216 | $1 \times 3140$ | 1.12 |
| C3968 | 16 | 217 | $13^{18} \times 27 / 8{ }^{\circ}$ | 1.12 |
| C3969 | 20 | 219 | $18 \times 27{ }^{3}$ | 1.23 |
| C3970 | 30 | 223 | 1, $5 \times 34{ }^{\circ}$ | 2.41 |

WB Dry Electrolytics


These capacitors are supplied in hermetically sealed aluminum tubes with waxed cardboard outer sleeves. They are suitable for general applications. Particularly noteworthy are their excellent low-temperature characteristics Stock Cap. Wkg. Diam. Your $\begin{array}{lccccc}\text { No. } & \text { Mfd. } & \text { Vits. } & \text { In. } & \text { Cost } \\ \text { C848 } & 10 & 25 & 11 \text { 位 } & \text { So. } 35\end{array}$
 $C 875$
$C 876$
$C 987$ $C 887$
$C 897$ $C 897$
$C 898$ $C 87$
$C 87$
$C 88$
$C 88$ C880
C 881
C 882 C98 C989 C99
C89
C89 $C 89$
$C 88$
$C 88$ C885 $C 88$
$C 88$
$C$ C889
C993
Dry Electrolytic
Cardboard Carton Filters


Compact impregnated cardboard carton units with universal mount ing flanges. Insulated leads. Inter nal metal shield. Hermetically sealed as a guarantee against mowture absorption; ideal for use under tropical conditions.

$$
450 \text { V. wkg. }-525 \text { V. peak }
$$

CS—Single Sections
Stock Cap. Sive Your
No. Mrd. In Colt
 C3864 8 5 $8 \times 1 \times 1 \times 27$. 68 CM-Separate Sections



MALLORY-YAXLEY Encyclopedia, 4th Ed.


Here is the book that is invaluable to repairmen everywhere. Contains complete data on over 27.000 sets, and furnishes the correct answer to practically all service problems encountered in day to day work. Over 400 mages of data on if. peaks, volume controls, condensers, vibrators, tubes, circuits and original part numbers on vibrators. controls and condensers. Should be in every serviceman's shop. Shpg. wt. 2 lbs. C19786
Your Cost
$95^{\circ}$

# SPRAGUE CONDENSERS 

"600" Line-Type TC Paper Tubulars


Popular Cumpact tubular condens ers. Non-inductively wound. Oil"Not a Failure in a Million convincing proof of the efficiency of these condensers. Universal for a voltage 1200 .
No. Mrd. Each No. Mrd. Each $\begin{array}{ccccccc}\text { C2627 } & .0001 & 12 \mathrm{c} & \mathrm{C} 2636 & .006 & 12 \mathrm{c} \\ \mathrm{C} 2628 & .00025 & 12 \mathrm{c} & \mathrm{C} 2637 & 01 & 12 \mathrm{c}\end{array}$ $\begin{array}{llllll}\mathrm{Cl} 2628 & .00025 & 12 e & \mathrm{C} 2637 & .01 & 12 \mathrm{e} \\ \mathrm{C} 2629 & .0004 & 12 e & \mathrm{C} 2638 & 02 & 12 e\end{array}$ $\begin{array}{llllll}\mathrm{C} 2630 & .0005 & 12 \mathrm{e} & \mathrm{C} 2639 & .05 & 15 \mathrm{c} \\ \mathrm{C} 2631 & .001 & 12 e & \mathrm{Cl} 640 & 06 & 18 \mathrm{c}\end{array}$
$\begin{array}{llllll}\mathrm{C} 2631 & .001 & 12 \mathrm{c} & \mathrm{C} 2640 & .06 & 18 \mathrm{c} \\ \mathrm{C} 2632 & .002 & 12 \mathrm{c} & \mathrm{C} 2641 & .1 & 18 \mathrm{c} \\ \mathrm{C} 2633 & 003 & 12 \mathrm{c} & \mathrm{C} 2642 & 25 & 26 \mathrm{c}\end{array}$
$\begin{array}{llllll}\mathrm{C} 2633 & .003 & 12 \mathrm{c} & \mathrm{C} 2642 & 25 & 26 \mathrm{c} \\ \mathrm{C} 2634 & .004 & 12 \mathrm{c} & \mathrm{C} 2643 & 5 & 35 \mathrm{c}\end{array}$
$\begin{array}{llllll}\mathrm{C} 2635 & .005 & 12 \mathrm{c} & \mathrm{C} 2681 & 1.0 & 59 \mathrm{c}\end{array}$
Save on " 600 " Tubular Kit!
You make a real saving when you
buy this Sprague kit of 33 TC tubular condensers: 2-.001,3-.002,3.005, 5-. 01

| C2613-Per Kit..... \$ \$ |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| "400" Line-Ty |  |  |  |  |  |
| Slightly smatler than the |  |  |  |  |  |
|  |  |  |  |  |  |
|  |  |  |  |  |  |
|  | . 05 | 12 c | ${ }^{2} 2611$ |  |  |
|  | . 06 | 15 |  |  |  |
|  |  |  |  |  |  |

Type UC Cased "HangUp" Paper Condensers Oilimpregnated Fully cased and sealed to pre. vent melting of ous to moisture Ideal for X'mit-
ting and P. A. work.



## INCCO

densers Type BA

Bathtub type. oil filled. Hermet icalmysealed. Lug type Meet Army-Navy specs. No. MTId C3100 C3100 C3101 | C3102 | .25 |
| :--- | :--- |
| C3103 | .5 |
| C3104 | 1.0 | C3105 C3106

C3107 C3107
C3108 C3109 2.0 1000 V.D.C. Working C3110 . $051^{13,} \times 1 \times{ }^{13}$ 1.03 1.09 1.09
1.12
1 C3114 1.0 C3115


SPRAGUE "ATOMS" Ultra-Compact Dxy Electrolytics
Ultra-compact capacitors sealed in tubes with outer insulating sleeve,
Protected against "Blow ups." All have $31 / 2$ bare wire leads riv eted to end caps.

| No. | Mdd. Whg. V. D.-L. |  |  | Each |
| :---: | :---: | :---: | :---: | :---: |
| C769 | 10 | 25 | $916 \times 1{ }^{18}$ | 29 c |
| C770 | 25 | 25 | 916x $1 \%$ | 35c |
| C2680 | 5 | 50 | P6, $\times 13 / 8$ | 29 c |
| C2682 | 10 | 50 | $\left.{ }^{11} 161\right]^{3} / 8$ | 32c |
| C771 | 25 | 50 | \%化13 | 41 c |
| C2841 | 50 | 50 | 1, $16 \times 13 / 8$ | 50 c |
| C772 | 4 | 150 | $56 \times 188$ | 29 c |
| C73 | 8 | 150 | ${ }^{3} \times 18$ | 32c |
| C774 | 12 | 150 | $83^{3} \times 15$ | 35 c |
| C775 | 16 | 150 | 11/6x1\% | 41c |
| C776 | 20 | 150 | 2 x 18 \% | 44c |
| C2840 | 30 | 150 | 13191\% | 47 c |
| C777 | 40 | 150 | $78 \times 15$ | 47e |
| C778 | 4 | 450 | ${ }^{8} 8 \times 15$ | 41 c |
| C779 | 8 | 4.50 | $3 \times 1{ }^{5 / 8}$ | 44 c |
| C780 | 12 | 450 | \% 5158 | 53c |
| C781 | 16 | 450 | $131421 / 8$ | 65 c |
| C782 | 20 | 450 | $78 \times 218$ | 7le |

Type "EL" Prong-Base Dry Electrolytics


## INCCO CAPACITORS

Type WA High Voltage Oil Filled Capacitors For Industrial Use
Engineered for all industrial. commercial and labora tory uses. Conservatively rated; safe for continuous operation at $10 \%$ overioad. incco natled, low power factor, wide range of operating temperatures. Available to meet saltwater submersion requirements; hermetizally sealed stee case. Glazed wet-process porcelain insulators-low moisture absorption and high terminal to case flash over. Wound with highest grade condenser tissucs. INCCO 120WA100-1 Mfd., 12.500 V.D.C. Wkg.

## c3140-Your Cost.

INCCO 200WA20 ............................................ ${ }^{159}{ }^{\circ}$.W. $\mathbf{8}^{\circ}$. D. $4^{\circ}$. Shpg. wt. $29 \mathrm{lbs} . \quad \$ 8820$ INCCO 250 WA $50-.5$ Mfd, 25,000 V.D.C. Working. W. $12^{\circ}$. D. $4^{\prime}$. Shpg. wt. 43 lbs. C3142-Your Cost NCCO 500WA50-. 5 Mfd., 50.000 V.D.C. Working Overall C3143-Your Cost ©
NOTE: Incco Industrial Capacitors can be supplied in many capacities from 6000 V.W. to 150,000 V.W. These capacitors can be supplied in standard welded cases at no extra cost.


| No. | Mfd. | Wkg.V D.-L. | Each |
| :---: | :---: | :---: | :---: |
| C783 | 10-10 $\dagger$ | 50 5 $5^{3} 8$ | 59 c |
| C3164 | 8-8* | 150 , $2^{3}$ | 59 c |
| C2842 | 12-20* | 150 11. $2^{3} \frac{1}{8}$ | 68 c |
| C3165 | 20-20** | 150 2? | 76 c |
| C2683 | $20-20 \dagger$ | $1501 \times 2$ | 97 c |
| C2843 | 40-20 $\dagger$ | $15011{ }^{1} \times 2{ }^{3} 9$ | \$1.00 |
| C784 | 12-12* | $200{ }^{13}{ }_{6} \times 2^{3}{ }_{8}$ | 68 c |
| C785 | $8-16$ | 200 13 [4 223 \% | 68 c |
| C2844 | 8-16 | $250{ }^{3} \times 27$ \% | 76 c |
| C2845 | $8-16 \dagger$ | 2501 1238 | 1.00 |
| C787 | 16-16* | 200 7/0 $x^{23} 2^{3}$ | 76 |
| C2846 | 16-16** | 2501 x23.8 | 88e |
| C2684 | 16-16 $\dagger$ | $250112^{3}$ ह6 | \$1.18 |
| C786 | 8-8* | 450 15in $2^{3}$ 3 | 76 c |
| C2685 | 8-8 $\dagger$ | $4501{ }_{16} \times 3^{3} \frac{1}{8}$ | 97 c |
| C2847 | 8-16* | $450-1 \times 23 / 8$ | 97 c |

Type D.C. Full sized electrolytics for P.A. and heavy service work. Double seal-moisture-proof construction. Long color-coded leads 475 V . working; 600 V . peak.

| No. | Mid. | L. W. 1 | Eac |
| :---: | :---: | :---: | :---: |
| 2646 | 2 | $2^{3} \times \times 7 / 8 \times 7 / 8$ | 50. |
| C2647 |  | $418 \times 14 \times$ | 8 |
| C2649 |  | 43/818 ${ }^{\text {d }}$ |  |
| C2651* | 4-4 | $418 \times 15 \% \times 1$ | 1. |
| C2653 | $4-8$ | $41 / 8 \times 1^{3} \times 1$ | 1. |
| C2656* | 8-8 | 41/8x ${ }^{1 / 2}$ / |  |
| *4 leads |  |  |  |
| Type LD. Similar to above but 450 V. working: 525 V. peak. |  |  |  |
| C3527 <br> C3528 <br> C2792 <br> C3529 <br> C3530 <br> C2794 <br> *) 112 | 4 | $4^{2} \times 17 \times \times 8$ | \$0.5 |
|  | 8 | $44_{8} \times 188 \times 1$ |  |
|  | 12 | 4) $8188 \times 1$ |  |
|  | 16 | 4 ${ }^{6} \times 138 \times 13{ }^{3}$ | 1.03 |
|  | 4-4* | $41 \frac{1}{} \times 180 \times 1$ |  |
|  | 8-8* | $41 \times x$ | 1.0 |
|  |  | $8 \times$ |  |
|  |  |  |  |

600 V. Peak Drys to Replace Wet Electrolytics units. Highly formed dry electrolytics guaranteed to carry the a.c. ripple

| Stock <br> No. | Cap. | Repid. | Wet |
| :---: | :---: | :---: | :---: |
| C2515 | 8 | 4 to $8 \mathrm{~m} / \mathrm{d}$. | You |
| Cost |  |  |  |

PTM TINY MIKES

|  |  |  | 450 W.V. <br> Universa for a wide variety of replace ments Conserva- |
| :---: | :---: | :---: | :---: |
| tively rated at 525 volts, but will stand surges as high as 560 to 580 volts. Special metal mtg. feet. |  |  |  |
|  |  |  |  |
|  |  |  |  |
| No. | Mfd. | Size In. | Ea |
| C3564 |  |  | S0. |
| C3565 |  |  |  |
| C3563 | 12 | 11. x 1.15 |  |
| C3587 | 16 |  |  |
| C3566* |  |  |  |
| C3567* |  |  |  |

*Four leads; separate sections.

## INCCO Oil-Filled Condensers

Type SA
Hermetically
sealed case. Incco Oil " $A$ " impreg. nated and filled lain insulators. lain insulators. Conservatively rated-safe operation at $10 \%$
overload. "Space overload, Space Saver uni-
versal mounting brackets for easy adjustment. Non-corrosive lead coated steel case.

600 V.D.C. Working

C3120

1000 V.D.C. Working
$C 3122 \quad 1.0 \quad 127 / 8 \times 1{ }^{3} 15 \times 11$ wi 2.20
C3123, $2.0 \quad 4 \quad x 1^{18 / 161^{11} 16 / 1}$
1500 V.D.C. Working

2000 V.D.C. Working


## Tritest CARBON RESISTORS

## SERVIGZMEN'S SPECIAL!

## * $1 / 2$ \& 1 Watt R.M.A. Carbon Resistors

Here'sanot her Lafayette
EXCLUSIVE serviceman's offer
 that helps you to build profits

Our tremendous buying power makes this offer possible-stock up now and save! All are R.M.A. coded and held to acceptable tolerances. Specify stock number of type and resistance: $\begin{array}{lllllll}\text { Ohms Ohms Ohms } & \text { Ohms } & \text { Ohms } & \text { Ohms } & \text { Ohms } \\ 100 & 900 & 6000 & 17500 & 70000 & 200000 & 11 / 2 \mathrm{Meg}\end{array}$ \begin{tabular}{llrllll}
100 \& 900 \& 6000 \& 17500 \& 70000 \& 2000000 \& $1 / 2 \mathrm{Meg}$. <br>
150 \& 1000 \& 7500 \& 20000 \& 75000 \& 250000 \& 2 <br>
200 \& 1500 \& 10000 \& 25000 \& 80000 \& 300000 \& $21 / 2 \mathrm{Meg}$. <br>
\& 250 \& 200 \& 1200 \& 30000 \& 90000 \& 100000 <br>
\hline

 

200 \& 1500 \& 10000 \& 25000 \& 80000 \& 300000 \& $21 / 2$ Meg. <br>
250 \& 2000 \& 12000 \& 30000 \& 90000 \& 100000 \& 3 <br>
\hline
\end{tabular} $\begin{array}{llllllll}500 & 2500 & 12500 & 35000 & 100000 & 500 M 000 & 5 & \text { Meg. } \\ 600 & 3000 & 13000 & 50000 & 125000 & 750000 & & \end{array}$ $\begin{array}{llllll}600 & 3000 & 13000 & 50000 & 125000 & 750000 \\ 750 & 5000 & 15000 & 60000 & 150000 & 1 \text { Meg }\end{array}$

## 100 For <br> C5239- C5240 C5240 Watt Size 34 ${ }_{5}{ }_{5}$.

 resistors. Contains approximately 50 - 10 -watt, 25 popular carbon 1 -watt resistors. All standard RMA color coded. Shpg. wt. 2 lbs.C 3816 Kit of 100 . Specially priced
$\$ 1.69$

## 2-Watt Carbon Resistors

 Ileavy-duty carbon resistors, absolutely moisture proof. RMA color coded for easy identification: made of the finest material and workmanship. Guaranteed accuracy, $\mathbf{1 0 \%}$ plus or minus. The average are within $5 \%$. Resistance values will not vary at normal voltage. Ideal for replacement across small voltage divider sections, bleeders, etc. Also for public address
amplifiers or for test instrument replacement. Size $2^{\prime}$ L. I $1 / /^{*} \mathrm{O} . \mathrm{D}$.


NOTE: Calculator below suppilled FREE with orders for
24 or more Trutest Carbon 24 or mo r

or Code
Indicator Permits inscant calcula-
ton of the value in ohms of any R.M.A.
color coded resistor. The
circular rule can be set in a moment-readings are accurate. Full directions are printed on the indicator. $\mathbf{C 3 8 4 7 - \text { Your Cost Each. } 1 0 ¢}$ C3847 -Your Cost Each

Filament Resistors

## $\mathrm{c}^{2} \mathrm{~B}^{8}=3$

Dependable wire wound filament resistors, accurately rated. Have solder lug terminals and mount ing leet. Available with tap at the tap. Supplied in the following resistances only
$10.20,30,40,50,60$ and 100 ohms. With Center Tap
sired. 10 For 71 c .
Your Cost Each
Without Center Tap
C3998-Specify
sired. 10 For 63 c .
Your Cost Each.
sired. 10 For 63 c .
$7{ }^{9}$

## Tututest INSULATED $1 / 2$ \& 1 Watt

*Porcelain Insulated Outer Shells *Low Drift


Improved, finer carbon resistors, with heavy molded insulating shells which make them imper vious to moisture, heat and mechanical strain. of receiver Insulation permits resistors to touch each other without shorting. Hall-watt units $3 / 4 x^{7}{ }^{\prime \prime}$ dias. One-watt units $\left.15 / 10 x\right\}_{2}{ }^{\prime}$ dial. RMA color-coded. Approximately 300 units to 1 lb .


## SPRAGUE "KOOLOHM" Resistors



## Continental Carbon Multiplier Resistors

Impregnated and hermetically sealed in unusually stable. For any 1 watt applica-
dion but especially recommended for meter multipliers, photo-cell cir cuits, etc. Pigtail leads. Type A1. Accuracy $\pm 5 \%$.


[^2] substitute like quality where necessary.

# IRCPRECISION RESISTORS 

## Type BT Insulated Resistors Type F Metallized Resistors



## TYPE BT



Type BT employ metallized element sheathed in an overall covering of moisture proof phenolic compound. Type $\mathbf{F}$ are the original Metallized units housed in Isolantite. Both types are non-inductive. Have pig-tail wire leads. Tolerance $\pm 10 \%$. Specify Resistance.

| $\begin{gathered} \text { Ohms } \\ 1 \\ 2 \\ 3 \\ 5 \\ 10 \\ 15 \end{gathered}$ | Ohms 100 150 200 250 300 350 400 450 500 | Ohms 600 750 800 1000 1250 1500 2000 2250 2500 | Ohms 3000 3500 4000 5000 6000 7000 7500 8000 9000 | Ohms 10000 11000 12000 12500 15000 17500 20000 2500 25000 | Ohms 30000 3500 40000 50000 60000 650000 70000 7500 100000 | Ohms 125000 150000 200000 300000 400000 G000MXO | Megs. <br> 1.0 <br> 1.5 <br> 2.5 <br> 3.0 <br> 4.0 <br> 5.0 <br> 6.0 <br> 10.0 <br> 200 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | 1-Watt-BT-1 <br> $11 / 4 \times 1 / 6^{\prime \prime} .350$ ohms up. |  |  | Watt-8T |  |
|  |  |  |  |  |
|  |  |  | Each.... 24 | $\begin{aligned} & \text { E2263- } \\ & \text { Each } \end{aligned}$ |  |
| $3 / 2$-Watt $\bar{F}-1 / 2$ $11{ }^{1} 0$ merohms. C5250 |  |  |  |  |  |  |  |  | $\begin{aligned} & \text { 2-Watt-F-2 } \\ & 113 \text {. } 50 \text { onhm to } \\ & 10 \text { merohrs. } 188 \\ & \text { C5252-Each } 18 \end{aligned}$ |  |
|  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |

Similar to the BT units listed above, but contain a wire wound element, completely encased in molded compound. Tolerance $\pm 10 \%$. $\left.\begin{aligned} & \text { Order sizes desired from tabulated listing above. Specify Resis tanc } \\ & 1 / 2 \text {-Watt } \\ & \text { BW- } 1 / 2\end{aligned} \right\rvert\, \begin{array}{llll}1-W a t t & \text { BW-1 } & \text { 2-Watt- BW-2 }\end{array}$


## IRC Ultza-Figh Range Resistors

Type FH-1 and Type MG-3
For all industrial and electronic uses. Stable, nonageing, moisture-prool resistors. F1F-1 (listed above). MG construction utilizes the insulating properties of glass. All units above 1,000 megohms specially impregnated for stability under high humidities and other abnormal atmospleric condi tions.

Type FH-1
 Machine wound on non-hygroscopic cores, cement coating.
Ohms
1
$5 \frac{2}{7}$
104
254
$500^{4}$


$\qquad$


#### Abstract




$\qquad$

## Type "A $8^{\#}$ 10-Watt Rating

### 51.15 1.15 1.15 1.65 1.65 2.15 2.15

## IRC Wire Wound



30,000 ohms and over are 5 watts. $13 / 4$ long, ${ }^{3}$ " ${ }^{3}$ diim. Range up 10 0,000 ohms (sce list)
C5210-Up to 10,000 ohms. . . 26c Above 10,000 ohms, Each. . . 29c Type "DG" 20-Watet Rating
60,000 ohms and over are 10 watts. $2^{*}$ long, "1s diam. Range up to 100,000 ohms (see list).

 | $C 5211$ | 15,000 | $41 c$ | C5290 | 60,000 | 100,000 | $65 c$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | Type "Ep 50 -Watt (Max.)

$412^{\circ}$ long. $8 / 4^{\circ}$ diam. Range up to 100,000 ohms. Only in sizes marked with (1) (see list).

| Stk. No. From To Each Stk. No. From To Each |  |  |
| :---: | :---: | :---: | :---: |
| C5248 | 5 | 5000 Tle | $\begin{array}{llllllll}\text { C5248 } & 5 & 5,000 & 71 \mathrm{c} & \text { C5254 } & 30,000 & 100,000 & 94 \mathrm{c}\end{array}$

$612^{\prime \prime}$ long, $1^{\prime \prime}$ diam. Range up to 100,000 ohms. Only in sizes marked with asterisk* (see list).

| Stk. No. From | To | Each | Stk. No. From | Each |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C5260 | 100 | 5,000 | 50.97 | C5235 | 75,000 ohms | 5.47 |
| C5261 | 7.500 | 25,000 | 1.15 | C5236 | 100,000 ohms | $\mathbf{1 . 6 2}$ |

$\begin{array}{llll}\text { C5261 } & 50,500 & 25,000 & 1.25 \\ \text { C5 } 234 & 1.29\end{array}$
105,00 ohms
$5!.47$
C5234 $50,000 \mathrm{ohms} 1.29$
101/2" lons, $1 \frac{1 / k^{*}}{}$ diam. Range up to 100,000 ohms. Only in sizes marked with ( $\dagger$ ) (see list). Stk. No. From To Each Sik. No. From To Each $\begin{array}{lllllllllll}\mathbf{C 5} 237 & 100 & 10,000 & \mathbf{\$ 1 . 6 2} & \mathbf{C 5 2 3 8} & 15,000 & 100,000 & \$ 1.94\end{array}$


## IRC Power Wire-Wound Variable Resistors

For all industrial and Radio uses. Dissipate heat rapidly, withstand heavy overloads, have great mechanical strength. All except 10 watt units) are supplied with a NEW highly improved contact band that The spring carries a silver contact button on which the pressure never varies-no torn resistance wire, no corroded contacts. Band is threaded. Mounting brackets with all but the 10 -watt units.

Check sizes available in type desired before ordering, as all types are not available in every resist ance value listed below.

| Ohms | Ohms | Ohms | Ohms |
| :---: | :---: | :---: | :---: |
| 5 | 250 | 2500 | 15000 |
| 10 | 500 | 3000 | 20000 |
| 25 | 750 | 4000 | 25000 |
| 50 | 1000 | 5000 | 40000 |
| 100 | 1250 | 6000 | 50000 |
| 150 | 1500 | 7500 | 75000 |
| 200 | 2000 | 10000 | 100000 |

## Type ABA- 10 Watts

$11 \mathrm{x}^{3}{ }^{3}{ }^{7}$. Range up to $10,000 \mathrm{ohms}$. (Sce list above). C5262-
Your Cost Each
$44^{\text {c }}$
C5213-Extra slider for above. Your Cost Each ...........
Type DHA- 25 Watts
$21 / \mathrm{x}^{9}{ }^{18}$. Range up to 25,000 ohms. (See list above).

| No. | From | To | Each |
| :---: | :---: | :---: | :---: |
| C5274 | 5 | 5,000 | $56 c$ |
| C5275 | 6,000 | 15,000 | $65 c$ |
| C5276 | 20.000 | 25,000 | $71 c$ |
| C5219-Extra slider (silver) | E.. $12 c$ |  |  |

## Type EPA-50 Watts

 $41 / 2 \times 3$. Available in sizes up to100,000 ohms. See list above. Each with brackets and one slider

| No. | From | To |
| :--- | ---: | ---: |
| C5286 | 5 | 5,000 |
| C5287 | 6,000 | 25,000 |
| C5288 | 40,000 | 50,000 |

Each
$\$ 0.88$
Type ESA-80 Watts
$32 \times 3+$. Avalable in all sizes as isted at left (except 150, 1250 and 75,000 ohms). Each with brackets and one slider.

| No. | From | To | Each |
| :--- | ---: | ---: | ---: |
| C5196 | 5 | 5,000 | 51.15 |
| C5197 | 6,000 | 25,000 | 1.29 |
| C5198 | 40,000 | 50,000 | 1.47 |
| C5199 | 100,000 | $\ldots . \cdots$ | 1.62 |

Type MAA- 100 Watts
$61 / 2 \times 1 \frac{1}{8}$. Available in the following resistances.

| hm | ms | Ohms | Ohms |
| :---: | :---: | :---: | :---: |
| 100 | 2500** | 10000* | 500 |
| $5000^{\text {* }}$ | $5000{ }^{*}$ | 15000 | 75 |
| 1000* | 7500 | 25000* | 000 |
| No. | From | To | Each |
| C5266 | 100 | 5,000 | 51.29 |
| C5267 | 7,500 | 25,000 |  |
| C5268 | 50,000 |  | 1.62 |
| C5269 | 75,000 | 100,00 | 175 |
| Type HOA- 200 Watts $10 \frac{1}{2} \times 1 / \mathrm{M}$. In sizes marked by asterisk in list above. |  |  |  |
|  |  |  |  |
|  | From |  |  |
| C5270 | 500 | 10,000 | 51.94 |
| C5271 | 25,000 | 100,000 | 2.2 |

Extra Sliders
Silver contact type tofit sizes listed.
$5289-75,000-100,000$


Scientifically designed and constructed. Dependable precision meter multipliers and shunts. Guaranteed accuracy $1 \%$. Non-inductively wound. Winding is specially impregnated, which insures constant
 $2^{13}, 16 \times 7 / 8^{\prime}$. Have
type terminals.

## $C 5150$ $C 5154$ <br> C5154

Type WW-1

$C 5159$
$C 5160$
$\begin{array}{r}C 5160 \\ \mathrm{C} 5161 \\ \hline\end{array}$
$\begin{array}{lrl}C 5162 & 100 \\ C 5164 & 900 & 68\end{array}$ $\left.\begin{array}{lll}\mathrm{C} 5164 & 200\end{array} \quad \begin{array}{lll}\mathrm{C} 5177 & 60000 \\ \mathrm{C} 5000^{\circ} & 250 \\ \mathrm{C} 5178 & 75000\end{array}\right\} 1.12$
C5200 250 C5126
C5193 750,0002.65|C5202 13/2 Meg. 4.41
C5194 1 Meg. 3.09
C5115 2 Meg. 5.88
$4 c$
$\frac{\text { Type WW-4 }}{$\cline { 2 - 4 }}
Stock
Rrs. Your Stock Rir
Your
Cost
$\left.\begin{array}{ll}\text { C5204 } & 400 \\ \text { C5155 } & 500\end{array} \begin{array}{lllllll}\text { C5179 } & 100000 & 1.23 & \text { C5124 } & 500\end{array}\right\}$

C5143 1500 G8C C5183 200以 (1O 1.56


cisi
 ccill cirn ise 73 c



## Resisto-Cabinet

Free with any of the following resistor kits. Siurdy, 4 drawer ( 7 compartments in each) cabinets $11 \times 5 \frac{1}{2} \times 51 / 2^{\circ}$. Blue \& Silver finish. Shpg. Wt. 7 lbs. Kit No. I: 8 Type BT-1/2 W. resistors, 37 type BT-1 W, resistors, 10-type AB 10 W fixed resistors, 4 -type ABA 10 resistors. Total 59 resistors.
C5281-List value.. $\$ 16.46$. Your Cost, Complete Kit No. 2: Contains 100 Type BT-1/2 W. Resistors. C5280-List value. $\$ 17.00$. Your Cost, Complete
Kit No. 3: Contains 83 BT-1 Whatt resistors.
C5282-List value. S16.60. Your Cost, Complete
s9.68
\$9.98
\$9.76

## OHMMITE RESISTORS

## Vitreous Enameled <br> Fixed Resistors <br> $\sum_{0}^{\infty}=0$

Lug type resistors, wire-wound on porcelain cores. The vitreous enameled coating both protects and insulates the wire. The best alloy and largest possible size wire are used for each resistance. The vitreous enameled coating retains the uniform spacing of the turns, just as they were wound, which permits close spacing. Wire is me
chanically locked and soldered to the terminal lugs. Tolerance $10 \%$.

| 25 WATT |  |  |  |
| :---: | :---: | :---: | :---: |
| 1 | 150 | 3,000 | 25,000 |
| 2 | 200 | 3,500 | 30,000 |
| 3 | 250 | 4,000 | 35,000 |
| 4 | 500 | 5,000 | 40,000 |
| 5 | 750 | 6,000 | 45,000 |
| 10 | 800 | 7,500 | 50,000 |
| 25 | 1,000 | 10,000 | 60,000 |
| 50 | 1,500 | 12,000 | 70,000 |
| 75 | 2,000 | 15,000 | 80,000 |
| 100 | 2,500 | 20,000 | 100,000 |
|  |  |  | Each |
| C7125 - 1 to 5M. . . . . . . . . 47e |  |  |  |
| C7126-6M $10.15 \mathrm{M} . . . . .53 \mathrm{c}$ |  |  |  |
| c7127-20M to 50M . . . . . 65c |  |  |  |
| C7128-50M ohms . . . . . . 73c |  |  |  |
| C7129 70M ohms . . . . . . . 79c |  |  |  |
| C7130-80M ohms . . . . . . 88c |  |  |  |
| C7131-100M ohms . . . 51.12 |  |  |  |
| 100 WATT |  |  |  |
| 1 | 75 | 1,500 | 20,000 |
| 2 | 100 | 2,000 | 25,000 |
| 3 | 125 | 2,510 | 30,000 |
| 4 | 150 | 3,000 | 40,000 |
| 5 | 250 | 5,000 | 30,000 |
| 10 | 500 | 7,500 | 60,000 |
| 25 | 750 | 10,000 | 75,000 |
| 50 | 1,000 | 15,000 | 100,000 |
|  |  |  | Each |
| C7139-1 to 5M.......97e |  |  |  |
| C7140-7,500 to 25M.... $\$ 1.15$ |  |  |  |
| C7141-30M to 50M...... 1.29 |  |  |  |
| C7142-60M to 75M..... 247 |  |  |  |
| c7143-100,000 ohms..... 1.62 |  |  |  |

## "BROWN DEVIL" Fixed Resistors



Wire wound, vitreous enameled units suitable for use on all electronic and industrial equipment. Tinned copper wire terminals. Protected against humidity and mechanical damage. ' $01.10 \%$. Wt. 3 oz.

|  |  |  |  | strong ceramic hubs. The slowbreak quick-make" action, pro- |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Ohms | Ohms | Ohms | Ohms | break <br> vided b |  | make | action, | pro |
| 0.4 | $125 \dagger$ | 1,850** | 16,000 | vided by a positive cam-and-roukr |  |  |  |  |
| 0.6 * | 150 | 2,000 | 17,500 | mechan <br> beat for | the | the | action pro | ven |
| $0.8{ }^{*}$ | 200 | 2,250 | 18,000 | best for the applications of these |  |  |  |  |
| 1 | 225 | 2,400* | 20,000 | Switches. ldeal for use in switch- |  |  |  |  |
| 12 | 250 | 2,500 | 22,500 | boards, battery chargers, motor |  |  |  |  |
| 1.3 | 300 | 2,750* | 25,000 | controls, X-ray equipment, etc. Non-shorting, single pole rotary, |  |  |  |  |
| 1.5 | 350 | 3,000 | 30,000 | multi-position units. |  |  |  |  |
| $2+$ | 400 | 3,500 |  |  |  |  |  |  |
| 4 $\dagger$ | $450 \uparrow$ | 4,000 | 40,1000 | Model LLI Tap Switch |  |  |  |  |
| $4 \dagger$ | 500 | 4,500 | 45,1000 | Alternating current rating 10 |  |  |  |  |
| 5 | $600 \uparrow$ | 5,000 | 50,000 | Amps. 150 Volts-13/" diam. $1 /{ }^{\prime \prime}$ |  |  |  |  |
| 7.5 | $650{ }^{*}$ | 6,000 | \$5,000 ${ }^{\circ}$ |  |  |  |  |  |
| 10 | 700 | 7,000 | 60,000 | Shait diam.. Standard mounting. For $1 / 0^{\circ}$ panel maximum, by means |  |  |  |  |
| $12+$ | 750 | 7.500 | 65,000 ${ }^{\text {\% }}$ | of $3 / 8-32$ threaded bushing and |  |  |  |  |
| $15 \dagger$ | 800 | 8,000 |  | hex. nut. Single unit. Depth behind |  |  |  |  |
| $20 \dagger$ | $850{ }^{\circ}$ | 8,590¢ | 75,000 |  |  |  |  |  |
| 26 | 960 | 10,000 |  | panel $1 \frac{1}{8}$. |  |  |  |  |
| $30 \dagger$ | 1,000 | 11, 10, 104 | 85,000 | Model 212 Tap Switch |  |  |  |  |
| 35 | 1,100 | 12,(m) 4 | 90,000 | Alternating currentrating 15 Amps. |  |  |  |  |
| $40 \dagger$ | 1,200 | 12,500 | 95,000 | 21 diam.. ${ }^{1 / 4}$ shaft diam.. stand- |  |  |  |  |
| 50 75 | 1,250 | $13.500 \uparrow$ | 100,000 |  |  |  |  |  |
| 100 |  |  |  | ard mounting. For $1 / 6^{\prime \prime}$ panel maximum, by means of "- 32 thread- |  |  |  |  |
| 10 Watt Resistors |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Available in all sizes except those marked*. |  |  |  | Model 111 |  |  | Model 212 |  |
| c7150-0.4 to 10M ohms. Specify sizes desired. Each........... 26c |  |  |  | Stock Your No. Tota! Stock Your |  |  |  |  |
| c7151-11M 1050 M ohms. Spec- |  |  |  | C10309 | \$1.53 | 2 | 30 C10320 | \$3.82 |
| ify sizes desired. Each....... 29c |  |  |  | C10308 | 1.53 | 3 | 60 C10319 | 3.82 |
| 20 Watt Resistors |  |  |  | C10307 | 1.53 | 4 | 00 Cl 10318 | 3.82 |
| Available in all sizes except those |  |  |  | C10306 | 1.59 | 5 | 12() $\mathrm{Cl0317}$ | 3.97 |
| markedt. <br> C7152-0.4 to 15 M ohms. Specify |  |  |  | C10305 | 1.59 | 6 | 150 C10316 | 3.97 |
|  |  |  |  | C10304 | 1.65 | 7 | 180 C10315 | 4.12 |
| C7152-0.4 to 15 M ohms. Specify sizes desired. Your Cost.... . 41e |  |  |  | Cl0303 | 1.65 | 8 | 210 C10314 | 4.12 |
| C7153-20M to 50M ohms. Spec- |  |  |  | C10302 | 1.71 | 9 | 240 C10313 | 4.26 |
| ify szes desired. Your Cost. 50e |  |  |  | C10301 | 1.71 | 10 | 270 C10312 | 26 |
| C7154 55 M to 100 M ohms. |  |  |  | C10300 | 1.76 | 11 | 3710 C10311 | 4.41 |
| Your Cost. |  |  |  |  |  |  | C103 |  |

## OHMITE Adjustable <br> 3 <br> 'DIVIDOHM'R Resistors

Wire-wound units that make ideal voltage dividers for original equipment and replacement in transmitters, rectifiers and other apparatus. Handy for obtaining odd resistance values, for adjusting circuits and for use on equipment which must be set to meet various line voltages. Vitreous enameled on porcelain cores with a narrow strip of the turns of wire exposed to form a contact surface for embossed contact on the adjustable lug. (Every turn is securely held against shifting.) Slider and mounting bracket included.

| 10 WATT $1^{13} 5^{5} 5^{4}$ |  |  |  | 25 WATT $2^{2} \times 80$ |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 5 | 100 | 2,000 | 7,500 | 5 | 250 | 4,000 | 20,000 |
| 10 | 250 | 3,000 | 10,000 | 10 | 500 | 5,000 | 25,000 |
| 25 | 500 | 4,000 |  | 25 | 1,000 | 7,500 |  |
| 50 | 1,000 | 5,000 |  | 50 | 2,000 | 10,000 |  |
| C7174 <br> Your Cost |  |  |  | 100 | 3,000 | 15,000 | Each |
|  |  |  |  | C7175 5 ohms to 5 M ..... 56c C7176-7,500 to $15 \mathrm{M} . . . .65 \mathrm{c}$ c7177-20M to 25 M ....... 71 c 100 WATT $61 \mathrm{E}^{3}$ |  |  |  |
| 50 WATT 4**90 |  |  |  |  |  |  |  |
| 1 | 250 | 3,000 | 12,000 | 10 | 250 | 5,000 | 25,000 |
| 2 | 300 | 3,500 | 15,000 | 25 | 500 | 10,000 | 30,000 |
| 3 | 400 | 4,000 4,500 | 20,000 | 50 | 1,000 | 15,000 | 40,000 |
| 5 | 500 750 | 4,500 5,000 | 25,000 30,000 | 100 | 2,500 | 20,000 | 50,000 |
| 10 | 800 | 6,000 | 40,000 | c7182-10 ohms to 5M. \$1.29 |  |  |  |
| 25 | 1,000 | 7,000 | 50,000 |  |  |  |  |
| 50 | 1,250 | 7,200 | 60,000 | C7183-10M to 25M..... 1.47 |  |  |  |
| 75 | 1,500 | 7,500 | 80,100 | C7184-30M to 50M...... 1.62 |  |  |  |
| 100 | 2,000 | 8,000 | 100,000 | 200 WATT $10 \frac{1}{}{ }^{\circ} \times 11 / 8{ }^{\prime \prime}$ |  |  |  |
| 150 | 2,250 | 9,000 |  | 5 | 250 | 5,000 | 25,000 |
| 200 | 2,500 | 10,000 |  | 10 | 500 | 10,000 | $30,000)$ |
|  |  |  | Each | 25 | 1,000 | 15,000 | 40,000 |
| c7 | 10 | 105 M | . 88 c | 50 | 2,500 | 20,000 | 50,000 |
| $C 71$ | -6M | 25 M . | 97 c | c7185 5 ohms to 10M. . 51.94 |  |  |  |
| C71 | -30M | - 50 M . | 51.22 |  |  |  |  |
| C71 | -60M | - 100N | 1.29 | C7186 15M $1050 \mathrm{M} \ldots . .2 .26$ |  |  |  |

Standard Adjustable Sliders SCREWDRIVER

BAKELITE KNOB TYPE

TYPE

| Diam. Inches | TYPE |  | TYPE |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Stock No. | Your Cost | Stock No. | Your Cost |
| ${ }^{518}$ | C7193 | 6 c |  |  |
| 810 | C7194 | 6 c | $C 7197$ | 9 c |
| 3 | $C 7195$ | 9 c | C7198 | 15c |
| $1 \%$ | C7196 | 9 C | C7199 | 15 c |

## OHMITE Powex Rheostats



Designed to produce permanently smooth, close control. Ceramic and metal construction. Provided with insulated shafts with provision to keep the rheostat from turning on the panel. The resistance wire is wound over a solid porcelain core. Each rurn is locked against shifting by vitreous enamel, which also covers the core and base. Requires $3 / /^{*}$ Hole. WL 1 lb.

| Model "K"-25W ( $\mathbf{1}^{1}$ /6" dia.) |  |  |  | Model "3"-50 Watt ( $2^{3}$ dodia.) |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stock | Total | Max. |  | No. | Ohms | Amps. | Each |
| No. | Ohms | Amps. | Each | $\overline{C 7200}$ | 0.5 | 10.000 |  |
| C8350 | 1 | 5.000 | \$2.65 | C7201 | 1 | 7.070 | \$2.94 |
| C8362 | 2 | 3.540 |  | C7202 | 2 | 5.000 |  |
| C8351 | 3 | 2.880 |  | C7203 | 4 | 3.530 |  |
| ${ }^{88363}$ | 8 |  |  | ${ }_{\text {c }} \mathrm{C} 7204$ | 8 | 2.500 |  |
| C8352 C8364 | 8 10 | 1.770 1.580 |  | c7205 $\mathbf{c} 7206$ | 12 | 2.040 1.760 |  |
| C8365 | 15 | 1.290 |  | c7207 | 22 | 1.500 |  |
| C8366 | 25 | 1.000 |  | C7208 | 35 | 1.190 |  |
| C8353 | 35 | 845 |  | C7209 | 50 | 1.000 | \$2.65 |
| C8367 | 50 | . 707 | \$2.35 | c7210 | 80 | . 790 |  |
| C8390 | 75 | . 575 |  | C7212 | 125 | . 630 |  |
| C8368 | 100 | . 500 |  | ${ }^{C 7212}$ | 150 | . 585 |  |
| C8369 | 125 | . 445 |  | C7213 | 225 | 470 |  |
| C8370 | 175 | . 375 |  | C7214 | 300 500 | . 408 |  |
| C8371 | 250 | . 316 |  | C7215 | 500 | 316 |  |
| ${ }^{\text {c }} 83391$ | 350 | . 267 |  | C7216 | 800 | .250 |  |
| $\begin{aligned} & \mathrm{C} 8372 \\ & \mathrm{C} 8392 \end{aligned}$ | $\begin{aligned} & 500 \\ & 850 \end{aligned}$ | $\begin{array}{r}.222 \\ .182 \\ \hline\end{array}$ |  | C1217 C7218 | 1,000 1.600 | . 2224 | \$2.79 |
| ${ }^{\text {C8373 }}$ | 1,000 | . 155 |  | C7219 | 2,500 | .141 |  |
| C8374 | 1,500 | . 129 | \$2.65 | C7220 |  | . 119 |  |
| C8375 | 2,500 | . 100 |  | c 7222 | 5,000 | 100 | \$294 |
| C8376 | 3,500 | . 084 | \$2.79 | C7222 | 8,000 | . 079 |  |
| C837 | 5,000 | . 070 | \$2.79 | C7223 | 10,00 | . 070 |  |

MODEL "K"-100 WATT ( $31 / 8$ DIA.)


तITTO 5 and 10 Watt Wire-Wound Resistors


| Ohms | Ohms | Ohms | Ohms | Ohms | Ohms | Ohms | Ohms |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 50 | 250 | 800 | 1500 | 2750 | 8000 | 20000 |
| 10 | 75 | 400 | 900 | 1750 | 3000 | 9000 | 22500 |
| 15 | 100 | 500 | 1000 | 2000 | 4000 | 10000 | 25000 |
| 20 | 150 | 600 | 1100 | 2250 | 5000 | 12500 | 30000* |
| 25 | 200 | 750 | 1250 | 2500 | 6000 | 15000 | 40000* |
| * $\uparrow$ vail | in 10 | watt si | only. |  | 7000 | 17500 | 50000* |
| CA438-TRUTEST 5-Watt Resistors Your Cost Each, Any Size. |  |  |  |  |  |  |  |
| C4439-TRUTEST 10-Watt Resistors Your Cost Each, Any Size. |  |  |  |  |  |  |  |

10-Watt Adjustable Wire Wound


Vitreous enamel coated adjustable wire wound units. Lug terminals. $13 / 4 x$ / ${ }^{\prime \prime} \mathrm{O} . \mathrm{D}$. with mtg. brackets. Specify resistance. $4445-$
$\left.\begin{array}{cccccc}\text { Ohms } & \text { Ohms } & \text { Ohms } & \text { Ohms } & \text { Ohms } & \text { Ohms } \\ 10 & 50 & 150 & 500 & 2000 & 5000 \\ 25 & 100 & 200 & 1000 & 2500 & 10000\end{array}\right\}$


## MTIRA Semi-Variable

 Wire-Wound Resistors Vitreous enamel coated. Adjust able lugs have small contact buttons out shorting out much resistance. Brackets and one slider furnished| 25 Watts ( $2 \times 5 / 8^{\prime \prime}$ )No. Ohms ${ }^{\text {Each }}$ |  | 50 Watts ( $41 / 2 \times 5 / 8^{\circ}$ ) |  |  | 75 Watts ( $6 \times 5{ }^{5}{ }^{\circ}$ ) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | No. | Ohrns | Each |
| C20740 | $1)$ |  |  |  | C20770 | 100 |  | C20800 | 100) |  |
| C20741 | 2 | C20771 | 200 |  | C20801 | 200 |  |
| C20742 | 3 | C20772 | 300 |  | C20802 | 300 |  |
| C20743 | 5 | C20773 | 400 |  | C20803 | 400 |  |
| C2074 | 10 | C20774 | 500 |  | C20804 | 500 |  |
| C20745 | 20 | C20775 | 800 |  | C20805 | 750 |  |
| C20746 | 50 | C20776 | 1000 |  | C20806 | 1000 |  |
| C20747 | 100 | C20777 | 1500 |  | C20807 | 1500 |  |
| C20748 | $200-2+$ | C20778 | 2010 |  | C20808 | 2000 |  |
| C20750 | $500-4$ | C20779 | 2500 |  | C20809 | 2500 |  |
| C2075 | 750 | C20780 | 3000 |  | C20810 | 3000 |  |
| C20752 | 800 | C20781 | 4000 |  | C20811 | 4000 |  |
| C20753 | 1000 | C20782 | 5000 |  | C20812 | 5000 |  |
| C20755 | 2000 | C20783 60010 <br> C20784 7000 <br> C20785 8000 <br> C2078 90001 <br> C20787 10001 <br> C2078 12000 <br> C20789 15000 <br> C20790 20000  <br> C20791 25000  |  |  | C20813 |  |  |
| C20757 | 2500 |  |  |  | C20814 | 71000 |  |
| C20759 | 4000 |  |  |  | C20815 | 7500 |  |
| C20760 | 3000 |  |  |  | C20816 | InOOP? | -84 |
| C20761 | 6000 |  |  |  | C2081 | 1500 |  |
| C20762 | 7000 - |  |  |  | C20819 | 25400 |  |
| C20763 | $8000-54$ |  |  |  |  |  |  |
| C20765 | 10000 |  |  |  |  |  | $\$ 1.10$ |
|  | 1500 | $\left.\begin{array}{l} \mathrm{C} 2079230000 \\ \mathrm{C} 20793 \\ \mathrm{C} 20794 \\ 500000 \end{array}\right\} ? 36$ |  |  |  |  |  |
| $C 2079620000$ $C 2079725000$ 5 <br> C20825-Extra sliders |  |  |  |  |  |  |
|  |  | C20823 | 10000 | \$1.22 |  |  |  |
|  |  |  |  |  | istors. | Eac |  |

## Tmutest <br> Vitreous <br> Resistors

Guaranteed plus or minus $10 \%$. All are non-porous, dissipate heat rapidly, have positive lug contacts and do not change



# MALLORY Yard-Ohm Resistance 

 KitsThe Yard-Ohm Kit provides a real solution to the odd-value resistor problem. Ideal for meter shunts. for experimental labs, pre-production runs and for use wherever a high quality flexible resistor is desired. Contains all the necessary range of values. Excellent for replacement applications. Each kit consists $f$. sistsol an envelope containing yard sparal Available in eight resistance values. Dissipation-all types; $1 / 2$ watt per inch. Instructions included.

| Stk | Ohm | ap | our | Sk. | Ohms | Cap. |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | Per In. | Amps. | Cost | No. | Per In. | Amps. | O |
| C4407 | 1 | 707 |  | C4411 | 50 | 100 |  |
| C4408 | 5 | . 315 |  | C4412 | 100 | 071 |  |
| C4409 | 10 | . 223 |  | C4413 | 250 | 0.11 |  |
| C4410 | 25 | . 141 |  | C4414 | 500 | 031 | Any Type |



## IECTROFM Wire-Wound

## Fixed Resistors

10 Watt units furnished with pig-tail leads. 20 Watt, 50 Watt and 100 Watt units have solder lug terminals. All types are coated with vitreous enamel and are space wound on low loss ceramic cores with resistance wire. $10 \%$ Tolerance


Ohms 22500
25000 25000
30000 30000
40000 40000
45000 c7300-Specify Resistance. Any above type, Your Cost...

| 5 | 50 | 200 | 600 | 2000 | 7000 | 25000 | 70000 |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 10 | 60 | 250 | 700 | 2500 | 7500 | 30000 | 75000 |
| 15 | 75 | 300 | 750 | 3000 | 10000 | 35000 | 80000 |
| 20 | 100 | 350 | 1000 | 4000 | 12500 | 400000 | 90000 |
| 25 | 125 | 400 | 1250 | 5000 | 15000 | 50000 | 100000 |
| 10 | 150 | 500 | 1500 | 6000 | 20000 | 60000 |  |
| C7301 | Speciry | Resistrnce 5 | to | 5 M Ohms | Your Cost |  | 50.41 |

C7301 Specify Resistance. 5 to 5 M Ohms. Your Cost C7303-Specify Resistance. 12,500 to 15 M Ohms. Your Cost C7304-Specify Resistance. 20 M to 25 M Ohms. Your Cost C7304-Splecify Resistance. 20 M to 25 M Ohms. Your Cost C7306-Specify Resistance. 60 M to 75 M Ohms. Your Cost

| 50 Watt ( ${ }^{3} \times 41 / 20^{\circ}$ ) Mounting Centers |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 5 | 100 | 750 | 2500 | 6000 | 10000 | 2000 | 50000 |
| 10 | 200 | 1000 | 3000 | 7000 | 12000 | 2500 | 60000 |
| 25 | 250 | 1500 | 4000 | 7500 | 12500 | 300 | 75000 |
| 50 | 500 | 2000 | 5000 | 800 | 15000 |  | 100000 |
| C7308-Specify Resistance. 5 to 5M Ohms. Your Cost ....... 50.65 |  |  |  |  |  |  |  |
| C7309-Specify Resistance. 6M to 25M Ohms. Your Cost....... 73 |  |  |  |  |  |  |  |
| C7310-Specify Resistance. 30 M to 50 M Ohms. Your Cost $\ldots .$. . 85C7311 Specify Resistance. 60 M to 75 M Ohms. Your Cost..... 1.06 |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| C7312-100M Ohms. Your Cost . . . . . . . . . . . . . . . . . . . . . . . . . . 1.2 |  |  |  |  |  |  |  |



C7313-Specify Resistance. 25 to 5M Ohms. Your Cost.
C7314-Specify Resistance. 7,500 to 25 M Ohms. Your Cost C7315-Specify Resistance. 30M to 50M Ohms. Your Cost C7316-Specify Resistance. 60M to 75 M Ohms. Your Cost
$\frac{\text { C7317 } 100 \mathrm{M} \text { Ohms. Your Cost..... }}{\text { IECTROFM Wize-Wound }}$

## Adjustable Resistors

## Vitreous Enameled units. Particularly ap.

 plicable to radio receivers, radio transmitter power supply, experimental and design work. Furnished with one adjust ing lug and mtg. brackets|  | Ohms | Ohms | Ohms | Mounti | Ohms | Ohms |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | $10$ | $75$ | $300$ | $\begin{aligned} & \text { Ohms } \\ & 750 \end{aligned}$ | Ohms $2000$ | Ohms 4000 | $\begin{aligned} & \text { Unms } \\ & 7500 \end{aligned}$ |
| 2 | 15 | 100 | 350 | 800 | 2250 | 4500 | 8000 |
| 3 | 20 | 150 | 400 | 1000 | 2500 | 5000 | 8500 |
| 5 | 25 | 200 | 500 | 1250 | 3000 | 6000 | 10000 |
| 7.5 | 50 | 250 | 600 | 1500 | 3500 | 7000 |  |
| 7322 | pecify | esi |  |  |  |  |  |



## "DS" Controls With Built-In Shafts


e $20^{\text {"CS" }}$ "ontrols in construction. 1 . $10^{\prime \prime}$ diameter. Has built-in shaft. "Double flatted" shaft takes 1/2" and 2/0" push-on knobs and set screw knobs without filing. Control diameter $11 / \mathrm{M}^{\circ}$; depth, less switch, ${ }^{33} \mathrm{~F}^{\circ}$; depth, with switch, "s/a


Any Type Above, Your Cost Each... iipSif Controls

| No | "DS" | Ohms | Tapped At | No | "DS" No. | Ohms | Tapped At |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C9145 | 13-130X | 250000 C | 125000 | C9136 | 1C-538X | 1 Meg . | 250000 |
| C7809 | 18130X | 250000 R | 60000 | C9130 | 13-137X | 1 Meg . | 250000 |
| C9146 | 18-132X | 350000 F | 75000 | C9147 | 13-139X | 2 Meg . | I 50000 |
| C9128 | 13-133X | 500000 H | 125000 |  |  |  |  |

## $\frac{\text { Your Cost Each.................................. }}{\text { Switches for IRC Controls }}$

 Positive action. Underwriters' Lab. inspected. Quickly attached, S.P.D. S. Switches D.P.S.T. Switches S.P.D.T. Switches C9133 "CS" Each C9135 "CS" Each C9134 "CS" Each

## Metallized High ()

## and Migh Voltage Resistors

Dype MP units are designed for service in ultra-high frequencies where power dissipation is required. Ideal for transmitter dummy loads and rhombic antenna terminations. Ceramic base coated with a metallized filament resistance material. Type MV units are designed for high voltage applications where high resistance and
quired. So constructed as to give the same performance as large number of 1 watt resistors connected in series. A heavy varnish coating protects both types from mechanical injury and the effects of humidity. protects both types from mechanical injury and the effects of humidity, Available with luks or ferrules, $\pm 15$ Tolerance. Write for
 A climate-proof cement coating provides a desendable protection for heavy duty work. No reduction in power ratings necessary. Lo C5105-Type NEP-50 watts, $41 / 2 \times 1 /$
Standard values from 5 ohms to 5,000 ohms.
Your Cost Each
C5106-Type NHA- 100 Watts, $61 / 2 \times 11$ t.
Standard values from 5 ohms to 5,000 ohms
Your Cost Each
C5107-T NRE NHO- 200 Watts, io 16 iji in in follow. 4 - 35 ohm
Your Cost Each

## \$1.76 <br> \$2.35



IRC Control Kit
19 Universal size "DS" controls and 6 radio replacements! Types included are recommended for replacement in over 10,850 models in IRC Manual. Factory packed in sturdy cabinet $141 / 2 \times 7 \times 41 / 8^{\circ}$, finished in silver, blue and yellow. Separate compartment for each control; 3 handy drawers hold switches, and small parts. Contains: 2 each 13-133. 13-137, 13-139X; one each of $11-116,11-123,11-128$, 11-133, 13-123, $13-128$, $1: 3-130$,
$13-130 \mathrm{X}, 13-133 \mathrm{X}, 13-137 \mathrm{X}, 13-139,14-116$, and $16-119 ; 5$ number 41 13-130X, 13-133X, 13-137X, 13-139, 14-116, and 16-119;
and 1 number 42 switches. Cabinet included FREE! W C7739
Your Cost Complete
$\$ 14.4 .5$

Type "Cs'P Volume Controls
Dependable units easily adapted for a large percentage of all replacements. The entire length of the $3^{\circ}$ shaft is flat. Outstanding features are: 5-Finger "Knee Action" Element Contactor; Spiral Spring Connector which eliminates one sliding, metal-to-metal contact; Metallized-type Resistance Element; and the Thrust Washer.

| Stock No. | $\begin{gathered} \text { iRC } \\ \mathrm{css}^{-1} \mathrm{No} . \end{gathered}$ | Ohms | $\begin{aligned} & \text { Stock } \\ & \text { No. } \end{aligned}$ | $\begin{gathered} \text { IRC } \\ \text { "CS" No. } \end{gathered}$ | Ohms | $\begin{aligned} & \text { Stock. } \\ & \text { No. } \end{aligned}$ | IRC | Ohms |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C9231 | 11-103 | 500A | C9244 | 16-118 | ${ }^{1} 15000 \mathrm{~F}$ | C9257 | 13-130 | 250000 C |
| C9232 | 11-108 | 1000A | C9245 | 16-119 | 20000F | C9258 | 14-130 | 250000D |
| C9233 | 11-110 | 2000 A | C9246 | 11-120 | 25000A | C9259 | 13-132 | 3500000 C |
| C9234 | 11-112 | 3000A | C9247 | 14-120 | -25000D | C9260 | 11-133 | 500000A |
| C9235 | 11-113 | 4000 A | C9248 | 16-120 | 25000 F | C9261 | 13-133 | 500000 C |
| C9236 | 11-114 | 5000 A | C9249 | 11-123 | 50000 A | C9262 | 14-133 | 500000 D |
| C9237 | 13-114 | 5000 C | C9250 | 13-123 | 50000 C | C9263 | 13-137 | $1.0 \mathrm{Meg} . \mathrm{C}$ |
| C9238 | 11-115 | 7500 A | C9251 | 13-125 | 75000 C | C9264 | 13-139 | 2.0 Meg. |
| C9239 | 11-116 | -10000 | C9252 | 14-125 | 75000 D | C9265 | 13-140 | 3.0 Meg. |
| C9240 | 13-116 | 10000C | C9253 | 11-128 | 100000A | C9266 | 11-141 | 5.0 Meg. |
| C9241 | 14-116 | * 10000D | C9254 | 13-128 | 100000 C | C9267 | 11-142 | 7.0 Meg. A |
| C9242 | 16-116 | *10000F | C9255 | 11-129 | 200000A | C9268 | 11-143 | 10.0 Meg. A |
| C9243 | 1+118 | -15000D | C9256 | 14-129 | 300000 D |  |  |  |

## *Includes 300 ohm BT-1/2 Resistor <br> Any Above Type, Your Cost Each. <br> $59^{\circ}$ <br> Tapped Standard Type "CS" Controls

| Stock No. | $\begin{gathered} \text { IRR } \\ \text { "CS"No. } \end{gathered}$ | Ohms | Tapped | $\begin{gathered} \text { Stock } \\ \text { No. } \end{gathered}$ | $\begin{gathered} \operatorname{IRC} \\ \cdot \mathrm{Cs}^{\prime \prime} \text { No. } \\ \hline \end{gathered}$ | Ohms | Tapped At |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C9269 | 13-130X | 250060A | 125000 | C9273 | 13-137 X | $1.0 \mathrm{Meg} . \mathrm{II}$ | 2:0010 |
| C9270 | 18-130X | 250000 R | 16000 | C9274 | YC-539X | 1.0 Meg . | 5(0)0(t) |
| C9271 | 18-132 X | 350000 H | 760 mm | C9275 | 13-139X | $2.0 \mathrm{Meg} . \mathrm{H}$ | 50wam |
| C9272 | 13-133X | 500000 H | 125000 |  |  |  |  |
| Your | Cost Each |  |  |  |  |  |  |

## Dual Type "CS" Twin Controls



## Explanation of IRC Tapers

A-Uniform (Potentiometer Voltake Divider
D-Antenna and "C" Bias (Antenna Grid Bias of 2 Tubes)
F-Antenna and Bias (Antenna Grid Bias of 1 Tube)
H-Tapped control for Tone Compensations

"W" Wire Wound Controls Diameter $1^{11 / 4}$. Rated 2 watts. $3^{\prime \prime}$ shaft. Less switeh, but switch covers can be plates for use with these controls will he found in opposit
dust cover supplied.

| Stock | IRC |  | \|Stock | IRC |  | Stock | IRC |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | No. | Ohms | No. | No. | Ohms | No. | No. | Ohms |
| C7810 | W-6 | 6 | C7818 | W-50 | 50 | C7826 | W-750 | 750 |
| C7811 | W-8 | 8 | C7819 | W-60 | 60 | C7827 | W-1000 | 1000 |
| C7812 | W-10 | 10 | C7820 | W-75 | 75 | C7828 | W-2000 | 2000 |
| C7813 | W-1.5 | 15 | C7821 | W-100 | 100 | C7829 | W-3000 | 3000 |
| C7814 | W-20 | 20 | C7822 | W-200 | 200 | C7830 | W-4000 | 40.00 |
| C7815 | W-25 | 25 | C7823 | W-300 | 300 | C7831 | W-5010 | \$010 |
| C7816 | W-30 | 30 | C7824 | W-400 | 400 | C7832 | W-7500 | 7500 |
| C7817 | W-40 | 40 | C7825 | W-500 | 500 | C7833 | W-10000 | 10450 |
| Your Cost Each, Any Above Type. |  |  |  |  |  |  |  |  |

IRC All-Metal Rheostats All-metal units with die-cast aluminum case. Heat is uniformly distributed throughout the element regardless of percentage of element actually used. Flat elockspring (Silent Spiral Connector) center connector, 25 -Watt units $131 /{ }^{\prime \prime}$ " dia.. ${ }^{31}$ " behind panel; $50^{\circ}$. Watt units $236^{\circ}$ dia., $136^{\circ}$ behind panel. Shpg. wt. 2 lbs.

| $25$ | 5-Wat | tt Rh | stats Each |
| :---: | :---: | :---: | :---: |
| c9150 | 6 | 2.04 |  |
| C 9151 | 10 | 1.58 |  |
| C9152 | 25 | 1.00 |  |
| C9153 | 50 | . 709 |  |
| C9154 | 75 | . 575 | - 5 |
| C9155 | 100 | . 500 | 4-5 |
| $C 9156$ | 250 | . 315 |  |
| C9157 | 350 | . 267 |  |
| C9158 | 500 | . 222 |  |
| C9159 | 750 | . 173 |  |
| C9160 | 1000 | . 125 | 2-65 |
| C9161 | 1500 | . 129 |  |
| C9162 | $2500$ | . 100 |  |
| C9163 | $5000$ |  | S2.79 |



I KFFP BUYING MORE AND MORE WAR BONDS AND STAMPS II

## MÄMOZY VOLUMF COVVIROLS

## UNIVERSAL VOLUME CONTROLS



The Mallory-Yaxley Volume Controls listed on these pages can be used to service over $90 \%$ of all the radio receivers now in use. With comparatively few units, the serviceman is enabled to meet practically all service requirements. |Mallory-Yaxley Controls feature: minimum bias adjustment on all bias controls: $3^{\circ}$ shafts that can be shortened by notching and breaking off; complete shielding; all furnished with knob adapter, and mounting hardware. Approved switch (listed below) can be added to any control.

## UNIVERSAL REPLACEMENT CONTROLS

All with two mounting nuts, washer, ground terminal and knobadapter. Yaxley): carbon element units with adjustable bias resistor where required.


 Car.-Carbon element. WW-Wire wound, *-Has adjustable bias controls have external adjustable resistor. t-l las slotted shaft for auto sets. Supplied Less Switch.
Your Cost Each, Any of the above Control
$59^{4}$



For use where control mounts off chassis. Plated metal. Adjustable mounting center C6297-Type RB-248-Mounting centers $112^{\circ}$ to $23{ }^{2}$ Your Cost Each, Elther Type.

124

## Control Hex Nuts

 For bushings $\begin{array}{lr}\text { No. For Panels } & \text { Each } \\ \text { C6384 } & 9 \mathrm{c} \\ \text { C6386 } & 1 / 2 \\ \text { C6385 } & 12 \mathrm{c} \\ & \end{array}$
Volume Control Wrench


For standard volume control nuts. C6387-No. 178 Your Cost Each

## Standard Universal Tapped Controls

Standard $11 / 2^{\prime \prime}$ diameter controls with tap for various applications. Furnished with two nuts, washer, ground terminal and knob adapter. desired use TRPF21. thas slotted shaft for auto sets. $\ddagger$ Special taper for fader service. auto sets. $\begin{aligned} & \text { Oppecial taper for fader service, } \\ & \text { Others are }\end{aligned}$ oz.

| Stock | Mirs. | Res. | Tapped | Stock | M frs. | Res: |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | No. | Ohms | At Ohms | No. | No. | Ohms | At Ohms |
| C6543 | TRP801 | 40000 | 8000 | C6588 | TRPB15 | 3 Meg . | 9150000 |
| C6544 | TRP602 | 60000 | 4000 | C6589 | TRP616 | 500000 | 60000 |
| C6545 | TRP603 | 2.50000 | 110000 | C6590 | TRP617 | 60000 | 12000 |
| C6546 | TRP604 | 350000 | 20000 | C6591 | TRP618 | 2 Meg | 250000 |
| C6547 | TRP605 | 350000 | 70000 | C6592 | TRP610 | 500000 | \$100000 |
| C 6577 | TRP606 | 500000 | 100000 |  |  |  | 250000 |
| C6578 | TRP607 | 500010 | 225000 | C6593 | TRP620 | 2 Meg . | 900000 |
| C6579 | TRP608 | 1 Meg. | 200000 | C6594* | TRP621 | 21/4 Meg. | \{ 250000 |
| C6580 | TRP600\$ | 1 Meg . | 500100 |  |  |  | \$500000 |
| C6581 | TRP610 | 1 Meg . | 30000 | C6595 | TRP622 | 44000 | 7000 |
| C6583 | TRP612 | 2 Meg . | 15000 |  |  |  | 14000 |
| C6586 | TRP613 | 2 Meg . | 400000 | C6596 | TRP623 | 250000 | $50 ¢ 100$ |
| C6587 | TRP614 | 350000 | 70000 | C6576 | TRP624 | $21 / 4$ Meg. | 2510000 |
| Your | st Ea | ny | the |  |  |  |  |

## Standard Universal Dual Controls

Consists of two volume controls strapped together and driven by a single shaft. Units listed service practically all receivers.
Stock Res. in Ohms

| Stock | Mirs. |  | Res, in Ohms |  | Taper |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | No. | Type | Front | Rear | Front | Rear |
| C6684 | CE | WW | 2000 | 5000 | I | I |
| C6658 | GE | WW | 10000 | 5000 | VII | IV |
| C6685 | GG | WW | 10000 | 10000 | VII | IV |
| C6686 | GK | Car. | 10000 | 50000 | I | IV |
| C6659 | LL | Car. | 100000 | 100000 | 1 | , |
| C6687 | LM | Car. | 100000 | 250000 | I | I |
| C6749 | MM | Car. | 250000 | 250000 | I | I |
| C6750 | MN | Car. | 250000 | 500000 | 1 | 1 |
| C6689 | NN | Car. | 500000 | 500000 | I | I |
| WW-Wire | Wound | ment. | - Carbon | element. |  |  |
| Your Cost | Each, |  |  |  |  |  |

## Explanation Of Mallory Volume Control Tapers

No. (1) For audio or antenna shunt circuits.
No. (2) For series circuits such as cathode voltage controls.
No. (3) For antenna shunt and "C" bias circuits
No. (4) Linear taper; for voltage divider circuits.
No. (4a) Modified linear taper, similar to No. 4 .
No. (7) Wire wound element. For antenha and "C" bias.

## MALLORY-YAXLEY Encyclopedia 4th Edition

Newest, biggest, most valuable issue. Contains data on over 27.000 st andard sets and answers practically all service problems. Since special type volume controls are not available for the duration, servicemen will find the section, especially valuable, which lists the correct universal control to be used for all standard make sets. Over 400 pages of if peaks, volume control data, vibrators, tubes, circuits, con-


## COMPACT RHEOSTATS \& POTENTIOMETERS

 TYPE C-2 WATTS Wire Wound. Controls ideal for use where space is limited. Contact arm is
grounded to the
grounded to the
shaft Diam.
$1^{1}{ }^{\circ}{ }^{\circ}{ }^{2} 1 / \pi^{\prime \prime}$ shaft


|  |  | No. |
| :--- | :---: | :---: |
| No. | Ohms | No. |
| C6197 | 6 | C6201 |
| C6198 | 10 | 66202 |
| C6199 | 15 | $C 6203$ |
| C6200 | 20 | C6204 |

Your Cost Each
4. 4


| POTENTIOMETERS |  |  |  |
| :---: | :---: | :---: | :---: |
| C6205 | 6 | C6210 | 40 |
| C6206 | 10 | C6211 | 50 |
| C6207 | 15 | C6212 | 100 |
| C6208 | 20 | C6213 | 200 |
| C6209 | 30 | C6214 | 400 |
| Your Cost Each, Any of the Above |  |  |  |
|  |  |  |  |
| C6216-3000ohms |  |  |  |
| C6218-6000hms |  |  |  |
|  |  |  |  |
| C6229-10000ohms |  |  |  |
|  |  |  |  |

TYPE M
4 WATTS
$\qquad$ Conservatively Fully enclosed. 1 f: diam.;mount in $70^{\circ}$ hole. Shaft long. With dust

cover. RHEOSTATS


## And ACGESSODIIS. Mallor Y

## "UM" and "TM" Junior Controls

Ultra-compact controls featuring noiseless composition elenments; attachable switches; plup-in type shafts. Roth UM and TM types have slotted shafts which will take any one of the 28 different types of special sliafts but are provided with a tap as shown. TM type designed for use in tone compensating circuits. All arc $3 / 2^{\circ}$ thick, $1^{11^{6}}{ }^{\circ}$ diameter
"UM" TYPE JUNIOR CONTROLS

|  | $\begin{aligned} & \text { Type } \\ & \text { No } \end{aligned}$ | Ohms |  | $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ | Ohmis \& |  | $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C6 | M | $5 \mathrm{M}(4 \mathrm{~A})$ |  | L'M133 |  |  |  |  |
|  |  |  |  |  |  |  |  |  |
| C69 |  |  | C6937 |  |  |  |  |  |
| C69 |  | ${ }_{15 \mathrm{M}}{ }^{4}$ | C6938 C6939 | CM137 |  | C69 |  |  |
|  |  |  |  |  |  | $\mathrm{ClO}_{\mathrm{Cg}}^{4}$ |  |  |
|  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |
| C693 |  |  |  |  |  |  |  |  |

ype UM Controls (less shaft
Your Cost, Any Size.
59 ${ }^{\text { }}$
"TM" Type Tapped Controls

| No. | Type | Ohms | Tapped | No. | Type | Ohms | Tapped |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C6953 | TM220 | 250 M | 50M | C6959 | TM 240 | 1 Meg. | 200M |
| C6954 | TM221 | 250 M | 110 M | C7006* | TM241 | 1 Meg . | 200 M |
| C7013* | TM222 | 250 M | 110 M | C7007* | TM242 | 1 Meg . | 450 M |
| C7014* | TM223 | 500 M | 60 M | C6960 | TM243 | 1 Meg . | 450M |
| C7015* | T M 224 | 500 M | 100 M | C7008 | TM244 | 11/2 Meg. | 200M |
| C6955 | TM225 | 350M | 70 M | C6961 | TM245 | 2 Meg . | 5 M |
| $C 7016$ | TM226 | 500 M | 15M | C6962 | TM246 | 2 Meg . | 15M |
| C7017 | TM227 | 500 M | 100 M | C6963 | TM247 | 2 Meg . | 60 M |
| C6956 | TM228 | 500 M | 5M | C6964 | TM248 | 2 Meg . | 250 M |
| C6957 | TM230 | 500 M | 150 M | C6965 | TM249 | 2 Meg . | 600 M |
| C6958 | TM231 | 500 M | 225 M | C7009 | TM250 | 2 Meg . | 125 M |
| C7018* | TM232 | 500M | 225 M | C6966 | TM251 | 2 Meg . | 900 M |
| C7019 | TM233 | 500 M | 60 M | C7010* | TM252 | 2 Meg . | 900M |
| C7020 | TM234 | 1 Meg . | 65 M | C7011 | TM254 | 2 Meg. | 400 M |
| C7021 | TM230 | 1 Meg. | 125M | C6967 | TM257 | 3 Meg. | 900 M |
| C7022 | TM238 | 1 Meg. | 300 M | C7012 | TM259 | 2 Meg . | 900 M |
| C6864 ${ }^{\circ}$ | TM239 | 1 Meg . | 300 M | --Cluteh | Type Co | rols. |  |

Any Type Above, Your Cost Each
MALLORY-YAXLEY Attachable Switches
Fit all "UM" "TM" \& "MR" Jun Each.
C6969-I Bouble Pole, Single Throw
C6970-Single Pole, Double Throw
C6972-Four Pole, Single Throw (Shorting Type)



Type "MR"' Junior Controls

Ulra-compact controls are similar to the types that they feature standard shafts, $3^{\circ}$ long milled the entire length and furnished with knob adapters (for spring type knobs). All are rated conservatively at $1 / 2$ watt. No. I Type | Ohms || No. | Type | Ohms | No. \| Type | Ohns | No. Type | Ohms | No. Type | Ohms |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C 6900 | MR14 | $5 \mathrm{M}(4 \mathrm{~A})$ | C6909 | MR33 | $50 \mathrm{M}(1)$ | C 6918 | MR44 | $250 \mathrm{M}(1)$ |

 C6902 MR19 10M(2) C6911 MR35 50 M (1) C6920 MR48 500 M (1) C6903 MR20 $10 \mathrm{M}(4) \quad$ C6912 MR36 $75 \mathrm{M}(1)$ C6921 MR50 $500 \mathrm{M}(\mathrm{t})$ C6904 MR21 15M (1) C6913 MR37 $\quad 75 \mathrm{M}$ (2) $\quad$ C6922 MR51 $\quad 750 \mathrm{M}(1)$ C6905 MR22 15M(2) C6914 MR39 100M(1) $\begin{array}{llllllll}\text { C6923 } & \text { MR53 } & \text { 1 Mog(1) }\end{array}$

 Type MR Controls, Any Size, Each $\qquad$
Junior Controls With Fixed Knurled Shafts Similar to type "MR". controls above, but have 3 " universal knurlec shaft for replacing original units of this type.
Stock

C6637 NK. Taper No.
${ }^{\text {C663 }}$ MK $401 \quad 500 \mathrm{M}(1) \quad$ C6640 MK $402 \quad 1 \mathrm{Meg}$. Type MK Controls,
Your Cost Each, Any Type

$\square$
C6973-SS1. Replaces any $1 / 4$ round shaft or $1 / 2$ or ${ }^{3}$ ne flatened C6974-SS2. Each. C6975-SS3. Replaces any Cos7ed shaf Replace any C6976-SS4. Each.......... 15c C6977-SS5. Each............. 15 C6978-SS6. RCA, Hudson 16
C6982-SS10. Each.......... $15 c$ C6983-SS11. Replaces any ${ }^{3}{ }^{6}$ slotted shaft 2 to $4^{\prime \prime}$ long.. C6984-SS12. Each. C6986-SS14. Replaces any slotted shaft to $2^{\text {" }}$ long. C6987-SS15. Replaces any 8 Cottol 4 to $6^{\prime \prime}$ long any slotted shaft 4
C6988-SS16.

## MALLORY-YAXLEY Plug-In Shafts

Fit all UM and TM junior con. trols. Adapt for use with most auto and home radios.
C6989-SS17. Replaces any siot. ted insacup shaft to $6^{\prime \prime}$ long 29 c c6992-SS18. For Belmont. . 15 c C6993-SS19. Each.......... 296 C6995-SS21. Motorola mode 17D. Each....................21c 17D. Eac C6996-SS22. Each C6997-SS23. Each C6998-SS24. Each ........... $15 c$ C6999-SS25. Replaces standarc knurled shafts from 3/" to $4^{\prime \prime}$ lone E6809-..SS26. Zenith sets.... 15 15 C6810-SS27. Philco sets.... 15s C6820-SS28. Motorola sets. 29 c C6821-SS29. Motorola sets. 15 c C6822-SS30. Motorola sets. 15 e C6826-SS31. Philco sets


CRL Split Knurl Midget

## Radiohms

For 1938-39-40-41 radios using silit-knurl shafts where the knobs
will not fit any other type of shaft. Shafts $33 / 80$ long.

No. CRL Ohms Each $\left.\begin{array}{lll}\text { C8285 } & \text { NK-139 } & 250 \mathrm{M} \\ \text { C8286 } & \text { NK-140 } & 500 \mathrm{M} \\ \mathrm{C} 8287 & \text { NK-141 } & 1 \mathrm{Meg} .\end{array}\right\} \boldsymbol{1}$ C8288 NK-141 1 Meg. C8289 NK-143 500M * ${ }^{\text {C8291 }}$ NK-144 1 Meg.* $\} 8$ - Tapped controls.

## CENTRALAB Power

 RheostatsIdeal for use as motor speed
controls, charge. meg rate regulators,etc. All metal frame; core treated ashes-
 wound. All for single hole mount ing; knob supplied. Diameter $2^{*}$; bushings $8 / 2 \times 1 / 2$ long. Depth 50 watt units 15 : 75 watt units $13 \%$. All have tinned solder lug terminals for easy connections. Shag. wt. Li db.


## HARDWICK-MINDLE

 25-Watt Rheostats

Each element is wound on a
form placed inarefractory base which is embedded in amyl. Each has a $9 / 8^{\circ}$ bushing and nut for single hole mounting; depth be$158^{\circ}$ : panel $14^{13}{ }^{\circ}{ }^{\circ}$; base diameter grees. All rated 25 -watts maxmum. Have screw terminals. Furnished with knob.


1 Meg: Midget Volume
Control and
Switch
Standard $1 /$ She $^{\text {shaft extending }}$
in from bush- a
ing. Complete
with SPST switch.
C8141 -Your Cost.... 45

## (Q) Min Migetanc Stanciate



## Standard Radiohms

 Noted for their long noise less life these famous contools employ a patented nonwearing contact arrange metal band is pressed into contact with the resistance strip by the rotating arm. strip by the rotating arm.Contact between the arm and the band is by means of an oil-treated wood button that is absolutely noiseless and perfectly smooth in operation. Control dimensions:
 new CRL type numbers less switch. Order by these or by the old CRL numbers. With switch numbers are the same except for prefix letter which is " B " in place of " A ". " BT " in place of " AT " and " BF " in need, as listed in the new CRL Guide. Taping the exact control you U-Voltage Divider (uniform) | A2-Ant. Sh. \& "C" Bias 2 Tubes
 for 1 Tube

GT T-Audio Grid or Tone Control

 (Composition Element)
C8891—A T-135
C8881-AT-136
500 , (10) ohms GT
Your Cost
List
Price
51.50
884 C8882- CT T-137

1 Megohm GT Each.

## TWIN REPLACEMENT RADIOHMS

Most popular twin controls for general. replacement
Stock No. CRI No. Front Ohms Rear Ohms


## C8787

## WITCH COVE 500,000

 250.000500,000

Radiohms


## CENTRALAB Midget Radiohms

Small diameter controls for use in auto radio sets or in midget radios. Molded bakelite cases. Al Depth, less switch, $21 / 2^{\circ}$ shaft milled entire length. Separate switches easy to install. Same taper symbols as shown with standard Radiohms above. CRL type numbers given below are less switch-CRL typ \begin{tabular}{ccc|cccc}
\hline No. \& CRT. \& Ohms \& No. \& CR \& Ohms <br>
\hline C8187 \& NF 106 \& 5000 U \& \& C8281 \& NF112 \& $20,000 \mathrm{~A}$

 

\hline C8187 \& NF 106 \& 5000 U \& C8281 \& NF 112 \& $20,000 \mathrm{~A}$ <br>
C8190 \& NF 107 \& $10,000 \mathrm{~A}$ \& C8217 \& NF113 \& $25,010 \mathrm{U}$
\end{tabular} 25,0180U C8192 N102 250,000GT $\begin{array}{llllllll}\text { C8188 } & \mathrm{NF} 108 & 10,000 \mathrm{~A} 2 & \mathrm{C8} 8191 & \mathrm{NF} 101 & 25,000 \mathrm{~A} & \mathrm{C8} 273 & \mathrm{~N} 118 \\ \mathrm{Cl} & 500,000 \mathrm{~L}\end{array}$



Any Type Listed Above (Less Switch) Each.


 $\square$ 59
Tapped Midget Radiohms
Tapped for tone compensation circuits. Less switch.
C8274 Ohms. Each C8275 NT 119 250,000 C8276 NT121 1 Mes.
$88^{4}$


CLAROSTAT Wire

cases. Switch covers bakelite tache. Control diameter $15 /{ }^{\prime \prime}$. Mount in $3 / 3^{\prime \prime}$ hole. $1 / 4^{\prime \prime}$ shaft extends $1{ }^{\circ}$ Units marked with asterisk (*) are rheostat type: all others potentiometers. Tapers:
L-Untuned Antenna
S-Standard Pot. (uniform)
W-Screen Grid; Phono Control U-Antenna \& "C" Bias (1 tube) Stock Res. Stock Res. c7048* Ohms No. Ohms C7049*,${ }_{2}^{1} \quad \mathrm{C7093} \quad 1000 \mathrm{~S}$ C7050* 3 C7090 2000 S $\begin{array}{lllll}\text { C7051* } & 4 & C 7089 & 2000 L \\ \text { C7052* } & 6 & C 7088 & 2000 \mathrm{~V}\end{array}$ $\begin{array}{llll}\text { C7053* } & 10 & \text { C7087 } & 3000 \mathrm{~S} \\ \text { C7054* } & 15 & \text { C7086 } & 3000 \mathrm{U}\end{array}$ $\begin{array}{llll}\text { C7754* } & 15 & \text { C7086 } & 3000 \mathrm{U} \\ \text { C7055 } & 20 & \text { C7047 } & 4000 \mathrm{~S}\end{array}$ $\begin{array}{llll}\text { C7056* } & 25 & \text { C7084 } & 5000 \mathrm{~S} \\ \text { C7057* } & 30 & \mathrm{C7083} & 5000 \mathrm{U} \\ \text { C7058* } & 40 & \mathrm{C7082} & 5000 \mathrm{~V}\end{array}$ $\begin{array}{llll}\text { C7058* } & 40 & \mathrm{C7082} & 5000 \mathrm{~V} \\ \mathrm{C7099} & 50 \mathrm{~S} & \mathrm{C7080} & 7500 \mathrm{U}\end{array}$ C7060 $60 \quad \mathrm{C7079} 7500 \mathrm{~V}$ $\begin{array}{cccc}C 7061 * & 75 & C 7078 & 10000 S \\ \text { C7098 } & 100 S & C 7075 & 10000 \mathrm{~V}\end{array}$ $\begin{array}{llll}\mathrm{C} 7097 & 200 \mathrm{~S} & \mathrm{C} 7074 & 10000 \mathrm{~W} \\ \mathrm{C} 7096 & 300 \mathrm{~S} & \mathrm{C} 7073 & 15000 \mathrm{~S}\end{array}$ $\begin{array}{llll}C 7096 & 300 S & C 7073 & 15000 \mathrm{~S} \\ \mathrm{C} 7095 & 400 \mathrm{~S} & \mathrm{C} 7072 & 15000 \mathrm{U} \\ \mathrm{C} 7094 & 500 \mathrm{~S} & \mathrm{C7070} & 20000 \mathrm{~S}\end{array}$ Your Cost Each, 57 f Any Above Type. 2.5000S C7066 40000 S C7067 30000S C7065 50000 S Your Cost Each, Any Above Type $73^{4}$ C7063 100000S $\}$ E. $\$ 1,8$ Switch Cover For Above units.
$\qquad$

## UTAH Wire-Wound

 Midget Controls Rheostats and are 17行 diam.Mount in 3 :
$1 / 3^{\prime \prime}$ in back of
the panel. $1 / 6$
diam. shafts ex

$$
3-W a i
$$

3-Watt Po

| No. | Ohms | No. | Ohms |
| :--- | ---: | ---: | ---: |
| C6515 | 6 | C6520 | 400 |
| C6516 | 10 | C6522 | 500 |
| C6517 | 15 | C6522 | 1000 |
| C6518 | 20 | C6523 | 1500 |
| C6519 | 200 |  |  |
| C6524 | Watt | Rheostats |  |
| C6525 | 3 | C6529 | 25 |
| C6526 | 6 | C6530 | 30 |
| C6527 | 10 | C6531 | 40 |
| C6528 | 20 | C6532 | 50 |
| Your Cost Each. |  |  |  |

Your Cost Each,
Any of the Above
$26^{6}$


# STANCOR-TRANSFORMERS 

 UNIVERSAI MOUNTING POWER TRANSFORMERS$\star$ Electrostatically Shielded
$\star 5$ Possible Mounting Positions
$\star$ Primaries for 115 V. $50 / 60$ Cycles $\begin{aligned} & \star \text { Heavy } 8 \text {-Inch Flexible Leads }\end{aligned}$

| Stock No. | Type No. | No. of Tubes | Your Cost | Plate |  | Rec. Fil. |  | Fil. No. 1 |  | Fil. No. 2 |  | Mtg. Area | Wt. Lbs. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | Vits. | M.A. | V. | A. | V. | A. | V. | A. |  |  |
| C1706 | P-6001 | 4-5 | \$2.18 | 650 | 40 | 5 | 2 | 2.5 | 4 |  |  | $2^{1 / 2} \times 3^{\circ}$ | 4 |
| C1712 | P-6002 | 5-6 | 2.79 | 700 | 50 | 5 | 3 | 2.5 | 71/6 |  |  | $2^{1} 2 \times 3^{\circ}$ | 4 |
| C1713 | P-6003 | $6-7$ | 2.91 | 700 | 70 | 5 | 3 | 2.5 | 9 |  |  | $2^{15} 16 \times 33 / 8$. | 4 |
| C1714 | P-6004 | 8-9 | 3.41 | 700 | 90 | 5 | 3 | 2.5 | 12.5 |  |  | 31/6x31\% | 6 |
| $C 1719$ | P-6009 | $6-7$ | 3.20 | 550 | 70 | 5 | 3 | 5.0 | . 5 | 2.5 | 10.5 | $2{ }^{15}{ }^{15} \times 38$. | 5 |
| 61715 | P-6005 | $6-7$ | 3.20 | 700 | 70 | 5 | 3 | 2.5 | 9 | 2.5 | 3.5 | $2^{19} 16 \times 3$ 16 ${ }^{16}$ | 6 |
| 61716 | P-6006 | 11-13 | 4.20 | 700 | 120 | 5 | 3 | 2.5 | 12.5 | 2.5 | 3.5 | $34 \times 3 \times$ | 6 |
| $C 1717$ | P-6007 | 10-12 | 4.38 | 800 | 110 | 5 | 3 | 2.5 | 15 | 2.5 | 3.5 | 31. $\times 3 \%^{\circ}$ | 7 |
| C1735 | P-6297 | 4-5 | 2.18 | 480 | 40 | 5 | 2 | 6.3 | 2 |  |  | $21 / 2 \times 3^{\prime \prime}$ | 4 |
| C1720 | P-6010 | 4-5 | 2.18 | 650 | 40 | 5 | 3 | 6.3 | 2 |  |  | 21/2x3 ${ }^{\prime \prime}$ | 4 |
| C1721 | P-6011 | 6-7 | 2.79 | 700 | 70 | 5 | 3 | 6.3 | 2.5 |  |  | 21/3x ${ }^{\text {² }}$ | 4 |
| $C 1722$ | P-6012 | 8-9 | 3.15 | 700 | 90 | 5 | 3 | 6.3 | 3.5 |  |  | $2{ }^{13} 6 \times 33{ }^{\prime \prime}$ | 6 |
| C1723 | P-6013 | 11-13 | 3.47 | 700 | 120 | 5 | 3 | 6.3 | 4.7 |  |  | 31/8×3\% | 6 |
| $C 1724$ | P-6014 | 13-15 | 4.55 | 750 | 150 | 5 | 3 | 6.3 | 5 |  |  | 31/183 ${ }^{\circ}$ | 6 |
| C1726 | P-6165 | 14-16 | 5.26 | 800 | 200 | 5 | 4 | 6.3 | 5.5 |  |  | 3 ${ }^{1 / 4} \times 41 /{ }^{\prime \prime}$ | 7 |
| 62731 | P-6093 | 6.7 | 3.15 | 600 | 60 | 5 | 3 | 6.3 | 2.5 | 2.5 | 7.5 | 213/16 $\times 3 \frac{188}{}{ }^{\text {a }}$ | 4 |
| $C 1733$ | P-6095 | 8-9 | 3.67 | 700 | 90 | 5 | 3 | 6.3 2.5 | 3.5 | 2.5 | 9 | 31/8 $\times 3 \%$ * | 6 |
| C1734* | P-6234* | 11-13 | 4.79 | 660 | 90 | 5 | 3 | 2.5 | 12 | $\left.\begin{array}{l}6.3 \\ 5.0 \\ \text { a }\end{array}\right\}$ | 4 | $31 / 8 \times 3^{2}$ " | 6 |
|  |  |  |  |  |  |  |  |  |  | 2.5 |  |  |  |
| $C 1718$ | P-6008 | 14-16 | 4.91 | 750 | 180 | 5 | 3 | 6.3 | 3.3 | 2.5 | 6 | 37/8x41/3 ${ }^{\text {a }}$ | 7 |



Type "M" Mount


Vertical Mount


Horizontal Mount
SPECIAL 6.3 V. TRANSFORMERS FOR SETS USING P.M. SPEAKERS
$C 1785$
$C 1786$
$c 1787$
$c 1741$
$c 1743$
$C 1744$
$c 1745$

| $P-6289$ | $5-6$ |
| :---: | :---: |
| $P-6119$ | $6-7$ |
| $P-6120$ | $7-9$ |
| $P-6312$ | $7-8$ |
| $P-6313$ | $11-13$ |
| $P-6314$ | $14-16$ |
| $P-6315$ | $16-18$ |

$\$ 2.18$
2.20
2.94
3.35
3.70
5.17
7.06

| 6.3 | 2 |
| :--- | :--- |
| 6.3 | 2.7 |
| 6.3 | 3.5 |
| 6.3 | 2.8 |
| 6.3 | 4.5 |
| 6.3 | 5.5 |
| 6.3 | 7.0 |



## UNIVERSAL OUTPUT TRANSFORMERS



REPLACEMENT DRIVER TRANSFORMERS

| Stock | Type |  | redance | Ratio | Mtg. | Mtg. | Wt. | Your |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | No. | Pri. | Src. | 1/2Nec. | Type | Ctrs. | Lbs. | Cost |
| C1684 | A-4712* | 20 M | 2.2 M | 3:1 | A | 296 | , | \$1.09 |
| Cl 685 | A-4713 | 10M | 2.5M | 2:1 | A | $25.6{ }^{\circ}$ | 1 | 1.09 |
| C1688 | A-4723 | 10M | 1.1M | 3:1 | A | $251{ }^{\text {" }}$ | 1 | 1.09 |
| C1687 | A-4722 | 10M | 10M | 1:1 | E | 2\%\% |  | 1.76 |
| C1682 | A-4401 | 10M | 1.4M | 2.7:1 | J | $2^{3}$ | 2 | 1.59 |
| C1689 | A-4734 | 10M | 1.6 M | 2.5:1 | A | $2^{3}{ }^{\text {a }}$ | 2 | 1.29 |

FILTER CHOKES TYPE A

| Stoct | Type | Hen- | Cur. | D.C. | Dimensions | Wt. | Your |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | No. | rys | M.A. | Ohms | $H \mathrm{~W} \times \mathrm{D}$ | Lbs. | Cost |
| C1698 | C-1706 | 5 | 50 | 300 | $1{ }^{3}$ 假 $2^{3}$ y $\times 1$ ! 6 | 1 | \$0.68 |
| C1699 | C-1707 | 7 | 50 | 500 |  | 1 | . 68 |
| C1700 | C-1708 | 10 | 05 | 460 | $17 \times 33^{1} \times 2^{13} 0^{\prime \prime}$ | 2 | . 88 |
| C1701 | C-1709 | 9 | 85 | 250 | $18 \times 3$ \% ${ }^{18}$ | 2 | 1.18 |
| C1702 | C-1710 | 8 | 150 | 200 | $21.2 \times 4 \times 21 / 6^{\prime \prime}$ | 3 | 1.47 |
| Cl623 $\dagger$ | C-1003 | 30 | 50 | 550 | $1^{7}{ }^{\circ} \times 3^{5} 10 \times 18 / 0$ | 2 | . 91 |
| C1624 | C-1002 | 30 | 75 | 400 | $21 / 43^{11} 16 \times 178$ | 2 | 1.23 |
| C1625 | C-1001 | 30 | 110 | 200 | $212 \times 4 \times 20$ | 3 | 1.56 |
| C1626 ${ }^{+}$ | C-1034 | 30 | 30 | 1150 | $13.8 \times 21 / 5180$ | 2 | 1.12 |
| C1583 | C-2303 | 10 | 130 | 100 | $2 \times 33^{4} \times 15$ | 2 | 1.09 |
| C1584 | C-2304 | 8 | 150 | 65 | $2 \times 3,4 \times 15{ }^{\prime \prime}$ | 2 | 1.09 |
| C1585 | C-2305 | 20 | 100 | 275 | $2^{3} 8^{3} \times{ }^{3} \times 2,8^{\circ}$ | 2 | 1.47 |
| C1586 | C-2309 | 8 | 1.50 | 90 | $21 \times 33^{16} 11^{17}$ | 2 | 1.29 |
| *Center lapped. †Output chokes. A.C.-D.C. CHOKES TYPE A |  |  |  |  |  |  |  |
| C1793 | C-1723 | 4.4 | 50 | 330 |  | 1 | . 68 |
| C1694 | C-1080 | 15 | 50 | 200 | $1582^{23} 14813{ }^{3}$ | 1 | . 71 |
| C1697 | C-1325 | 15 | 50 | 250 |  | 1 | . 71 |
| C1695 | C-1227 | 15 | 50 | 350 | 13 | 1 | . 71 |
| C1696 | C-1279 | 15 | 50 | 400 | $158513613{ }^{3}$ | 1 | 71 |



| OUTPUT TRANSFORMERS |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stock No. | Type No. | Class Oper. | Tubes | Impedance in Ohms |  | Mx Wts. | Mtg No. | Your Cost |
|  |  |  |  | Prim. | Socondary |  |  |  |
| C1663 | A-3822 | A | S | $\overline{7 \mathrm{M}, 10 \mathrm{M}}$ | . 7 to 4 | 5 | Q | \$0.85 |
| C1669 | A-3848 | A | 8 | 16,000 | 1,2,4 | 5 | Q | . 91 |
| C1676 | A-3857 | A | S | 25,000 | 4 | 5 | A | . 94 |
| C1677 | A-3865 | A | S | 1,500 | 2, 4, 6 | 5 | A | . 91 |
| C1640 | A-3876 | A | S | 2,000 | 4 | 5 | A | . 68 |
| C16.45 | A-3877 | A | S | 5,000 | 4 | 5 | A | . 68 |
| C1646 | A-3878 | A | S | 7,000 | 4 | 5 | A | . 68 |
| C1648 | A-3879 | A | 8 | 10,000 | 4 | 5 | A | .71 |
| C1649 | A-3881 | A | S | 15,000 | 4 | 5 | A | . 71 |
| C1647 | A-2201 | A | S or PP | 8,000 | 6 | 10 | A | 1.32 |
| Cl661 | A-3824 | B | 8 | 8,000 | 1, 2, 4 | 8 | 0 | 1.41 |
| C1665 | A-3825 | A | S | 2,500 | 1,2,4 | 8 | Q | 1.18 |
| C1667 | A-3831 | B | S or PP | 10M | 2, 4, 8 | 5 | A | 1.03 |
| C1656 | A-3303 | A \& 8 | S or PP | 14 M | $4,8,15,500$ | 20 | C | 2.59 |
| C1657 | A-3304 | A ${ }^{\text {c }}$ B | S or PP | $10 \mathrm{M}, 7 \mathrm{M}$ | $4,8,15,500$ | 25 | C | 2.82 |
| C1644 | A-3301 | $A$ \& $A B$ | PP. | 3,000 | $4,8,15,500$ | 30 | C | 2.94 |
| C1672 | A-3851* | AB1 | PP | 4,400 | $\begin{aligned} & 4,8,15,250, \\ & 500 \end{aligned}$ | 30 | C | 3.53 |
| C1590 | A-385.5 | A | S or PP | 7,000 | 10,2000 | 5 | E | 2.00 |
| C1661 | A -3800 | A \& AB | PP | 5,000 | 4,8, 15 | 30 | C | 3.32 |
| C1662 | A-3801 | ABI | PP | 6,600 | 250, 500 | 35 | C | 3.88 |

## UNIVERSAL INTERSTAGE TRANSFORMERS

Split secondarles. Primary center tapped. May be used plate to grid, p.p. input or p.p. interstage. Primary will pass 10 milliamperes DC. Shpg. wt. each, 2 lbs.

| No. | Type | Core | Mig. | H. W. D. | Centers | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1630 | A-4773 | $3^{3} \times 1{ }^{\prime \prime}$ | E | $23 \times \times 2 \times 2{ }^{1}$ | $23^{25}$ | \$1.82 |
| C1631 | A-4774 | \% $\times 1{ }^{\prime \prime}$ | S | $21 \times 2=\times 2 \%$ | 23 | 1.53 |
| C1634 | A-4775 |  | S | $22_{4} \times 21 \times 2{ }^{0}$ | 23, | 2.06 |




## Trutest POW ER TRANSFOBMERS


(A) Flush-Type

(B) Compact

Trutest Power Transformers are engineered by experts |assurance that Trutest transformers will live up to the and constructed of the finest materials. Each unit is claims made for them. To simplify installation, all units designed to provide amplesnfety factor under normal con-
ditions of furnished with a schematic diagram, showing ninety (90) days against mechanical and electrical de- for $\mathbf{1 0 5}-120$ volts, $C 0$ eycles a.c. only.
fects. All conform to R.M.A. standard. This is your

| $\begin{aligned} & \text { Stock } \\ & \text { No. } \end{aligned}$ | $\begin{aligned} & \text { M'igg } \\ & \text { Type } \end{aligned}$ | No. | $\begin{gathered} \text { \$Plate } \\ \text { Volts-M.A. } \end{gathered}$ | $\begin{aligned} & \text { Rect. } \\ & \text { V. }-A . \end{aligned}$ | $\begin{aligned} & \text { +Fil. } 1 \\ & \text { V }-A . \end{aligned}$ | $\begin{aligned} & \text { +Fil. } 12 \\ & \mathrm{v}-1 . \end{aligned}$ | Mounting Area, Ins. | Mounting Crits., Ins. | Shpe. Wi. Lbs. | $\begin{aligned} & \text { Your } \\ & \text { Cost } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1473 | A | 4 | 480-40 | 5-2 | 6.3-1.6 |  | ${ }^{3} \times 21 / 2$ | $21 / 4 \times 2$ | 3 | 50.95 |
| C5635 | A | 4 | 650-40 | 5-2 | 6.3-1.6 |  | $3 \times 21 / 2$ | $213 \times 2$ | 2 | . 99 |
| C5636 | A | 5 | 700-50 | 5-2 | 6.3-2 |  | $3 \times 213$ | $21 / 3 \times 2$ | 21 | 1.59 |
| C1518 | A | 6-7 | 700- 60 | 5-2 | 6.3-2.5 |  | $3 \times 21 / 2$ | $21 / 3 \times 2$ |  | 1.72 |
| C1519 | A | 7-10 | 700-70 | 5-2 | 6.3-3 | 2.5-4 | $3{ }^{1} \times 22^{1 / 16}$ | $2^{13} 140 x^{24}$ | $31 / 2$ | 177 |
| C1521 | A | 4 | 650-40 | 5-2 | 2.5-4 |  | $3 \times 21 / 2$ | $21 / 2 \times 2$ |  | 1.15 |
| C2431 | A | 5 | 700-50 | 5-2 | 2.5-5 |  | $3 \times 21 / 2$ | $21 / 2 \times 2$ | 214 | 140 |
| C1505 |  | -9 | 700-70 | 5-3 | 2.5-7 | 2.5-3 | $3 \% \times 2{ }^{18} 16$ | $2^{18} 16 \times 2$ 1/6 | 3 16 | 1.86 |
| C1509 | A | $8-9$ $10-11$ | 700-90 | 5-3 | 2.5-10.5 | 2.5-3 | 3 3 $\times 31 / 8$ | $31 / 2 \times 21 / 2$ | 33 | 2.12 |
| C1456 | B | 10-11 | 700-110 | 5 | 2.5-151/4 | 2.5-3 | $31 \times 31$ | 31/8 $\times 21 / 2$ | 4 | 2.72 |
| C1457 | B | 5 | 650- 50 | $5-2$ | 6.3-1.6 |  | $21 / 2 \times 21 / 8$ | $2 \times 1{ }^{2}$ |  | 1.19 |
| C1458 | B | 6-7 | $700-60$ | 5-2 | 6.3-2.5 |  | 2102 | $2 \times 2$ |  | 1.35 |
| C1459 | B | 8.9 | 700-75 | 5-3 | 6.3-3.2 |  | $2 \times 4$ | $21 /{ }^{2}$ |  | 1.80 |
| C1525 | B | 10-11 | 600- 150 | 5-3 | 6.3-3 |  | 312031/4 | 21/3 $\times 21 / 4$ |  | 1.95 2.39 |
| C1460 | B | 1213 | 750-125 | 5-3 | 6.3-5 |  | 31/838/8 | $21 / 2 \times{ }^{1 / 2}$ | 51/6 | 2.51 |
| C1526 | B | 12-14 | 675-200 | 5-3 | 6.3-5 |  | $4 \times 31 / 2$ | $31 / 8 \times 21$ | 5 | 3.10 |
| C1461 | B | 13-15 | $800-160$ | 5-3 | 6.3-6 |  | 312x ${ }^{3}$ | $23 \times 2116$ | 6 | 2.95 |

## *All plate and heater secondaries are center tapped

# Trutest purieos: AUDIO COMPONENTS 



## OUTPUT TRANSFORMERS



## FILAMENT TRANSFORMERS*

| $\begin{aligned} & \text { Stock } \\ & \text { No. } \end{aligned}$ | Filament Winding Rated At | $\begin{gathered} \text { Mitg. } \\ \text { Flg. } \end{gathered}$ | $\begin{aligned} & \text { Hize }{ }^{\text {Sn. }} \\ & W . \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Mitg. } \\ & \text { Centers } \end{aligned}$ | Terminals | $\begin{aligned} & \text { Shpg. } \\ & \text { Wt. } \end{aligned}$ | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1943 | 6.3 volts c.t. @ 1.2 amps . | A | $15 \times 22^{12} \times 1{ }^{1 / 2}$ | $2^{5168}$ | Leads | 1 lb | S0.75 |
| C2388 | 2.5 volts c.t. @ 5 amps . | A | $21 x^{1 / 16 x]}$ | 31 | Leads | 2 lbs . | . 75 |
| C2441 | 5 volts c.t. © 4 amps. | A | $20 \times 3 \times 1{ }^{\circ}$ | 2\%" | Leads | 2 lbs. | . 95 |
| C5495 | 6.3 volts c.t. a 5 amps . | A | $2{ }^{2} \times 3 \times 2{ }^{3}$ | 2\% | Leads | 2 lbs. | . 99 |
| C1468 | 2.5 volis c.t. © 10 amps . | C | $31.8 \times 25 \times 25 / 8$ | $2 \times 134^{\prime \prime}$ | Leads | 3 lbs . | 2.19 |
| C1469 | 5 volts c.t. © 6 amps. |  | $31 \times 2{ }^{8} \times 27 /{ }^{\text {a }}$ | $2 \mathrm{xl}{ }^{3 / 4}$ | Ieads | ${ }_{3}^{3}$ libs. | 2.35 |
| C2471 |  |  | 31. $\times 2$, $\times 2 \%$, | $\times 130$ | Leads | 3 lb | 2.19 |
| C1966 | Tube Tester 1.1 to 117 volts ( 19 steps) | A | $3{ }^{5}$ |  | Leads | 4 lls | 2.5 |



Type A Mtg. Popular wide frame
strap mounting units. strap mounting units.


Type B Mtg.
Popular strap mounting units with high frame.


Type C Mtg. Fully shielded upright mounting units with
four eye lugs for mountfour
ing.

30 Henry Filter Choke


Inductance 30 Henrys, 50 ma. maximum d.c., resistance 450 ohms. $18, \times 2, \frac{1}{8}$. Well made, heavy duty choke suitable for servicing and experimental use. Shpg. wt. 2 lbs.
Your Cost Each...... $\leqslant 9$

NOTE-During the present emergency we must reserve the right to substitute like quality when necessary.

R.C.A. Universal Output Matchsingleor putput tubes to n y coil of
 from
to 15 ohms. Primary impedance 1000 to 20,000 ohms. Response flat from 30 to 10,
$21 / 52^{\circ}$. We. 3 libs. $2132^{\prime \prime}$. Wt. 316
C5536-Each...

##  <br>  <br> 2D <br>  <br> 28 Leads, $2 E$ Lugs <br>  <br> $2 G$ <br>  <br> 3B Loads, 3E Lugs <br> 

Plate-to-Grid Transformers
High quality units, all designed to mateh a 10,000 ohm plate $(56,76,37$, $27,55,85,77$, etc.) to a single class A grid delivering not nore than


- Lhas static shield between primary and secondary.


## Push-Pull Input Transformers

Single plate ( 10,000 ohms) to push-pull grids. Stock No. C301 may also be used as a tapped PP grid impedance with ratios of $1: 1,1: 2$, or $1: 4$

| Stock No. | Thord. No. | Turns Ratio | Dimensions W. D. H. | $\begin{aligned} & \text { Mtg. } \\ & \text { Type } \end{aligned}$ | Wt. <br> Lbs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C532 | T-14A92 | 3:1 | $2^{3} \frac{8}{} \times 15{ }^{6} \times 13 \%$ | 3B |  | \$0.94 |
| C600 | T-13A35 | 3:1 | $2{ }^{23} 148158 \times 1 \%$ | 3B |  | 1.06 |
| C281 | T-33A91 | 3:1 | $2^{7}{ }^{8} \times{ }^{2} 19{ }_{19} \times 2 / 8$ | 2 B | 14 | 1.41 |
| C237 | T-86d03 | 3:1 | $3 \mathrm{~F} / 6 \times 21 / 6 \times 2$ | 3B | $11 / 2$ | 1.59 |
| C216 | T-14.429 | 3:1 | $2 \times 1{ }^{13} 16 \times 28.6$ | 2 C | 11 | 1.76 |
| C282 | T-57A39 | 3:1 | $2^{3} 3 \times 218 \times 238$ | 2 F | $1{ }^{1 / 2}$ | 1.76 |
| C283 | T-57A40 | $3: 1$ | $33^{33} \times 22^{4} \times 3$ | 2 B |  | 2.29 |
| C284 | T-57A41 | 3:1 | $3{ }^{3} \times \times 2{ }^{1} 2 \times 3$ | 2 F | $23 /$ | 2.47 |
| C301 | T- 74.431 | 1:1 | $33.4 \times 21 / 3{ }^{2}$ | 2 F | 21/4 | 2.47 |
| C601* | T-13A36 | 1:1 | 3 3, $\times 1{ }^{13} \times 2$ | 3 B |  | 1.41 |
| C272* | T-58A 0 | 1.5:1 | $3{ }^{3} \times \times 21 / 2 \times 3$ | 2 F | 21/4 | 2.65 |

- Indicaur P.P. Plates to P.P. Grids.


## Filtering Chokes

For receivers, amplifiers and transmitters application. All inductance ratings shown are with full rated current flowing through the winding.

| Suck No. | Thord. No. | Mount. Type | Induct. 15'ss. | Rated Ma. | Res. <br> Ohms | Wt. Lbs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C604 | T-13C26 | 3B | 8 | 40 | 530 |  | \$0.65 |
| C605 | T-13C27 | 3B | 10 | 40 | 475 | 3 3 | . 76 |
| C606 | T-13C 28 | 3B | 10 | 65 | 460 | 1 | . 85 |
| C241 | T-43C52 | 2 C | 10 | 75 | 260 | 11/4 | 1.18 |
| C252 | T-47C07 | 3B | 12 | 75 | 410 | 1 | 1.18 |
| C254 | T-4C02 | 3B | 12 | 80 | 405 | 11 | 1.06 |
| C287 | T-57C51 | 2 B | 6 | 80 | 138 | 11 | 1.06 |
| C607 | T-13C29 | 3B | 9 | 85 | 250 | 11/2 | 1.12 |
| C334 | T-68C07 | 2 B | 15 | 83 | 375 | 2 | 1.41 |
| C289 | T-57C53 | 2 B | 10 | 110 | 200 | $21 /$ | 1.41 |
| C290 | T-57C54 | 2 F | 10 | 110 | 200 | 24 | 1.59 |
| C335 | T-75C49 | 3B | 8 | 120 | 290 | 11/2 | 1.06 |
| C269 | T-17C00-B | 2 F | 12 | 150 | 231 | 38 | 1.94 |
| C608 | T-13C30 | 2 B | 8 | 150 | 200 | $21 / 3$ | 1.41 |
| C336 | T-74C29 | 2 G | 15 | 150 | 200 | 51.3 | 2.82 |
| C310 | T-87C49 | 2 F | 5 | 200 | 80 | $3{ }^{36}$ | 1.94 |
| C366 | T-75C51 | 2 G | 13 | 250 | 121 | 8 | 3.53 |

## AC-DC Filter Chokes

Small but highly efficient filtering chokes for $\Lambda$ C-DC receivers, intercommunicators, etc. All are $2^{\prime} \xi_{15} \times 15$ 自 $\times 13^{\circ} 6^{\circ}$ high

| Sturk No. | Thord. No. | Mount. Туре | Induct. Hys. | Rated M8. | Res. Ohins | Wt. Lhs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C487 | T-14C61 | 3B | 7 | 55 | 200 | 3 | \$0.71 |
| C488 | T-14C62 | 3 B | 8 | 55 | 250 | ${ }^{3}$ | . 71 |
| C489 | T-14C63 | 3 B | 8 | 55 | 300 | 3. | . 71 |
| C490 | T-14C64 | 3 B | 10 | 55 | 350 | 3 | 71 |

Low Imp. Source To Single or P.P. Grid

| Stock No. | Thord. No. | Application | $\begin{aligned} & \text { Impedance Ohms } \\ & \text { Pri. } 8 \text { Sec. } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Mitg. } \\ & \text { Fig. } \end{aligned}$ | $\begin{aligned} & \text { Wit. } \\ & \text { Lus. } \\ & \hline \end{aligned}$ | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C375 | T-fi5A 73 | DB mike to grid | $200 / 50100000$ | 2 F | 2 | \$2.12 |
| $\begin{aligned} & \text { C402 } \\ & \text { C405 } \end{aligned}$ | $\begin{aligned} & \text { T-83A } 78 \\ & \text { T-86A02 } \end{aligned}$ | S.B. mike to arids S.B. mike to grid | $\begin{array}{ll} 100 & 4(00,000 \\ 100 & 400,000 \end{array}$ | $\begin{aligned} & 2 \mathrm{~F} \\ & 2 \mathrm{~B} \end{aligned}$ | $1_{1}^{14}$ | $\begin{aligned} & 1.59 \\ & 1.59 \end{aligned}$ |
| C377 | T-72. 55 | Plate and S.B. Mike to grid | $\begin{array}{ll} 3000 & 100,000 \\ 200 & \\ \hline \end{array}$ | 2B | 8 | 1.18 |
| C428 | T-83D21 | Line to P.P. grids 6 LB 's or $50^{\prime}$ 's (AB) | 500 5100 <br>  12,500 | 2 F | 21/6 | 2.47 |

## - Center tiapped secondary.

 We are listing on this page only the most popular numbers in the complete Thordarson audio line. See page 52 for power transformers. We can, liowever, supply any unit made by Thordarson at lowest prevalling prices.

# AUDIO TRANSFORMERS UTc 



PLATE TRANSFORMERS

| No. | Type | Pri. V | Sec. V. | D.C.Ma. | Mtg. | Wt. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $C 1792$ | P-8500 | 115 | 510 | 250 | RF | 12 libs. | \$6.44 |
| $C 1793$ | P-8501 | 115 | 660, 555* | 250 | RF | 13 lbs . | 8.58 |
| C1794 | P-8502 | 105-115 | 880, 700 | 250 | RG | 18 lbs. | 8.53 |
| $C 1795$ | P-8503 | 115 | 1100. 500 | 130-150 | RG | 17 lbs . | 8.67 |
| $C 1796$ | P-8504 | 115 | 1550, 1350 | 300 | RJ | 30 lbs . | 16.61 |
| $C 1797$ | P-8505 | 115 | 1550, 1330 | 500 | RJ | 41 lbs. | 22.34 |
| $C 1798$ | P-8507 | 115 | 1820, 1520 | 500 | RK | 49 lbs. | 29.11 |
| $C 1799$ | P-8508 | 115 | 2150, 1850 | 300 | RJ | 36 lbs. | 23.52 |
| C1803 | P-8509 | 115 | 2450 | 250 | RJ | 35 lns . | 22.78 |
| C2806 | P-8510 | 115 | 2430, 2150 | 300 | RK | 39 lbs . | 24.11 |
| $C 1807$ | P-8511 | 115 | 2950, 2400 | 300 | RK | 50 lbs. | 26.90 |
| C1808 | P-851 | 5-230 | 3000, 2410 | 500 | RL | 70 lbs. | 47.04 |

UNIVERSAL OUTPUT TRANSFORMERS

| $\begin{aligned} & \text { Stock } \\ & \text { No. } \end{aligned}$ | Type | Imp. in Ohins |  | $\begin{aligned} & \text { D.C. } \\ & \text { Ma } \end{aligned}$ | Max. <br> Audio | Mtg | $\begin{aligned} & \text { Wt. } \\ & \text { Lbs. } \end{aligned}$ | $\begin{aligned} & \text { Your } \\ & \text { Cost } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | No. | Pri. | Sec. |  |  |  |  |  |
| C1809 | A-9070* | 1500 to | . 02 to 50 | 80 | 15W | RC | 4 | 54.12 |
| C1810 | A-9071* | $\begin{aligned} & 1500 \text { to } \\ & 200000 \end{aligned}$ | . 02 to 50 | 150 | 30W | RD | 5 | 6.2 |

PLATE TO GRID INTERSTAGE TRANSFORMERS
Hum-bucking construction. Numbers marked with * are for single plate to P.P. grids; ** indicates P.P. plates to P.P. krids.


## IINE TO LINE AND V.C. TRANSFORMERS

| Stock No. | Type | Use | Impedance in Ohms |  | Audbloype Watts Mtg. |  | Wt Lbs. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Prim. | Sec. |  |  |  |  |
| $\overline{C 1817}$ | A-9540* | L-L | 50, 125, 200 | 50, 125,200 | $+24$ | RA | 3 | $\overline{\$ 3.23}$ |
| C1818 | A-9541 |  | $250,333,500$ 250,500 | $250,333,500$ $4,8,15$ | ${ }^{\text {DB }} 15$ | C |  | 3.67 |
| C1819 | A-9542 | L-VC | 250, 500 | 4, 8, 15 | 30 | RD | 6 | 3.97 |
| C1820 | A-9543 | L-VC | 250,500 | 4,8,15 | 60 | RE | 10 | 5.59 |
| C1821 | A-9544 | L-VC | $\begin{array}{r} 500,1000 \\ 1500,2000 \end{array}$ | 4,8,15 | 30 | RC | , | 3.67 |

*Hum-Bucking type construction.

## DRIVER TRANSFORMERS

Numbers marked with * are for single plate to push-pull grids. Those marked with ** are for push-pull plates to push-pull grids.

| No. | Type | Pri. Imp. | D.C.Ma | Audio | Mtg. | Wt. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1822 | A-9520* | 2000-5000 | 40 | 10W | RB | 3 lbs . | \$2.94 |
| C1823 | A-9521* | 2000-5000 | 50 | 15W | RC | 4 lbs. | 3.82 |
| C1824 | A-9522* | 5000-10000 | 50 | 15W | RC | 4 lbs. | 3.82 |
| C1825 | A-9523** | 2500-5000 | 50 | 15W | RC | 4 lbs . | 4.12 |
| C1826 | A-9524** | 5000-10000 | 50 | 15W | RD | 5 lbs . | 4.32 |
| C1835 | A-9525** | 2500-5000 | 50 | 15W | RC | 4 libs. | 4.12 |
| C1836 | A-9526** | 1500-5000 | 100 | 30W | RD | 5 libs. | 4.35 |

## POLY-PEDANCE DRIVER TRANSFORMERS

| No. | Type | Watts |  | Prim. to 1/3 Sec. Ratio |  |  | Mts. | W7t | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1837 | ^-9527 | 15W |  | 1.25:1, 1.5:1, 2:1, 2.5:1. |  |  | RD | 4 lbs. | 55.59 |
| C1838 | A-9528 | 30w |  | 1.25:1, 1.5:1, 2:1, 2.5:1. |  |  | RC | 5 lbs. | 6.17 |
| C1839 | A-9529 | 15W |  | 1:75, 1:85, 1:1, 1:1.25, |  |  | RC | 4 lbs. | 5.00 |
| C1842 | A-9530 | 30w |  | $\begin{aligned} & 1: 2.75,1: 3.5 \\ & 1: 75,1: 85,1: 1,1: 1.25, \\ & 1: 1.45,1: 1.75,1: 2,1: 21 / 4 \\ & 1: 25 \end{aligned}$ |  |  | RD | 5 lbs. | 6.47 |
| FILTER CHOKES |  |  |  |  |  |  |  |  |  |
| No. | Type 1 | Induct. | Ma. | D.C. Res. | Insul. | Mt |  | Wt. | Each |
| C1844 | C-2710 | 15 Hys . | 200 | 80 ohms | 3000 V . | RI |  | 5 lbs | \$3.38 |
| C1845 | C-2711 1 | 12 Hys . | 300 | 80 ohms | 5000 V . | RE |  | 10 lbs | 5.73 |
| C1846 | C-2712 1 | 10 Hys. | 400 | 60 ohms | 5000 V . | RF |  | 15 lbs | 7.94 |
| C1847 | C-2713 | 8 Hys . | 500 | 65 ohms | 5000 V . | RI | H | 19 lb | 12.35 |

## SWINGING CHOKES

| No. | Type | Henrys | Ma. | D.C. Res. | Insulation | MLg. | Wt. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1849 | C-2700 | 8-30 | 200 | 80 ohms | 3000 V . | RD | 5 lbs | \$3.38 |
| C1850 | C-2701 | 8-25 | 300 | 80 ohms | 5000 V . | RE | 10 ths . | 5.73 |
| C1853 | C-2702 | 5-25 | 400 | 60 ohms | 5000 V . | RF | 15 lbs. | 7.94 |
| C1854 | C-2703 | 5-20 | 500 | 65 ohms | 5000 V . | RH | 19 lbs | 12.35 |

## U. T. C. Public Address Audios

Incorporate the most advanced design features. Uniform drawn cases are finished in telephone black enamel with threaded inserts for top or bottom mounting. All have lug terminals. Low level units have hum bucking construction. Completely poured with special sealing compound. Overall dimensions: (length, width, height).

Type E Case: $21 / 2 \times 3 \times 3^{\circ}$
Type F Case: $31 / 0 \times 41 / 5 \times 31 \%^{\circ}$.
Type G Case: $35 / 8 \times 47 / 84 \times{ }^{\circ}$
Line Matching Units
In Type E case. Shpg. wt. 3 lbs. each.


 | C5382 | PA-132 | 1 plate to p.p. grids. Split sec. 2:1 grid | $\mathbf{3 . 8 2}$ |
| :--- | :--- | :--- | :--- |

## Varitone Unit

Equalizer matching transformer. 50,000 ohm external potentiometer required. Type E case. Shpg. wt. 3 lbs . C5532-VT-2. For insertion in shunt with line or mike of 5,000 to 20,000 ohm plate. Your Cost.

## Output Transformers

Secondary impedances: $500,200,50,16,8,5,3,1.5$ ohms.
$\frac{\text { Stock }}{\text { C5387 }}\left|\frac{\text { Type }}{\text { P4 }}\right| \frac{\text { Imped. P.P. }}{30}\left|\frac{\text { Typical Tubes }}{300}\right|$ Case $\mid$ Lbs. $\mid$ Each C5387 $\begin{array}{cc}\text { PA-16 } & 3000 / 5000 \\ \text { PA-2L6 } & 6000\end{array}$ 2A3's, 6A5G
6L6's self

| $F$ | 5 | 54.12 |
| :---: | :---: | ---: |
| $G$ | 10 | 7.06 |

## P.A. VARIMATCH Output

Designed to match any tubes within the rated power to line or voice coils. Output impedances: $500,200,50,15,8,5,3,2.5$ ohms.

| Stock |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| C5777 | $\frac{\text { Type }}{\text { PVM-1 }}$ | $\frac{\text { Watts }}{12} \left\lvert\, \frac{\text { Typical Tubes }}{42,43,45,47,2 \mathrm{~A} 3,6 \mathrm{~F} 6}\right.$ | $\left.\frac{\text { Case }}{\mathrm{E}} \right\rvert\,$ | Lbs. |$\frac{\text { Each }}{53.53}$

## Filter Chokes

| Stock | Type | Henrys | Ma. | Ohms | Case | Lis. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C5580 | PA-10 | 10 | 200 | 110 | F | 4 | \$3.23 |
| C5582 | PA-11 | 30 | 100 | 375 | F | 4 | 3.23 |
| C5725 | PA-48C | 100 | 50 | 2500 | F | 3 | 3.23 |

## Line Varimatch Transformex

Matches any voice coil or group of voice coils to a 500 ohm line. Impedance range from

$\left.\frac{\text { No. }}{\mathbf{C 5 7 8 2}}\left|\frac{\text { Type }}{\text { LVM-1 }}\right| \frac{\text { Application }}{15-\text { Watt Line Varimatch }}\left|\frac{\text { Case }}{\mathrm{E}}\right|-\frac{\text { Lbs. }}{2} \right\rvert\,$| Each |
| :---: |
| 3.23 |



## 'ITinear Standard'/ Audios

A line of shielded highest fidelity audio transformers featuring input coils that have lowest hum pick-up of any avallable, or minus 1 requency response (within plus thorough shielding and dependability. Us.sed extensively by broadcast stations. Housed in alloy cases that have threaded 4 -hole terminals for mounting (top or bottom). Telephone black enamel finish. Overall dimen-

Line Matching Units

For matching multiple line: $50,125,200,250,500$ ohms. Type A case. Dual alloy shielding, hum reduction -74 db . Shpg. wt. 3 lbs. $\left.\frac{\text { No. }}{\text { C5401 }}\left|\frac{\text { Type }}{\text { LS-10 }}\right| \frac{\text { Match To }}{\text { Single grid- } 60,000 \text { ohms, } 2 \text { sections }} \right\rvert\, \frac{\text { Each }}{510.5}$ | C5401 | L.S-10 | Single grid- 60,000 ohms, 2 sections | S10.58 |
| :--- | :--- | :--- | :--- |
| C5739* | L.S-10X | Single grid- 60,000 ohms, 2 sections | 13.23 | * Quadruple alloy shielding, hum reduction -92 db .

## Interstage Transformer

| No. | Type | Application | Case | Lis. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: |
| C5423 | LS-21 | 1 plate to 2 grids. $21 / 2: 1$ | A | 4 | \$10.00 |

## Output Transformers

To voice coil secondary: $30,20,15,10,7.5,5,2.5,1.2$ ohms. C5412 in
type B case, C5398 in C case; C5412-8 ibs.; C5398-16 type B case, $\mathbf{C} 5398$ in C case; C5412-8 lbs.; C5398-16 lbs.

| No. | Type | Pri. Imped | Typical Tubes | Each |
| :---: | :---: | :---: | :---: | :---: |
| $\overline{\text { C5412 }}$ | LS-55 | $5000 \& 3000$ | $2 A 3{ }^{\prime} \mathrm{s}, 6 \mathrm{~A} 5 \mathrm{G}^{\prime} \mathrm{s}, 300 \mathrm{~A}^{\prime} \mathrm{s}$ | \$11.76 |

## t-Also matches $50,125,200,250,333,500$ ohm lines. Varimatch Modulation Transformers

Match Any Modulator Tube to Any R.F. Load Hero's the answer to your modulation problem-a new line of trapsformers pro vi ing ; unirersal range of load impedanees for any modulator combination. The
VARISATCH transformer can never become obsulete. All units carry Clas VARIMATCH transformer can never become obsulete. All units carry Class C current and have charts giving impedance combinations.

| $\begin{gathered} \text { Stock } \\ \text { No. } \end{gathered}$ | Type | Mar. Audio Watts | Max. <br> Input <br> Class C | Typical Mod. Tubes | Case | Wt. Lhe. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C5600 | VMO | 12 | 25 | 30, 49, 79, 6A6 | E | 4 | \$3.53 |
| C5360 | VM1 | 30 | 60 | $6 \mathrm{~V} 6,6 \mathrm{B5}, 2 \mathrm{~A} 3$ | F | 6 | 5.59 |
| C5361 | 1M? | 60 | 125 | 801, 6L6, 800 | G | 10 | 8.23 |
| C5362 | VM3 | 125 | 250 | 800, 807, 845 | H | 15 | 11.75 |

## IT TRAMSMITINGGTRANSFORMERS





G5 TO G11

Case Dimensions Type Height Width Depth | G-7 | $53 / 8^{\prime \prime}$ | $49 / 16^{\prime \prime}$ |
| :--- | :--- | :--- | G-8 $53 / 8^{\prime \prime} \quad 51 / 2^{\prime \prime} \quad 51 / 2^{\prime \prime}$

G-9 61/8" $\quad 55 / 16^{\prime \prime} 613 / 16^{\prime \prime}$ G-10 $61 / 8^{\prime \prime} \quad 63 / 16^{\prime \prime} 611 / 16^{\prime \prime}$ G-11 $71 / 8^{\prime \prime} \quad 69 / 16^{\prime \prime} 73 / 8^{\prime \prime}$

## Class A Input Transformer

| No. | Type | Application | Ratio | Case | Wt. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C5802 | S-2 | 1 plate* to 2 grids | 2:1 | G-2 | 2 lbs. | \$2.35 |
| C5804 | S-4 | 1 plate* to 2 grids, wide range response | 1:1 | G-3 | 3 | 3.23 |
| C5805 | S-5 | Single or double button mike or line to 1 grid; |  |  |  |  |
| C5806 | S-6 | hum bucking type Single or double buiton | 16:1 | G-2 | 2 | 2.65 |
|  |  | mike or line to 1 grid. compact type. | 16:1 | G-1 | 2 | 1.91 | *Will match tubes like 6C5, 56, 6C6 triode. 77 triode, etc. Can be used with high mu triodes with loss in low frequencies.

Universal Output To Line and Voice Coil All secondaries designed to match 2,8 and 15 ohm voice coils and 500 ohm line. Average shpy. wt., each 6 liss.

| No. | Type | Primary Ohms | Watts | Case | Each |
| :---: | :---: | :---: | :---: | :---: | :---: |
| C5814 | S-14 | 2500, 4000. 7000 | 10 | G-2 | \$2.79 |
| C5815 | S-15 | 4000, 5000, 10.000 | 12 | G-2 | 2.94 |
| C5816 | S-16 |  | 30 | C-4 | 3.82 |

## Universal Output Transformers

Designed 10 match any modulator tubes to any RF load. Secondary will carry IDC

| No. | Type | Watts | Case | Lbs. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: |
| C5818 | S. 18 | 12 | G-3 | 3 | 53.09 |
| C5819 | S-19 | 30 | C-4 | 4 | 4.70 |
| C5820 | S-20 | 55 | G-5 | 5 | 6.76 |
| C5821 | S-21 | 110 | (\%) 7 | 11 | 9.41 |
| C5822 | S-22 | 2.0) | C-9 | 18 | 14.70 |


| Matching Transformer |  |  |  | Shipping weight 4 lbs. |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stock No. | $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ | Application | Pri. <br> Ohms | Sec. Ohms | Case | Your Cost |
| C5811 | S-11 | Single 56, 6C6 triode, 6C5 or similar tube toline. | 10 | $\begin{gathered} 200, \\ 500 \\ \hline \end{gathered}$ | \%-2 | \$2.65 |


| Universal Driver Transformer |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| No. | Type | Application |  |  | Case | Lbs. | Each |
| C5809 | S-9 | P.P. Driver plates to grids of Class B tubes up to 400 watts out put. |  |  | G-3 | 4 | \$3.23 |
| Multiple Secondary Filament Windings |  |  |  |  |  |  | Irimaries tapped 105,115 volts, $50 / 60$ cycles AC. All secondaries center tapped. Shpg. wt., each, 8 lbs. |
| Stock No. | $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ | Fid. No. 1 Volts Amps. | Fil. No. 2 Voles Amps. | Volts | $\begin{gathered} 3 \\ \text { pus. } \end{gathered}$ | Case | Your Cost |
| $\begin{aligned} & \text { C5865 } \\ & \text { C5868 } \end{aligned}$ | $\begin{aligned} & \text { S-65 } \\ & \text { S-68 } \\ & \text { S-70 } \end{aligned}$ | $\begin{array}{ll}2.5 & 5 \\ 5 & 3 \\ 6.3 & 5\end{array}$ | $\begin{array}{ll}5 & 4 \\ 6.3 & 4 \\ 6.3 & 5\end{array}$ | $\begin{aligned} & 6.3 \\ & 7.5 \end{aligned}$ | 3 5 | G-5 G-5 $\mathbf{G - 5}$ | $\$ 3.53$ 3.82 3.82 |

## 

## Standard VARITRAN Voltage Controls

The VARITRAN is an ideal voltage control unit of the type employing a sliding contact vide continuously variable output voltages - FROM OTO 136 VOLTS without interruption of the circuit. Used extensively to transmitters, etc. Type V'l (illustrated) is completely shielded and includes cord, plug, and switch. Other units are completely shiesded and units shown below for $\mathbf{1 1 5}$ volit Input.

| No. | Type | Watts | Amps. | Size | Wt. | Price |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C5733 | V-0 | 230 | 2 | $6 \times 4$ | 10 liss. | 58.33 |
| C5771 | V-1 | 570 | 5 | $5 \times 812 \times 3$ | 14 lbs | 21.76 |
| C5716 | * V1-M | 570 | 5 | $5 \times 101 / 2 \times 3$ | 14 lbs. | 19.60 |
| C5772 | V-2 | 570 | 5 | $5 \times 7 \times 4$ | 13 lms . | 9.80 |
| C5773 | V-3 | 850 | 7.5 | $5 \times 7 \times 51$ | 19 lbs. | 14.70 |
| C5774 | V-4 | 1250 | 1 | $63 \times 93 \times 6^{3}$ | 37 libs. | 21.56 |

## ©TRASSMITINGG TRASSOPRMERS

THORDARSON
PLATE TRANSFORMERS
All primaries for 115 V. $50 / 60$ cycles a.c. Specified secondary A.C voltage is at transformer terminals, either side of c.t.; dual Sec. A. filter (choke input) approx. 20\% less than A.C. rating. Electro static shields between primary and secondary.

| Stock No. | Thord. No. | $\begin{aligned} & \mathrm{Sec} . \\ & \text { A.C. } \end{aligned}$ | $\begin{aligned} & \text { DC } \\ & \text { Ma. } \end{aligned}$ | $\begin{aligned} & \text { Mtg. } \\ & \text { Type } \end{aligned}$ | Size. Inches H. W. D. | Wt. Lbs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C560 | T19P5 | 560 | 150 | 3 | 18 | 7 | \$4.23 |
| C642 | *T19P55 | 660 | 250 | 3 | $47 \% \times 3$ | 8 | 4.59 |
| C643 | T19P56 | 900 | 225 | 3 | $47 / 8 \times 3 / 8 \times 41 / 4$ | 10 | 4.94 |
| C644 | $\dagger$ T19P57 | 1075 | 12 | 3 | $418 \times 3$ 3 $641 / 2$ | 11 | 6.00 |
| C645 | T19P59 | 1560 | 300 | $5 \ddagger$ | $6 \times 57 / 8 \times 7$ \% $/ 8$ | 261/2 | 12.35 |
| C648 | T19P63 | 1560 | 500 | 54 |  | 38 | 18.17 |
| C649 | T19PM37 | 2450 | 500 | 5 | $936 \times 715 \times 68$ | 51 | 35.28 |

*Indicates bias tap at 30 volts. f-Have insulated bushings t-Designed for double rectifiers. Will deliver both ratings simultaneously

## FILAMENT TRANSFORMERS

Primaries for 115 volts, $50 / 60$ cycles except those marked (*) which have primary taps at $105,110,115$ volts. All secondaries center tapped unless indicated by ( $\dagger$ ) which has two taps.
The essential of improved voltage regulation and minimum heat rise have been given prime consideration in the design of these units. Ratings given are for continuous operation at full load.

| Stuck Yo. | Thord. No. | Windings Volts Amps. |  | Insul. lolts | Mtg. <br> Type | $\begin{aligned} & \text { Size-lns. } \\ & \text { W } \times D \times I I \end{aligned}$ | Wt. L.bs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C517 | T50F61 | 2.5 | 3.5 | 1600 | 6 | $2^{7} \times 1 \times 2^{3} 8$ | , | \$1.23 |
| C304 | T19F88 | 2.5 | 5.25 | 1600 | 6 | $27.8{ }^{2}{ }^{1} x^{29} 8$ | 1 | 1.41 |
| C305 | T1vF83 | 2.5 | 10 | 1600 | 6 | $3{ }^{3} x^{2} 14 x 3$ | 2 | 1.59 |
| C306 | T19F90 | 2.5 | 10 | 7500 | 1 | $\left.2^{5} \times 2^{1} \times 3\right\}_{4}$ | 2 | 2.12 |
| C450 | T34F33* | 2.5 | 10 | 7500 | 8 | $3^{3} 4^{3} 3^{1}, x^{4}$ | 5 | 4.23 |
| C500 | T19F82 | 2.5 | 15 | 10000 | 1 | $3^{3}{ }_{4} \times 2^{2}{ }_{16} \times 4$ | 4 | 5.53 |
| C452 | T63F99 | 5 | 4 | 1600 | 8 | $2{ }^{7}$ i6x3 $\times 3^{1}$ \% | 2 | 2.29 |
| C501 | T10F83 | 5 | 5 | 1600 | 6 | $3^{8} 4 x^{2}{ }^{1} 8 x 3$ | 2 | 1.59 |
| C515 | T19F84 | 5 | 8 | 1600 | 1 | $296 \times 21 \times 3$ ) | 3 | 1.94 |
| C519 | T19F85 | 5 | 13 | 1600 | 1 | $33^{3} \times 236 \times 4$ | 4 | 2.82 |
| C520 | T19F86 | 5 | 21 | 1600 | 1 | $3{ }^{3} 12^{13} 16 \times 4$ | 5 | 3.88 |
| C467 | T74F23 | 5 | 13 | 1600 | 8 | $3{ }^{3} \times 3$ ! ${ }^{3} \times 4$ | 5 | 3.53 |
| C468 | T74F24 | 5 | 21 | 1600 | 8 | $376 \times 33^{5} \times 4819$ | 6 | 6.00 |
| C307 | T19F91 | 5.25 | 4 | 1600 | 1 | $23.4 \times 2,4 \times 314$ | 2 | 1.76 |
| C309 | T19F92 | 5.25 | 13 | 1600 | 1 | $3^{3}{ }_{3} \times 2{ }^{1} 2 \times 4$ | 4 | 2.47 |
| C549 | T19F80 | 6.3 | 1 | 1000 | 6 | $21 \times 1 \frac{6}{6}$ | 1 | . 94 |
| C550 | T19F81 | 6.3 | 2 | 1600 | 6. | $2^{7} \mathrm{x}^{1} 1^{3}+\times 2^{38}, 11$ | 1 | 1.06 |
| C311 | T19F97 | 6.3 | 3 | 1600 | 6 | $2^{7} x^{2} 2 \times 2^{3}$ | 2 | 1.23 |
| C303 | T61F85 $\dagger$ | $\begin{array}{r} 6.3 \\ 5,2.5 \end{array}$ | 2.5 | 1600 | 2 | $35.4 \times 2^{3} 8 \times 2$ ! | 2 | 1.59 |
| C373 | T33F60* | 6.3 | 5 | 1600 | 8 | $2^{2} \times \times 2^{7} \times \times 3{ }^{3}$ | 4 | 2.82 |
| C312 | T1uF98 | 6.3 | 6 | 1600 | 1 | $25 \times 23 \times 3\}$ | 3 | 1.94 |
| C313 | T19F99 | 6.3 | 10 | 1600 | 1 | $3^{3} x^{3} x^{21} x^{4}$ | 4 | 2.47 |
| C314 | T19F03 | 7.55 | 4 | 1600 | 1 | $2 \% \times 21 \times 3 \frac{1}{4}$ | 2 | 1.76 |
| C315 | T19F94 | 7.5 | 8 | 1600 | 1 | $3 \times 27 \times 33^{3}$ | 4 | 212 |
| C374 | Tง2F20 | 7.5 | 8 | 1600 | 8 | $3^{3}{ }^{1} \times 3^{3} \times x 4$ | 5 | 3.70 |
| C533 | T19F9 | 10 | 4 | 1800 | 1 | 2900214x314 | 3 | 1.94 |
| C499 | T10F06 | 10 | 8 | 1600 | 1 | $23116 \times 27.8 \times 311 / 15$ | 4 | 2.47 |
| C.142 | TfuF14* | 10 | 8 | 1600 | 8 | $3^{3}<x^{3}{ }^{3} \mathrm{x}$ | 5 | 3.53 |
| C497 | T19F87 | 10 | 12 | 1800 | 1 | $3^{3}{ }_{4} \times 31_{6} \times 4$ | 7 | 4.41 |

## INPUT (SWINGING) CHOKES

| No. | Thord. | Henries | Ma. | Ohms | Insul. | Type | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C551 | T19C39 | 5-20 | 150 | 215 | 3000 | 3 | \$2.29 |
| C634 | T19C35 | 5-20 | 200 | 130 | 3000 | 8 | 2.82 |
| C635 | T19C36 | 5-20 | 300 | 105 | 5000 | 8 | 4.94 |
| C637 | T19C38 | 5-20 | 500 | 75 | 5000 | 7 | 10.58 |
| SMOOTHING CHOKES |  |  |  |  |  |  |  |
| C552 | T19C46 | 12 | 150 | 215 | 3000 | 3 | \$2.29 |
| C638 | T19C42 | 12 | 200 | 130 | 3000 | 8 | 2.82 |
| C639 | T19C43 | 12 | 300 | 105 | 5000 | 8 | 4.94 |
| C641 | Ti9C45 | 12 | 500 | 75 | 5000 | 7 | 10.58 |

## UNIVERSAI MODULATION TRANSFORMERS



#  <br> $\sqrt{6}$ <br>  <br> STANCOR <br> PLATE TRANSEORMERS 

| Stock No. | Type | $\begin{gathered} \text { D.C. } \\ \text { Voltage } \end{gathered}$ | M.A. | Mts. Dimen. H. W. D. | Mtg. | Lhes. | Ea |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1860 | P8042 | 600 | 300 | $4^{3} \times 3 \frac{3}{4} \times 6{ }^{\frac{1}{6}}$ | 3 | 16 | \$10.5 |
| 1861 | P8043 | 750 | 300 | $71 / 2 \times 61 \times 8$ | 5 | 27 | 15.8 |
| C1862 | P8026 | 1250 | 300 | $7{ }^{5} 8 \times 73 \times 8$ |  | 36 | 19.9 |
| C1863 | P8028 | 1500 | 300 | $78 \times \times 73 \times 8$ |  | 38 | 22.0 |
| C1864 | P8032 | 2000 | 300 | $75 \times 73 \times 93$ | 5 | 45 |  |

## D.C. Voltage After Fiter. SWINGING CHOKES

| No. | Type | Hys. | Ma | Ohms | HxWxD | Mtg. | Wt. Lbs | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1827 | C1400 | 8-40 | 175 | 100 |  | 3 | 3 | \$2.23 |
| 766 | C1702 | 8-30 | 250 | 60 | 3 | 6 | 4 | 2.94 |
| 829 | C1402 | 8-30 | 250 | 60 | 31/23 $\times 3 \times 16^{\circ}$ | 3 |  | 3.23 |
| 769 | C1720 | 5-25 | 300 | 80 | 41/2x $\times 3 \times 3 \times 31 / 2$ | 6 | 9 | . 70 |

## FILTER CHOKES

| C1830 | C1410 | 20 | 175 | 100 | 31 |  | 3 | 52 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1831 | C1411 | 15 | 200 | 80 | 31.53 | 3 | 4 | 2.7 |
| C1832 | C1646 | 20 | 200 | 70 | 3 仿 3 年 $\times 3$ | . 3 | 5 | 3. |
| C1767 | C1703 | 15 | 250 | 60 | $31 / 2 \times 3 \times 3$ | 6 | 4 | 2.9 |
| C1833 | C1413 | 12 | 300 | 80) | $45 \times 37 / 6 \times 3$ ? |  | 9 |  |

FILAMENT TRANSFORMERS

| No. | Type | Sec. V. | Amps. | $11 \times W \times D$ | Mty. | Lhs. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1774 | P3060 | 2.5 | 10 | $31 / 2 \times 2$ 3/192190 | 6 | 3 | \$2.41 |
| C1790 | P4088 | 5.0 | 3 | $31.4 \times 2 \times 2$ | 6 | 2 | 2.65 |
| C1779 | P5014 | 6.3 | 3 | 3 , $\times 2 \times 21 / 2 \times 214$. | 6 | 2 | 1.73 |
| $C 1775$ | P3064 | 6.3 | 6 | 3 ${ }^{1 / 5215 \times 212^{\prime \prime}}$ | 6 | 3 | 2.06 |
| C1780 | P5015 | 7.5 | 4 | $316 \times 212 \times 21 \%^{\prime \prime}$ | 6 | 3 | 1.76 |
| C2782 | P6138 | 7.5 | 8 | 37631/4 $\times 1$ \% | 6 | 3 | 2.79 |
| C1781 | P5016 | 10.0 | 8 | $315 \times 3 \times 2$ \% | 6 | 3 | 2.23 |
| C1791 | P4096 | 10.0 | 5 | 3/8 $\times 31 / 4 \times 31 /$ | 3 | 5 | 3.32 |

## DRIVER TRANSFORMERS

Driver tubes listed in order of preference with best listed first

| No. | Type | From | To | Class | Mty. | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1896 | A4208 | PP 6C5, 6J5, | PP 2A3. |  |  |  |
|  |  |  |  |  |  |  |
| C1897 | A4702 | 1-2A3, 45, 46, | PP 6L6, 6V6, | AB2 |  |  |
|  |  | $89,2 A 5,6 F 6 \text {, }$ | 6F6. 45, PP Par. $6 L 6$ | AB1 | 3 | 2.44 |

POLY-PEDANCE DRIVER TRANSFORMERS
Tapped $t 0$ give usable ratios in Class B Drivers. Cap, of C1616 and C1617, 15 watts; primary per side, -60 ma . Cap. Cl618, 30 watts; primary 120 ma . per side. All type 1 mts . Wt. 4 lbs .

| Stock No. | $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ | Ratio Primary to $1 / 2$ Secondary | $\begin{aligned} & \text { Dimen, } \\ & H \times W x D \end{aligned}$ | Each |
| :---: | :---: | :---: | :---: | :---: |
| C1616 | A-4761 | $\begin{aligned} & 1.25: 1,1,4: 1,1.6: 1,1.8: 1 \\ & 2: 1,2.2: 1,2.4: 1 \end{aligned}$ |  | 4 |
| C1617 | A-4762 | 6:1, 3:1, 3.2:1, 3.4:1 |  |  |
|  |  |  | $31 / 8 \times 25 / 8 \times 31 / 6$ | . 7 |
|  |  | 25:1, 3.2 |  |  |

PLATE MODULATION TRANSFORMERS

| No. | Type | Tubes | Sec. Imp. | Audio | Mrg. | Lis | Each |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\overline{C 1748}$ | A3845 | $1-6 \mathrm{~A} 6,6 \mathrm{~N} 7,53$ $79.6 \mathrm{Y} 7$ | $\begin{aligned} & 3000,5000 \\ & 6500,8000 \end{aligned}$ | 25 W . | 3 | 4 | \$2.41 |
| 61751 | A3808 | P1 ${ }^{\prime} 6 L 6,807$ | 4000, 5000 |  |  |  |  |
|  |  | PP Par. 616. | 50, 100 | 60 W | 8 | 8 | 5.41 |
| C1757 | A2907 | PP 10, T20, TZ- <br> 20,1 Y 25,35 . <br> 46, 801, 809 | $\begin{aligned} & 3300,5000, \\ & 6800,9000, \\ & 12,500 \end{aligned}$ | 90 W. | 8 | 10 | 7.03 |
| C1758 | A2908 | PP RK18. T20, TZ20, HY25. | $\begin{aligned} & 3000,4500 \\ & 5350,6250 \end{aligned}$ |  |  |  |  |
| C1759 | A3829 | $\begin{aligned} & \text { RK31, 35T, } 50 \mathrm{~T} \\ & \text { P.P. RK } 12,57 . \end{aligned}$ | 3300, 4000 | 120 W | 8 | 11 | 7.41 |
|  |  | $\left\|\begin{array}{l} \text { HY 25-10Z, T40, } \\ 809,100 \mathrm{TL} \end{array}\right\|$ | 5000,6250 | 175 W | 8 | 12 | 8.00 |

POLY-PEDANCE MODULATION TRANSEORMERS
Tapped to give wide range impedances for correctly matching every type load. Impedance chart and instructions with each unit
Stock Type Max. Pri. Ma. Sec. Ma. Dimen. Type Each

| No. | No. | Audio | ner Side | Ser. | Par. | HxW $\times$ D | Mtg. | Lach |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C1621 | A-3892 | 30W | 80 | 80 | 160 | $37 \times 31 \times 43 \%^{2}$ | 1 | \$5.00 |
| C1622 | A-3893 | 60W | 125 | 125 | 250 | $37 / 8 \times 31$ | 1 | 5.88 |



Shpg. wts.: C1621, 6 lbs.; C1622, 8 lbs.; Cl638, 35 Ibs

# INTERFERENCE FILTERS 

## MALLORY Interference Filters



## $\mathbf{Z - 6}$. A dual in

 ductance-capacit Titer with provisionforreturnlead toground. Recom-

Plug-In" mended for sup-
 $110-220$ volts, 3 amps . Use at radio or noise source. $183 \times 3$ C12516Each ${ }^{1} 1.23$

## Heavy Duty Type LB Industrial Filters

 Clanges. Your Cost pg. wt. 8 Ib Your Cost as above s3.53 LC-10. Same as above, but rated C12515Each.


## Cornell-Dubilier "Quietones"

Most satisfactory results are ohtained when Quietoncs Most satisfactory results are ohtained when Quietones are installed at the source of the interference. Where
source of interference canot be located a Quietorre source of interference cannot be located a quietone
connected to the electric supply line of the radis connected to the electric supply line of the radis
receiver will alleviate, if not fully correct, the condreceiver will alleviate, if not fully corr
tion. Each has plug end and receptacle.

## IF-19-21



Idding For Thes Addressing Machiner Billing Machines Dental Machines Dictating Machines Drilling Machines Washing Machines dir Conditioners Auto Call Systems Barber Clippers

For These
F- 18 Cash Registers
IF-13
1F-18 Dishwashers
IF-18 Floor Polishers
1F-19 Food Mixers
IF-19 Fans
IF-19 Juice Extractors
IF-19 Massagers
F-18 Radios
F-18 Refrigerators

IF-21. All-Wave capacitive-inductive filter. For 110 V. 1.6 amps max. in walnut bakelite case. Shpg. wt. 2 lbs. C12495-Your Cost Each
IF-19. Like above, but 5 amps. max. Each C12493-Your Cost Each
C12425-IF-6-Your Cost Each
$88=$

## Special Type "Quietones"



IF-22A. For use with Schick, Knapp Monarch, etc shavers. Black bakelite case
C12496. Your Cost Each.
If-228. Like above, but
$\$ 126$ ington-Rand, Ronson, etc. shavers C12497-Your Cost Each $\$ 1=26$ 1F-27. Capacitive-inductive filler for severe interference from oil burners, motors, etc. For 110 max. Stee! box; flexible leads.
\$3.17
IF-28. Same as above, but for equipment drawing up to 10 amps. max. Shpg. wt lite cas
\$2.82
\$3.53
$\$ 5.64$

## ICA "rILTERVOLTS"

## Intermediate Model (A)



Eliminates extremely noisy radio reception due to power line disturbances caused by lights, electrical appliances, etc. Can be installed at set or at source of interference. plug and ground binding post. Ca-pacitive-inductive type. Size: $45 / 8 \mathrm{x}$ C12507

## C12507

## All-Wave Model (B)

Contains heavy duty R F "PI" filter circuit arrangement. Eliminates noises caused by electric beating pads, irons, toasters, vacuum cleaners, etc. Rated 250 watts, at 32,110 and 220 volts a.c. or d.c. For use with any all-wave or
broadcast receivers. Metal case $5 \times 4 \times 44 / 8$. Has cord and plug and receptacle. Wt. 5 lbs

## 612508-Each

## Industrial "Quietone" Model IF-7A

Capacitive-inductiv caused bothermy machines, elevators, etc. In steel cutout duit. For single phase $110-220$ volts a.c. ar or conamps. Wi. 9 1bs
C12500-Each
$\$ 5.29$
\$2.65
SPRAGUE

ct. $2^{3}{ }^{3} \times 11^{\prime}$ dia. $6^{\circ}$ leads. 714

## SPEAKER GEMENT and GOIL DOPE

Coil Dope Kit Hasa polystyrene base
and its power factor and its power factor
loss is necligible even if used for high frequency work. Will ture proof. May also be used for cementing parts made of polystyrene, of special thinner

## C15313-

$38^{\text { }}$

## $\Leftrightarrow$ Millen Coil Dope



## All-Purpose Cement

 For speaker cones. bakelite, metal,hard-rubber, etc hard-rubl ${ }_{2} \mathrm{ClOz}_{2} \mathrm{oz}$ size
C15311-8 oz. size
C15311-8 oz. size.
C15312-1 pt. size



 Under certain conditions it is
often found that radio re-
ceivers connected to the same
power lines will pick up electrical noise from a fluorescent fixture.
This is easily eliminated by installing one of these filters into the Under certain conditions it is
often found that radio re-
ceivers connected to the same
power lines will pick up electrical noise from a fluorescent fixture.
This is easily eliminated by installing one of these filters into the Under certain conditions it is
often found that radio re-
ceivers connected to the same
power lines will pick up electrical noise from a fluorescent fixture.
This is easily eliminated by installing one of these filters into the Under certain conditions it is
often found that radio re-
ceivers connected to the same
power lines will pick up electrical noise from a fluorescent fixture.
This is easily eliminated by installing one of these filters into the Under certain conditions it is
often found that radio re-
ceivers connected to the same
power lines will pick up electrical noise from a fluorescent fixture.
This is easily eliminated by installing one of these filters into the

Ifending fixture. The leads fromalling one of these filters into the offending fixture. The leads from the fifter are connected to the power
Deluxe Filte
C12520-Your Cost
Cornell-Dubilier Filter (right)
Standard Filter-In
S12501 Your Cost.

## IF-24 Fluorescent Lamp Filter

Capacitive type, ideal for fluorescent lights. In
metal case. For 110 v., a.c. or d.c.
E12501-Each..............................

 Noise Falters
Under certain conditions it is
often found that radio re-
power linnected will pick up electrical noise from a fluorescent fixture.
This is easily eliminated by installing one of these filters into the

## MAlLORY•SWITCHES•YRXLEY

Midget Jack Switches
Same general con-
struction as Junior
types. Mount in in hole. Include
black knob and black $k$
No. 6446
6 - No


## Your <br> Your <br> 0. 11-S.P.D.T <br> $3{ }^{3}$ <br> C6447-Your Cost.... $\in 74$ <br> YAXLEY Junior Jack Switches

Furnished with black knob; on off plate Mountsin
Panels up to $1^{\prime \prime}$ thick. $1{ }^{16}$ " deep
Two Position Switches

| No. | Part | Type | Each |
| :--- | :--- | :--- | ---: |
| C6470 | 720 | S.P.S.T. | $\mathbf{S 0 . 5 0}$ |
| C6471 | 730 | S.P.D.T. | .62 |
| C6472 | 740 | D.P.S.T. | .68 |
| C6473 | 745 | 5-Spring. | .79 |
| C6474 | 760 | D.P.D.T. | .88 |
| C6475 | 733 | 3-P.S.T. | .88 |
| C6469 | 744 | 4-P.S.T. | 1.15 |
| Three Position. Switches |  |  |  |
| (Center Position.OHf) |  |  |  |
| C6440 | 732 | S.P.D.T. | .62 |
| C6441 | 762 | D.P.D.T. | .85 |
| C6442 | 763 | 3-P.D.T. | 1.12 |
| C6443 | 764 | 4-P.D.T. | 1.38 |

 Button Switches Non-lock ing Types Furnished
with black Bakelite
in 6560 Nole, panels up to 2001 . Make Contact C6462-No. 2002. Break Contact Your Cost,
C6462-No. 2003. S.P.

| $\begin{aligned} & \text { Each. } \\ & \text { C6457-No. } \\ & \text { tact. } \\ & \text { Your Cost } \end{aligned}$ |
| :---: |
|  |  |
|  |  |
|  |  |
|  |  |

## With <br> 

Special single-circuit 24-point $2^{*}$ non-shorting switch. $3 / 9^{\prime \prime}$ bushing. $2^{\circ}$ grooved shaft. Complete with C6371-
Your Cost


YAXLEY Gang Switches Contact members are heavily silver plated, and given a smooth hard finish Contact shoe, of the self-cleaning type is of silver alloy. All switches are pro vided with one permanent stop and one
adjustable stop. Bushings and exadjustable stop. Bushings and ex-
tend 8,8 . Pointer type, Bakelite knob supplied.

## Shorting

 C6tock No. Type C6247 C6248 1211L $\begin{array}{ll}\text { C6249 } & 1215 \mathrm{~L} \\ \text { C6250 }\end{array}$ C6251 1212L
## C6252

C6253 ${ }^{12265 L}$

| C 6253 |  |
| :--- | :--- |
| C 6254 | 12225 L |

C6255 1?23L
C6257 1236L
C6259
C6260
C6261 1246L
C6262 1
${ }^{C} 6281$


Low loss ceramic insulation, wide contact spacing. improved heavy silver plated contacts. For trans nitters with power up to 100 watts 4 contacts per circ. With knob


SINGLE GANG SWITCHES
Non-shorting Total No
Ston-shorting No. Type Circuits

Stock No. Type Circlits Points Your Cost | C6263 | 1316 L | 1 Circuit | 1 to 6 points | $\$ 0.71$ |
| :--- | :--- | :--- | :--- | :--- |
| C6264 | 1311 L | 1 Circuit | 1 to |  |

$\begin{array}{lll}\text { C6265 } & 1311 \mathrm{~L} & 1 \text { Circuit } \\ 1 & 1 \text { to } 11 \text { points } \\ 2 & \text { Circuit } & 1 \text { to } 5 \text { points }\end{array}$
$\$ 0.71$
82
88
$\begin{array}{lll}2 \text { Circuit } & 1 \text { to } 5 \text { points each } & .88 \\ 3 & \text { Circuit } & 1 \text { to } 3 \text { points ach } \\ 4 & \text { Circuit } & 107\end{array}$
4 Circuit 1 to 2 points each
1.03

## Co 267 1312L 4 Circuit TWO GANG SWITCHES

2 Circuit 1 to 6 points each
Circuit 1 to 11 points each
4 Circuit 1 to 5 points each
Circuit 1 to 2 ppoints each
THREE GANG SWITCH
" 3100 " Series Single-Gang Tap and Circuit


## Selector Switches

Suitable for use in many types of test circuits. $2^{\prime \prime}$ notched shafts, 1/4 dian. With black bar knob and mounting nut. ${ }^{3}$ is bushings. Same features as gang switches (listed above). *-Have adjustable stop.


Shorting

| Shorting |  | Non-Stherting |
| :---: | :---: | :---: |
| Stuck No. | Type | Stock No. |
| C6878 | 3115 J | C6888 |
| C6879 | 31112 J | C6889 |
| C6990 | 3122. | C6890 |
| C6991 | 3123J | C6891 |
| C6880 | 3126 J | C6892 |
| C6881 | 3134 J | C6893 |
| C6882 | 3142 J | C6894 |
| C6883 | 3143J | C6895 |
| C6884* | 31117J | C6896* |
| C6885 ${ }^{\text {* }}$ | 3120 | C6897 ${ }^{\text {- }}$ |
| C6886* | 3136J | C6898* |
| C6887* | 3163J | C6899* |

## CENTRALAB Return'/ Switches

 Lever Action Each switch supPlied with knob. Plates a available for in groups up to five Shorting Type Non-Shorting Type
No
Poles Pus.
 $\begin{array}{llll}\text { C12826 } & 2 & 3 & \text { Spring } \\ \text { C12801 } & 4 & 2 & \text { Spring } \\ \text { C12800 } \\ \text { C12802 }\end{array}$ $\begin{array}{lll}\mathrm{C} 12805 & 2 & 3 \\ \text { Pos. \& Sur. } \mathrm{C} 12806\end{array}$ Any Type Above, Each Black Mounting Plates No. Gangs Dimen. Each $\begin{array}{lll}\mathrm{C} 12794 & 1 & 2^{5} 1 \mathrm{x} \\ \mathrm{C} 12795 & 2 & 112 \mathrm{y} \\ \mathrm{C} 12796 & 3 & 212 \mathrm{c} \\ \mathrm{C} 12797\end{array}$

# ARADOOndPOWER SWIICHES <br> PRECISION MU. 

 SWITCHES
## Metal Clad Type

 A strong metalcased high-quality switch for uses where a protec-
tive housing is retive housing is re-
quired and where quired and where
conduit connecconduit connec-
tions are desired. tions are desired-
Low pressure act-
either side or bottom mounting. For use on machine tools, aircraft. ships. tanks, packaging nachinery and many others. Underwriter's Lab. approved. Rated 17 amps. at 125 V . Size: $3 \times 1 \times 11^{\circ}$ high.
Type MBP-DN-Sleeve Plunger with Neoprene Hood. SPDT. C12750-
$\$ 3.51$ Your Cost.
Type MBP-D-Sleeve Plunger. SPDT. C12751-Your Cost $\mathbf{\$ 2 . 6 1}$ Type MB-DW-Roller Leaf. SPDT. C12752-Your Cost
$\$ 2.21$

| Standard MU-Switch <br> Light pressure. quick <br> Sion units. Require only <br> 4 oz. pressure <br> and $.001^{\circ}$ of movenent to operate. Underwriters approved. Rated 15 amps. at 125 volts a.c. $1 / 11$.P. in- ductive loads at $125-460$ a.c <br>  Screw terminals with lugs. Used for sorters, counters, float controls, etc. No. $\mathbf{N 1 2 5}$ Type Normal Each C12726 S.P.S.T. Open $\} 904$ C12727 S.P.D.T... |
| :---: |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |



## MUStat-Ty

 For automatic control of temperature in electribrooders and in. cubators, orwherever an automaticelectric heat control is desired. Maximum efficiency between $80^{\circ}$ wafer and adjusting screw. Rated: 15 ampsily. Non-inductive loads. C12753-

NOTE: In addition to the above Mu-Switches we can supply thelr entlre llne of Basic Aircraft and many other types for spe-
clalized uses. Write for MuSwitch eatalog and price Ilst.

## 

JONES Terminal Strips
No. $144-7 / 8^{\circ}$ wide by $18 /{ }^{\prime \prime}$ high. Terminals are mounted on $8^{\circ} \mathrm{cen}$ ters. $10^{\circ}$ metal to metal spacing
over bakelite. Screws are $5 / 40 x^{3}$. No. $141-118^{\circ}$ wide by $1 / 2^{\circ}$ high. Cerminals mounted on spacing over metal to metal spacing over No. 140 No. 141

| Stock <br> No. | Stock <br> No. | Term-140-141 |  |
| :---: | :---: | :---: | :---: |
| inals Price |  |  |  |
| C12527 | c12539 | 2 | $11 c-14 c$ |
| $C 12528$ | $C 12540$ | 3 | $16 c-20 c$ |
| $C 12529$ | $C 12541$ | 4 | $20 c-25 c$ |
| $C 12530$ | $C 12542$ | 5 | $24 c-30 c$ |
| $C 12531$ | $C 12543$ | 6 | $27 c-35 c$ |
| $C 12532$ | $C 12544$ | 7 | $31 c-40 c$ |
| $C 12533$ | $C 12545$ | 8 | $35 c-46 c$ |
| $C 12534$ | $C 12546$ | 9 | $40 c-51 c$ |
| $C 12535$ | $C 12547$ | 10 | $44 c-56 c$ |
| $C 12536$ | $C 12548$ | 11 | $48 c-62 c$ |
| $C 12537$ | $C 12549$ | 12 | $52 c-67 c$ |



## CUTLER-HAMMER Switches

Cutler-Hammer Switches are
approved by the Underwriters.


Toggle Switches Approved type with
nickel plated metal parts. All rated at 3 amperes at 250 volts except C12834 amps. at 125 v .
Stems $15 / \mathrm{m}^{2}$ diam.

## Sin Pole-Singie hrow <br> Your Cost Stem <br> 10 for <br> C12835-i Stem <br> Your Cost, Each <br> 10 for <br> SIngle Pole-Double - $\$ 2.25$ <br> C12834-1/2 Stem ? <br> 10 Cost, Each <br> 

 10 for.Doubie Pol. $\$ 2.34$
C12833-1/2 Stem 4,4 Your Cost, Each.
10 for ....................
C12817-3/2 Stem 424 Your Cost, Each......................... 10 for...........


No. Type Amps. Ea. 10 for $\begin{array}{llll}\text { C12813 S.P.S.T. } & 645 \mathrm{c} & \$ 4.05 \\ \text { C12814 D.P.S.T. } & 5 & 49 \mathrm{c} & 4.41\end{array}$ $\begin{array}{llll}\text { C12814 D.P.S.T. } & 5 & 49 \mathrm{c} & \mathbf{4 . 4 1} \\ \text { C12815 S.P.S.T. } & 1278 \mathrm{c} & 7.02\end{array}$ $\begin{array}{llll}\text { C12815 S.P.S.T. } & 1288 \mathrm{c} & 7.02 \\ \text { C12816 D.P.S.T. } & 1083 \mathrm{c} & 7.47\end{array}$


Porcelain Base Knife
Switches


Switches
For set manufacmenand set builders. Metal base. Nickel-plated finish. Heavy shank, $3.8^{\circ}$ diameter. Handle is shaped like a baseball hat.

| Stk. No. | Type | Each | 10 For |
| :--- | :--- | ---: | ---: |
| C12760 | S.P.S.T. | $32 c$ | 52.88 |
| C12761 | S.P.D.T. | 41 c | 3.69 |
| C12762 | D.P.S.T. | $50 c$ | 4.50 |
| C12763 | D.P.D.T. | 66 c | 5.94 |

## H \& H Two Circuit Push Switches



In normal position, with plunger out, one circuit is "on", and the other "off". When plunger is depressed, circuits are reversed. Slow make, quick break momentary con-
tacts. Rated 6 amps. at 125 v. a.c. Bushing ${ }^{13} 1 z^{\prime \prime}$ dia.. $588^{\circ}$ long

METAL PLUNGER (A)
Used on Supreme instruments and other popular makes.
C12774-......3.
Each........
$\$ 3.15$
 C12778-Black 5 S 53.33

BAKELITE BUTTON (B $\left.\begin{array}{c}\text { C12775-Red } \\ \text { C12776-Black }\end{array}\right\}$ Ea. 4 C $_{53.78}^{10 \text { For }}$

## H. \& H. Rotary Panel

 Switches

Rated 3 amps, 125 volts. Approved type. With locknuts. Shaft ex3. " in diameter.

| Bakelite Knife Switches |  |  |
| :---: | :---: | :---: |
| Heavily p base. Sin double po | d metal pa pole types $1 / 2^{\prime \prime}$. | ts, bakelite $112^{\circ}$ long; |
| Stock No. | Type | Your Cost |
| C16830 | S.P.S.T. | 45 c |
| C16831 | S.P.D.T. | 53 c |
| C16832 | D.P.S.T. | 61c |
| C16833 | D.P.D.T | 71c |
| C16834 | 3-P.S.T. | 99c |
| C16835 | 3-P.D.T. | \$1.06 |
| C16836 | 4-P.S.T. | 1.32 |
| C16837 | 4-P.D.T. | 1.58 |


\section*{Terminal Strips <br> Hi-quality bakelite terminal strips <br> Beavy Bakelite Strips <br> } 1/6 thick. Plain, no markings. 10 For | No. | Terminals Ea. | 10 For |
| ---: | :---: | ---: |
| C13145 | 2 | $6 c$ |
| C13123 | 3 | 7 c |
| C | 62 c |  |
| C 1312 | 4 | 10 c |
| C 13113 | 6 | 89 c |
|  |  | 15 c |

BAKELITE MOUNTING STRIPS


For mount ing parts
which are to be in-
sulated from chassis. Tinned.

$C 13133$
$C 13134$
.

Screw and collar terminals mount ed on $1 / 8^{\prime \prime}$ bakelite strips, $7 / 8^{\prime \prime}$ wide. No. Terminals Ea. 10 For

$C 131$
$C 13$
$C 13$
$C 13$
$C 13$
$C 13$
$C 13$
$C 1$
10 F
For
14c
$16 c$
$18 c$

## crumiopluc sand CONNECTORS

## Miniature Connectors

Molded bakelite connectors in cadmium plated brass shells. Only $18^{16}{ }^{\circ}$ long, ${ }^{11}{ }^{\prime \prime}$ " diameter. Bakelite element held in place by set screw When used with shielded cable shield can be soldered to shell. Accommodates cables up to 2 :

| Male | Female | Cont. Each |  |
| :---: | :---: | :---: | :---: |
| c13335 | C13337 | 3 | 18 c |
| c 13336 | C 13339 | 4 | 20 c |
| C 13333 | C 3334 | 5 | 22 c |
| C 13338 | C 13340 | 6 | 22 c |

## Miniature Sockets

 and PlugsThese are inwith the con-
above. The sockets are equipned with push-on mounting rings and can be used with above listed nale plugs as well as the plain plug listed here. Similarly the plugs listed below can le used with the female connectors listed above

| Sockets | Plugs | Cont. Each |  |
| :--- | :---: | :---: | :---: |
| C11599 | C12708 | 3 | 8 c |
| C12701 | C12709 | 4 | 8 c |
| C12702 | C12710 | 5 | 10 c |
| $\mathrm{C11542}$ | $\mathrm{C12711}$ | 6 | 10 c |

## Shielded Sockets

Similar to sockets listed above but with shield. When used with shield. ed male connector listed at top of page a completely shied mounted.

Your Cost
No.
Type
C12704-3-contact
c12705-4-contact
C12706-5-contact
Each
18 c
.18 c

Standard Speaker


1-piece molded bakelite. speaker cables easily wired.

| No. Type | Each |
| :---: | :---: |
| C11512-4 prong |  |
| C11513-5 prong |  |
| C11514-6 prong |  |
| C11515-7 prong |  |
| C11516-8 prong. |  |

For Amphenol
Co-Axial Cable and Connectors see page 65

## AMPHENOL

## Shielded Plugs

Fully shielded cable type 2 pole plugs and receptacles. Take up to


WITH CLAMP (A) No. Description C11546-Mecrptacle C11545-Ptandard Plug Cll647-Polarized Plug Your Cost,
Any Above, Each SIDE OUTLET (B C11548-Receptacle
C11547 Stan C11547-Standard Plug C11650-Polarized Plug Your Cost,
Any Above, Each.

END OUTLET (C C11651-Receptacle C11652 Standard Plug Your Cost,
CAny Above, Each.

AMPHENOL CONNECTORS are recognized as the world's finest precision connectors and are approved by U. S. Army and Navy in accordance with specification AN9534 for use in aircraft, tanks, ships, firing control devices, etc. The number of contacts per single shell range from 1 to 47 with current carrying capacity per contact ranging from 5 to 200 amperes. Listed on this page are only a few of the many important items in the complete Amphenol catalog. However, Lafayette Radio Corporation can supply any Amphenol product manufactured. A complete Amphenol catalog will be sent on request of purchasing agents, engineers, etc. Include highest priority ratings on all Amphenol orders.
"AN" Plugs, Receptacles and Fittings


## "AN" Connectors



Designed in accordance with U. S. Army-Navy Procurement Specification AN-9534, as most suitable for general radio and P.A. work. Al have aluminum alloy shells with light sand blast finish. Insulation is high dielectric black bakelite. Machined threads with Permalub coating prevent binding. Shells are polarized to prevent incorrect insertions. Male and female elements are interchangeable so that male prongs can be kept at dead end of circuit. Contacts are machined from phosphor bronze bar stock and heavily silver plated, to insure low resistance. Cable camps have two inner grooves into which cable covering is pressed ket backed by a fibre washer. Take cables from so to $1 /$

Angle Connectors (A)
Male. Right angle: rear end can units having coupling threads.

| Stock | Con- For Wire Your |  |  |
| :---: | :---: | :---: | :---: |
| No | tacts | Size | Cost |
| C12550 | 1 | 8* | \$2.44 |
| C12551 | 1 | 16 | 2.34 |
| C12552 | 3 | 20 | 2.53 |
| C12553 | 4 | 20 | 2.59 |
| C12554 | 5 | 20 | 2.71 |

## Chassis Unit (D)

Female. Has square mounting flanges for permanent assembly to chassis with screws or rivets.
Stock Con-For Wire Your

| Stock | Con- | For Wire Your |  |
| :---: | :---: | :---: | ---: |
| No. | Cacts | Size | Cost |
| C12555 | 1 | $8^{*}$ | $\mathbf{\$ 1 . 0 5}$ |
| C15556 | 1 | 16 | .77 |
| C12557 | 3 | 20 | .89 |
| C12558 | 4 | 20 | .95 |
| $\mathbf{C 1 5 5 9}$ | 5 | 20 | 1.01 |

Straight Comnector With Coupling Ring (B)
Male. Use with connector having coupling threads.
> $\begin{array}{lccc}\text { C12560 } & 1 & 8^{*} & \$ 1.94 \\ \text { C12561 } & 1 & 16 & 1.78 \\ \text { C12562 } & 3 & 20 & 1.07\end{array}$
> $\begin{array}{llll}\text { C12561 } & 1 & 16 & 1.78 \\ \text { C12562 } & 3 & 20 & 1.97\end{array}$ $\begin{array}{llll}\text { C12563 } & 4 & 20 & 2.07 \\ \text { C12564 } & 5 & 20 & 2.16\end{array}$
Straight Connector With Coupling Threads (C) Female. Like a
coupling threads

| Stock | Con- | For Wire Your |  |
| :---: | :---: | :---: | :---: |
| No. | tacts | Size | Cost |
| C12565 | 1 | $8^{*}$ | $\$ 1.96$ |
| C12566 | 1 | 16 | 1.60 |
| C12567 | 3 | 20 | 1.71 |
| C12568 | 4 | 20 | 1.77 |
| C12569 | 5 | 20 | 1.83 |

"Widely used for connectors are exceptionally easy to wire. Both male prongs and female contacts extend beyond bakelite element and are terminated in a soldering lug. Simply insert wire into lug and touch with soldering iron; lugs are solder coated.

## AMPHENOL Receptacles and Plugs



Molded black bakelite insulation. 2-pole receptacles have one elongated hole and can be used with both the standard type of plug and the polarized type having one $1 / /^{\prime \prime}$ and one $316^{\circ}$ blade. 3 -pole receptacles are for
use with 3 pole plugs. Underwriters ratings: $15 \mathrm{~A}-125 \mathrm{~V}$ or $10 \mathrm{~A}-250 \mathrm{~V}$. Dimensions: (A) hole $1.172^{\circ}$, (B) Mty. ctss. $-11 / 2$ to $17 / 8^{\circ}$, (C) hole- $13 / 8{ }^{*}$. Mitg. ctrs.- $18 / 4$;

> PLAIN (A) No. Poles Typej C11502-2 Receptacle c11624-2 Polarized Plug C11624-2 Polarized Plu c11625-3 Receptacle WITH PLATE (B C11500 2 Receptacle C11501-2 Standard Plug C11501-2 Standard Plug
C11627-2 Polarized Plug

> Each
$15 c$ 21c
> $16^{\circ}$

Heavy Duty Type Multiple Connectors


Cadmium finished locking type shells with ring on male plug and matching thread on female connectors. Rubber gasket and cable clamp keep strain off prongs. Coupled connectors $31 / /^{\circ} \mathrm{L}$. by Con- Male Female Chassis tacts Plug A Conn. B Conn. C C13555 C13377 C13274 $\begin{array}{llll}\mathbf{C 1 3 5 5 4} & \mathrm{C} 13376 & \mathrm{C} 13273 \\ \mathrm{C} 13553 & \mathrm{C} 13375 & \mathrm{C} 13272\end{array}$ $\begin{array}{llll}C 13553 & \text { C13375 } & \text { C13272 } \\ \text { C13492 } & \text { C13491 } & \text { C13269 }\end{array}$ Any Above Type
Your Cost Each
$73^{\text {f }}$

## Polaxized Four-Pole Plugs



Underwriters approved. 4 extra heavy prongs rated at $15 \mathrm{~A} .-125 \mathrm{~V}$. or 10A.-250V. Dirt and moisture proof. Cable clamp adjustable to 12". Connectors coupled- $3^{\prime \prime}$ long $\mathrm{x} 1 \mathrm{~K} \mathrm{C}^{\circ}$ diam. POLARIZED, with numbered contacts. Fully shielded. Elements are interchangeable. Shell may be used as fifth conductor
C. 3314 -Male (A) . . . . . . . . $\$ 1.47$ . 13316 -Female (B) ....... 1.47 C13320 Panel receptacle (C). Female. Mounts in 114 hole. Has

## Cable Connectors

grommet cable opening at end. Fenzale Male Contacts Each C11475 C11471 4 15c

| $C 11476$ | C11472 | 5 | 15c |
| :--- | :--- | :--- | :--- |
| C11477 | C11473 | 6 | 15c |


| $C 11478$ | $C 11474$ | $7 S$ | 15 c |
| :--- | :--- | :--- | :--- |
| $C 11491$ | $C 11490$ | 8 | 15 c |
| C 11508 | $C 11506$ | 9 | 17 c |


| C11508 | C11506 | 9 | 17 c |
| :--- | :--- | ---: | ---: |
| C11509 | C11507 | 11 | 21c |


|  | Same as above but with cable opening at side. $14^{\prime}$ D., 11/4'L |  |  |
| :---: | :---: | :---: | :---: |
| Female | Male | Conta | Ea |
| C11586 | C11579 | 4 | 15 |
| C11587 | C11580 | 5 | 15 |
| C11588 | C11581 | 6 | 15c |
| C11589 | C11582 | 7 S | 15 |
| C11590 | C11583 | 8 | 15 |
| C11591 | C11584 | 9 | 17 |
| C11592 | C11585 | 11 | 21c |

Same as
above, but
has nositive
gripping
gripping
Clamp
accepts cables up to $460^{\circ}$ in diameter. Female Male Contacts Each $C 11684$ C11692
C11685 C11693
C11686 C11694 - 6 18c
$\begin{array}{llll}C 11687 & C 11695 & 7 S & 18 c\end{array}$
$\begin{array}{llll}C 11688 & C 11696 & 7 L & 18 c\end{array}$
$\begin{array}{llll}C 11689 & C 11697 & 8 & 18 c \\ C 11690 & C 11698 & 9 & 20 c \\ C 11691 & C 11699 & 11 & 24 c\end{array}$
$\begin{array}{llll}C 11691 & C 11699 & 11 & 24 c\end{array}$

## Locking <br> Covers <br> For above connec <br> 

tors. $11 / 6 \times 21 / 2^{\prime \prime}$
C11479 Per Pair

# IACKS PLUGS O SOCKETS <br> Midget Jacks <br> Flat Plug 

Fibre insulation. C6548. hole. C6548-Closed 66549 - 0 ${ }^{\text {cun }}$
Your Cost Each
C6550- New Imp. Short Jack.
3 -circuit for

## Popular Phone Plugs



Molded balielite shell. 2 s: ${ }^{\circ}$ long C14974-Black connections. C14971-Red. Each

Metal Shell Type 5 C14970 Each
"Stubby" Metal Shell
 Midget Bakelite Plug Bakelite shell. $21 / \mathrm{s}^{\prime \prime}$ overall $\times 1 /{ }^{*}$ dianieter. Solder lug connect ions. C14960-Black C14963-Red Your Cost 10 For $\$ 2.85$ 324
Midget Metal Shell Same with metal shell. $21 彳^{\prime \prime}$ over all $x$ " ${ }^{\text {g }}$ " diam. 10 for $\$ 3.40$ C14958
Your Cost-Each
Locking Type Shielded TelephonePlug

Cannot be accidentally removed from its jack. which replaces hex nut of present jack ${ }^{13294-2-T e r m . ~(P h o n e) ~} \$ 1.03$ C13295-3-Term. (Mike)... 1.32

## note

Consult page 61 for tip Jacks
banana jacks and phono jacks

## MALLORY PRODUCTS

Signal Corps Type Jacks Phone Jack:

W. E. 47A. 47B;' Sig. Corps No. PL-47, PL-48, PL-55, PL,-148.
PL-155,
C 6300 . Mike Jack: Three circuit. Like Sik. Corps No. JK-33A. Takes W. E. 109: Si. Corps No. PL-46, PL-68, PL-168
C6301-Each

414

## Grounding Jack

No. GJ.1-For grounding airplanes while re-fucling. Similar in construction to midget jack No
A-1, except for insulation. C6339 Your Cost....244

YAXLEY Plugs \& Jacks $\square$ Bh $D 0$ C
No, 75. Two way. Bakelite shell. Tie cord ancho
No. 75 N . As above, b shell. Tie cord anchor. 534 No. 75A. As above, with built-in cable clamp.
No. 100. 2-Way Extension jack Fibre shell. C6348-Each....71c No. 100 N . As ahove, but with No. 100A. As above, with nickel shell, cable clamp.
51.23

Mlcrophone Plugs \& Jacks No. 76, 3-way mike plug. Bake No. 76 A. Same but with nicke shell. C6347 Each No. 101. 3-way Mike Jack for No. 101. 3-way Mike Jack for above. Fibre
C6343 Each.

YAXLEY Midget Jacks Extremely com-


Ultra-compact.
type, for use where space is limited. Molded bakelite body ${ }^{1 / 1}$ dia.
C14964-Each

## ,

High Volt. Plugs \& Jacks


Heavy duty type, in medium and giant sizes. Handle $\mathbf{1 0 0 0}$ volts at 10 amps. For use with high R.F. currents, diathermy work, x'mitters. etc. Insulated threaded heads and handles. Hardware furnished with jacks. Medium jacks for panels up to $16^{\circ}$ thick; giant jacks for panels up to ${ }^{\prime \prime}$ thick.

Medium Plugs $2 \times 3 \times 3$. C12870-Black \& Red $32 \mathbf{C a}_{\text {en }}$

Medium Jacks- $2 \times$ : C12872-Black \& Red
C12873-Black
G Glant Plugs $2 \pi!2 \times 3 / 4$ C12785-Black \& Red
C12786-Black $\in \boldsymbol{C}_{\text {ea. }}$

Glant Jacks- 2 道 ${ }^{\circ}$ C12787-Black \& Red
$\left.\begin{array}{l}\text { C12788-Black }\end{array}\right\} 8$ fea. $^{\text {en }}$.

## Signal Corps Jacks

 Single open circuit jack. Equiva-lent of Signal Corps Jack JK-34A Mechanically perfect. Cannot pass official requirements, because of slight imperfection in finish. C6340
Microphone Jack. Equivalent of Signal Corps Jack JK33A C6341
Your Cost $\qquad$
Space does not permit a complete listing of all available plugs and connectors. Write us regarding your requirements for any special plugs or connectors not listed in this catalog

JONES " $500^{\prime \prime}$ Series Plugs \& Jacks


Designed for 5000
volts and 25 amps . per contact. Con-
lacts are brass and phosphor bronze, silver plated. Long leakage path from terninal to terminal, and terminal to ground. All sizes are polarized so that it is impossibe to in-
sert one size plug in another size socket. and brackets are steel, parkerized (rust-proofed). Plug and socket blocks are interchangeable in caps and brackets. Decp brackets should always be used when one plug or socket has a cap; shallow bracket types should be used in pairs, both plug and socket.
"500" Series Plugs

| Contacts | Stock No. | $\begin{aligned} & \text { Cap }\left(\begin{array}{l} \text { A }) \\ \text { Your } \\ \text { Cost } \end{array}\right. \end{aligned}$ | Deep Stock No. | (B) <br> Your Cost | Shallo Stuck No. | et (C) Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 2 | C12730 | 51.18 | C12736 | \$1.03 | C12742 | 51.03 |
| 4 | C12731 | 1.68 | C12737 | 1.47 | C12743 | 1.47 |
| 6 | C12732 | 2.18 | C12738 | 1.91 | C12744 | 1.91 |
| 8 | C12733 | 2.68 | C12739 |  | C12745 | 2.35 |
| 10 | C12734 | 3.18 | C12740 |  | C12746 | 2.79 |
| 12 | C12735 | 3.67 | C12741 | 3.23 | C12747 | 3.23 |
| "500" Series Sockets |  |  |  |  |  |  |
|  | With Cap (B) |  | Deep Bracket ( A ) |  | Shallow Bracket (C) |  |
| 2 | $\overline{C 12712}$ | \$1.18 | C12718 | \$1.03 | C12728 | 51.03 |
| 4 | C12713 | 1.68 | C12719 | 1.47 | C12729 | 1.47 |
| 6 | C12714 | 2.18 | C12721 | 1.91 | C12789 | 1.91 |
| 8 | C12715 | 2.68 | C12722 | 2.35 | C12790 | 2.35 |
| 10 | C12716 | 3.18 | C12723 | 2.79 | C12791 | 2.79 |
| 12 | C12717 | 3.67 | C12724 | 3.23 | C12792 | 3.23 |

## Jones" 300 " \& " 400 "SeriesPlugs \& Sockets

 Multiple contactand soctets in both series heavy duty pere) and " 300 ") serie standard duty ( 5 ampere) sizes. Cable type plugs and sockets have cable clamps. Chassis type have brackets-heavy duty
type at ends-standard duty type at sides.

TYPE A PLUGS

| rd Duty |  | Heavy Duty |  | Standard Duty |  | Heavy | Duty |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stock | Your Con- | Stock | Your | ck | Your Con- | Stock | Your |
| No. | Cost tacts | No. | Cost | No. | Costiact | No. | Cost |
| C12460 |  | C12400 | 42c | C12466 | 22c | C12412 | 45c |
| C12461 | 25c | C12401 | 51c | C12467 | 26c | C12413 | 57 c |
| C12462 | 29c | C12402 | 60c | C12468 | 31c | C12414 | 69c |
| C12463 | 32c | C12403 | 69c | C12469 | 35c | C12415 | 81 |
| C12464 | 36c 10 | C12404 | 78c | C12470 | 40c 10 | C12416 |  |
| C12465 | 40c 12 | C12405 | 87 c | C12471 | 45c 12 | C1 | 05 |
| Chassis Type Plug (C) |  |  |  | Chassis Type Socket (D) |  |  |  |
| $C 12472$ | 10c | C12426 | 27e | $C 1$ | 10c | C12406 | c |
| C12473 | 13c | C12427 | 33c | C12479 | 14 c | C12407 | 39 c |
| C12474 | 16c | C12428 | 39c | C12480 | 18 c | C12408 | 48c |
| C12475 | 19c | C12429 | 45 c | C12481 | 22c | C12409 | c |
| C12476 | 22c 10 | C12430 | 51c | C12482 | 26c 10 | C12410 | 66c |
| C12477 | 25c 12 | C12431 | 57 c | C12483 | 31c 12 | C12411 |  |
| Locks for "500" Series Jones Plugs and Jacks |  |  |  |  |  |  |  |
| For use in connection with any Deep porn |  |  |  |  |  |  |  |
| Gracket and cap combination. The locks |  |  |  |  |  |  |  |
| hold the units securely together, and can be released instantly. Mounting plates fit |  |  |  |  |  |  |  |
| all Deep Brackets; fastened by same |  |  |  |  |  |  |  |
| screws that hold deep brackets to panel. |  |  |  |  |  |  |  |
| screws that hold deep brackets to |  |  |  |  |  |  |  |
| 12793 | er Pal |  |  |  |  |  |  |

\section*{ALL

\section*{"World's

## "World's <br> Socket'

Molded from
high-dielectric
lite, with molded-in plate for $11 / 2^{\circ}$ mounting centers. Cannot come loose or rattle. Strong, dependable Stock No. Prongs Your Cost, Ea.

## ${ }_{C} 13164$

$C 13165$
$C 13166$
C13167
$C 13167$
$C 13168$
$C 13168$
C 13169
$C 13169$
C13223

$$
\left.\begin{array}{c}
5 \\
6 \\
7, \text { small } \\
7, \text { large } \\
8, \text { octal }
\end{array}\right\}
$$

6

## Midget "MIP" Octal

Smaller, more compact than above | Has |
| :--- |
| pronks only. |
| c13225. centers. | C13243-"MIP" Loktal Ty Your Cost, Each

$10 \%$

## C-R Tube Socket

 Magnol type C-R socket with 11 sil ver-plated contactsSubstantial barriers bet ween each contact increase the ing in less loss, thus reducing possible voltage breakdown. Complete with retainer ring for direct chassis mounting C13185

59

## "CIR" Isolantite

Low loss isolantite sockets can be locked in metal flange. Ideal for high frequency receivers and x'mitters.
$\begin{array}{lll}\text { No. Prongs } & \text { No. Prongs } \\ \text { C14534 } & 4 & \text { C14537 } 7 \text { small }\end{array}$ $\begin{array}{llll}\text { C14534 } & 4 & \text { C14537 } & 7 \text { small } \\ \text { C14535 } & 5 & \text { C14538 } & 7 \text { large }\end{array}$ C14536 $6 \quad$ C14539 8 octal Any Type, Your Cost.......27c

## HAMMARLUND

## Isolantite Sockets

Ideal lo-loss socketsforim-
proved high proved high cept ion
Glazed tons


Glazed tops, sides; underneath "Ceresin" treated. Subpanel or $2^{1}$ base mounting. "Cuide groove." $21+x 188^{2}$. $176{ }^{27}$ mounting cen-

 | $C 8496-4$ | $36 c$ | $C 8499-7 L$ | $45 c$ |
| :--- | :--- | :--- | :--- | :--- |
| $\mathrm{C} 8497-5$ | $39 c$ | $\mathrm{C} 8530-7 \mathrm{~S}$ | 45 c | c8498-6 42c

C8532 8-Prong Octal.

## MILLEN Sockets

Muchhigher
Steatite body
used to provide used to provide
increased insulation. Barriers separate all contacts, permitting use of higher than ordinarily used voltazes.
Stk. No. Mirs. No. Prongs Each Stk. No. Mirs. No. Prongs Each $\left.\begin{array}{lll}\begin{array}{lll}\text { C8045 } \\ \text { C8046 }\end{array} & 33004 & 4 \\ \mathbf{C 8 0 4 7} & 33005 & 5 \\ 33006 & 6\end{array}\right\} 24$ C8049 33008 Octal
MILLEN 807 Tube Clamp


Holds tube to chassis in portable mo-
bile rigs,
c7998-
Each $30^{\text {c }}$

## AMPHENOL Standard Tube Sockets



Type "A" is designed for general replacement work and has a steel adapter plate to fit mounting centers from $11 / 6^{2}$ to $17 / 8^{\prime \prime}$ Type "B" is for new work and requires only a single $1^{8}$. ${ }^{6}$ hole, being held in place witha retainer ring, unusually easy to mount. Both types
11 prong sockets are for Amphenol connectors. 7C sockets fit small
 and large base tubes

| No. | Bakelite "A" |  | Bakelite "B" |  |
| :---: | :---: | :---: | :---: | :---: |
| Prongs | Stock No. | Each | Stock No. | Each |
| 4 | C13057 | 7 c | C13207 | 61/20 |
| 5 | C13058 | 7 c | C13208 | 6312 c |
| 6 | C13059 | 7 c | C13209 | $61 / 2 \mathrm{c}$ |
| 75 | C13061 | 7 c | C13210 | $61 / 2 \mathrm{c}$ |
| 7. | C13060 | 7 c | C13211 | $61 / 2 \mathrm{c}$ |
| 7 C | C13056 | 9c | C13237 | 8 c |
| 8 | C13050 | 9 c | C13212 | 8 c |
| 9 | C13041 | 11 c | C13213 | 10c |
| 11 | C13042 | 15c | C13214 | 14 c |

## 

## Amphenol Miniature Tube Sockets

For the New RCA, Mytron,
Raytheon and Cetron Baby Tubes
For the new miniature tubes of all makes for use in hearing aids, pocket radios, remote controls, measuring (3णनख) devices, etc. All mounting holes ${ }^{5} 8$ " except Raytheon

For RCA Tubes Designed for 1S4, 1S5, 1T4 and 1 R5. Eic. C13173-Black Bakelite..... 10 c C13172-As above, but of molded polystyrene for UIIF work. Each.

For Hytron Tubes .21c For HY113, HY115, HY125.

For Raytheon Tubes
For CK501, CK502, CK503, C1is98-Black Bakelite. Each

## For Photo Cells

To fit RCA Pee-Wec and Cetron Ea. 10c C11599-Black Bakelite. Ea. 8c

## X'Mitg. Special Purpose Sockets

 Base Mounting weatherconditions. Emicient losses to an ab-
solute minimum. Excellent for transmitters and high frequency gear. Prones $\begin{array}{ccr}\text { No. } & \text { Prongs } & \text { Each } \\ \text { C12636 } & 4 & 53 c \\ \text { C12637 } & 5 & 53 c \\ \text { C12638 } & 6 & 59 c\end{array}$
C12643
7 L \& S

$$
\begin{aligned}
& 59 c \\
& 59 c
\end{aligned}
$$

## Crystal Sockets

Easy to mount be-
 surface. Available
in Polystyrene or ceptionally low losses. Solder lug terminals.
No. Make Insulation $\begin{array}{cc}\text { No. } & \text { Make } \\ \text { C8050 Millen } & \text { Insulation } \\ \text { C8062 }\end{array}$ C8062 Am
Mour Cost.
Amphenol-


## - NOTE-

We can supply your every radlo requirement. Write for Information on Items mot


AM-
PHENOL Steatite Low-Loss Sockets
Meets government specifications. Withstands higher temperatures, does not absorb moisture. Contacts are phosphor bronze. then silver-plated for low resistance connections with the tube prongs.
Excellent for transmitters, high power amplifiers, etc.

| Prongs | Stock No. | Each |
| :---: | :---: | :---: |
| 4 | C13194 | 24 c |
| 5 | C13195 | 24 c |
| 6 | C13196 | 24 c |
| 7 S | C13197 | 24 c |
| 7 L | C13198 | 29 c |
| 8 | C13199 | 24 c |

Poly-
st
Ultra
Socket
Molded polystyrene for U.H.F. work. 8 prongs. Caution: Solder fast ! Do not heat


Acorn Clips and Sockets O Acorn Socket - Made of genuine Made of genuine square for 954 and 955 type tubes. Rugged spring contacts assure perfect connections.
Your Cos
C13155-Speci 1851 tube. Each C13156-Sock ..............3c 922.921 soket and mount for Your Cost.....



$59{ }^{〔}$
$59{ }^{\text {¢ }}$

AMPHENOL Above Chassis Sockets
 Chassis type bakelite
socket. in socket, in
met a !
shell. above subpanel. Has 4
knockouts for leads, plus flange for mounting. Ideal for mounting on work benches, breadboard radios, etc.

| No. Prongs | No. Prongs |
| :---: | :---: |
| C13100 4 | C13103 7 |
| C13101 5 | C13104 7 L |
| C13102 6 |  |
| Any Type Above, Your Cost Each. |  |
| C1310S-7 L. \& S. C13106-8 Oct. |  |
| Either Type Above, |  |
| Your Cost Eac |  |

## $\rightarrow$ (2) Loktal Sockets Replacement

 adapter plate for $11 / 2{ }^{\circ}$ to $17 / 8^{\circ} \mathrm{mtg}$. centers or ring type without plate for 13040 hole. Bakelite. With Plate. Ea. C13045-With Ring only. Ea.10c

Excellent for use at high and ultra-high frequencies. Contacts are reinforced with cadmiumplated steel springs, recessed in a form to prevent movement. Can be mounted on a metal panel without shorting. 7 prongs. For the 829 and 832 tubes. * $C+1$

## JOHNSON No. 267 <br> \section*{Miniature}

 SocketDesigned for us. with the 9000 series and Minia ture Iseries tubes including $154,155,1 T 4$, etc. Contacts are phosphor bronze aligning. So designed as to permit a minimum amount of capacity between contacts, a center ceptionally low-loss construction. c13186.
Your Cost
$29^{\circ}$
JOHNSON Sockets


Low-ab sorption porcelain material
base. Heavy base. Heavy
phosphor bronze contacts, caded. wit h double filament springs, Heavy nickeled brass shells. -14
C14160-UX base. Ea. . C14161-50 Watt base. 7 ? Your Cost

73 4 for RCA 803, RK 28 , etc
for RCA 803, RK 28, et
Your Cost

## RADIO ESSENTIALS

## MUELLER Clips and Plastic Insulators



Spring actuated clips for lab., test and batterv uses. Type 27 and 27 C are laboratory ty pes with mesh teeth on three sides, others have teeth in front only. New Plastic insulators cover entire clip as shown. Listing below shows insulators opposite proper size clip. All packed 10 to a box; clips are marked + and - ( 5 each), insulators 5 red and 5
CLIPS

| No. | Type | Size | Each | 10 For | No. | Type | Each | 10 For |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C16029* | 45 | $11 / 2^{\circ}$ | 4 c | S0. 32 | C16031 | 47 | 8 c | 50.55 |
| C16030 | 45C | $11 /{ }^{\prime \prime}$ | 6 | . 54 | C16031 | 47 | 8 c | . 55 |
| C16032* | 48B | 2 | 4 c | . 34 | C16033 | 49 | 9 c | . 59 |
| C16034* | 24A | 3 ' | 8 c | . 68 | C16035 | 26 | 19c | 1.27 |
| C16026* | 27 | 2120 | 8 c | . 68 | C16028 | 29 | 12c | . 82 |
| C16027 $\dagger$ | 27C | $212^{\circ}$ | 13c | 1.17 | C16028 | 29 | 12c | . 82 |
| C16018 $\dagger$ | 214 | 4 | 13c | 1.17 | C16019 | 23 | 33c | 2.25 |

No. 85T Mueller Crocodile Tip Clip For connecting Bridges, Voltmeters, etc., or anything having binding posts
able heads. Fine for test prods. C16023-Your Cost Each No. 85. As above, less phone tip. C16020-Your Cost Each Plastic insulator for either
C16021-Your Cost Each

## MUELLER Wee-Pee-Wee Clip

 Nom-Ferrous R.F.Clip. Will not heat in high requency circuits. Ideal or tapping (specify color desired. No. 88-93) (specify color desired. No.FAHNESTOCK Clips


Type
Clip. Type C. Screw Mount, Single
 Steel Screws \& Washers (1) 10 rews oval head screws. The cup $10 / 32$ is de
signed to match the screw head in appea Stock No C14776
C14777-Cup washer
Your Cost for 12.
C14803-10/3
Envelope of 20
Envelop

## Threaded Rods

Ideal threaded roce for making your own long screws. Easily cut to any length. $\ln 12^{\prime \prime}$ lengths. C14913-42-32 size. I er Lkth. 12 c C14911-8-32 size. Per erth.12c
C14918-10-32 size. Per Logth.14c


Angle Brackets With Tapped Holes 1 leavy gauze steel. Stock No. Size 10 For Each
C14909 $1 / 2 \times 1 / 2-\quad 20 \mathrm{c} \quad 21 / 2 \mathrm{c}$ C14910

## BELDEN

## Terminal

## Assortment

Contains 100 most popular solder terminals. For all servicing and set building requirements. In C14790-Your Cost.

## "Form-Fit" Shields


$\qquad$ or $1+2 \mathrm{t}$ (10 For

For inductor coils of all kinds.
Will take wire from 120 to $\$ 12$ gauge. lock screw adjust ment.
Crath.

Brass Terminals Made of "1/8" brass. ${ }^{10}$ takes No. 10 screw. C1477810 For. -arrie 10 amps. 54
Mounting Lugs Of heavy plated steel. Hole in fiat end for C14955Per 10.
Your Cost Per 100

## Jacket

 Type Tube
 the tube by plied complete with ground clip to be heid by socket mounting bolt against shield.
C13258-For ST-14 tubes with or without cap such as $24 \mathrm{~A}, 01 \mathrm{~A}$ C13262-For ST-12 tubes without grid caps such as $27,56,41$. Out gri
1 H 4 K
C13264-For ST- 12 tubes with grid cap such as $6 \mathrm{C} 6,57,58$, 6A7. 6.17G. etc 10 For.....54c
c Each.
${ }^{6}$ Bantam Tube Shields
A
C13259-Plain shield, without matically. 10 For $\ldots .24 \mathrm{c} 3$ C Your Cost Each

34
C13260-Same as above, but with short cap and ground clip For tubes without top grid cal
Type A. 10 For $\quad 35 \mathrm{c}$ Your Cost Each

C13261 Type B. With grid-lead | cap and ground clip. |
| :--- |
| 10 For .45 c | Your Cost Each. $\frac{5}{t t e r y}$

Snap Fastener Battery Terminals
Same as used for Ever-
ready types 430,435,
455,467 ; Burgess type
XX-45 midget bat-


C11732-Set of 2 ( 1 male 1 f
male). 10 sets for 25 c
Your cost...............


Scotch Tape For insulating or bind hesive quality radio parys. Dexible. easy inches in roll.
C15039 Your cost...254

## Metal \& Glass Tube Cap



Smooth, seam less drawn walls assure a snug. positive fit on cal grooves provide flexible fit. vide flexible fit

automatically grounds to th
base on metal based tubes.
For GT tubes: $1.218^{\prime \prime}$ base
C13256-Open top.
C13257-ciosed top
For GT/ G tubes: $1.165^{\circ}$ base.
C13246-Open top.
C13267-Closed top
c13247-Closed top.
Each, Any Type Above
10 For
Metal Tube Grip Cap Shields For use with screen grid metal tubes. 10 For

## 4-Prong Tube Bases

 The old standby for winding short-wave coils. Can also be used as a cable connector. $1 /{ }^{1} 6^{\circ} 6^{\circ}$ outsinde diameter,
C9987
Your Cost Each 10 for ........................ 35 c

## Friction Tape

Highest quality
Ideal for servicemen. mechanics and electricians.
Packed in individual


Rub-R-Shim
Strips of shock proof live sponge rubber. One side adhesive W. xT. Each 10 For C14361 8/6 $x^{3} / a^{\prime \prime}$ 26c $\$ 2.35$ C14862 8/8 $\times \frac{3}{61} \quad 30 \mathrm{c} \quad 2.70$ NATIONAL Grid Clips Ex (b) $A$

Type A. Easily removed. Tinned grip end for soldering
No. Type Tubes Dia. Each C14565 Metal (octal) C14441 X miting*

Type B. Safety Grip of molded T20, 809 . etc.
C14597. Each
Like above, but ceramic. 244
As above, but ceramic
$22^{9}$
C8055-Type 36001


Your Cost Each
24
Screen Grid Clips Miniature Clips for wire ferrule
C14985
Per Doz. 14e 24 For Stror Glass Tubes For Standard Glass T ubes. 100 For

##  <br> High Quality Machine <br> Screws

| Length Doz. Gross |  |
| :---: | :---: |
|  |  |
|  |  |
| 1475 |  |
|  |  |
|  |  |
|  |  |
| 6-32 FFat Head Machine Screws |  |
| ${ }_{\text {c14761 }}$ |  |
|  |  |
| ${ }_{C 114764}$ |  |
|  |  |
| Ornamental Top |  |
| Antique Finished |  |
| Machine Screws ${ }^{\text {No. Size Leth, Doz. } 100 \text { Lots }}$ |  |
|  |  |
|  |  |
|  |  |
|  |  |
| Stock Wood Screws |  |
|  |  |
| ${ }_{\text {cha }}$ |  |
| ${ }_{\text {C14783 }}$ |  |
| Locking Washers |  |
| (724.) ${ }^{\text {chi4758-To pass }}$ No. |  |
|  |  |
|  |  |
|  |  | 100 For

 160 Piece
Set Builder's
Hardware Assortment ${ }^{\text {Annans }}$. 20 each 10 6.32x1- screws; 50 lockwashers C14830 Per Kit.

## Soldering Lugs



0
( $\$ 2.20$ 4. Thou-C14812-No. 1. C14813-No. 2 C14814-No. 3, solderless type. C14815-No. 4,18 long Your Cost per 100. Any Type Lug. $\qquad$ 244
Tapered Lugs Fits over all screws up to
No. 10; shank fits banana pluss. $11 / /^{\prime}$ long, $3 / /^{\prime \prime}$ wide. Cut for easy solder Per Dozen.

## Heavy Duty

 Spade LugsFor battery terminals, etc. $1^{\circ}$
long. No. 10 slot. 100 For 69 c . long. No. 10 slot. 100 For 69 c . C14912-Your Cost per 10 . $8^{4}$


## Right <br> Angle

Brackets Made of heavy metal strip: Width is ${ }^{3 / 6}$. ery sturdy. Stock No. Size Ea.. For 10 C14895 ${ }^{C 14896}$ ${ }^{C 14897}$
C14899

RADIO HARDWARE IN JARS

|  |  |  | The mos ware-in <br> Your C <br> Any Jar <br> C14675 | st conveni keep your glass jars <br> ost, <br> Jar only | ent, neatest small hardwith screw- $\begin{gathered} 354 \\ 51.65 \\ \hline \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| A |  |  | P-K | Tap Sc | ews (C) |
| $\frac{3}{B}$ |  |  |  | Quantity 50 50 45 40 35 | Size <br> No. $4 \times 1 / 2^{\circ}$ <br> No. 6x $1 /{ }^{\prime \prime}$ <br> No. 6x ${ }^{2}$ : <br> No. $7 \times 12$ |
| Round Head Machine |  |  | C14670 | 45 | No. 10x $3_{8}{ }^{\circ}$ |
|  | re |  | Hexagon Nuts (8) |  |  |
| C14650 | 100 |  |  | Quantity |  |
| C14651 | 100 | 'lo | C14661 | 110 | $4-36 \times 1 / 0$ |
| ${ }_{614652}$ | 75 | 4-36x ${ }^{\text {a }}$ / ${ }^{\text {cong }}$ | $\mathrm{Cl}^{14662}$ | 110 | -32 |
| C14653 | 90 | 6-32x 3 'long | C14663 | 90 | 6-32 |
| C14654 | 80 | $6-32 \times 1 /{ }^{1 /}$ long | C14664 |  | $8-32 \times$ 8 |
| C14655 | 70 | 6-32x ${ }^{2} /{ }^{\prime \prime}$ long | Washers (D) |  |  |
| C14656 C14657 | 75 70 | ${ }_{8-32 \times 10} 8.32 \times$ long |  |  |  |
| C14658 | 65 | 8-32x 3 \% long | ${ }_{C 14672}$ | ${ }_{150}^{150}$ No. 8 | Plain |
| C14659 |  | $10.32 \times 1 /{ }^{\prime \prime}$, long | C14673 | 100 No. 6 | Shakeproof |
| C14660 |  | 10-32x * ${ }^{\text {long }}$ | C14674 | 100 No. 8 | Shakeproof |

## anyw

Haxdware Assortment
Over 1000 pieces of hardware itenis. Contains Rivets, set screws, eyelets machine screws, luss,
etc. Packed in convenient metal box, $31 / 2 \times 3 \$ 1 \times 2$, Weighs over 2 lbs. A bargain assortment unequalled

C14833-Your Cost Only

## 794

## DeLuxe Hardware Assortment

Our most popular hardware assortment conveniently boxed. Contains over 1000 pieces of the most frequently used hardware, including assorted machine screws
woodscrews-nuts-bolts-rivets-eyclets-lugs-lock washers-fibre washers-rubber grommets, etc. Finest guality hardware. Shpg, wt. 4 lbs.
$\$ 1.34$

## Escutcheon Pins

$\Longrightarrow$ Antique finish- $\quad$ l/io nameplates
C14811-Per 100
144 Knob Set Screws These headless set screws
are case hardened. For radio are case hardened. For radio
knobs, couplinys, etc. C14786- knobs, couplinyss, etc.

 | 10 For. |
| :--- |
| 50 |



Rubber Grommet Kits
 Available in
two assortments kit "A" contains 12 assorted
grommets in 4 $3 /{ }^{2}$. Kit "B" contains 30 assorted grommets in 4 standard sizes ${ }^{3}{ }^{3}$ to



Escutcheon Screws
Round head, antique finish. $3 / 8^{\prime \prime}$
long. Fits any type escutcheon. long. Fits any type escutcheon.
C14934-No. 2 size 2.24
Per Gross...........29.
$\frac{\text { Per Gross............ } 25}{1 / 4 \text { Metal Spacers }}$
 Stock Heipht For Lots of
No. Inches Ten 100


|  | 3381 | 3.10 |
| :--- | :--- | :--- |

Assorted Fibre Washers Contains 100 phain and to fit Nos. 6 8 and 10
screws, as well ${ }^{3 / 4}$. 14832 - Shpg. wt. 8 oz
$\underset{\text { Yer Box..........324 }}{\text { Y }}$

## Self-Tapping Screw



Hex Nuts, Knurled Nuts, (a) (0) $\begin{gathered}\text { Washers, } \\ \begin{array}{c}\text { Popular } \\ \text { Sizes }\end{array}\end{gathered}$ C14804-6-32x1/ her. Sizes
Envelope of 20; Net.....s 54 Per 100. cre $14805-32 x$
Envelope of 20 . Not nuts 54 Per $100 \ldots .20 c$ Envelope of 15; Net...... 54
Per 100. C14807-832 3 , hex nuts 5 4 Envelope of 15; Net c14803-10-32x $3 /$ hex 104
nuts Envelope of 20; Net Per $100 \ldots . .15 \mathrm{c}$ C14808-6-32xi1/2nurl- 104
ed Nuts. Env. of 6; Net ed Nuts. C14809No. 6
No. C14810 No. 6 washers Elther Env, of 25 ; Net.. St $\frac{\text { Above } \text { Per } 100 . \ldots . . . . .19}{\text { Insulating Washers }}$


## Rubber Grommets

 Insulate holes in chassis, electrica appliances, etc.| Stock | Fits Hole | Inside | P | Per |
| :---: | :---: | :---: | :---: | :---: |
| No. |  | Diam |  | 0 |
| C14765 | $1 /{ }^{\circ}$ | $1 / 8$ | 9 c | 60c |
| $C 14766$ |  |  | 16c | 65 |
| C14768 |  | $5{ }^{\circ}$ | 21c | 70 c |
| C14769 | 16 |  | 22c |  |




# IBRDDNGPOSTSP PIUGSS MACKS:CIIPS 

EBY
度
$\frac{1}{4}$Binding Posts Non-Removable Tops
Specially designed for use on metal chassis. or phone tip. C13082 Junior Post Your Cost
Your
Each
$13^{4}$ C13083-Ensign Post Has 6-32 stud, ,9" long. 154
Your Cost Each..... C1308-Commander Po Has $8-32$ ctud. To lo long. 244
Your Cost Each....
EBY Twin Post Units Two posts molded into a Bakelite base.
c13062 Your cost $38^{4}$ C13063-Your Cost.
Insulated Posts
Red or black composition Specify color. 10 for 99 c C13163
Your Cost
114

and "Gnd",
10 for 51.35
C13049-Your Cost. 15
Beryllium Banana Plugs
 all government equipment. Made of Beryllium copper. Rivet shank of plug can be turned over without C13183. Overall size 1 . 10 . Your Cost Each

11 size $11 /$ as above but
Your Cost Each
214
Phone Tip and Lug
Adapters For Prods
landy for use with any banana plug, or test prod fitted with a banana plug end. Fits either tip jacks ot binding post
C12913-Phone tip end.
C12914 Epade lug end 124
10 For ....................... $\$ 1.08$
Insulated Banana Jacks and Plugs


Plug has set screw for solderless wire connection. Jack fits ${ }^{1}$ "hole and panels up to $30^{\prime \prime}$ thick. Red or black insulation on both. Splecify color desired
C12915-1'lug 10 For 100 For Each.......11c 99e $\$ 9,40$ C12916-Jack 10 For 100 For Each


Insulated plug is $1^{\circ}$ long and jack $\%$. Plain plug is s $8^{\circ}$ long; jack is In and is amole up 10 is. Insulated types avatlable in red or black. Specify color desired C12905-Plain jack EC c12906-Plain plug 3 each 12 For..... . 54 e 100 For. . 54.05 C12907-Insulated plug 7 C C1290, Insulated jack \} ea. Per Doze
Per 100. .

Standard Tip Plug Fine Quality

Per $100 \ldots . . . . . . . . . . . . .$.

## Solderless Insulated Phone Tip Plugs



## Plain Solderless Phome Tip Plugs

 All metal tipSolderless connection. $1 \%$ C12943-12 for 65 c
$6^{\circ}$ Your Cost Each As above but $11 /{ }^{\circ}$. long Your Cost Each.


Right Angle Tip Plugs
 Ninh set screw for
solderless connec- $B$ tions.
C12937-(A) Specify red or black,
Your Cost Each.
C12988 (B) Red.
$24^{c}$
Split Type Banana Plug


## Plain Banana Jacks and Plugs <br> 以 <br>  <br> Plug is 134 long. Jack is $5 / 2$ long

 and fits $/ 4$ " hole in panels up to "thickC12919-Plug. Each 0 For.....62e 100 For. C12923-Jack.
Each.

Alligator Clips
Powerful grip. $\qquad$ Ends take
hanana pluys.
$2^{\circ} \mathrm{clip}$ is $14^{3}$ wide. $23^{\prime \prime}$ clip is 5,6 wide. Steel non-rusting finish. No. Length Each 10 For
 Copper-with bronze spring. For RF work. Has set screw. 10 For c12947


Alligator

## Clips

 Plated metal sulated handies that take banana plugs. Handles in red or black; specify. Steel non-rusting finish.$\begin{array}{cccc}\text { No. } & \text { Length Each } & \text { 10 For } \\ \text { c12911 } & 21 / 40 & 12 \mathrm{c} & 51.08\end{array}$
$\begin{array}{llll}\text { C12909 } & \text { 315, } & 13 \mathrm{c} & 1.17 \\ 0\end{array}$
${ }^{\text {C12949* }}$ Copper-with bronze spring.
Alligator Phone Tip Jack

## Test Prods



High srade insulated prods, avaiable with three different types or ips. Type A is standard soldet ype B has chuck and ype Bhas chuck and Tul to hold plain phono necde. Jype $C$ has banana plug to fit standard banana jack. Red or Blackspecify color.
SOLDERLESS PROD (A)
C12881 5 51/4 29c
C12884 6\% 35c
PHONO NEEDLE TIP (B) $\begin{array}{lll}\text { C12868 } & 43 & 29 \mathrm{c} \\ \text { C12869 } & 51 /{ }^{\circ} & \text { 35c }\end{array}$ BANANA PLUG TJP (C)

| C12912 | 25, | $26 c$ |
| :--- | :--- | :--- |
| $\mathbf{C 1 2 9 1 0}$ | 35, | 35 |

## Phono Needle Plug

Constructed so that the insulated sleeve will take a hanana plug, and the prod lact with the banana plug. Tip holds phono needle (needles easily replaceable). Overall length $11 /^{\circ}$. Red or black; specify color. 10 For 90 c
C12917-Each
104

MALLORY 520 Series
Round Head Jacks
Compact type. Insulated
ops. Mount in $1 /$ hole.
C6534-Red Each
C6534-Red
$\left.\begin{array}{l}\text { C6535-Black } \\ \text { C6536-Yellow }\end{array}\right\} \downarrow$ \&
C6536-Yellow
C6537-Green 4 C6538
Your Cost.


Insulated Tip Jack
No. 420 Series-
Bakelite. Phone tips
jack. Mount in a single
C6505-R
C6506 Black 124
Per Pair. 1 red, 1 black 244
C6467-Your Cost...
Molded Bakelite Insulated Tip Jacks


Speciry color. No. 432.24
10 For


# TEST PROOS S.eAIIGNNGG TOOLS 

ICA 5-IN-1 Aligner Kit
Combines
 1. and nut wrenches, miniature blade screwdriver for all aligning and a full-size insulated handle driver. 3 piece set c15082-rour Cost ... 884 ICA Aligning Tool Set


Two tools one fits within other One is $6^{\circ}$ long, $1 /^{\prime \prime}$ diameter with fitted brass wrenches for $1 / /^{\prime \prime}$, and s/s ${ }^{\circ}$ hex nuts. Other is "trod C15083-
C15083-
$\$ 1.03$
Double Shank Trimmers
For Philoo, RCA, etc. Screwdriver shank is $7 / \mathrm{A}^{\prime \prime}$ diameter-fits into akes s , up c15105 $-6^{\circ}$ long. Each. 73 个 C15106-10 long. Each
$\ldots .88 c$ ICA Low "C" Aligner

A low capacity screwdriver for aligning superhets. $1 / 4$ " bone fibre, with 2 driver nibs. One extends $1 / 2^{\circ}$, for padd ing condensers. Ot her ability tuned circuits.

## Hex Socket Aligner

6 年
Oher end has hardened screw driver bit. Shaft diameter ${ }^{7 / 2}$ Your Cost
FIBRITE Screw Driver


## ICA Alignimg Kit

## 14 tools telescope into six units

 a flexible screwdriver, "magic" "align ment tool, alligator side wrench, 6 insulated driver-metal nib, ${ }^{5} 16^{\circ}$ and 1/4" nut wrench, " insulated square nut wrench, $1 / 4$ hex metal side wrench, $21 / 2^{\prime \prime}$ insulated driver with metal nib. $1 / 4$ hex slotted insulated wrench driver, ${ }^{3}$ "hex insulated nut C15088- \$ Kit$4 \leq-1$
Like above, but less flexible screw C15089-Your Cost.......... $\mathbf{\$ 3 . 8 2}$

## Aligning Wrench

For adjusting air trimmers on RCA and Philco 1936-' 37 and ' 38 sets ${ }^{3}$ "Fenoline, $81 / 2^{\circ}$ long.
C15144- Your Cost $^{8} . . . . . .88$

## Trimmer Screwdriver



For slotted trimmers. Has recessed blade in metal nib. Shank diameter ${ }^{2}$ " small enough to go
through a $14^{\prime \prime}$ hole. Length $4^{5} 8^{\circ}$


## ICA Aligning Tool


$6^{\prime \prime}$ narrow fibre rod, " ${ }^{2}$ dia., with C15078-For Philco sets, 384
Each.................
Neon Test-O-Lite


With this Test-O-Lite you can find blown out fuses inmmediately. Will check any voltage between
110 and 550 volts either aice or d.c. Will also check spark-plugs radio sets, appliances, etc. Distinguishes a.c. from d.c. Bakelite C12983

284


## ICA Adjustable Balancer

Bone fibre-no metal parts. Screwdriver slides inside aligning Wrench; other end has hex socket

For aligning coils, condensers, etc.
C15080- $61 / 4 \times 1 / 6 \ldots 24$

## U.R.F. Aligning Tool

Molded of pure Polystyrene-no Wpacity efrect on critical circuits.
W25075-Each........294

Handy Neon Circuit Tester


## ICA Dual AlignmentTool

One side has 13 " screwdriver blade, opposite side has socket screwdriver for adjusting iron core tuning circuits. Handle $21 / 2^{\circ}$ black bone fibre. Overall $6^{\circ}$. Your Cost

44
ICA Push-Button Tuner Aligning Tool

Special for aligning variable permeability push-button tuning units. Bone fibre handle $\$ /{ }^{\circ}$ dia., $17 / 8$ " long; shank $4 \frac{1 / 2 "}{}{ }^{\prime \prime}$ long. Socket Y/ dia., contains recessed screw-
driver nib.
C15115-Your Cost... $\leqslant \leqslant 4$
Flexible Tuning Wand

For determining correct alignment. A $6^{\prime \prime}$ flexible rod; one end brassloaded-the other, core steel. Placing either end in magnetic
field of coil will show inductive
condition
c14970-Your cost... 39
Solid Tuning Wand hody is solid insulation. ©2 6

4-1 Neutralizing Tool


Hexed entire lengt h; cut worn end and have a new wrench. Hex $\begin{array}{ll}\text { Stock No. Length } \\ \text { C15148 } & 6^{\circ} \\ \text { Your Cost } \\ 17 \mathrm{c}\end{array}$ C15148
C15149

## iICA Test Lead Kit



Needle and Solderless Tip Prods


Chucks and nuts hold plain phonograph needles (Type A). in red and black. colored kinkless "ire. Type $B$ is solderless tip
long point. Leads $50^{\circ}$ long.
NEEDLE TIP PROOS (A) No. Wire Ends
C12976.-Plone Tips C12975-Spade Lugs .. Sof C12977-Alligator
SOLDERLESS TIP PLUGS (B) $\left.\begin{array}{l}\text { C12968-Phone Tips } \\ \text { C12969-Spade Lugs }\end{array}\right\}$ C12970-Alligator
Test Lead BARGAIN!

tips
tips, the other insulated removable banana plugs. Also includes: one pair each; insulated alligator
clips; insulated spade plugs; insulated needle points (all lored l.black) Each... \$2.06
c12861 Each Heavy Duty Test Leads handles and re
movable phono needle chuck.
Alligator clip.
C12980. ..88c ICA "No Break' Prods í 17 Of solid brass, ered with shockless 1 black: sharp pointed tips. Other end
of $50^{\circ}$ kinkless ber wires have solderless insulated ch2999-Pair c23000-Same but with plainnon insulated phone tips.
Your Cost Per Pair...

10,000 Volt Test Leads $1 \cap(\mathrm{~B}) \mathrm{f}$ Safely test up Necessary for television work.
Large diameter bakelite prods. guarded midget phone tips. $2^{\prime \prime}$ tips prods $.50^{\circ}$ heavy duty cables of 18 gauge stranded tinned copper

$\$ 2.35$

Molded finger grip tips with set
screws. $65^{\circ}$ overall. $\$ 1$
C12988-Your Cost
Mueller "Snapper" Probe


A $7^{\circ}$ fibre insulated tube fitted with spring contact jaws that separate by thumb pressure on knob. Test leads connect under knob. C14916-Red Handle 138 c Each
C14917-Black Handle 72 c Pair

## HOOK.UPEMAGWIT WIRE <br> Metal Shielfed Wixe <br> Colored Rubber Wire

Shielded with a seamless copper tube. Absolutely moisture-proof and remarkably strong. No. 22 conductor. Hi-voltage insulation. In 5-foot lengths only. C16183-One wire. C16185-Three wire

## 75 c

$\$ 1.05$
No. 14 Tinned Solid Copper Push-Back Wire

Designed for heavy-duty work in power amplifiers, transmitters, etc. Cotton wrapper with heavy lacquer insulating material and final layer of impregnated cotton braid. High breakdown voltage.

25-Foot Colls
C16341-Black C16339-Red Your Cost, Per Coil.

## 100-Foot Colls

C16348-Black C16346-Red Your Cost.
s1.55

## CDundrach wIRE

Solid Tinned Copper Core Type
No stripping is necessary. Just push back the double cotton-covered moistureproofed braid. No. 20 wre. Four colors or cir2 lbs. per 100 fee


Standard Tinned Copper Core Type
Very flexible wire of multistrand tinned copper: equivalent to No. 20 cotton braid pushes back Cotton braid pushes back
easily. Available in $4 \mathrm{col}-$ easily. Available in 4 col-
ors. Weight, 2 lbs. per 100 feet.
25-Foot Colls
C16350-Red C16352-Black C16351-Green C16353-Yellow Your Cost ( 10 For $7 \mathbf{c}$ c
$\$ 1.55$ ), Per Coil......

50-Foot Colls
C16358-Red C16360-Black C16359-Green C16361-Yellow Your Cost (10 For 31
$\$ 2.75)$, Per Coil........ 100-Foot Colis
C16366-Red C16368-Black C16367-Green C16369-Yellow Your Cost (10 For $\$ 2 c$
$\$ 5.55), ~ P e r ~ C o l l . . . . . . . . ~$

1000-Foot Spools
C16374-Red C16376-Black C16375-Green C16377-Yellow C16375-Green C16377-Yellow
Your Cost, Per Spool..... $\$ 4.95$

Stranded and tinned covered with a live covered with a live
rubber compound. Very flexible; easy to strip. Solders in-
stantly. Available in stantly. Available in $\qquad$ 25-Foot Coils
C16272-Red Your Cost Each C16273-Black 19 C 5 For C16274-Green 1~ 85c

## 1000-Foot Spools

C16108-Red Your Cost Each c16109-Black
c16110-Green \$5. 5
No. 16 RUBBER COVERED C16280-Black C16281-Red


Stranded No. 14 Gauge C16121-Black C16120-Red $\begin{array}{lll}\text { Your Cost } & \begin{array}{ll}25 \mathrm{Ft} & 50 \mathrm{Ft}\end{array} \quad \begin{array}{l}100 \mathrm{Ft} \\ 85 \mathrm{c}\end{array} & \$ 1.55\end{array}$

Stranded No. 12 Gauge C16122-Black C16123-Red 25 Ft .50 Ft .100 Ft


## RESISTANCE WIRE

 ON HANDY SIZE SPOOLSHigh grade resistance wire in small quantities for use in
highly sensitive instruments where accurately determined resistance values, secured through the employment of a high grade alloy wire, are necessary

| Wire | Ohms | ENAMELED |  | bare |  | Your |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Stock | Ft. In. | Stock | Ft. In. |  |
|  | Per Ft. |  | Spool |  | Spool |  |
| $\begin{aligned} & 14 \\ & 16 \end{aligned}$ | . 04603 | ${ }_{C}^{C 16600}$ | ${ }_{31}^{20}$ | ${ }_{\text {C1 }}$ C6614 | ${ }_{38}^{24}$ | Cost |
| 18 | . 1164 | C16602 | 40 | ${ }^{C 16616}$ | 48 |  |
| 20 | . 18050 | C16603 | 57 77 | C16617 C16618 | $\begin{array}{r}81 \\ 126 \\ \hline\end{array}$ | Lach, |
| 22 | .2941 | C16604 | 77 | C16618 | 126 | Any |
| ${ }_{26}^{24}$ | . 74678 | ${ }^{C 16605}$ | 141 | ${ }_{C}^{C 16619}$ | ${ }_{277}^{190}$ | Spool |
| 28 | 1.183 | C16607 | 160 | C16621 | 399 |  |
| 30 | 1.879 | C16608 | 182 | C16622 | 560 |  |
| 32 | 2.990 | C16609 | 205 | C16623 | 765 |  |
| ${ }^{34}$ | ${ }_{4}^{4.756}$ | ${ }^{1} 16610$ | 230 | ${ }^{\text {C16 }} 1624$ | ${ }^{1092}$ |  |
| ${ }_{38}^{36}$ | 7.560 12.02 | C16611 | ${ }_{279}^{253}$ | ${ }_{C}^{C 16625}$ | ${ }_{1881}^{1482}$ |  |
| 40 | 19.11 | C16613 | 303 | C16627 | 2308 |  |

## HIGH GRADE MAGNET WIRE ON HANDY SIZE SPOOLS

## Economical sized spools of high grade magnet wire for

 those desiring less than of 1 lb . All spools are plainlymarked with the length of wire contained on the spool as well as the size. Available in double cotton, double silk and enameled insulation.
DOUBLE COTTON DOUBLE SILK ENAMELED
Gauge
14
16
18
20
22
24
26
28
30
32
34
36
38
40

| Stoek F | Ft. In. | Stwek | Ft. In |
| :---: | :---: | :---: | :---: |
| No. S | Spool | No. | Spool |
| C16500 | 21 | C16514 | 19 |
| C16501 | 33 | C16515 | 25 |
| C16502 | 42 | C16516 | 31 |
| C16503 | 60 | C16517 | 42 |
| C16504 | 81 | C16518 | 60 |
| C16505 | 110 | C16519 | 83 |
| C16506 | 148 | C16520 | 101 |
| C16507 | 168 | C16521 | 119 |
| C16508 | 192 | C16522 | 141 |
| C16509 | 216 | C16523 | 163 |
| C16510 | 242 | C16524 | 100 |
| C16511 | 266 | C16525 | 219 |
| C16512 | 294 | C16526 | 243 |
| C16513 | 325 | C16527 | 275 |

> Your Cost Each, Any Spool

## Extruded Plastic Tubing

$\xrightarrow[10,000 \mathrm{~V} \text {. di-electric strength. Will }]{\longrightarrow}$ $10,000 \mathrm{~V}$. dielectric strength. Will
not support combustion. Resisnot to petroleum solvents, acid. talkalis petroleum solvents, acid, tures. May be bent over A.S. T.M. ing at $220^{\circ}$ for 150 hours. All are 3 -foot lengths.

|  | No. 1 |
| :---: | :---: |
| 186 | Black |
|  |  | $\begin{array}{ll}\text { C16188-Black } \\ \text { C16189-Red } & \text { I } 12 \text { c ea. } 10 \text { For }\end{array}$

 $\left.\begin{array}{l}\text { C16192-Black } \\ \text { C16193-Yellow }\end{array}\right\}_{19}$ cea. $\$ 1.70$

## 8.YardSpools of Spaghetti

## Iligh grade vare nished cambric tub

 ing. 5000 V . dicelectric strength.
fibre spools. Takes a No. 12 wire C15951-Red C15952-Green C15954-Yellow C15955-Black Takes a No. 14 wire. C15751-Yellow C15753-Black Any Above Sizes Any Above Sizes
Per $8-Y$ ard Spool

## Per 8-Yard Spool

Takes a No. 18 wire- 12 yard spool only.
Per 12-Yard Spool.... 59 c

## FINHST GRADF MAGNBL WLZY



Highest quality copper wire winding power transformers and chokes, winding coils or any other radio and electrical purpose. Ideal Tor use in shops, tories, etc.
PLAIN ENAMELED

| Stock | Size | Ft. | Your | Cost |
| :---: | :---: | :---: | :---: | :---: |
| No. | BdS | Per Lb. | M Lb. | 1/2 Lb. |
| C20950 | 16 | 125 | \$0.16 | \$0.29 |
| C20951 | 18 | 202 | . 16 | . 29 |
| C20952 | 20 | 319 | . 17 | . 31 |
| C20953 | 22 | 506 | . 17 | . 31 |
| C20954 | 24 | 804 | . 18 | . 32 |
| C20955 | 26 | 1280 | . 20 | . 36 |
| C20956 | 28 | 2030 | . 22 | . 38 |
| C20957 | 30 | 3220 | . 24 | .43 |
| C20958 | 32 | 5100 | . 26 | . 47 |
| C20959 | 34 | 8080 | . 30 | . 55 |
| C20960 | 36 | 12810 | . 39 | . 71 |
| C20961 | 38 | 20300 | . 49 | . 88 |

Double Silk Covered Stock Sizo Ft. Your Cost

 | C20962 | 18 | 199 | 50.36 | 50.66 |
| :--- | :--- | :--- | :--- | :--- |
| C20963 | 20 | 314 | .10 | .78 | $\begin{array}{lllll}\text { C20963 } & 20 & 314 & .40 & .78 \\ \text { C20964 } & 22 & 494 & .46 & .90 \\ & 24 & 778 & .55 & 1.37\end{array}$ $\begin{array}{lllll}\text { C20966 } & 24 & 1220 & .58 & 1.07\end{array}$

| C20968 | 30 | 2960 | 1.10 | 2.13 |
| :--- | ---: | ---: | ---: | ---: |
| C20969 | 32 | 4570 | 1.39 | 2.70 |
| C20970 | 34 | 6980 | 1.76 | 3.33 |
| C20971 | 36 | 10500 | 2.16 | 4.11 |


| $C 20971$ | 36 | 10500 | 2.16 | 4.1 |
| :--- | :--- | :--- | :--- | :--- |

## DOUBLE COTTON

Extremely popular with amateurs and experimenters. Highest quality

| expermment |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Stock | Size | Ft. | Your Cost |  |
| No. | B\&S | Per Lb. Y Ib. | $1 / 2 \mathrm{Lb}$. |  |
| C20973 | 16 | 122 | $\$ 0.18$ | $\$ 0.33$ |
| C20974 | 18 | 192 | .20 | .36 |
| C20975 | 20 | 298 | .21 | .37 |
| C20976 | 22 | 464 | .23 | .41 |
| C20977 | 24 | 711 | .26 | .47 |
| C20978 | 26 | 1080 | .31 | .57 |
| C20979 | 28 | 1630 | .36 | .65 |
| C20980 | 30 | 2420 | .42 | .76 |
| C20981 | 32 | 3500 | .49 | .90 |
| C20982 | 34 | 4920 | .59 | 1.06 |
| C20983 | 36 | 6660 | .79 | 1.48 |

ROUND TINNED COPPER BUS BAR NO. 14-2-FOOT LENGTHS C15965 Your Cost 1 $4^{c}$ - 1.27 NOTE: Wire prices are affected by conditions of metal markets, therefore all wire prices are subject to change without notice.

## GIANT SLEEVING

No. 2 Spaghetti. I. D. $33^{\circ \prime} ; 36^{\circ}$ long. High Voltage oil varnish impregnation. Black only C15956-10 For $\$ 1.25$ Per length


Multi-Conductor Cable


A high grade, heavily insulated cable Each lead has a different colored rubber jacket for easy identification. 18 gauge, stranded tinned copper wire. Cotton braid overall.

| No. | Wire | Per Ft. | S2 Ft. |
| :---: | :---: | :---: | :---: |
| C16089 | 3 | $21 / 2 \mathrm{c}$ | \$2.25 |
| C16090 | 4 |  | 2.70 |
| C16091 | 5 |  | 3.60 |
| C16092 | 6 | $41 / 2 \mathrm{c}$ | 4.05 |
| C16093 | 7 |  | 50 |
| C16094 | 8 |  | 5.40 |
| C16095 | 9 | 61 ct | 5.85 |
| C16096 | 10 | 71.5 | 6.75 |

# Belden:RADOEFIECTRICLL WIRF <br> Shielded Primary Wires <br> BELDEs Elexible 

\section*{Hi-Volt

## Hi-Volt <br> Push-Back <br> Latest type insulation with a high puncture voltage <br>  rating (6900 volts). yet insulation slips very easily. No. 20 tinned copper, cotton wrap, $010^{\text {o }}$ rubber wall "hasnet weape" lacquered rayon braid over all. Colors: green, blue, red, yellow black Specify color. <br> C16261-25-ft. Stranded. C16259-100-ft. Solid C16262-100-ft. Stranded.... 73c <br> R-F Hook-Up Wire <br> 100 Foot Spools. Insulation resistance is 49,000 megohms Tinned copper with two specially Tinned copper with two specially treated cellulose acetate braids. Colors: green, blue, black, red and yellow. 3 pecify color. <br> C16247-No. 20 Solid. c16248-No. 20 Stranded. 78 sc C16204-No. 18 Solid..... $861 / \mathrm{s}$ C16205-No. 18 Stranded. $961 / 2 \mathrm{c}$ <br> Shielded Hook-Up Wire No. 20 hook-up wire with closely woven tinned copper shielding braid under shield. O.D. 105 Per Ft <br> Per 100-Fit <br> $\$ 1.59$

## 72 Ohm Coaxial Cable



Will meet the requirement for all frequencies in the audio to and including the television or f m ing or transmitt ing cables; also for ing or transmitting cables; alsofor photoelectric or other circuits cation. DB loss per 100 -ft.: 031
at $10 \mathrm{Mc} . ; 2.24$ at $40 \mathrm{Mc} . ; 3.78$ at at 10 Mc.; 2.24 at 40 Mc . 3.78 at
100 Mc . Capacity between con100 Mc . Capacity between con-
ductors per $\mathrm{ft}$.26.3 mmf . at
$10000 \mathrm{kc} \cdot 25.9 \mathrm{mmf}$ at 40000 kc . 10000 kc 25.9 mmf at 40000 kc .; stranded (19×28) tinned, low loss rubber compound tinned copper sheath, $460^{\circ}$ O.D C20936-Per F
Per 250 Ft
134

## Appliance Elements

 Fit $90 \%$ of the standard C13270-F. element
Each.
10 for $27{ }^{9}$ 10 for. $\$ 2.45$
aped heater
Each.
10 for.


Each.....36c 10 for element. $\$ 3.15$


Outlet Box Receptacles

boxes
Approved
g. wi. 1 lb .
by the underwriters. Shps
C13328-Single
Your Cost Each
Midget Cord Connector
Flat 2-piece type,
Underwriter's
listed
C13276-10 for $\$ 1.45$
C13276-10 for $\$ 1.45 .$. . 5

## All-Rubber <br> Lead-In Wire

Easy stripping-easy soldering. All made of 7 surands cinned copper wire with thick rubber sheath Diam. . 040 on 18; $126^{\circ}$ on Shag. Belden Wire Lpth. Your $\left.\frac{\text { No. }}{\text { C16227A }} \frac{\text { No. }}{8200^{t}} \frac{\text { Gauge }}{18} \right\rvert\, \frac{\text { Feet }}{100} \frac{\text { Cost }}{5.4515}$ | C16227A | $8200 \dagger$ | 18 | 100 | $5.451 / 2$ |
| :---: | :---: | :---: | :---: | :---: | :---: |
| C16227B | 8200 | 18 | 1000 | 3.70 |

Test Prod Lead Wire

Flexible No. 18 wire ( $65 \times 36$ ) tinned copper. Cotion wrap. ${ }^{3 / 4}$ rubber wall. Two 7 ft . lengths red and black (14-ft. total) parallel wound. C16336-Two 7-ft. lengths.
Your Cost

## Per Spool.

284
c16337-Red or Black (Snecily)
Your cost per 100 Feet. . $\$ 1.29$

For inside use. Twisted pair of ton wrap, color coded braid waxed, ton wrap, color coded braid waxed, overall hare copper shield. Two
conductors. $145^{\circ} 0 . D$. Shpg. wt. 3 lbs. per 100 ft.
c20911-Per Foot.


No. 12 gauge ( $19 \times 25$ tinned) with colored cellophane serve, $031^{\prime}$ rub ber wall, glazed cotton braid lac-
quered and an overall tinned copquered and an overall tinned cop
per shield. Wt. 6 lbs . per 100 ft . per shield. We. 6 lbs. per 100 ft .
C16223- 100 Ft for $\$ 3.83$ Your Cost per Foot. .

St No. 14 gauge. $027^{\prime \prime}$ rubbe (19x27, 100 Ft. for $\$ 3.09$ \& C16218-Your Cost per Ft. ©f No. 16 gauge. $.022^{\prime \prime}$ rubber wall. C16249-Your Cost per F

## Rayon Push-Back

No. 20 tinned copper, heavy wrap cellulose acetate, "basket-weave" abrasion-proof lacquered rayon braid. Colors: green, blue, red yellow, black. Specify color. C16066-25-ft. spool*. . . . . . . 19c C16068-25-ft. spool $\dagger$. . . . . . . 21c C16080-100-ft. spool* . . . . . . 9c C16081 - 100 -ft. spool $\dagger$. . . . . . 66 c C16067-1000-ft. spool*... . 55.26 C16069-1000-ft, spool $\dagger \ldots . . \$ 6.00$ Following in red or black only Similar to above; No. 14 gâuge
 C16082-100-ft. spool
*Solid. +Stranded.

## TRANSMISSION LINE CABLE

## 

Shielded Twisted Pair 18 stranded. rubber and paper wrap, tinned copper shield over twisted pair-weatherproof overall white braid. Ideal where interference is great.
500 Foot Spool $\$ 1.89$ C16162.
Commercial Twisted Palr $22(7 \times 30$ tinned) paper wrap. .022 ${ }^{\text {r }}$ rubber. Weatherproof overbroadcast receivers. $\$$ ? 21
16171 500-f.

Heavy Rubber Cord


Parallel All Rubber PLamp Cord

The two conductors are sheathed in a coatins of tough live rubber ridge between these conductors al lows them to be easily separated without fear of ruining the insulation. In Black, Ivory and Brown per 100 color des
C20920-18 Gauge-Your Cost


## Cotton Twisted Pair

18 Gauge, $1 / 4^{\prime \prime}$ R.C. wire with a cot ton covering offered at prices below market. Yellow and green mixture. C20902-Your Cost Per Ft ..... 2c
$\$ 1.50 \quad \$ 3.35 \quad \$ 11.75$

Impedance Matching Cable No. 18 stranded, rubber covered cotton, twisted pair, weatherproof overall White cotton braid. For all-wave jols. 72 ohm impedance matching hali-wave dipole aerials.
500 Foot Spool
$\mathbf{C 1 6 1 7 4} . . . . . .$.
$\$ 9.15$
"EO-1" Type Cable 12 solid cellophane wrap. . 035 " rubber, twisted pair, weatherproof o 2000 cotton braid. Carries up to 2000 watts.
C20887-Per Ft \& $\begin{aligned} & 100 \mathrm{Ft} . \\ & \$ 3.93\end{aligned}$

The thick belt of flexible rubber that covers the conductor is made
of smooth oil-resisting, abrasion proof high quality "Jacket."
No. Size Ft. 100 Ft
C20945 18-2-wire $31 / 2 \mathrm{c}$ \$3.15
$\begin{array}{llll}\mathrm{C} 20945 & 18-2 \text {-wire } & 31 / 2 \mathrm{c} & \$ 3.15 \\ \mathrm{C} 20946 & 16-2 \text {-wire } & 4 \mathrm{c} & 3.75\end{array}$
C20947 14-2-wire 10c 8.95
Parallel Silk Lamp Cord


Popular type for connecting radio receivers, lamps. et
ering of silk braid.

18 Gauge-1/4" Wall
C20836-Maroon C20838 C20837-Old Gold
Your Cost, Per Foot....... 24 100 Ft.... $51.85 \quad 500 \mathrm{Ft} . .$. . 58.80 C20839-Maroon ${ }^{20}$ Gauge C/C" Wall C20840-Old Gold 10
00 Ft.... $\$ 1.15 \quad 500$ Ft ... $\$ 5.15$

## Telephone Wire

For general use and inter-com No. 19 Gauge

Gauge.
C20895-100 Ft. 500 Ft .1000 Ft. Your Cost $\$ 2.25 \quad \$ 10.50 \quad \$ 19.95$ C20896-3-Conductor No. 19

Crystal Mike Cable

Suitable for tough johs because of ts high insulation resistance under moisture conditions, and resistance to bending and flexing. 8401-For microphones or low imp. trans. lines. 8411 -For lapel mikes. 8431-For phono pickups.
Stoek Type Out. Cap. Per 100 $\begin{array}{llllll}\text { No. } & \text { No. Dia. Mmid. Ft. } & \text { Ft. } \\ \text { C20844 } & 8401 & .245^{\circ} & 25 & 6 \mathrm{c} & \$ 4.77\end{array}$ C20858 8411.155 35 4c 3.24 C20848 8431.160 $\quad 55 \quad 21 / 2 \mathrm{c} 200$

## BELDEN Shielded Rubber Mike Cable



20 Gauge tinned stranded conducors cabled, cotton wrapped, shielded cotton wrap over shield, overall rubler sheath.
No. Cond. O.D. Ft. 100 Ft. $\begin{array}{llll}\text { C20876 } & 2 & .280^{\prime \prime} & 6 \mathbf{c} \\ \mathbf{C 2 0 8 4 5} & 3 & 54.68 \\ \text { C2080 } & 7 \mathrm{c} & 5.45\end{array}$ $\mathbf{C 2 0 8 7 7} 4 \quad 325^{\prime \prime} 9 c \quad 6.68$

Unshielded Cable
Like above, but No. 18 gauge, no C20910
C20910 2 . $245^{\circ}$ 3c $\$ 2.66$
$\begin{array}{lllll}\text { C20880 } & 3 & .265^{\circ} & 4 \mathrm{c} & 3.32 \\ \text { C20881 } & 4 & 260^{\circ} & 51 \mathrm{cc} & 4.26\end{array}$

## Shielded Anto-Radio Lead-In Wire



No. 20 stranded conductor ( $20 \times 30$ tinned) with special low canacity tinned) with special low canacity. rubber sheath and overall shield.
Max cap. bet ween conductor and Max. cap. between conductor and C20883-100-ft. For $\$ 3.61,1 / 2 \dagger$
As above, but with rubber sheath overall. 290\% O.D.
C20884-100-ft. For $\$ 4.79$.

We cansupply all Belden Products. Write for prices or send us your order giving Belden part number, priority and CMP allotment.

## Cube Tap <br> Bakelite. Three lets from 1 plug C13282- <br> Your Cost Each 1/24 <br> 12 for <br> 70 c



## Current Tap

Straight socket combined
 C13278
Your
10 for


## Bakelite Handled

 PlugGenuine Bakelite with handle grip. Prevents pulling out wires.
Sturdy prongs.


## Trutest VIBRATDR5



The Trutest line of replacement vibrators
has been designed to fulfill the servicing requirements for the great majority of home and auto radio receivers (using vibrators). All provide long-lived service. Shpg wt. 2 lbs

## NON-SYNCHRONOUS VIBRATORS



4 -prong. $132^{\prime \prime}$
by $31 / 8$ hirh by $31 / 8$ high. general replace-
ment unit Fits many receivers. C14635

4-prong (diagram above). 21/4x phigh. Replacement for Philico No. 38-5036, all models to 1936
4 -prong (like above). $2^{\prime \prime}$ by $3^{3}$ i6" high. Replacement for Philco No. 41-3170. For 1936-7-8 sets except Model 816
C14636
4 -prong (like above). $188^{\circ}$ by Philco No. 41-3186; fits Model 816.

4 -prong (like above). $13 / 2^{\circ}$ by 3) \% high. Replacement for Philco No. 41-3398. For 1939 sets, including Model 920, etc.
C6028



Any Non-Synchronous Vibrator Above,
Your Cost
Each.
s 1.19

## In Lats of 6, Each.

## SYNCHRONOUS VIBRATORS





Synchronous Vibrators Any Type Above, excent C6032


## CROSS INDEX OF EQUIVALENT VIBRATORS TRUTEST RADIART MALLORY

| $\begin{gathered} \text { DELCO } \\ \text { Typo } \end{gathered}$ | UTAH <br> Type | MEISS. |
| :---: | :---: | :---: |
| 5051125, 5053185 | SP5 | 715 |
| 5038055, 503966 | SP51 | 704 |
| 5052525 | SP60 | 712 |
| 5053181 | SP55 | 714 |
| 5041376, 5043853 | SP52 | 718 |
| 5052869, 5053501 | SP62 | 723,728 |
| 5050498 | SP54 | 726 |
|  | NP41 | P450 |
| 5040000, 5052378 | Ace $\mathrm{NP}_{48}$ | EU1 |
| 5042703 | NP49 | P464 |
| 5052378 | NP484 | P454 |
| 5050673 | NP480 | 435 |
| 5052374 | NP6 | 452 |
|  | NP43 | 440 |

## Thutest Auto Radio Suppressors

## भाทTM

High quality suppressors housed in black molded cases. All popular types are shown and listed. No. Type Description C5246 A Standard Spark Mug C5278 A Special for Ford Po C5247 B Compact Spark Plug Type for Ford V8 C5253 C Cable Type for Buick C5285 D Elbow Cable Type C5279 E Standard Distributor C5293 F Distributor Type for Ford 1936 and earlier C5277 F Distributor Type for C5256 * Filbow Type for 1938 Ibow Type for 1938
Plymouth
99c Ea. 10 For $\because$ with elbow connec. tor.

Wire Wound Units (G) Most efficient type. Do not mm pair motor efficiency. Low d.c. resistance, high inductance. Acts as r.f. choke. Extra rugged as r.f. choke. Extra rugge
C5297-Distributor Type
Either Type, Each.
Master Distributor Unit Hermetically
sealed imper-
vivus to moisture

Mallory "4-4" Vibrator
A competitively priced vible with standard Mallory 294 , but with 4 contacts, Non-symchronous. Size: $31 / 5 x$ 11/8". For low drain auto or battery sets. Shpg. $\begin{aligned} & \text { wt. }{ }^{\text {cos9 }} \\ & \text { Your cost }\end{aligned} \$ 1-23$

## Dome Light Filter

Eliminates the noise in dome Has condenser
 $\frac{\text { Your Cost Each....... }}{\text { Noise Filter }}$

Noise Filter Eliminates the need
for spark plug supfor spark plug sup-
pressors by cutting out all ignition inter-
ference. Installed in ference. Installed in
antenna lead of set; shielded lead supplied. Complete in2 libs.
C14202- 1.62


## Vibrator Condensers

 Oil impregnated.Rated at 1600 volts
Small square metal Tutest Small square metal
cans are $11,8 x 7 / 8 \times 1 / 4$.


| No. | Mid. | No | Mild. |
| :---: | :---: | :---: | :---: |
| C3240* | . 007 | C3241* |  |
| C3242* | . 02 | C3245 |  |
| C3244 | . 01 |  |  |
| Your Cos | cost, An | Type. |  |
| In lots o | 10 (As | ssorted) | \$2.18 |
| *lave t | o lead | -othe | one. |



Used for shielding of interference BARE circuits. Closely woven.


 | C16236 $31 / 2 \mathrm{c}$ |
| :---: |
| Shielded 7 MM. Wire | Lacquered braided wire with a

heavy rubber wall and outer covering of tinned copper shielding. Wt. ${ }^{7}$ Ibs, 100 ft .
C16211-Per Foot C16213

## 7 MM. Ignition Wire

 Standard 7 mm . black lacquered braided wire. Maisture proof. Shpg. wt. 7 lbs. per 100 ftC20851-Per Foot

## WIBRATORS FIUSES DAAL BEIIS

## LITTELFUSE and BUSS FUSES



Protect delicate instruments．Break circuit immediately on reaching blow point．Length or DC．High Speed action．Type 8AG

| Stock No． | Rat－ ing Amps | Max． <br> Load <br> Ma． | Res．on 5 Ma． Load | Your Cost Each |
| :---: | :---: | :---: | :---: | :---: |
| C12339 | $\overline{1 / 200}$ | 5 | 500 | 18 |
| C12385 | 1／100 | 10 | 110 |  |
| C12386 |  | 25 | 20 |  |
| 12387 | 16 | 60 | 5 |  |
| C12389 | 1.8 | 100 | 1.5 |  |
| C12388 |  | 100 | 3 |  |
| C12390 |  | 200 | 6.2 |  |
| C12391 |  | 300 | 3.0 |  |
| C12392 | ， | 400 | 2.5 |  |
| C12393 | 发 | 600 | 1 |  |
| C12394 |  | 1000 | 24 |  |
| C12395 | 2 | 2000 |  |  |
| LITTELFUSES For Radio Sets and Amplifiers |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
| No．Amps．No．Am |  |  |  |  |
| C12378 |  |  | 2396 |  |
| C12379 11／2 C12397 |  |  |  |  |
| $\begin{array}{lllll}C 12380 & 2^{2} & C 12398\end{array}$ |  |  |  |  |
| $C 123813$ C12399 |  |  |  |  |
| Above， 5 |  |  |  |  |
| Each．．．－Ea |  |  |  |  |
| 12 for．． |  | c 12 | for． | 97 c |



Extractor Fuse Posts Takes 1 in－
strument type
ink for panels up to thick． As above，for 3 AG fuses（ $11 \times 1 \mathrm{iN} \mathrm{\prime}$ ）．
C12326－Your Cost，Each 24 c

＂Meter Back＂
Fuse Mount Mounts directly on ill not touch other posts．Takes $1 \times 1 / 4$ instrument
C11049－Y Your Cost，Each．．．12c

## Plug Fuses

$\begin{array}{ll}\text { C13200－6A．} & \text { C13203－20A } \\ \mathrm{C} 13201-10 \mathrm{~A} . & \mathrm{C} 13204-30 \mathrm{~A} .\end{array}$ C13202－15A
Your
5
Copper Oxide Rectifiers


## Dial Drive Springs

High grade steel wire rust－ proof springs．Five sizes Kit of 10 Assorted Spring （all sizes）．c9890－Per Kit．．．24́4 only）
0 C989


## Fuse Retainer

Two piece connectorof heavy metal with fibre inside insulation．
long．Powerfulspring contact．
c12372 Each．．．．．．．．．．．．． 12 For
＂Jumbo＂Fuse Retainer $21 / 2^{\prime \prime}$ long by $3 / 2^{\prime \prime}$ diameter．Replace－ bushings，springs，etc． 17 ¢ 12 For
Bakelite Fuse Mounts


As above，but for $11 / 4 \times 1 / 2$ fuses
（type 3 AG ）．C12327－Each．．12c
Panel Type
Molded bake－
lite． $1180^{\circ} /{ }^{\circ}$
$1 / 0^{\circ}$ For
instrument
type fuses
c1283－－Your Cost
fuse clips．
c1
Same as above，but for fuses（type 3AG）
C12324－Each．

## Dial Cable＂Thrift Spool＂

 Economical and practical assort－ ment of populartypes of dial
types of dial
landy 3 －section
25 feet each of phosphor bronze cable，mediumlinen oardand special thin cord（total 45 ft ．）Shpy．wh
c lb．
C9879－Each．．．．．．．

## MALLORY Replacement Vibrators



The listing below shows a complete line of Mallory 6． 12,32 and 110 V ．vibrators．Noted for greater a handy vibrator guide，C19993 with every purchase of a Mallory vibrator．Order by our stock number wherever possible．When in doubt，give make of set model number，tube lineup and type number of
 original vibrator．


## J F D Woven Fabric Belts

Exact duplicate guality belts．
IMPORTANT！Order by Stock No．Give Belt No

| Belt | Size | For | Belt | Size | For | Belt Size | For |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | $613 / 10^{\prime \prime}$ | Zenith | 22 | $10^{1 / 56}$ | RC | $49 \quad 15$ | Zenith |
| 2 | 7 | \｛ Zenith | 23 | 107\％ | （RCA | 50 $16{ }^{5}$ | RCA |
| 3 | 73 | Enterson | 27 | 101／8 | Airline | 56 | Emerson |
| 4 | ถ̊ | Belruout | 28 | 1019 ${ }^{\circ}$ | Zecith | $5983{ }^{31}$ | Emerson |
| ${ }_{7}$ | 74 | RCA | 30 | 11716＂ | Pida | $60{ }^{613}$ | Z．nith |
| 10 |  | Belmont | 33 | 111160 | Grunow RCA | $61{ }^{7}$ | Emerson |
| 10 | $8{ }^{14} 1{ }^{\prime \prime}$ | Fada | 33 |  | RCA <br> Sparton | 62 87\％ | Emerson |
| 11 | 8\％＂ | SEmerson RCA | $\left\lvert\, \begin{aligned} & 34 \\ & 36 \end{aligned}\right.$ | $\begin{aligned} & 11^{11} 6^{60} \\ & 11^{3} \end{aligned}$ | Sparton Crosley | 63 9216 | Airlino |
| 12 | 823 㡈 | RCA | 37 | $11^{13}{ }^{\text {a }}$／ | Fada | $6.64{ }^{64}$ | Airline |
| 13 | $8^{13} / 8^{\prime \prime}$ | \｛RCA | 38 39 | ${ }^{123} 1{ }^{\circ}{ }^{\circ}$ | Zenith | ${ }^{65}$ | Airline |
|  |  | Airline | $\begin{aligned} & 39 \\ & 40 \end{aligned}$ |  | Admiral | 68 1＇8行 | Admiral |
| 14 | 85\％ | Silvertone | 41 | $\frac{12}{122^{1}}$ | Fada | $69123 \%$ | Admiral |
| 15 | 91／2＂ | RCA | 42 | $12^{13} 6^{\prime \prime}$ | RCA | $\begin{array}{ll}72 & 81 / \\ 76 & 01\end{array}$ | Emerson Tanith |
| 16 | 081 | $\left\{\begin{array}{l}\text { Zenith } \\ \text { Airline }\end{array}\right.$ | 43 | ${ }^{1236}{ }^{\circ}$ | RCA | $77131 / 6^{\prime \prime}$ | Zenith |
| 17 | 骨 | Zenith | 4 | ${ }_{13} 12{ }^{3}$ | Silvertone Zenith | 79 113110 | Zenith |
| 18 | 1021 | Emerson | 47 | $14^{14}$ | Sparton | 80.938 | Zenith |
| 19 | $10^{\circ}$ | Garod |  |  | SRCA | 84 ${ }^{87}$ | Zenith |
| 20 | $10 \%$ | Garod | 48 | 151／20 | Arvin | $87163{ }^{\circ}$ | Admiral |

## C9909－（Specify Belt No．）Your Cost Each．．．．．．．．．．．．．．．．．．．．St

##  <br> Drive A handy kit for the serv－ for the serv contains siz different <br> hard to get dial drive tension springs．Total of 25 springs in all．Offered at an un－ usually low price．Shpy． <br> Rubbers <br> Eight dif－ ferent types <br> of friction drive rub－ popular or <br>  ceivers including：Atwater Kent， RCA，Stewart Warner，etc．Kit of 24 pieces． <br> C9400－Per KIt

Per Kit


Phosphor Bronze Dial Cable Maximum strength． 16 strand typeclose－ Y y braided． 42
strand type consists of seven， 6 strand cables wound over No．Strands
C9933
C9934
C9872
C9936
C9937
C9938
C 9938
C 9881

Each
50.19
0.19
.70

## Linen Dial Cable

All types are of black woven linen exactly as used in most receivers． High tensile strength．
C9889
Special Thin Cable
$44 c$
Light Cable

| $\begin{aligned} & \mathbf{C 9 9 4 2} \\ & \text { C9943 } \\ & \mathbf{C 9 9 4 4} \end{aligned}$ | $\begin{aligned} & \text { (approx. } 11 \text { diam.) } \\ & 25 \mathrm{ft} \text {. } \\ & 100 \mathrm{ft} . \end{aligned}$ |
| :---: | :---: |
| C9939 C9941 | $\begin{gathered} \text { Heavy Cable } \\ \text { (approx. } 5 \text { fiam.) } \\ 25 \mathrm{ft} \text {. } \\ 50 \mathrm{ft} \\ \text { it. } \end{gathered}$ |

$18 c$

|  | .36 |
| :--- | :--- |
|  | .65 |

# CRADO SFRVICE NECCSSSIIIES 

Air Drying Finishes


Now you can get professional appearing finishes in either crystal, air-drying finishes. Simply apply and let it dry for durable and lasting finish. Air-dry or bake on metal wood. In 2 -oz. and 8 -oz. sizes.
Wrinkle Lacquer (Crystal)

$$
\begin{aligned}
& \text { Wrink } \\
& 2 \mathrm{oz}
\end{aligned}
$$

No. Each Color No. Each C15259 24c Black C15309 73c C15319 24c Gray C15387 73c C15320 24c Brown C15388 73c C15380 27c Red C1538973c Wrinkie (Varnish) Finish C15381 27c Black C15390 73c $C 15382$ 27c Red C15391 73c C15383 27c Gray C153si 73c Telephone (Emooth) Finish C15384 21c Black C15393 62c C15385 21c Gray C15394 62c C15386 Chrome-Like Finish C15386 21c Chrome C15395 56 c

## Color Coding Enamel



For color coding
coils, terminals $\mathrm{e}_{\mathrm{G}}^{\mathrm{t}} \mathrm{cec}^{\mathrm{c}}$ blue, red, yellow and a bottle of thinner. Two brushes are included. Have your own system of color coding. Adds greatly to appearance C15258

WALSCO Contact Cleaning Fluid Prepared to clean tuning condenser springs, volume controls, band switches, etc contacts. With brush. Ci5377-Each ...24

## "WALSCOLUB B"

## Lubricant


plete with sprayer, pint jar,spark plug air check valve, compression
tank, set of adapters and 12 -foot hose. Shpg. wt. 6 lhs. $\$ 3.95$

## Touch-Up Sprayer

## Designed to oper

are perfectly with
very low pressure from spare tire or any other air container. Air-tight brass valve ad justable brass spray tip, rubber hose and two $4-02$
jars Very handy for touchin jars, Very handy for touching up marred panels, Chpg. wt. 3 lbs



## KESTER Solder

Will not spatter. Preferred by servicemen and other large users. Flux in core. The aluminum solder is the flux-filled type and is furnished with cleaning material and instructions. ${ }^{3}$ diameter
Rosin Cor

| Per Tin | C14857 | S0.17 | C14878 | Co. |
| :--- | :--- | :--- | :--- | :--- | :--- |
| lit |  |  |  |  |

$$
\begin{array}{lllll} 
& \text { C14859 } & 3.00 & \text { C14879 } & 3.00
\end{array}
$$



KESTER Thin-Core Solder: Rosin core Din

## C14876. Solder C14E\&5 $\quad 1.96$

…

\$3.15
(F):-ir) Solder Paste, Mlux and Tinning Bar NOKORODE Paste (top): Non-corrosive paste, Fluxes all metals except aluminum without corroding or discoloring. Insures perfect soldered joint. Very C15277 Your Cost
(center): Non-corrosive. For Clean, so
Your Cost Eact
124
KESTER Tinning Block (bottom): Cleans and tins soldering irons speedily. Easy to use. In handy 3 pound ba

15

## NOKORODE Core Solder

Made of $20 \%$ tin and $80 \%$ lead. Superior paste used for flux. No. 10 gauge. Ap-
proximately $11 / 2$ ounces.
C14882-Your Cost............

"RAPID"' \&lectroplaters Small portable electroplating outfits for home or workshop. Easy to use. For replating jewelry. utensils, radio parts,
etc. Each kit contams: $\mathbf{1 0 z}$ of plating etc. Each kit contams: 1 oz. of plating
compound; $10 z$. of metal polish; 1 anode brush; battery wires with clips attached; full instructions. Require two No. 6

C15359-Nickel Plating Outfit



Any Type
Sny Type cis371-Silve C15360-Copper Plating Outfit C15370-Cadmium Plating Outfit E1 Each.... $10 \leq 1$ C15372-Nickel Compound (plate $125-175 \mathrm{sq}$. in.) C15373- Copper Compound C15374-Cadmium Compound 374 C15375-Sil
Your Cost
$\square$ in.): C15374-Cadmium New Industrial For industrial use only. Com Applicator, 4 -oz met
C15376-Your Cost
\$7.50

## GमNHRAL CHMHNT Radiomen's Needs



## Radio Cbemical Kit

A complete kit
necessities in a
neat leatherette pocket case. A
serviceman. following necessities. Service Cement, Rubber Drive Cement, Carbon-X, Grafoline, Scratch Polish. Non Slip Cleaner. An applicator is attached to the cap of each container to
C15529-Your Cosit.
.$\$ 1.32$

## Felt-Koat

 "Flock Fin- ish Kit'
Complete Flock
Finish Kit for ap
plying soft feltpike flock to

## tables, cabinets, testers, panels,

 displays, tool chests, compartments, lamp bases, wire mesh on speakers, and microphone grills, erc. Produces heavy solt velvet like coat that prevents scratching. Easy to apply, DeLuxe Kit con-taining Brown flock, special aptaining Brown flock, special applicator, undercoat, thinner and brush.
C15528-Your Cost........ . 51.18

## CARRON-X

"For Noisy Carbon Controls'
A practical method to touch up worn and noisy spots on carbon controls. Just apply Carbon-X over
the bad spots. Ideal for servicemen. Also an elec-C15531-1
C15531-1 oz. bottle
c15532-2 oz. bottle.


## LUBE-REX


contact cleaner that is ideal for attenuators, push Cleans contacts and prevents corrosion. Moisture repellent, rust preventing and clings to metal. Excellent for Philco
Mystery controls. Mystery controls.
C15533-2 $2 z$.
C15534-Pint.
$\mathbf{2 9 c}$
$\$ 1.32$

## Scratch <br> Crayons

Package of Six Shades of Crayon Fillers to match practically all shades of wood. Specual stain fillers. Merely select the filler of the proper shade and run it over the scratch or dent. Works fast. scratch or dent. Wor


## SOIDERING IRONS

## "AMERICAN BEAUTY" Irons

## $\square \square \mathrm{N}^{-1}$

100-Watt, Model 3138
America's most famous iron. Made for those who want the very best. Metal parts are heavily plated and highly polished. Length $127 / 1$ With $8 / 8{ }^{\circ}$ tip and 6 ft . cord. Stand supplied. Chpgiti-Your Cost C15170-Extra tip for above. Each -... 37 c 50-Watt, Model 576
A smaller "American Benuty" for soldering in corners and tight places. "i6 tip. With stand. Shpg. wt. 2 lbs.
C15172-Your Cost $\$ 3.31$
C15173-Extra tip for above. Each
"AMERICAN BEAUTY" Stand ThermoContro
For regulation of tempera ture of soldering irons. Thermostat is adjustable. Body of stand of molded plastic, tacle to connect and recep tacle to connect iron. For 110 volts A.C. Shpg. C15169-Stand only. Each.


## OHMITE Soldering Iron

 Control Rheostats Controls the heat of soldering irons, melting pots, and other heater loads. Their use with
irons saves time, current, and tips, and prolongs the life of the heating, element. Temperature can be increased above normal by using a 100 volt iron and the control on a 115 volt line when extra heat is required. Complete with cage, cord and series plug.

| Stock | Iron-Pot |  |  |  | Your |
| :---: | :---: | :---: | :---: | :---: | :---: |
| No. | Watts | Volts | Dia | H | Cost |
| C7344 | 40-65 | 115 |  |  | \$ 4.26 |
| 7345 | 85-100 | 115 |  |  | 4.26 |
| 7346 | 120-150 | 115 |  | 21 | 5.38 |
| 7347 | 175-220 | 115 |  |  | 5.88 |
| C7348 | 300-350 | 115 |  |  | 6.88 |
| C7349 | 430-500 | 115 | $71 / 2$ |  | 10.0 |

LENK Alcohol and Gasoline Torches


Type A-Compact, leak-proof torch for service C14868 Wt. 1 lb . Alcohol torch. $\$ 180$ Your Cost, Each $\qquad$ 1.30 Type 8-Double burner torch-provides either handle. $7 \times 43 / 5 \times 1 / 2$. Wt. 3 lls. Cleansing pin $\$ 2$ C14867-Alcohol torch. Each
Type -Gasoline torch. Has flame control shut off valve. $71 /^{\prime \prime} 11 \times 3^{\prime \prime}$ bise Diam. Polished Brass. Cap. ${ }^{3 /}$ pint. Wt. 2 lbs. $\$ 1$. 78 C14856-Same but for alcohol. Each... 51.96 LENK Torch Fuel
No sediment in fuel prevents carbon deposit on wick. Eliminates corrosion. C14890
Quart can. Each.
Shlpped by Express Onily.
Snap-On Iron Holder


Fits all makes and size Irons Snaps on
barrel of iron, raises it $2^{\prime \prime}$ from bench. Can be left on constantly
Prevents fire danage.

## DRAKE Industrial Irons <br> Underwriter's Approved 200 Watt



No. 800. Reconimended for general factory soldering, art glass and medium tin work $6-\mathrm{ft}$. cord. Ideal for auto work, lamp wiring, and home repairs. Shpg. wt. 3 lbs. C15550- $8 / 8^{\circ}$ tip. Complete with sta Your
Cost
\$6.00
100 Watt

No. 600 Suggested for switchboards, radio and other light manufacturing uses. Complete with 6 - ft . cord and "Magic Cup" stand. with 6 - ft. cord and Magic Cup
Shpe. 2 ibs. $3^{\circ}$ cip.
c15551-.... $\$ 4.50$

## DRAKE DeLuxe Irons 100 Watt

## $=\square 000$

No. 325. Recommended for general radio work. Highest quality Nichrome wire wound on amber mica. Complete with 6 ft . heater on amber mica. Nickel plated. Shpg. wt. $11 / 2$ lbs. $\$ / 3^{\prime \prime}$ tip.
C15162 Your Cost
s2. 44
200 Watt


No. 425. For all medium heavy work. Highest quality Nichrome wire wound on amber mica Ideal for auto work, lamp wiring, home re pairs, etc. $6-\mathrm{ft}$. cord and stand. Nickel plated. 5/ "tip. Wt. 2 lbs. C15552-Your Cost.
$\$ 4.85$

## DRAKE Compact Iron

Smallest indus $\qquad$ $0 \longrightarrow 0$ trial iron, fore
and delicate instrument wiring. Measures $9^{\circ}$ and weighs only 9 oz. 60 watts with $Y^{\prime \prime}$ tip. With 6-ft. cord and Magic Cup stand. Underwriter's Approved.
C14835-Your Cost
$\$ 2.65$
DRAKE Heat Control


Allows constant temperature at all times. Individual temperature con trol. Use wherever it is necessary to keep an use, such as test benches
labs. etc. Wt. 3 lhs.
\$2.65

## ESICO Solder Pots



200 Watt Model. Ruggedly constructed and
not top heavy. May be not top heavy. May be screwed to benches where there is a possi-
bility of being hit or bility of being hit or
height $41 / 2$. Wt. $33 / 4 \mathrm{lbs}$ C15554-Your Cost.
$\$ 4-4$
325 Watt Model. Same construction as above. types is a pilot light which indicates when pot is heating. Capacity $31 / 4 \mathrm{lbs}$. $31 / 3^{\circ} \times 118^{\circ}$. Overall height $\left.\begin{array}{l}\text { cis555 } \\ \text { Your cost. }\end{array}\right\}-37$

ESICO High Quality Soldering Irons


Preferred by technicians everywhere. All are constructed of the finest materials and will give long, dependable service. High grade elements are wound on finest mica insulation Underwriter's approved. Furnished with 6 -ft. cord set. For a.c. or d.c. All models are 6-ft. cord set. For a.c. or d.c. All models are
supplied WITH STAN D. Shpg. wt. 3 lbs. each. With Screw-In Tips

| Soldering Jroms |  |  |  | Extra Tip |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| ck |  | Tip |  | Stock |  |
| No. | Watt | D |  | No. | Cost |
|  | 65 |  | 51.15 | C14847 |  |
| C14854 | 100 |  | 1.73 | C14847 | 28 c |
| C15174 | 150 | $9 \%$ | 2.94 | C15175 | 35 c |

Constant Duty Models
Plug-tip irons especially designed for use in constant duty at factories, labs, etc. For 110 volts a.c. or d.c. Wt. 4 lbs

| Soldering Irons |  |  |  | Extra Tips |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Stock | Watts | Tip | Your | Stock | Your Cost |
| C15190 | 110 | $8{ }^{\circ}$ | 53.23 | C14903 | 28c |
| C15191 | 130 | 1\%" | 4.55 | C15168 | 39 c |

## ESICO Thermostatic Control

## Stand

Use of this unit makes it impossible tooverheat iron. Iron can be maintained at any desired temperature while in stand. When removed from control, full current is applied to iron For irons with up to $1^{\prime \prime}$ dlam. tips. Wt 3 lbs. C14885-Stand Only $\$ 3.82$

Compact Pencil-Type Irons

plug and removable tip. Rated at 25 watts Shpg. wt. 21 bs. C15155-110 V. a.c. or d.c. $\$ 1.35$ Each C15151- or 6 operation 120 volts. a.c.-d.c
$\$ 1.70$
TMTIPAT "Special"Irons


Sturdily constructed. Resistance wire elements wound on porcelain tubes. 60 -watt iron furnished with one $3 / 8^{\circ}$ screw-on tip; 75 -watt iron with one $8 / 3^{\circ}$ screw-on tip; 100 -watt iron with one 3 " plunger-tip. $6-\mathrm{ft}$. cord C14892-60-Watt Iron. Your Cost, with 2 tips
C14894-75-Watt Iron. C14894-75-Watt Iron.
C14893-100-Watt Iron. $\$ 99 \mathrm{c}$
$\$ 1.50$

## Soldering Iron Tips

 Replacement plunge Stock No. Iron C15166. 60-75 w. C14903 85-100 w C15168 115-150 w The items listed on this page areavail-
able on priority only. To expedite de-
livery on your orders, please include
your highest authorized rating.
We can supply any replacement ele-
ment for items listed on this page at
usual standard discounts from the
ilst price. Write for information.
i

Kraeuter Pliers


The line of tools listed below are from the Kraueter "Standard" series, and ate not to be confused with the lower priced " $K$ " series. All are drop forged from extra high grade steel, and have the famous "blue temper" finish. Stand up under severe service.

Dlagonal Cutting Pliers A-Cutting jaws meet perfectly. No. Length Your Cost C14942 $432^{\prime \prime} \quad \$ 1.13$ $C 14944 \quad 6^{6} \quad 1.43$

## Long Nose Pliers

B-For the hard to get at places. Side cutting blade will stay sharp. No. Length Your Cost C14946 51.20

Electrician's Cutters (C) Modified electrician's pliers with fitted lap joint, hardened cutters. No. Length Your Cost $\begin{array}{lll}\text { C14935 } & 8^{5 / 2} & \$ 1.20 \\ & & 1.43\end{array}$

## Genuine KLEIN Pliers



Finest alloy tool steel. Individually tempered to assure long-life cutting cages.
C15223-(A) Oblique Cutting Tliers with Wire Stripping Notch. lap joint: narrow head. $5^{\prime \prime}$ long Shag. wet. 3 li
$\$ 2.50$
C15221-(B) Long Nose Side Cut ting Pliers. Pointed slender nosesharp cutters. $6^{\circ}$ long.
C15224-(C) Long Curved Nose Pliers. Very useful in close quarters. $6^{\circ}$ long.
Elther Above type. $\$ 275$
Your Cost, Each...


A handy work apron with five various size pockets for tools. Sturdy canvas, trimmed with heavy binding. Ideal for the shop, lab etc C15518Your Cost

## Amber Handle Screwdrivers



Phillips screwdrivers used for recessed head screws. Rustproof tool steel blade. Unbreakable, shockproof handles designed to provide a good grip C15502 (A) -"Stubby" $11 / 2$ ". Extra short for clase-up work. For No. 5 to 9 screws. Your Cost, Each ................................ . 45c C15501 (B)-21/2 blade length. For No. 4 and smaller screws. Your Cost, Each
C15500 (B)-4" blade length. For No. 5 to 9 screws. Your Cost. . 53c C15503 (C)-51 blade length S/Go D. For No. 10 to 16 screws. Your Cost, Each blade length b/6. D. For No. 10 to 16 screws. Powerful, rustproof screwdrivers with tool-steel blades accurately ground to fit screw slot. Unbreakable transparent amber handles. C15507 (G)-"Stubby" $13 \%^{\circ}$ Blade. ${ }^{3}$ " handle diam. Each...... 15c C15508 (G)—Heavy duty "Stubby" 1 1/2"Blade. 1 "handle. Each... 38 c C15511 (F) -Handy pocket size with clip. 21.2 Blade. Each...... 11 c C15509 (E) - $311^{\circ}$. Blade. 3 " Diam. Your Cost, Each. C15510 (D)-31/. Blade. $1 / 1^{\circ}$ Diam. (not shown). Your C15506 (D) -5 Blade $1 / 4$. Diam. Your Cost, Each C15504 (D) - $6^{\circ}$ Blade $1_{0}$ Diam. Your Cost, Each C15505 (E) $-6^{\circ}$ Blade ${ }^{3} \mathbf{4 0}^{\circ}$ Diam. Your Cost,


Mallets are of solid unbreakable amber securely fastened to hickory handles. Hammer has amber faces fitted to metal shank amber faces fitted to metal shank
and hickory handle. In the use of and hickory handle. In the use of inists and shect metal workers. etc., these units find ready acceptance, not only as a substitute for scarcer hammers, but to perform better work in nany applications. If amber heads are marred at any time they can be repeatedly ground down smooth


Shockproof—Unbreakable Genuine transparent amber XCELITE handles-will protect against 5000 volts. Hollow shafts for long studs. Deep enough to handle two nuts at once. Overall length $6^{\circ}$ C15330-For $1 / 0^{\circ}$ hex nut C15328-For $7 / 6^{\circ}$ hex nut C15331-For 3 , hex nut C15332-For fic hex nut. C15333-For ${ }^{\text {C1/2 }}$ hex nut. Any Above TypeYour Cost, Each C15335-For 746" hex nut C15336-For $1 / 2$ hex nut Either Above, Your Cost, Each.

54 ${ }^{\text {¢ }}$
Hollow Shaft Type Invaluable for installing and removing volume controls and other panel equipment. Permits zemoval of nuts from volume controls with up to $3{ }^{2}{ }^{\circ}$ shafts.
C15344-For $15_{2}{ }^{\prime \prime}$ hex nut
C15329-For ${ }^{9} 16^{\circ}$ hex nut

# woiksiop purficionte 

Vernier Sliding Caliper 5"Rule With Depth Gauge

15Precision made of fine curate. $5^{\circ}$ rule graduated in 16 th and 32 nds. $5^{\prime \prime}$ depth gauge. Vernier caliper has lock nut. Has sharp pointed projections for accurate
dividing, scribing, etc. A highly important measuring tool. Wt 1 lb .
C15027-Your Cost, Each... 98c Slide Caliper Rule

Inside and outside diameters up to 3 inches, in $1 / 16$ and 1 62". Knurled locknut. Wt. 8 oz. 24

## Handy Steel Rule

Sranernernin and

## Depth Gauge

A handy, accurate pocket rule for quick measurement. Made of steel, with pocket clip for depth meas urements. 6 inches long, graduated in quick reading 64ths. Steel 6" Rule With B \& S Wire Gange

Front graduated in quick reading 32 nds and 64ths; also has Ameri can or B\&S wire gauge for sizes
from No. 8 to No. 20. Back has from No. 8 to No. 20. Back has B\&S wire gauge dec C15007-Each
Same as above, but without wire gauge. $3 /{ }^{3 /}$ wide

Drill and Wire Gauge
Highly accurate-of hardened and tempered steel. Clear, easy-to-read numerals. Drill, tap size and decimal equivale C14997-

95
Each.

## Multi-Use Rule

 and Gauge

Four inch quick-reading 32nd and 64th inch scale, drill point gauge, square, bevel protractor, center finder, circle divider, tap drill table Tempered
Your Cost
$95^{\text {c }}$

## DIETZGEN Slide Rules

Apprentice slide rule (Maniphase Apprentice slide rule (Maniphase wood and finished in natural grain with clear lacquer. Reverse side of rule has inch scale on one edge and millimeter rule on other. Back of rule contains special set of conequivalent chart. Supplied with Imitation
C14888-Each
pule High quality white surfac cris8.
Each.

## DeLuxe HANDEE Grinder



Will drill, grind, polish, cut, carve saw and engrave on all materials. Fits the hand, yet incorporates a powerful highspeed motor ( 25,000 RPM) which is practically troubleproof. Ball bearing construction with packed-in lubrication, enclosed motor, built-in switch. Operates on 110-120 volts $25-60$ cycles AC or DC. Supplied with $1 / 8$ spring collet chuck DeLuxe 127 Dee outht, complete with 27 ine accessories and contained in a steel carrying case. Accessories include: rubber polishing Wheel with mandrel; saw with mandrel; sliting saw; two steel cutters;

three drills; push-pin mandrel; steel wire cavity brush; bristle brush; wire scratch brush; rubber disc with mandrel; felt polishing point with mandrel; rubber polishing point with mandrel; felt polishing wheel;
drum sander and three bands; disc cleaning brush; mounted wheels drum sander and three bands; disc cleaning brush; mounted wheels
 C15263-No. 3010. Your Cost. C15624-No. 3011. Same as the above, but with 26 assorted Mounted Wheels for industrial application only. Your cost
C15354 - De Lux HANDEE, complete with 7 accessories as follows: $16^{\circ}$ Collet; 5 Wheels; 1 Rubber Polishing Wheel; 1 Wheel Dressing
Stone. Speed 25,000 r.p.m. No. 3008. Each..................... $\$ 15.72$

## HANDEE Industrial Hi-Power Grinder



This fast, powerful and sturdy grinder is built to work all day long, and yet it is so compact and convenient that it may be $10^{\prime \prime}$ overall, including chuck, with a total weight of 3 lbs . Speed is 17,000 RPM, with ample power to drive $21 /^{\prime \prime}$ diameter whecl. Precision ground bearings are grease-sealed, changeable spring collet type chuck has capacity of $16^{\prime \prime}$ and $1 / 8^{\circ}$. Sturdy cast housing is completely insulated, with cushion grip to eliminate vibration and to avoid fatigue. Comes with wooden carrying case, 3 mounted wheels, $1 \times 1{ }^{\circ}$ drum sander with two extra bands, wheel dressing stone, and chuck
wrenches. For operation on $110-120$ volts, $25-60 \mathrm{cycle} \mathrm{AC}$ or DC. Shpg. C15265- Your Cost.
\$32.72
Black \& Decker $1 / 4^{\prime \prime}$ Ball Bearing Drill A streamined, pistol-grip drill with
special ball spindle bearing, splined spindle gear mountings, ball bear ings, 12-tooth pinion gear and screened air vents. Has 3 jaw Jacobs threaded chuck and key, which will handle drills up to $1 / 6$. Capacity in up to $1 / 2^{\circ}$ thick. Universal AC-DC
 RPM, full-load speed of 900 RPM, 2-pole automatic-release trigger switch mounted as a unit with cord protector. Has three wire cable and plug. Idcal for regular $1 /$ production drilling. Operates on 110 volts C14707
Your Cost Each, $\mathbf{5 3 2 . 5 0}$ Less $2 \%$
\$31.85


BURGESS Vibro-Tool
This light weight but sturdily con-
structed tool. built by the makers of the famous Burgess batteries, uses vibration prin-
ciple, delivering 120 vertical strokes per second, to ciple, delivering 120 vertical strokes per second, to
file, chisel, hammer, or groove soft metals, for cutting wood, cardboard and textile patterns, and for marking lines on glass, drilling glass, etc. Even hard tool steel may be easily marked by using tungster.
needte. Indispensable for cleaning metal moulds and forgings. Supplied complete with package of 20 needles for glass, engraving. stencil work, and heavy lines in hard material. For operation on 117 volt 60 cycle AC only. Shpg C15620
Your Cost, Each
\$7.35

## BURGESS VIBRO-TOOL ACCESSORIES

Vibro-Tool Converter. Provides Vibro-ToolEtcher Attachment. $50 \%$ increase in power. operaes speeds and allows variety of interesting techniques and results not
possible with the Vibro-Tool alone. For 117 volt 60 cycle operation only. Wt. 3 lbs. Cl 621 Your Cost $\$$ -
Knife Attachments for cutting into thin wood, cardboard, etc. C15626-Narrow knife, cuts up to $3 / 0$ thickness. Pkg, of $5 \ldots . . .49 \mathrm{c}$
C15627-Wide knife, cuts up to ${ }^{6}$ inickness. Pkg. of 5 ........49c Pkg. of 3 blunt hammering tips for leather or thin metals
C15628-Your Cost


Contains three ${ }^{1}$ diameter dies (4-36, 6-32, 8-32) with die stock: three taps $(4-36,6-32,8-32)$ and 3 matching tap drills for these taps. Tap holder also included. All Shpsed wt. 3 lbs.
C14994-Your Cost. $\$ 1$

Taps, Wrench and Drills Only Three taps ( $4-36,6-32,8-32$ ), three in wood case. Shpg. C24995
$\$ 1.35$


Set of 9 Assorted Steel Drills


## Drill Stand

from No. 1-No. 60
c17277... $35^{4}$


C15049- $1 / 8^{\prime \prime}$ to $1 / 2$ " $53 / 6$ "
overall with "T" handle. C15050-Same but for EltherTBit Brace.

69 C15048 $8_{8}$ to $1^{\circ} .613^{\circ}$ overall.

## CAN'T-ROLL Center

 PunchTempered steel withlarge head and knurled grip. Square head will not roll. Length 41 " $10^{\prime \prime}$, diameter $.325^{\circ}$ Shpg. wt. 1 lb . C14999- Your Cost..$~$

## Expansion Bits



WALSCO Staple Driver


For neater, faster johs on all wire and cable installations. Reaches places inaccessible with hammer and ordinary staples. Attaches staples to any surface Lightweight. rustproof construction. Staples wires up to ${ }^{4}$ diam. Single stroke wires up to
with palm of hand drives staple with palm of hand drives staple home. 24 staples when loaded. C15091 Staple-Driver, with on Box of 250 staples. Your
Cost
s3.33

## WALSCO Steel Staples



Made of carbon tool steel. In strips especially made for the Walsco Staple Driver. Inside coated with special clear insulating lacquer. Brown color. C15093-Box 250. $\qquad$ C15099-Box 1000 .51 .08 C15100-Box 5000 $\$ 1.08$

## WALSCO Rubber <br> Cap

Covers plunger head and makes it easier on the hand surfaces. o drive staples into hard cris090-Each
$19{ }^{\circ}$
Combination Tacker and Stapling Machine


A quick, handy tacker that is exceptionally convenient for tacking on grille cloth, attaching light wire or spaghetti, labels, etc. In addition to its use as a tacker it can also be used as a regular off ice or home stapling machine for clipping papers, receipts, checks, etc. recision
built, of steel with fine black finish. Complete with 100 staples. 7 C15281-Box of 1000 Staples. 26c

cocerers?
Wire Stripper Tempered steel Wt. 1 lb . cutting edge.
C15044-Your Cost.
$12^{\text {a }}$
Automatic Wire Stripper
Sensational Sensational
new stripper
new stripper all types of
wire instantwire instantthe handles and the job is done. Pocket size,
fast (up to 1000 wires per hour), fast (up to 1000 wires per hour),
positive acting. Works on wire ends positive acting. Works on wire ends working, without damage to any kind of wire. stranded or solid. Shpg. wt. 2 lbs.
C15537-For sizes 12 to 20 wire. C15538-For sizes 14 to 24 wire Your Cost,
Either Type
s3.53
Also available for $8-10$ and 10-18
wire; and for aviation wires,

## GENERAL PURPOSE CIRCLE CUTTERS



Provides an easy, accurate method for cutting clean circular holes in brass, aluminum, steel, wood, Bakelite, etc. Of fine heat-treated steel. Used with ordinary hand brace or slow speed drill press. All American-made.

| Stock No. | Type No. | Cuts Hole | Shank Style | Type Work | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: |
| C14720 | JR | 8, to 216 ${ }^{\circ}$ | Round | Light | 50.78 |
| C14711 | 4 | 3.0 to $4^{6}$ | Round | Medium | 1.30 |
| C14713 | 5 | 1 to $516^{\circ}$ | Round | Heavy | 1.88 |
| C14715 | 5 | 1 to 51/3" | Square | I leavy | 1.88 |
| C14717 | $1 \dagger$ | $7 / 8$ to $4^{\circ}$ | Round | Medium | 1.88 |
| C15069 | 5 | 11/4 to $8^{\circ}$ | Square | Ex. Heavy | 3.53 |

*Not illustrated.

## †Has extra beading cutter. <br> Replacement Drills and Blades

C15068- Drill for use with C15069. Your Cost
C14716-Blade for use with all above excent Ci5069.........35c
C14716-8lade for use with all above except C15069 and C14720 Your Cost
C15070-Blade for use with C15069. Your Cost 27 c
50 c

## GREENLEE Punches

Driven by screw ac-
tion, this handy tool tion, this handy tool
quickly cuts clean accurate holes for sockets, plugs, etc., in radio
chassis. Onll necesclassis. Only necessary to drit ${ }^{8}$ hole to fit or larger hole to fit $3 / 4$
cap screw. Each size tool consists of the punch, die for supporting the metal and cap screw. Shpg, wt.
C15131- ${ }^{\prime \prime}$ Complete
C15132-
" Complete
Either Above,
${ }^{s} 1.72$
Each.

, ....
" and 26
Punches. Each
C15136-1' Complete.
C15138-11/" Complete
C15139- $13{ }^{13}$ " Complete
C15140- $1^{3 / 2}$, Complete
Any Above,
Each.
C15142-18/8" Complete.
C15143-11/2" Complete.
地 $112^{\circ}$ inclusive. Each
C15146-21/" Complete.... . $\$ 4.96$ C15147-Screw for $21 / 4^{\circ}$ Punch 40c

## ICA Metal Chassis Shearing Punch

Cuts any size odd shape hole (square, rectangular, hexagon, etc.), on any size panel or chassis. Oniy hammer is necessary. Can be used in a punch press. Wt. 5 lbs. $\$ 8: 82$

Flexible Plack Saw Blades


Extra hard. Extra flexible. Longer life. Scientifically heat treated for hardness and flexibility. For all standard frames. Shpg. wt. approx. 1 lb . per doz. All are $12^{\circ}$ wide and . $025^{\circ}$ thick.
Stock
No. Length Teeth* Each Doz. $\begin{array}{lllll} & C 27273 & 10^{\circ} & 18 & 6 c\end{array} 60 \mathrm{c}$ $C 27274$ 10" 24 6c 60 c $\begin{array}{lllll}C 17275 & 12^{\prime} & 18 & 7 c & 72 c\end{array}$ $\begin{array}{lllll}C 17276 & 12^{\circ} & 24 & 7 c & 72 c\end{array}$
*Number of teeth per inch.

ACRO Chassis Cradle


Holds any radio, amplifier, nower supply, etc. chassis in any desired position for lesting, repairing or counter demonstration. Special clamps (supplled) grip chassis work. Built of steel. $281 / 2^{\circ}$ L. $151 / 6^{\circ}$ W. $12^{\circ} \mathrm{H}$. Shpg. wt. 5 lbs.

## Your Cost.

C15072 ExtraClamps ( Pair) 52.45


Will wind honey comb, spider-web. or solenoid coils of various widths and diameters equal in appearance wactory made coils. Includes all
accessories for winding the various types. Has recorder and indicator that counts turns. Instructions in cited

## WHALE Hack Saw



A very popular and sturdy hack saw. Solid frame that will give years of service. Tenite Iandle. Adjustable for $8^{\prime \prime}$ to $12^{\prime \prime}$ blades; blade may be faced in four directions. Nickel-plated stock $.165^{\circ} \mathrm{x}$ ${\text { tions. Nickel-plated stock } 165^{\circ} \mathrm{x}}^{5}$ blade. Excellent addition to radio mechanics' and electricians' toolbox. Shpy. wt. 2 lbs. 7 Cost...
C17282-Your cost.

IYON Industrial Benches and Stands


A definite advancement in steel bench design and construction. Heavy gauge steel legs formed to a rigidity wide and 2 deep assure Floor plates 6 unusual strengh. four heavy rivets, legs attached four heavy rivets. Legs attached
to bench top through special wood to bench top through special wood
attachment blocks which reduce attachment blocks which reduce
noise. Finished in green baked ennoise. Finished in green baked en-
amel. $34^{\circ}$ high $60^{\circ}$ long and $34^{\circ}$ deep. With $12^{\prime} \times 1$
shpe. wt, 206 ths. shp wi. 206 hrs
C22412-Yourcos
t 21.31


## Lyon Arc Welding Bench



Bench tops are 10 kauge steel. Shelf dividers form four dividers form four compartments $3^{\circ}$
wide for welding wide for welding
rods. Front of shelf for welding blocks. Legs and end cross-mem-
bers are welded into a single unit for easy erection and positive rigidity. Shield $35^{\circ}$ high sets inside flange and bolts securely. Finished in green baked enamel. $37^{\circ} \mathrm{W}, \times 28^{\circ} \mathrm{D}, \times 6612^{\circ} \mathrm{H}$ Shipped knocked down. Shpg. wt.
c22411
Your Cost
\$19.40
Lyon Tool Cabinet


Convenient for locking up valuable tools, dies, precision instruments and drawings. 3 stationary shelves in addition to top and bottonitrays. 1 lolds tool stands and Toters and has more enpadlock hasp-built-in flat key lock exira. Finished in green baked enamel $211^{\circ} \mathrm{W} \times 1511^{\circ} \mathrm{D} \times 34^{\circ} \mathrm{H}$ Shipped set up. Shpy. wt. 75 lbs . C22410-
Your Cost
\$11.76

Catalog on fulf line of Lyon Industrial equipment avallable on request.


Ideal for industrial plant maintenance work, for garages, agricultural machinery repairs, machine shops, etc. Can be operated by anyone following simple Instructions supplied. Further technical data and information on priority requirements supplied on request.


## MODEL 125A

Welds materials up to $1 / 2$ thick, and as light as 20 gauge. Handles To to welding rods. Vernier Type Arc Control has 16 heat stages ranking from 10 to 125
amps. maximum, 110 amps. conamps. maxinum, 110 amps. continuous. Fully equipped with headshield, electrode holder, weld, ing, ground and power cables, "C"
clamp, welding rods and simplified clamp, welding rods and simplified welding instructions. Size: $10^{\circ} 3^{2}$ H. $x$ $1555^{\circ} \mathrm{W} .101 /{ }^{\circ} \mathrm{D} . \mathrm{Shpg}^{2}$ wt. 90 Ihas.
C25630-For $110 \mathrm{~V} .50-60$ cycles A.C. C25631 For 220 V $50-60$ cycles A.C Either Model $\$$ Above, Your Cost. $58:$ Above, your cost. . $25632110-220$ V.A.....s 566.64

* Simple \&o Operate * Positive Quick Star No Marnetic Blow

MODEL 260A Appearance similar to Model 360-A. For heavy work; farm machinery, high speed industrial welding in tank and job welding shops, sheet metal shops, iron works, mills, foundries, factories, etc. Designed for cuntinuous operation. 36 heat ranges from 20 to 260 amps . Handeady for immediate use. Fully equipped with headshield, electrode holder, welding and ground cable, C clamp, welding rods and detailed weld ing and operatinginstructions. Shpg. W1. 295 lbs. For 220 C25633-
Your $\operatorname{Cost} \ldots 1750$

## TRINDL Arc Torch

Works with any AC or DC arc welder. Anyone can produce strong, sound welds on aluminum, bronze, iron, steel, etc. Complete with 12 ft . cables, four $6^{\circ} \times 6 \mathrm{~mm}$. carbons, 2 jack plugs and 2 adjustable daptor heads for ${ }^{3}$ in to $1 /$ inch carbons. C25635-Shpg. wi. 3 lbs. Your Cost
\$6.66
TRINDL Speedweld Mild Steel Welding Rods High grade, deep penetrating, mild steel general purpose shielded are welding electrode. Light tan flux coating. For use on A.C. transformer or straight polarity D.C. Arc welders.

##  <br> WORNER Plant Protection Unit Anti-Sabotage and $\sqrt{2 x-1}$ Two Models Covering 250 or 500 Feet. Weatherproofed

Guards against sabotage and espionage, indoors or out, for civilian or military use at waterworks, light plants, oil refiners, oil or gas storage plants, airports, railroads, etc. Provides visible or audible alarm or both in case of trespassing. Equipment comprises robeam in interrupted alarm is operated either at plant or at local law enforcement office. Any maintenance or electrical employee can install and maintain system, following instructions supplied. Light source and robot in identical weatherproof steel cases, $7 \times 53 / 4 \times 10$ ", provided with floor flanges for $11 / /^{\prime \prime}$ pipe for mounting at desired height. For use on 115 volts, 60 cycles A.C. Complete with
C15650-Model $2250-250 \mathrm{ft}$. range. Your Cost
C15651-Model 2500-500 ft. range

## WORNER Burglar Alarm System

Similar in appearance to the Industrini Units listed at the right. Light source projects beam of invisible infra-red light into condensing lens of receiver. Interruption of beam or disconnection of power to the unit of receiver. Interruption of beam or disconnection of power to the unit
operates a relay which may be connected to any audible or visible alarm operates a relay which may be connected to any audible or visible alarm
device. Alarm is continuous and can only be silenced by the possessor device. Alarm is continuous and can only be silenced by the possessor
of key to pick-proof switch lock on the receiver. Mirrors may be used of key to pick-proof switch lock on the recesver. Mirrors may be used
to project the light beam around a room to protect several entrances timultanenusly. Can be onerated with light beam lengths of up to 100 simultanernus yolis 60 cycle AC only. Shps. wt. 10 Ibs . $\$ 50.27$
C15659-Model 501 System. Your Cost.........
\$124.95
S194.77
$\star$ Flexible Smooth Arc $\star$ No Wearing Parts - Portable and Compact

## MODEL 360A

For high speed, heavy duty, maintenance, construction and production on structural steel frames, castings, etc. Will burn $36^{\circ}$ rod. 36 heat ranges, 20 to 360 amps . Heavy steel red crackle cabinet on casters. "Lift top"; sloping control panel. With headshield, electrode holder, weldink and ground cables, "C" clamp, welding rods and detailed welding and operating instructions. 360 amps. continuous duty For 220 volt a.c. operation $40^{\circ}$ H.x25* W. $x$ $19^{\circ} \mathrm{D}$. Shpg. wt. 345 lbs.
C25634__
Your Cost $\ldots 2 \div 0.10$


TRINDL Electrode Holders Unique design held in several bronze jaws make this holder extrenuely durable. Shpg. wt. 2 lbs . C25640-150 Amps. Each.
C25641-300 Amps. Each

## Welding Cable

Stranded copper wire-covered with cotton wrap-reinforced with cable laid twine. Com-
pounded rubber jacket. No. Cap. Amps. Size


## Welding Gauntlet

Preferred by welders liecause of their low cost, lisht weight, softness and flexibility. Highest quality specially tanned horsehide suede with four inch gaunt-
let. Thumb and forcfingers are reinforced to give
bility and added life. C25642-Per Palr
\$2.20

Audel's Welders Guide 422 pages of fundamental welding operations, as well as specialized techniques of hand and machine welding. Handy reference index welding immediate solution to all C20296-Postpaid
Your Cost............. $\begin{array}{llll}\text { C25645 } & 200 & \text { No. } 2 & 34 \text { e } \\ \text { C25646 } & 300 & \text { No. } 1 & 44 \text { e }\end{array}$

## Steel Cabinets for Rack Panels



Heavy duty cabinets built of 1 保" steel and finished in black ripple Standard and Deluxe models. Standard models have square re-enforced corners; spot welded joints. DeLuxe models have neatly rounded corners. Both types are universally drilled to take all standard $19^{\circ}$ rack panels. All have louvres and latch covers. All take chassis $13^{\prime \prime}$ deep.
De Luxe available with slate gray finish on special order. STANDARD STEEL CABINETS

| Stock | Cabinet | Panel | Door | Shpg. | Your |
| :---: | :---: | :---: | :---: | :---: | :---: |
| No. | imensions | Space | Location | W | Cost |
| C22194 | 83/4×19x131/2 | 8 \% $\times 19^{\prime \prime}$ | Top Only | 20 lbs. | \$ 5.08 |
| C22070 |  | 12\% 1 x $19^{\prime}$ | Top Only | 27 lbs. | 6.32 |
| C22193 | $1715 \times 19 \times 1312^{\prime \prime}$ | $171 / 2 \times 19^{*}$ | Top \& Rear | 34 lbs. | 9.41 |
| C22192 | 261'x $19 \times 13$ /1/ | $261 / 4 \times 19^{\prime \prime}$ | Rear Only | 47 lbs . | 10.29 |
| C28190 | $35 \times 19 \times 131 / 3^{\prime \prime}$ | $35 \times 19$ " | Rear Only | 55 lbs . | 12.05 |
| ICA DE LUXE STEEL CABINETS |  |  |  |  |  |
| C22188 | 101/2x $21 \times 131 /{ }^{\prime \prime}$ | $83 / 1019^{\prime \prime}$ | Top Only | 22 lbs . | 9.70 |
| C22071 | $14 \times 21 \times 13{ }^{\prime \prime}$ | $1214 \times 19^{\prime \prime}$ | Top Only | 29 lbs. | 11.76 |
| C22191 | 191/4x21x1315. | $171 / 2 \times 19^{\prime \prime}$ | Top \& Rear | 34 lbs. | 16.32 |
| C22198 | $28 \times 21 \times 131^{\circ}$ | $261 / 7{ }^{19}$ | Rear Only | 69 libs. | 18.23 |
| C22199 | $36^{3} \times 1 \times 1 \times 13^{1 / 2}$ | $35 \times 19$ " | Rear Only | 73 lbs. | 20.29 |


I.C.A. Hinged Steel Cabinets Employ full piano-hinged doors, and removable front panels. Modern grille type ventilation provided at the sides and back Front side corners are rounded. Finished in black ripple enamel. All Less Bases. Wts.: 5, 6, 7, 15 lbs.

| Stock | Dimen. | Panel | Your |
| :---: | :---: | :---: | :---: |
| No. | II.., D. | Size | Cost |
| C22200 | $8 \times 10 \times 8^{\prime \prime}$ | $8 \times 8^{\circ}$ | $\$ 2.65$ |
| C22201 | $8 \times 12 \times 8^{\prime \prime}$ | $8 \times 10^{\prime \prime}$ | 3.09 |
| C22202 | $8 \times 14 \times 8^{\prime \prime}$ | $8 \times 12^{\circ}$ | 3.88 |
| C22203 | $12 \times 20 \times 12^{\prime \prime}$ | $12 \times 18^{\circ}$ | 7.06 |


I.C.A. Sloping Front Cabinets Trimmed with red-striped moulding. with slate gray ripple finish. Front for ventilation, leads, etc. Less chassis. 8 tock H. W. D. For Shpg. Your

 $\begin{array}{ccccc}\text { C22094 } & 8 \times 14 \times 8^{\circ} & 7 \times 13 x^{20} & 8 \text { lbs. } & 5.14 \\ \text { C22096 } & 12 \times 18 \times 8^{\circ} & 10 \times 17 \times 3^{*} & 14 \text { lbs. } & 7.50\end{array}$


## Table

 Racks1/2 steel with black ripple finholes on $1 \% \%^{\circ}$ centers, tapped for $10-32$ screws. Both $20^{\circ}$ wide
and $12^{\circ}$ deep.
c22102-25" high. Panel
space $21 \times 19$
Shpg. wt. 33 lbs.
$\$ 3.7$ c22103-32" high. Panel space 28x 19*. Shps. wt. 36 lles. $\$ 5$.

Heavy Duty Type 1/16" Steel Chassis With Bottom Cover Plates


One piece $1 / 10^{\circ}$ steel. All corners re-enforced. Ends drilled to fit standard migg, bracket. All black wrinkle finish.

I.C.A. $1 / 16^{\prime \prime}$ Steel Panels

1.C.A. Standard Type Steel Chassis Bases


Stamped from one piece of No. 20 gauge cold rolled steel. Have four solid sides with welded corners. Bottom edges flanged in on four sides for additional reinforcements, and are drilled for bottom plates. Black are drilled for
ripple finish.

| Stock | Size | Wt. Your |  |
| :--- | :--- | :--- | ---: |
| No. | D. L. H. | Lbs. | Cost |

1.C.A. Black Ripple Finish Steel Bottom Plates
Bottom plates have holes to match the steel chassis listed above. and have pressed "bumpers" at the corners.

| Stock No. | $\begin{gathered} \text { Size } \\ \text { D. } \times \mathbf{L} . \end{gathered}$ | Wt. Lbs. | Your Cost |
| :---: | :---: | :---: | :---: |
| C22228 | $5 \times 91 /{ }^{\prime \prime}$ | 1 | \$0.38 |
| C22233 | 51/2010 | 1 | . 41 |
| C22241 | 7x 7" | 1 | . 4 |
| C22242 | $7 \mathrm{x} 9{ }^{\prime}$ | 1 | . 4 |
| C22249 | $7 \times 11$ " | 1 | . 53 |
| C22256 | $7 \times 13$ " |  | 56 |
| C22258 | $7 \times 15^{\circ}$ | 2 | . 62 |
| C22260 | $7 \times 17^{\prime \prime}$ | 2 | . 65 |
| C22265 | 10x12' | 2 | . 68 |
| C22266 | $10 \times 17^{\circ}$ | 2 | . 8 |

I.C.A. Heavy Steel Rack Panels, Black or Gray
 19" racks. Available with either black ripple finish or with commercial slate gray ripple. These panels don't collect dust-and they don't show finger marks. Available in 12 standard sizes to meet any requirements.

Black Gray Ht. Wt Black Gray c22169 c22118 C22169 C22118 13/2 C22170 C22119 3 3 C22171 C22120 C22160 C22121 C 22161 C 22122

## Steel Channel Racks



Built of $1 / 8^{\circ}$ stee with spot-weld ished in ripple black. Designed for use with
standard 19 long panels and are universally standard panels. Base is $16^{\circ}$ deep, 20 wide. Holes are tapped for 10-32 screws. Base is braced dom from wobble and to keep units in alignheightsshown belowareover alldimen sions.
C22150-731/" high. Wt. 85 lbs. Your Cose C22151-3 Panel space
Your Cost

Enclosed Steel Racks Deluxe type, Streamlined. drilled for all standard panels. Stainess stced at top and bottom. Finished in slate gray. (Black ripple apecifyale. der der Pane!
width 19 . Models are 16 wide. Hinged back Shipped
$k$ nocked down,with all hardware.
 on rear door

| Stock No. | $\begin{aligned} & \text { IIt. } \\ & \text { In. } \end{aligned}$ | Panel Space | Wt. Lbs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: |
| C22145 | 42" | $36^{3}$ | 100 | \$25.28 |
| C22146 | 66 ${ }^{1 / 2}$ | $6114^{\circ}$ | 150 | 32.92 |
| C22148 | $82 \frac{1}{4}=$ | $77^{\prime \prime}$ | 175 | 39.68 |

# RACKS.PANEIS CABINETS 

## Ripple sinish Steel Cabinets Sheet steel with spot welded reinforced comers. Covers removable, held by self-tapping screws Stock No. Dimensions Shpg. Wt. Your Cost



ICA General Utility Steel Cabinets Can be used for a multitude of radio and other purposes. Alt are substantially made of sheet stee, with spot welded re-inforced
corners. The tops and bottoms are removable; held in place by means of self-lapping screws that are furnished. Black ripple.
No. Size Shpe. Wit. Each


* Sheer Sieel * Spor Helded
* Renovable

Topps. Boltorns C22210 C 22174

ICA Sloping Front Steel Chassis


Heavy duty steel chassis finished in black ripple enamel. Sloping front for mounting instruments, etc.
Gives effect of in open cabinet Gives effect of in open cabinet
receiver or amplifier unit when used without top covers. All sizes are $332^{\prime \prime}$ high and have $4^{\circ}$ slope front. 3 popular sizes.
Stock Top of Bottom Wt. Your
 C22100 $10 \times 14^{\circ} 13 \times 14^{\circ}$, I $_{2.15}$ C22101 $10 \times 17^{\circ}$


Ripple Enamel and trimmed with red striped Chrome hand. For $3^{\circ}$


## ICA Chrome Handles

A beautiful adornment for any cabinet, amplifier With mtg. screws. $51 / 2^{\circ}$ Mtg. centers 41853 Your Cost


## Blank Metal Chassis Bases

Here's your chance to buy all purpose radio chassis. undrilled, at unusually drilled, at unusualy re-inforced spot welded corners for extra strength

[^3] Wt.


Three types avail able: Ternplate is stee. Elect ing; Electralloy i a non-magnetic zinc alloy; also in black wrinkle finish Termplate. Black
Ternplate Electralloy Wrinkle
$31 b_{s}$.

C22299 50 ach

 48 c 223

| . 48 | C22320 | S0.75 | C22306 | 50.57 |
| :---: | :---: | :---: | :---: | :---: |
| . 57 | C22321 | . 99 | C22307 | . 65 |
| . 52 | C22322 | . 87 | C22250 | . 61 |
| . 57 | C22331 | 96 | C22251 | . 67 |
| . 60 | C22332 | 1.05 | C22308 | . 72 |
| 65 | C22323 | 1.26 | C22309 | . 75 |
| . 67 | C22333 | 1.20 | C22252 | . 80 |
| 76 | C22324 | 1.75 | C22313 | . 91 |
| . 75 | C22334 | 1.79 | C22253 | . 99 |
| . 77 | C22337 | 1.89 | C22318 | 1.08 |
| . 90 | C22335 | 1.95 | C22254 | 1.12 |
| 98 | C22336 | 2.25 | C22255 | 1.24 |
| 99 | C22338 | 2.35 | C22319 | 1.65 |



## ICA Sloping Pamel Steel Cabinets

Streamlined cabinets with rounded corners. Compact speaker cabinets, oscilla tor cases, monitors, tele talk systems, small receiv gray ripple finish
 $41 / 4 \times 41 / 2 \times 41 /{ }^{\prime \prime}$. Shng Shng. wt. 2 2 lb
5 lb

## MASONITE and BAKELITE

 Radio PanelsMasonite: $\qquad$ magnetic, sturdy, yet easily worked with thick, finished in Black Ripple
Bakellte: Fine grade lakelite, black finish panels, ${ }^{3}$. thick. Also suitable for lest instruments, meters, etc

| MASONITE PANELS |  |  | BAKELITE PANELS |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Size | Stock No. | Each | Wits. | Stock No. | Each |
| $7 \times 10$ | C22280 | 50.59 | 3 lb . | C19600 | \$1.32 |
| $7 \times 12^{\prime \prime}$ | C22281 | . 65 | 1 lb . | C19601 | 1.62 |
| $7 \times 14$ * | C22282 | . 73 | 1 lb . | C19602 | 1.91 |
| $7 \times 18^{\prime \prime}$ | C22283 | . 88 | 1 lb . | C19603 | 2.41 |
| $7 \times 21$ | C22279 | . 97 | $11 / 2 \mathrm{lbs}$. | C19604 | 2.73 |
| $7 \times 24^{\circ}$ |  |  | $11 / 2$ lhs. | C19605 | 3.23 |
| $7 \times 30^{\circ}$ |  |  | 2 lbs . | C19608 | 3.97 |

MASONITE Relay Rack Parels
above, but with amateur standard notching

| $\begin{aligned} & \text { Stock No. } \\ & \text { C22267 } \\ & \text { C22268 } \\ & \text { C22269 } \end{aligned}$ |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | $13<19^{\prime}$ | S0.47 | Stock No. | Size | Each |
|  | $3.2 \times 19^{\circ}$ | . 59 | C22284 | $8{ }^{8} \times 19^{\circ}$ | \$1.03 |
|  | $51 / 6 \times 19^{\prime \prime}$ | . 73 | C22285 | $101 / 2 \times 19^{\circ}$ | 1.18 |
| C22277 | $7^{*} \times 19^{\prime}$ | . 85 | C22286 | 121/4×19 | 1.18 |

MILLEN Quartz "Q' Sheet
For panels, condenser mtg., insulation, etc. Drills and cuts rapidly. Quartz " $Q$ " is a highly polymerized styrene having remarkable low R.F. loss and high resist ance to voltage breakdown. Size: $3 \times 8 \frac{1 / 3^{\prime \prime} ; 1 / 10^{\prime}}{}$ thick. C8024-Milien No. 55001. Your Cost Each

GREENLEE Punches
Driven by screw ac
tion, this handy tool quickly cuts clean accurate holes for sockets, plugs, etc., in radio sary to drili seces-
 larger hole to fit 3 , cap screw. Each size tool consists of the punch, die for supporting the metal and cap screw. Shpg. wt.
C15131-3/" Complete C15132 \% " Complete
$\$ 1.72$ C15135-Screw for 84 " and $7 \mathrm{f}^{\circ}$ Punches. Each 20c C15136-10 Complete....... ${ }^{\circ}$. 88 C15138- $1 / 8^{8}$ Complete C15139-15\% Complete C15140- $1^{3}{ }^{3}{ }^{\prime \prime}$ " Complete Any Above,
Any A
$\$$
$\$ 2.00$
C15142-18/8" Complete ..... $\$ 2.28$ C15143-11/2" Complete. . ... 2.56 C15118--Screw for $1^{\prime \prime}$ to $1 \frac{1 / 2 " ~ i n-~}{\text { - }}$ C15146-21/4 Complete. . . . . . 54.96 C15147-Screw for $21 /{ }^{10}$ Punch. 40c


ICA Standard Amplifier Foundation Chassis
Streamlined amplifier chassis and covers, with new decorative tilators. Chassis stamped from one piece cold rolled steel, fin ripple. Covers are $6^{\circ}$ deep and slate gray, presenting a contrasting two-tone effect. Chassis are drilled for bottom plates(not supplied) see listing on page 74. Chissis height 3


ICA DeLuxe Amplifier Chassis Chassis is of one-piece cold rolled steel. With rein-
forced corners. Finished in rippled
black; cover in slate gray with polished striped chro mium mold ing and red


## ICA Sloping Chassis Units



GEITING ACQUAINTED S WITH RADIO Geltime Aequarmat
sowds RIDIO
Moncis By Alfred Mor gan. Gives the average person interested in radio the basic science, then progresses to the more technical details gradually. Also includes information on obtaining iten, and construction of simple transmitters and receivers. Written in clear and simple style, with many explanatory drawings. 285 pages, $5 \times 8^{\circ}$ C20255-Postpaid in U. S. A Your
\$2.45

## RADIO FOR BOYS

Frest
RADO 800 K
FOR 80 Y
Aroro monew
By Alfred Morgan. Complete on radio theory written in simplest terms. Information on learning the International Morse
(Radio) Code and detailed instructions for constructing crystal sets, one and two tube receivers, phonograph oscillators, with complete illustrations. $5 \times 8.192$ pages.
C20256 -Postpald in U. S. A.
Your

S-W BEGINNER'S BOOK


## Presents all in-

 formationneeded to get the most out of ception. Covers construction. construction, winding of coils and kinks254

Books For the Young Radio Experimenter

$\qquad$ A series written especially for the beginner in radio and elecricity. Specialists teli how and why in simple C19955-No. 1. How o Build 4 Doerle Short-Wave Sets
C19970-No. 2. How to Make the Most Popular All-Wave 1 and 2 Tube Receivers
C19972-No. 3. Alternating Cur rent for Beginners.
C19998-No. 4. All $\Lambda$ bout Aerials. C20008- No. 5. Beginner's Radio Dictionary C20009-No C20010-N.
Radio Diagrams C20011-No. 8. Radio For Begin C20003-No. 9. Simple Electrical Experiments
C20004-No. 10. Televisio
Any Title Above,
Your Cost Each
10 For
104
40c

## Manly ${ }^{\text {s }}$ Radio and <br> Electronic Dictionary

Defines 3800 terms in alphabetical order. 300 pages $6 \times 9^{\prime \prime} .550$ illus trations. Maroon binding. W. C19939-Each.


## "RADIO" Handbook, 1943 Edition

Revisions in this new Ninth Edition adapt it for war training and general use to a greater extent war training and general use to a greater extent than ever before. Contains added and simplified theory in the clearest possible language, test equip-
ment, home or field-constructed, and a review of ment, home or field-constructed, and a review of
mathematics for solving radio problems. More than GOO pages, durably clothbound, gold-stamped Radio's outstanding practical text for war trainin and regular purposes. C20000-Shpd. Postpaid In U. S. A
$\$ 200$

## A.R.R.L. RADIO BOOKS



## A.R.R.L. Radio Amateur's Handbook-Latest Edition

## New 20th edition of this famous handbook. Con

 tains as always complete fundamental data, constructional information on transmitters and re ceivers of latest design, and a great deal of new material designed to make it even $m$C19949-Your Cost
Shipped Postpald in U. S. A
$\$ 1.00$
Defense Edition. Complete text covering fundamentals, learn ing the code, and ultra-high frequency communications. Excel lent for defense training courses. All amateur radio procedure has been omitted. Of special interest to those conducting code classes or classes in connection with National Defense. 292 pages, numerous diagrams, formulas, graphs. C20264 Your Cost
Shipped Postpaid in U. S.
$\$ 1.00$

## Course in Radio Fundamentals


new ARRI book prepared in response to the demand for a course of study emphasizing the fundamentals on which practical communication is built. For best results should be used in con junction with the ARRL Amateur's Handbook either Defense or Regular Edition. Material is divided into 36 assignments with a series of questions designed to bring out significant points in the text.
C20211-Postpald in U. S. A.
Your Cost
504

## Learning the Radio Code

Designed to train students to handle code skillfully employing accepted method of "sound" conception. Helpful home study material for members of code classes. Adequate practice ma
terial included for classwork. C20006-Your Cost Postpaid.

25

## A.R.R.L. Lightning Calculators

C20012-Solves problems of frequency, inductance, capacity coils, condensers, and others
C20013-For problems involving current, voltage, resistance and
Either Above Types,
Your Cost-Each Postpaid
\$1.00

## A.R.R.L.Antema Book A comprehensive manual of antenna design and construction. Contains 18 full chapters profusely illustrated. Includes theory and practical data on all types. Over 100 page Postpaid. <br> $50^{\text {¢ }}$

A.R.R.L. Log Book

The law requires that amateurs maintain a log. This one is spiral bound, has 31 log pages, 31 note pages. " $Q$ " signals, graph paper, message number sheet. C19946-Your Cosi Each
$\qquad$
The Radio Amateur's

## License Manual

 How to get your licenses, made easy. Includes complete questions and answers for the new Class $\Lambda, B$ and $C$ examinations. Latest edition 29 pages Postpaid.C19940-Your Cost. 254

## Hints and Kinks

Volume Two. 128 pages of selected practical money-saving ideas. Numerous diagrams and illustrations. Postpaid. C19981-Your Cost

504
How to Become a Radio
Amateur
 Explains ele mentary theory, construction
of inexpensive of inexpensive stations, "code" laws, operating procedures, etc. A.R.R.L. publication. Latest revised edition. Postpald. C19935-
Your Cost

# PADIO FUNDAMFNTALS 

## ELEMENTS OF RADIO



By A. Marcus and Wm. Marcus under the editorship of Ralph E. Horton. An excellent volume for home study in preparation for positions such as radio technician and mechanic, radio operator, Signal communication Instructor, ground repair instructor, and other equally interesting and responsible posts in industry and armed forces. A complete basic course in the fundamentals of radio, requiring no previous knowledge of mathematics or physics it was written to the exact prescription of the U.S. Government officials responsible for training thousands of new radio technicians. Written in terms that the average reader can understand, with scores of easy-to-follow illustrations to help the reader grasp quickly the various phases of the subject.

Part One. Covers only the basic principles, such as wave motion, electron theory, detector operation, regeneration, audio amplification power supplies, speakers, superheterodyne operation and direction finders. No mathematics of any kind. Hundreds of illustrations. 337 pages, $6 \times 9$ ".
C20257-Elements of Radio. Part One
Postpald in U. S. A. Your Cost
$\$ 2.40$
Part Two. Application of radio theory and mathematics to circuits. Covers DC and AC current, Magnetism, Inductance Capacity, Resonance, Antennas, Vacuum tubes, Modulation, Cathode ray tubes, etc. 330 pages, illustrated. 6x9
C20258-Elements of Radio. Part Two.
Postpaid in U. S. A. Your Cost
\$2.40
Combination Offer. Elements of Radio, Parts 1 and 2 bound in one volume. 699 pages. $6 \times 9$
C2025 - Complete Edition.
Postpaid in U. S. A. Your Cost.....


## V1SION ${ }^{\prime}$

by U.K.Zworykin and G. A. on radio's new est developments, written in direct clear cut English by two of the most the field. 646 pages. 494 illustrations. Postpaid. C19789-
Your Cost

## \$5.88

Communication Engineering By Everitt. Deals with problems confronting telephone and radio enyineers. Explains unilateral and bilateral net works in connection with telephone and radio circuits. 727 pages. $6 \times 9^{\circ}$ 411 illustrations. $C 19720$
Your Cost
$\$ 4.90$

## Transmitter Guide

 Latest Edition. By Thordar son. Fundamental circuit, grid bias systems, modulation, etc.11
Xmitters 11 Xmitters from a x'tal controlled portable to a 1000 -wat ter. 44 pages.
C20024-Your Cost
Principles of Electron Tubes


By H. J. Reich Covers the application of vacuum and gaseous tubes to in-
dustrial and elecdustrial and electronic fields. Fun-
damental principles as well as practical representative circuits are discussed in clear concise language. 398 pages. $6 \times 9$ C20252
Your Cost
\$3.43
Photocells and Their Application
By Zworykin and Wilson. 2nd edition. 348 pages coverind theory and practice including television, talkies facsimile, etc C19886-
Your Cost.
$\$ 2.94$

## GHIRARDI'S Radio

 Physics Course(Latest Revised Edition)


This famous text has long been the radio "bible" tor teaching fundamentals of radio and televisior: to beginners and students. 972 pages vith over 500 ilustrations covering every phase of radio, public address, talking pictures, television, phrotocells. elements of a.c. and d.c. electricity. Used in schools everywhere for both military and civilian Shipped postpald in U.s. A. C19897
C19897
Your Cost
\$5.00

## FUNDAMENTALS OF RAD10

By F. E. Terman. An excellent text. Standard in many schools and training courses. Covers fundamentals of important branches of radio. 458.jages.
C19896-Your
\$3.67

Radio Amateur Course


A thoroughly au-
thoritative, clear-
ly written groundwork in ground radio for begin ners. Includesconsiructional articles on transmitters and receivers for ham use. Theory and practice fully
pages. $\left(61 / 2 \times 91 / 2^{7}\right.$.)
C19995-Your Cost
504

## Understanding Radio

By Watson, Welch and Eby, Teaches the newcomer theory construction and operation of radio circuits. A complete basic course for the prospective engineer, servicemen or operator. 601 pages, 406 illustrations. Wi. 2 lbs. C20223-
Your Cost
\$27

## Principles of Radio

By Keith Henney. Deals with fundamentals for the beginner and student. Easy-to-read style. 495 cla736-Your Cost $\$ 5.43$

Radio Operating Questions and Answers
 By Nilson and Hornung. Lat-
est edition. Has est edition. Has of typical pages operator license examination questions with fusely illustrated. Covers
spark, arc and tube transmit ters;
broadcasting, shortwave, radio-compass, etc. $5 \times 7$ Shpg. wi.
2 lts.
C19943-Each...

## Aircraft Radio - Electrical

 Equipment. By Morgan TWA's chief of communications. A book of extreme valuetoday to every student, pilot today to every student, pilot

C19696
Postpaid.
$\$ 450$
Practical Radio Communi cation. By Nilsonand Hornung Covers receiving, transmitting and practical design. Over 754 pates.
Your Cost
$\$ 5.88$
Fuadamentals of

## Vacuum Tubes

| ny A. V. Eastman. |
| :--- | :--- |$|$| New. second edition |
| :--- |
| covering all types of |
| vacuum tubes from |
| diodes to the most |
| complex modern mul- |
| tigrid tubs. Also cov- |
| ers indusirial types |

## Electric Eye Booklet

## By Eby. 32 pages of data on

 electric eye types, theory, ap plications. $\mathrm{C} 20016-$ Your Cost... $4 \leq 4$C19977-Latest RCA Xmitting Tube Guide
Your Cost.
35
RCA-RC-14 Tube Manwal.
C19963 Postpaid $\quad$ ©

## How Electronic

 Tubes WorkA C.E book that fully illustrates and explains the
functions of the functions of the anode, grid, etc Explains the dif-
 the gas-filled and $\qquad$ high-vacuum tubes (space charge and ionization) Gives kee why Pliotron, Phanotron, Ignition, Glow Tube, etc. 23 pages. 154 RCA Receiving Tube Characteristics Chart.
C19984-Postpald.
RCA PT-20R1 Phototube Book
C20226 Postpaid
Each.
A.C. Calculation Charts
By R. Lorenzen. 146 charts $7^{\circ}$ x 11" printed in two colors, covering all alternating current calculacions in series circuits, paralle circuits. series-parallel and mesh circuits, at irequencies from
cycles to
1,000
megacycles. $A$ cycles
tremendous time-saver for engineers and others who work on electrical communication and clectrical power problems. Each book contains
straixht edge.
c20267-Your cost. 7.35
Frequency Modulation More and more F. M. are going on manufacturers are selling the special re-
ccivers and converters for picking up these book tells how to
signals. This boceiver
 service these receivers and con-c19745Each.

Automatic Record Changers \& Recorders All the informa-
tion you need to repair
highly compl cal marvels You'll be sur prised at how
understand them when you look them up in this new Rider man trate every phase of operation. trate every phase size as other
744 pages. sals.
Rider manuals. Rider manuals. $\$ 588$


## RIDER'S MANUALS AND TEXT BOOKS


RIDER'S Sexvice Mamuals
Now more than ever before you need a complete set of Rider's Manuals with
formation on the latest sets.
Vofume 13-1650 pages of circuit diagrams and service data for late 1941 and earl
Your Cost
s10.78
Volume 1-5-A new abridged volume taking the place of the five original individual volumes. Al the important sets from 1930 to 1935 in one gian 2000 page volume Your Co

| No. | Volume | Year | Price | No. | Volume | Year | Price |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C19784 | 12 | Early 41 | \$10.78 | C19951 | 7 | 1937 | \$10.78 |
| C19898 | 11 | Late '40 | 10.78 | C19942 | 6 | 1936 | 8.08 |
| C19738 | 10 | Early '40 | 10.78 | C19957 | 5 | 1935 | 8.08 |
| C19893 | 9 | 1939 | 10.78 | C19976 | 4 | 1934 | 8.08 |
| C19892 | 8 | 1938 | 10.78 |  |  |  |  |

## "Cathode Ray Tubeat Work'

## 338 profusely illus trated pages cover-

 ing theory and application of the $\mathrm{C}-\mathrm{F}$ tube. C2001THE METER AT WORK. Book is cleverly arranged with
 THE OSCILLATOR AT
WORK. Covers al! types of WORK. cisizis Each
$\$ 1.96$
Mátulm-tube volt
 ciant tome 1.96

## RIDER Text Books <br> "Houra Day with Rider"

Sinning with John w-_ginning with John somal instructor and and practice. Each book is written in simple language, is sturdily and hand-
somely bound and
profusely illustrat-


## prolusely illustrat

A real profitmaker for the service man.
C20030. Alternating Currents in Radio Receivers
C20031 - On Resonance and Alignment.
C20032-D. C. Voltage Distribution in Radio Receivers.
C20033-On Automatic Volume Control.
Your Cost Each,
Any Above Titles.... 8 ?

Servicing by Signal


## Tracing

Tells how to locate troubles in receivers quickly and accurately Actual signals used for localizing and determining set ailments. 360
lustrated nages. $\$ 2.94$

##  <br> ALL RIDER BOOKS SHIPPED POSTPAID ANYWHERE IN U.S.A. ONLY.

## 

## Servicing

Superheterodynes

## Covers theory of all

 types of superhets and answers all questions pertaining to their C19927Your Cost. - $)^{\text {G }}$
Automatic quency Contro Systems.
cial sets. 144 pages. $\$ 1,22$
Aligning Philco Receivers Vol. 1: Authoritative collection of alignment data covering every C19975-Each
Vol. 2: 1937 to 1941. 200 pares Postpaid.
C19709-Your Cost. \$1.7.
Servicing Receivers by Means of Resistance Measurement. How to localize set troubles with How to localize set ro C19928-
Your Cost
How To Make
Good Recordings
Explains how to
 quality" "commercial quality" recordings. used by the experts Describes equip-
ment, needles, discs. turniable drives, etc. Prolusely illustrated. $51 / 2 \times 81 / 4^{2}$. Your

## Techniques of Recording

By Goldsmith and Geisel. Fundamentals of recording. 16 chapters, illustrated, dealing with functions of recording, for the beginner
and the advanced recordist. Wt. 1 lb.
 $75^{\circ}$

THORDARSON Manual
Contains 4 individual sections on sound amplifiers, transmitters, serv. ice and complete transformer catalog. 130 pases, profusely illustrated. C19987-Wt. 2 lbs. Each....21c

Sound Amplifier Guide From above Manual. Contains information on construction and installation of sound equipment, including amplifier schematics. mounting templates,

# PSERVICNG BOOXSSMANUALIS 



## Radio Circuit

 ManualBy increasing the
size of each page discarding non-
essential data and essential data and
editing the balance. listing only thase reccivers which the Service Engineer will definitely get to repair and putting obtaining
months of hard work in all of the information needed to do a good repair job the publishers of Radio-Cralt now bring you a new It is easier to handle because it is thinner than the usual manual in spite of its completeness. $1388 x$ 101/x2 $2^{\text {thick. }}$ more than 1800 models made corer 1910 and up to June 1941. Shlpped postpaid in U. S. A $\mathrm{C}_{2} 20231$
$\$ 9.80$

## Principles and Practice

 of Radio Servicing
$\mathbf{B y}$ H. J. Hicks.
Fundamental prinFundamental prin-
ciples and their application to various components of the receiver is covered.
Use of mathematics has been reduced to a minimum. Defiperformance of all the more complicated servicing procedures. Cov-
ers test equipment, signal tracing, frequency modulation and modern antennas. Includes a worthwhile
chapter on ketting and retaining radio servicing business. Fully illustrated. 391 pages. $\stackrel{1}{\mathrm{l} \text { c1 }}$.

##  Schools, Universities, Institutions, Llibraries, Bookstores are ontitied oquantity discounts on all books llsted <br> Write for details.

Power Factor Problems in Electricity Supply By G. W. Stubblngs. Elemen tary ireatise for students, sugply engineers and power users. Con-
tents: Meaning of Power Factor; Measurements; How Low Power Factor Arises; Power Factor Correction; Tariffs Power Factor Cal-
culations. Wt. $1 \mathrm{lb} \$ 3.43$
C20219. Each......

## Armature and Magnet

270 well illinstrated

pages.
tables.
to
c. Answers all ques
tions, clearly and concisely. Ilighly prac tical.
Shpg. $\$ 1.25$
Your Cost

## PLASTICS by DuBois

 An excellent textthat fills a long that fills a long
felt want. For those who want to leasn the "knowhow" of plastics manufacture. Requires no detailed knowle
chemist supplies formation valuable to the general public, designers and engincers. C20286-
Your Cost

## SERVICING BOOKS BY GHIRARDI

## Modern Radio Servicing

The latest edition. This comprehensive volume gives a 1300 page course on latest "factory" methods, Servicing radios of all kinds; how to construct and operate modern test equipment: trouble shooting: repairing; locating and eliminating noise; cathoderay alikning; auto radios, etc. Profusely illustrated,
700 diagrams, charts, photos, etc. Shpg. wt. 5 lbs . C19958-Shipped Postpaid in U.S.A. Your Cost.
$\$ 5.00$


## 3rd Edition Radio Troubleshooter's Handbook


pages! "Case histories" of over 4,600 receivers an automatic record changers! 50-page tabulation of IF peaks of 20,173 superhets and alimnment data for practically every superhet known! 60 pages of auto radio
charts and data! Covers 1,250 portable radio models! 20-page tube chart! And loads of other information covering manufactures's names, data on ballasts, pilot lamis, tube testing, magnet wire, tuning coils, grid bias networks, decibels, volume and tone controls, filters, conversion factors, reactance charts,

C19959-Postmald in U.S.A.
SAVE MONEY!
$\$ 5.00$
Shipped postpaid in U. S. A. Both For
s9.50
Twin "Trouble-Shooter Gadgets" Two remarkable, ingenious radio set "trouble symptom you find not only the cause and the location of the trouble but the remedy as well Made in pocket size. Postpaid in U. S. A



## Your Cost <br> $\$ 2.94{ }_{\text {Your cost }}^{\text {co2288 }}$ <br> \$3.18

PUBLICATIONS

## Record Player Manual

Hundreds of mechanical and electrical dugrams and instructions for repairing automaticrecord changers, pickups, wireless oscillators, record-
ers and combinations. 132 large pages, $836 \times 11^{\circ}$.
$\$ 1=0$

## Other Valuable Manuals

C20233-How To Modernize Radios for profit C20234
o Servicing C Your Cost
C20235-Simplified Radio ServicC 20236 -Practical Radio MatheMatics.......................... 25
C2022
C19674-Vol. 4. 1941 ......... 52.00
C19673-Vol. 3. 1940 … ..... $\$ 2.00$
C19672-Vol. 2. 1939........ 52.00
C20237-Stewart Warner...... 50 c
C20238-General Electric...... 50c
C20239-Arvin (Noblitt-Sparks)
Manual
C20240 Motorola Auto Radio

## Radio Repairing with Substitute Paxts

For the serviceman who must work with available substitute parts or lose servicing jobs. Shows how to repair any radio using available parts. A real aid for war time stitutions may be made, what parts may be omitted, how to alter circuits to fit available components. correlation of tube types for sub-

C20278 Postpald in U.S. Your

254
How to Us: Radio Diagrams of hints and short cuts of the use of radio diagrams. 10 \&
C20277-Your Cost..... C2027-Your Cost.
ALL Supreme Books Shipped
Postpaid in U. S. A. Onty
ASSOCIATFD BOOKS

## "Win Yout Wings"

By Col. Roscoe Turner. Latest books on aviation training. In two volumes: Volume I covers principles rology, etc.; Volume II covers advanced flight manavigation, etc. Total over 1000 pages, $6 \times 9^{\circ}$. Text covers in a non-technical, comprehensive mancommercial pilot's certificate and instructor's rating. C19744-Volume I
C19746 - Volume II
Either, Shipped Postpaid


DIESEL and Other Internal-Combustion Engines By M. E. Degler. A practical text on the development, principles of
operation, construction, details and performance of stationery and engines. 1944 Edition. Includes considerable material on high speed engines; also problems and answers. $F$
payes. $6 \times 9^{\circ}$. C2028
$\$ 2.45$
gineer, purchasing agent, ex-
pediter, maintenance man, servlisting of radio and electronic products of American manufacturers, intelligently indexed for quick location of the parts yo need. A veritable mine of informabound in hard clothicovers. $71 / \mathrm{x}$
s3.43

Wiring Diagrams
For Light and Power Contains valuable data and easy to-read diagrams for wiring prac paratus. Covers house wiring meters. relays, motors, switch boards, etc.
Postpaid.
C20295-
aviation radio.
fundamentals; radi
fundamentals, radin waves; tubes and amplifiers; ultra-high fre quency equipment; commercial air and every and every phase of use to the student and maintenance man. Wt. 3 lbs.
C19696-
C19696-

## How To Read Electrical

 Blueprints
## branches of the elec

trical field. Explana-
ings. Over 200 questions and answers. Contains general information on biuepints, how to read architectural blueprints, dagrams for
bell and signal wiring, etc. 318 pages, 301 illus., 9 full sized blueprints clrawn to scale. Cloth bind-
ing.
C $20287 \rightarrow$ Your Cost
Aircraft Radio and
Electrical Equipment
By $\mathbf{H}_{\text {. K K }}$ K. Mor-
gan, TWA Com-
munications Sup-
erintendent.
 cellent text for men in and those contemplating en-

$10^{3} 4^{5}$. Shpg. wt. 5 lbs
C20294Your Cost

# BADIO ENGINEFRNG BOOKS <br> <br> Engineering Electronics <br> <br> Engineering Electronics <br> Radiotron <br> Technical Mandbook <br> Radio Engineering 

 h. By Donald G. Fink Expressly writtenfor the electrical engineer who is faced with hundreds of new electronic devices in industry. Three sections covering Phys tron Tubes, and Electron-tube Ap plications. $6 \times 9^{\circ}$.
C20253-358 pages
\$3.43

## Electronics

By Millman and Seely. Complete discussion of electronic principles and their technical and engineering applications. 699 pages. Wt. 3 lbs. C20224 Your Cost
s4.90
The Slide Rule and Logarithmic Tables
 By J. J. Clark,
M. E. Explainsthe use of the slide rule for all pur by electricians, engineers. drafts men. mechanics, culations, circular slide rules, osarithms, four and ten-place tables, etc. 200 well illustrated pages. Cloth bound.
Prepaid.
c2026-Each..... $\$ 1$

Shure Reactance
Slide Rule
A handy time sav. ing calculator for solving in a simcomplex resonant frequency, capacinductance reactinductance roil "O, and dissipation factor problems. C20212 -
Your Cost
10

Wartime Refresher in Fundamental Mathematies


By the staff of the U. S. Naval Training School, Chicago. Progresses from
simple arith metic through complexalgehra in 20 thorough daily lessons nexcellent re
ho have had high school mathematics. 200 pages. $5 \times 71 / 2$ C20260
Postpaid in U.S.A.
Your Cost
s1.37

## Electrical and Radio Dictionary

Contains easy to understand definitions of electrical and radio terms plus several pages of symbol drawings such as those used on architectural plans, resistor and capacitor, inductor and coil, motor and kenerator and circuit-breaker symbols. Has numerous electrical formulas, ables or energy and torque, power 110 pages.
C20283-Wt. 1 lb. Each.
 Designers Handbook By F. Langsford Smith. Sponsored by RCA. For the set de signer but of value to all engineers, service c19680 Your Cost .... \&8

Measurements in Radio Engineering By Terman. Techniques and equipment with emphasis on principles involved in design and construc-
tion of laboratory equipment that is tion of laboratory equipment that is practical, simple and highly accurate. 400 pages. 208 illustrations. C20222Your Cost $\$ 3.82$

## 



## Mathematics for Electricians and Radiomen

By Nelson M. Cooke, Chief Radio Electrician U.S.N. Teaches you mathematics from elementary algebra through quadratic equations, logarithms, irigonometry, plane vectors, and elementary vector algebra with direct applications to electrical and radio problems. Gives you the grasp of mathematics you need, 600 illustrated probems worked out in detail, provides 3000 problems with correct answers
 C20246-Postpaid. Your Cost


## OHMITE Calculator

Solves any Ohm's law problem Resist. range 0 to 10 megohms; finds volts, amperes, wat1s; multi plies, divides, finds squares and square roots. Scales on both sides. $4^{1}{ }_{8} \times 9^{\prime \prime}$.
C19711
PRE-INDUCTION BOOKS
 33G pages. Postpaid In U.S.A.
C2027 - Your Cost


Fundamentals of Electricity

## Radio Operators License Manual

By Wayne Miller. 1943 Edition of question and answer manual on radio operator license examinations. Has answers to all questions appearing on exams for commercial radio telephone and telegraph licenses. $6 \times 9^{\circ}$
211 pages.
. 53.00
Radio Operators Code Manual With Touch Typing
work. Simple, thorough, concise 418 pages. Wt. 3 lbs
C20284 Your Cost
Workbor ( tion hook for use in conjunc-Six-Step Plan of Training
C20285 Your Cost....

By Wayne Miller. An outstanding book embodying the most recently developed method of teaching the continental Morse radio telegraph code. For home-study and class-
room use to teach code and touchroom use to teach code and touch-
typing with a minimum of effort. lyping with a minimum of

## Practical

Mathematics
By Ilohbs-Dalzell MicKinney. A very to-do-it" book dealing with the fundamentals of
 From the beginning to Roots, Equations, Graphs and Logarithms; includes six place log tables and questions and answers. 599 pages Shps. wt. 3 lbs.
C20280
Your Cost

TECHNICAL
HAMOEDOL


By Terman. Comprehensive engineering treatise covering important vacuum tube and radio phenomena. A technical book for technical men. 688 418 illustr. Wt Cost $\$ 5.39$
C20221 Your Cost
 Technical compila tion by radioauthor ities. 954 pages. W't. 2 lbs C19983Each
$\$ 4.90$
Mathematics for Radio and Communication
By Maedel. Written by the chief instruc-
tor for the RJ.A Institutes in New York. Used as officovers Arthmetic Alsebra and Geom-
 etry. Vol. 2 covers Advanced Algehra, Trigonometry and Complex
C19676-Vol. 1
Your Cost Postpaid $\$ 3.75$ C19677-Vol.2 $\$ \$ 00$

Slide Rrule Simplified
By C. O. Harris. adyunced stu dents. A popular. yet scholarly presentation on this most useful instrument. Takes the mystery out
 of the slicle rule. 26if pages, wel illustrated and boxed with a
Renuine Dietzgen $10^{\circ}$ slide rule kenuine
Wt. 5 lbs .
C20281-Your Cost...... $\$ 3.43$
Book alone, less slide rule. 52.45 C20282-Your Cost

Practice Book For Induction Tests

## Practical Radio for War Training

The most timely up to the minute radio book for wa training. Written in an easy to understand style Excellent for radio servicemen who want to brush up for home study, for high school pre-induction courses and for general reference. Over 300 large illustrations
$\$ 2.95$
 Prepare yourself for your job in thearmy. Includes samples of the General Classification Test given to inductees, including cube counting tests, vocabulary, analogies and arithmetic with explanations and correct answers. Also covers information on Army interviews for officers candidate school. pointers on getting the right job in the army, and information on Army personnel methods. A valuable guide for those entering the army or those seeking immediate officer's commission. 125 pages. $8 \times 11$.

## C2025

$98^{\text {c }}$



Type A


Type $\mathbf{C}$

Type D


Type

## VICTORY LINE TRANSFORMERS AND CHOKES

* 14 Units Afford Maximum Replacement Adaptability
$\star$ Produced By First-Line Transformer Manufacturers
The transformers and chokes listed below are manufactured by Thordarson, Stancor, Utah and other famous American transformer manufacturers. They meet the specifications of the new American Standards" approved line of transformers, designed to afford the maximum replacement adaptabillty with the least possible use of strategic raw materials. These fourteen units will cover the vast majority of neplacement requirements encountered in servicing work today. All are first quality components guaranteed for service. Prices below are those set tentatively by the O.P.A. as we go to press. Should prices berevised, please remlt as per prices below and wo wllf credit or deblt your shipment as per the revlsion.


## POWER TRANSFORMERS

| Stack No. | $\begin{aligned} & \text { Type } \\ & \text { Number } \end{aligned}$ | Plato-Win Volts | $\begin{aligned} & \text { 2ding } \\ & \text { Ma. } \end{aligned}$ | $\begin{aligned} & \text { Reet } \\ & \text { Volte } \end{aligned}$ | ament | $\begin{aligned} & \text { Fil } \\ & \text { Volt } \mathrm{C} \end{aligned}$ | nent Amps | Type Mtg. | Mounting-A rea $\text { H. } \times \text { W. } \times \text { D. }$ | Mounting Centers | Weight in Llus. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| FOR 2.5 VOLT TUBES |  |  |  |  |  |  |  |  |  |  |  |  |
| C2069 | VPT-1 | 325-0-325 | 70 | 5.0 | 3.0 | 2.5 | 9.0 | A |  | $3^{1 / 8} \times 1 /{ }^{\prime \prime}$ | 4.0 | \$2.97 |
| C2070 | VPT-2 | 325-0-325 | 120 | 5.0 | 3.0 | $\left\{\begin{array}{l}2.5 \\ 2.5\end{array}\right.$ | $\left.\begin{array}{r} 12.5 \\ 3.5 \end{array}\right\}$ | A | 3, $3^{\prime \prime} \times 31 / 8 \times 41 / 4$ | 3) $5^{\prime \prime} \times 216$ | 6.0 | . 1 |
| FOR 6.3 VOLT TUBES |  |  |  |  |  |  |  |  |  |  |  |  |
| C2071 | VPT-3 | $210-0-210$ | 50 | 5.0 | 2.0 | 0.3 | 2.0 | A | $3^{\prime \prime} \times 2 / 2^{\prime \prime} \times 31$ | 21/2"x ${ }^{\text {a }}$ | . 5 | \$2.3 |
| C2072 | VPT-4 | $300-0-300$ | 70 | 5.0 | 3.0 | 6.3 | 3.0 | A | $3^{*} \times 21 \times \times 3$ | ${ }^{21} 1^{\prime 2} \times{ }^{\prime}$ | 5. | 3.35 |
| C2073 | VPT-5 | 300-0-300 | 120 | 5.0 | 3.0 | 6.3 | 5.0 | A | $4{ }^{\text {a }}$ | $3^{3,108} \times 3^{\prime 2}$ | 7.1 | 4.56 |
| C2074 | VPT. 6 | 350-0-350 | 300 | 5.0 | 3.0 | 6.3 | 6.0 | A | $4.2 \times 3$ | $3 \times 3$ |  |  |

Power transformers bave $117 \mathrm{v} .50-60 \mathrm{cy}$. olectrustatieally shielded primaries.
FIL TER CHOKS

| Stuck No. | Part Number | Inductance in Ifenries | C. | Resistance in Ohms | $\begin{aligned} & \text { Type } \\ & \text { Mig. } \end{aligned}$ | $\begin{aligned} & \text { Dimensions } \\ & \mathrm{H} \times \mathrm{W} . \times \mathrm{D} . \end{aligned}$ | Mounting Centers | Weight in Lbs. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\overline{C 2075}$ | VPR-1 | 6 | 50 | 300 | $B$ | $150 \times 23^{\prime \prime} \times 1{ }^{1 / 3}$ | $2^{7} \mathrm{Mos}$, | 0.6 | \$ ${ }^{\text {. } 68}$ |
| C2076 | VPR-2 | 8 | 120 | 250 | B | $25{ }^{5} \times 4^{\circ} \times 2{ }^{\text {a }}$ | 37\% | 2.4 | 1.38 |


| $\begin{aligned} & \text { Btock } \\ & \text { No. } \end{aligned}$ | Part | Application | $\begin{aligned} & \text { Turns } \\ & \text { Ratio } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Primary } \\ & \text { D.C. Ma. } \end{aligned}$ | $\begin{aligned} & \text { Coro } \\ & \text { Sizo } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Type } \\ & \text { Mtig. } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Dimensions } \\ & \text { H. } \times \text { W. } \times \mathrm{D} . \end{aligned}$ | Mnunting Centirs | $\begin{aligned} & \text { Wripht } \\ & \text { in Lhs. } \\ & \hline \end{aligned}$ | $\begin{aligned} & \text { Your } \\ & \text { Cost } \\ & \hline \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{aligned} & \text { Input } \\ & \text { Univeral } \end{aligned}$ |  | 10 10 | $\begin{aligned} & 59^{\prime \prime} \times 48^{\prime \prime} \\ & \text { 4" }^{\prime \prime} 1^{\circ} \\ & \hline \end{aligned}$ | B | $\begin{aligned} & 156^{\prime \prime} \times 28^{\prime \prime} \times 112^{\prime \prime} \\ & 28^{\prime \prime} \times 27^{\prime \prime} \times 2^{\circ} \\ & \hline \end{aligned}$ | $211^{\circ}$ | $\begin{aligned} & 0.6 \\ & 1.5 \end{aligned}$ | $\$ 1.0$ |

" Center tapperi primary and split secondary may be used as plate to grid; P.P. input or P.P. interstage replacement. Overallratio is $3: 1$.
May bo used for step-up or stop-down applications.
DRIVER TRANSFORMERS

| C2079 | VAT-3 | 10,000 | $\begin{array}{r} 2,500 \\ 4,400 \\ 10,000 \end{array}$ | $\begin{gathered} 1: 1 \\ 1: 5: 1 \\ 2: 1 \end{gathered}$ | 35 | $3 / 6{ }^{\prime \prime} 3^{3 / 4}$ | B |  | $213 / 6{ }^{\prime \prime}$ | 1.7 | \$1.32 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |

OUTPUT TRANSFORMERS

| Shech No. | $\begin{gathered} \hline \text { Part } \\ \text { Number } \\ \hline \end{gathered}$ | $\begin{aligned} & \text { Output } \\ & \text { Tubes } \end{aligned}$ | IMPLDANCE |  | $\left\lvert\, \begin{gathered} \text { Primary } \\ \text { D.C.Ma. } \end{gathered}\right.$ | Max. Aud. Watts | $\begin{aligned} & \text { Core } \\ & \text { Size } \end{aligned}$ | $\left\|\begin{array}{\|c\|} \mathbf{T y p e} \\ \text { Mtg. } \end{array}\right\|$ | Dinemsions | $\begin{gathered} \text { Mtg. } \\ \text { Centers } \end{gathered}$ | Wright in Lhes | $\begin{aligned} & \text { Your } \\ & \text { Cost } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Primary | Soc. |  |  |  |  |  |  |  |  |
| C2080 | VAT-4 | Singla or P.P. Plates | 2,500 to 15,000 | 2 to | 50 | 4 | 1/3" $x^{5 / 8 / 8}$ | D | $15 /{ }^{\prime \prime} \times 2,8^{\prime \prime} \times 14^{\prime \prime}$ | 2 | 0.7 | 1.00 |
|  | VAT-5 |  | 0 |  | 70 | 8 | 88 | D |  | 216 | 0.9 | 1.03 |
| C2082 | VAT-6 | P. Plat | to 13 | 2 t | 70 | 15 | P¢"x1" | D | $2^{\circ} \times 3 \frac{188}{} \times 178^{\prime \prime}$ | $218.96^{\circ}$ | 1.7 | 1.50 |

##  <br> The Victory Line of condensers is identical for all manufacturers. In order to insure prompt delivery of your Cornell-Dubilier. Aerovoz, or Mallory, whichever is available at the time your order is received. <br> PAPER TUBULARS <br> MIDGET <br> \section*{ELECTROLYTICS}

Will enable handling of practically any by-pass job. Non-inductively wound, sealed and impregnated They are small. have a high safety factor, "are uniform in electrical $\star$ characteristics and are provided t with well-soldered wire leads. All
ars 600 D.C. working voltage. t ars 600 D.C. working voltage. -

These midget dry electrolytics will handle any job requiring an clectrolytic capacitor. Polarity clearly indicated. Bare wire leads.

replaces larger capacitors. Stock \begin{tabular}{l}
$\begin{array}{l}\text { Stock } \\
\text { No. }\end{array}$ <br>
\hline $\mathbf{C 3 1 5 0}$

 C3150 

\hline \& \& Cap. <br>
Mfd. <br>
\hline \& 100 <br>
\hline \& <br>
\hline
\end{tabular}

## "Civilian Replacement YOLOM = CONTROLS

Available for Civilian Replacement use for maintenance and repair of existing radios. Made by IRC, CRL, Mallory or Utah - we will ship which ever is $\neq$ available at time order is received. Standard make controls with switches $t$
 and set screw knobs without filing. Depth, less switch ${ }^{33}$. ${ }^{\text {a }}$, depth, with switch $33 / 1^{\prime \prime}$. Control diameter, $118^{\circ}$. Taper code: A-Uniform, CAntenna Shunt or Audio; D-Antenna and C 1Bias; $\mathcal{F}$-Antenna and Bias; $1[$ Tapped Control for Tone Compensation.
Stock No. Ohms

C9105
C9108
C9109
C9113
C9115
$C 9115$
$C 911$
C9118
${ }^{C} 9121$
Ohms
5,000
10,000
10,000
20,000
25,000
50,00
50,000
100,000
100,000

Any Untapped Control Your Cost Each. Control $59^{\text {i }}$

| Stock No. Ohms |  |
| :--- | :--- |
| C9125 | 250,000 |
| C9145 | 250,000 |
| C9126 | 500,000 |
| C9127 | 500,000 |
| C9128 | 500,000 |
| C9129 | 1 Meg. |
| C9130 | 1 Mog. |
| C9131 | 2 Meg. |
| C9147 | 2 Meg. |




C79-S.P.S.T. Switch for any control above. Each
C7797-D.P.S.T. Switeh for any control above. Each.

# SPECIAL VALUES 

CENTRALAB Insulated
Carbon Resistors


Type $310-3 / 2$ watt carbon resistors with resistance element sealed in a dense shock proof ceramic tube. Ends are pure copper to dissipate heat and insure adequate connec
tiontoresistor element. Radial leads All are RMA color coded Available only in sizes listed below.


Type 314. Same as above but rated listed below

| Ohms | Ohms |  |
| :---: | :---: | :---: |
| 200 | 10,000 |  |
| 8,000 | 12,000 | 250 |
| C4421-Specify resistance when ordering. <br> Your Cost Each <br> 100 for. |  |  |
|  |  |  |
|  |  |  |



Standard $1 / 2$ watt insulated carbon resistors with element sealed in
moisture proof phenolic compound All are standard RMA color coded. Available only in the sizes listed: Ohms Ohms Ohms Ohms $\begin{array}{rrrr}47 & 470 & 100,000 & 1 \text { meg. } \\ 75 & 500 & 120,000 & 3 \text { meg. } \\ 150 & 6,800 & 220,000 & 4 \text { meg. }\end{array}$ $\begin{array}{lrlr}150 & 6,800 & 220,000 & 4 \mathrm{meg} \\ 220 & 10,000 & 250,000 & 47 \mathrm{meg}\end{array}$ C4418-Specify size when $?$ ordering. Your Cost Each. 100 for.

1 Watt Insulated Wire Wound Resistors

Worth their weight in gold to the service nuan . and harder to get these wire wound resistors and advise carly ordering. One watt high quality units with wirewound ele ment, completely encased in a moisture proof phenolic compound. Available only in the sizes below. Ohms Ohms Ohms Ohms Ohms

| 1 | 5 | 15 | 20 | 400 |
| :---: | :---: | :---: | :---: | :---: |
| 13 | 6 | 16 | 300 | 450 |
| 3 | 8 | 18 | 350 | 500 |
| 4 | 10 |  |  |  |

 10 for


Slotted Bracket
$2^{\prime \prime}$ high, $111^{\prime}$ long, ${ }^{3 / 2}$
For condensers, elc.
C14906
Your Cost

## PTX SPECAI VALUES S SPECAL VALUES

## Vertical Home Antenna

 Eliminates unsightly and dangerous horizon tal wires Insures clear, practically noise. - ree reception. Sturdily constructed and much easier to install than other types of antennas. Complete outfit includes a special 12 -foot 4 -sec tion antenna mast of rust-proof flexible steel, 40 ft . of lead-in wire, 10 ft . of ground wire.每卫2 sulators, screws, two pipe straps one strap mounting assembly, in structions for installation and usc.Shpg, wt. 4 lbs.
c248-Your Cost. e SWITCH
gुy Compact slide plated contacts. Eachcircuitratedat 13/7 Wimperes at 110 volls. Size $1 \% \%^{\circ}$ mounting centers. C12995Speclally Priced Miniature 2-Watt stat Screw
Driver Slot
Control An exceptionally well constructed miniature 800 ohm wire-wound rheostat rated at approximately 2 ng control and for similar applica ions Screw driver slot adiustment " mounting center; 3/" diameter $8{ }^{\circ}$ high.
C6172 Your Cost, Each... \&f 10 For

Midget Electro-


## Dynamic

Replacement Speaker A compact speaker for midget receivers. Light in weight highly effective per formance, 4 ohm field. Less output trans former. Shpg Wt. 2 lhs. Your cost. \$1 39116 ?

Oval PM Speakers


Provides the bass response of a larger little more
room than ardinary 6 speaker $93{ }^{\circ}$ wide, $6 \%^{\circ}$ high. IIas extra heavy magnet and completely dustproof voice coil construction. With output $x^{\prime} \mathrm{mm}$. for single pentode or beam power tube. 6-8 ohm
 Midget PM Speakers

compact, light-
that employ efficient permanent mall and paging cal and paging
systems, hearing aids, intercommunicators, etc, $21 / 2^{\circ}$ model has 4 ohm voice coil, all others 3 ohns, $5^{\circ}$ model has round frame, others square. Less trans former. Shpg.


## AN EXCEPTIONAL VALUE!

 15" Heavy Duty Dynamic Speaker

We have only a limited quantity of these excellent, high fidelity speakers, with heavy stamped frame and oversize 5200 ohm fieid coil. Constructed before the war, nothing was spared to make this one of the finest speakers ever pro duced. Has Curvelinear high fidelity cone with corrugated spider and $2^{\prime}$ diameter 16 ohm voice coil. completely enclosed to prevent entry of dust. Supplied complete with $40^{\circ}$ cord and 7 prong plug, but less output transformer. Will handle 30 watts. Shpy. wt. 21 lbs
21.95

OVERSIZE 12" SPEAKER With TRANSFORMER
A powerful, heavy duty, $12^{\circ}$ dynamic speaker Outside diameter $1416^{\circ}, 800$ ohm field coil, Pentodes with $24^{\circ}$ speaker cable, and plug. Ideal for replacement and for use in public address
equipment. Shpy. wt. 10 lbs . C19184-Your Cost

LAFAYETTE $12^{\prime \prime} 2000$ Ohm Speaker High quality $12^{\prime \prime}$ dynamic speaker for replacement radio or P.A. use. Range $60-11,000$ cycles. Voice coil impedance $6-8$ ohms. 2000 ohm field coil. Handles volume excellently; will stand up under hard usage. Less transformer
C18900-Shpg. wt. 9 lbs.
$\$ 5.29$

## LAFAYETTE 12" Concert Dynamic

Model 12F-Highly efficient heavy-duty field coil speaker, ideal for P.A. use. Frequency response essentially flat from 60 to 8000 C.P.S. (with proper baffle). Has $11 / 18$ dia. voice coil with 8 ohm impedance. Field resistance 2500 ohms. Less transformer. Heavy metal frame. Shpg, wt. 11 ihs C19214
Your Cost
$\$ 6.99$


Your Cost.

## COMPACT 31/2" PM SPEAKER

 An ideal replace-ment unit for those ment unit for those
tiny sets or intercomy sets or inter-
comere space is at a premium. $31 / 2$ 11/2ins. deep. Fully shielded voice coil
construction makes
 construction makes
this an excellent unt this an excellent unit for use as a
microphone. $6-8$ Ohm voice coil $11 / 2 \mathrm{oz}$. magnet. Supplied less transformer.
C19103-Shpg. wt. 1 lb. 784
Your Cost.............
Portable Speaker Cases For Single
 Speaker To house any dynamic speaker Sturdy plywood case covered with black leatherette. $10^{\circ}$ opening; grille wire mesh. Leather handle, metal bumpers. Insert type door back $14 \times 141 / 829 / 6^{\circ}$. Shpg.
C22061-
 6"1 Dymamic Speaker Heavy $6^{\circ}$ speaker withoutput trans-
former for single pentode or beam power output
tube. 350 ohm field has hum With 3 ft. cord and plug. Shpg. wt. 3 lbs
\$1.25 Your Cost

5" Dynamic Speaker 450 Ohm field with output transformer
for. single pentode or beam power output
tube. Hum bucking coil. Shpg. wt. 4 lbs
$\begin{aligned} & \text { C19428- } \\ & \text { Your } \\ & \text { Cost }\end{aligned} \$ 1=0$

$8^{\prime \prime} 450$ Ohm

## Dynamic SPEAKER

Complete with output fransformer for single
pentode or beam power tube. 450 Ohm field has hum boil Anez ceptionally
 for replacement purposes. Shpu. wt .2
c 19145
\$3.09
Improved 5"

## Magnetic Speaker

High Impedance speaker, ideal for replacement in hattery sets, portables, ac/dc sets or intercommunication systems. 7000 ohms imped-
 pentode and beam power output tubes. 3 prong speaker plug. Shpg.
wt. 2 lbs. C19152 Your Cost s. 1.29

5'f Magnetic | Speaker |
| :---: |
| Extra sensi | Extra sensi tive speaker

with balanced armature. Adjustments are mained indefinitely. Has plated metal irames. Solinals. High Impedance
for single output tube
\$1.25 Your Cost

Oval Auto
 A highly efficient field
coil speaker or auto re
use. Improves bass response. 4 ohm field coil; 6-8 ohm voice coil. $91^{\circ}$ wide, $62 /{ }^{\circ}$ high, $41 / 4$ deep. Sturdy construction, heavy metal frame. C19140
Your Cost
s1.39
7's Heavy Duty 6V Auto Speaker

## With <br> 5 o h m

o
pletely


Less orutput transformer. Shpy. wt.
6 lbsios-Your Cost.. $\$ 1$
IReavy Duty $12^{\prime \prime} 1000$ Ohm

## Speaker

Beautifully built heavy duty speaker with metal field not cover. 1000 ohm field, 16 ohm voice-
coil. Complete with coil. Complete with hut less transformer.
Shpg wt. 11 lbs.
\$6.47

##  <br>  <br>  <br>  <br>  <br>  <br>  <br>  <br>  <br>  <br>  <br>  <br> 

 $+$

## STANCOR Power Transiomer

Kit of 25 Tubular By-Pass Condensers


BEAM POWER OUTPUT TRANSFORMER
 Power Output transformer for 6L6. 25L6GT $17 N^{2} \mathrm{G}^{2}$.
c1c. To 500
ohms or 6 to ohms or 6 to
ohm voice conil windings.) Open mounting $3 / 8^{\circ}$ centers. W Specially Priced
$97^{\text {c }}$

## Midget

Power Transformer Mounted in compact fully shieldd case, with electrostatic shield
between primary and secondary.
 117 Volt primary,
capped at 6.3 v . © $11 / 2 \mathrm{Amps}$ and 70 volts at 50 MA . Secondary 135
volts at 50 MA . with tap at 6.3 volts at $13 / 2$ Amps. With 10 in. color coded leads. C5616-Shpg. Wt. 2 lbs. Your cost


Heavy Duty Output Transformer


Openframe
mounting with color coded leads Primary for pushpull tubes, 5000 ohms plate to secondary for 8 or 16 ohm voice coils. Will handle 25


Handy assortments of popular sizes of paper tubular by-pass condensers, all of standard manufacture and
voltages. Contains 25 condensers voltages. Contains 25 condensers all with capactiy ranges from, Figure
your savings and Order
C3365-
Your Cost
97 ${ }^{\text { }}$
Trutest Push-Pull Output
 Transformer Fully shielded upright mounting output transformer. $14,000 \mathrm{ohms}$
plate to plate with secondaries of $2-4-8-15-250-500$ ohms. Will handle a maximum of 15 watts audio. $31^{\prime \prime}$ high, $21 / \mathrm{k} \times 23 / 4$
color coded leads C1539Each.
$\$ 1.76$

## Power Transformer

 Type P9837. ShieldLeads are brouxht out through an opening in 115 V . PrimarySecondary H.V.C $350-0-350 \mathrm{~V}$. at 145 MA . Recti- C1901-Shpg. wt. $9 \$ 4,41$ 150 MA. Choke For use in amplifiers 5 small transmitter 1500 ohnis D D.C. resist
20. 200 ohnis D.C. resis tion. Rated inductance measured under full load operating condiLions. $3^{3}=16 \times 3 \% / 8 \times 4 \%$ c1904-Slupg. wt. $\$ 2.82 \frac{*}{*}$
$51 / 3 \mathrm{lbs}$. Your Cost

Midget A.C.-D.C. Chokes Similar to those used by manufacturers of the better midget sets. Extra
profits for you at this low price. 15
 Hlenrys, 50 ma.

x.

## 400 ohms

 d. C. resistancecenters 2 . 2 .

29

## Full Wave

## Vibrator Transformer

 Open frame type with leads. 6-Volt primary:
secondary delivers 245 volts at 40 ma. Size $3 \times 251 \times 1 / 2 / 0$ Shipping Limited. C1427-Your Cost

Quantity
.39 个


## Philco Vibrators

 Philco Part No. 41-$3186-4$ prong non-synchronous 19.0 synchronous $19 / 3$ x4il 38-5036, for all Philco Models prior to 1936 except Model 816. Replacement for over 100 models. Equivalent to Mallory 500P and 507P.

## C6102-Your Cost <br> $\$ 1.19$

 synchronous, $2 \times 3^{5} \mathrm{~h}^{\circ}$ high. Equivasynchronous, lent $^{2 \times 1}$, high Equiva-C6103-Your Cost $\$ 1.19$ Philco P't. No. 83-0026-4 pr. nonsynchronous. $11 / 2 x 27 /{ }^{\prime}$.alent to Mallory $509{ }^{2}$. C610S-Shps wt. 1 . Each..

## 2 Volt Vibrator

7 prong replacement vibrator for the popular General Electric self charging portable radios and farm
sets. Shpy. wt. 1 Ib.
C6101-Your Cost.

Midget Metal Cased Dry
Electrolytics
Small in size for tight places-iull rated capacity with maximum oltage protection. Don't delay-Stock up Now 1
$15-30-15-20$
$400-300-250-25$
Volts $400-300-250-25$ Volts
DC Working. Can Common Negative. Size C2426-Your Cost.
.65 c 40-15-15-20 Mrd. at 475-350 150 25 Volts DC Working. Can Common Negative. $13 / 8 x^{\circ}$.
C2427-Your Cost
20-10-20 Mrd at $350-350-25$ DC Working Volts. Can Common Negative. Size $2 \times 1$.
.60c $30-20-100 \mathrm{Mfd}$. at $150-150-12 \mathrm{DC}$ Working Volts. Can Common Negative
C2430-Your Cost

## "HARD-TO-GET" HARDWARE

All prices are on gross lots unless specilled otherwise. Items marked $\star$ are dozen prices on which there is a $\mathbf{1 0 \%}$ discount when ordered in gross lots.

C15451-Fpor Nuts
Per Gross.. Mach. Screws C15450-For No. IoMach. Screws Per Gross.
…......

C15453-1/4"O.D., be" L. for No 6 Mach. screws. Per Gr. 79 c c1545 L. Per Gross., ${ }^{\prime \prime}$.....79c 6 Mach. screws. Per Gr. 89c $1 / 4$
3. O.D. For No. 6 Screws
89 Gross.......88

Brass Machine Screws C15499-4/36x1" Round 1lead C15492-4/36x 13 R ${ }^{3}$. 74 c Cap Screw. Per Doz... 15 c C15494-1/36x21/2 Rd. Ilead C15493-6/32x17/8 Binder IId.
 Cap Screw. Per Doz.. $\star 22 \mathrm{c}$
c15498 $6 / 32 \times 3$ 1/ Round Hd, Cap Screw. Per Doz.. *34e Pal Nuts
C15400-For condensers with $13 / 16^{\circ}$ threaded necks.
Per Doz................. 12 c
Machine Screw Nuts C15403- $1 / 5-28 x^{2} / 8^{\circ}$ Hex Nuts. Per Gross.................... Nuts. Per Doz...... +23 c C15407-1/2" $24 \times 3 /{ }^{\circ}$ ilex Nuts.

## Felt Bumper Feet

C15456-1/2"O.D. with No. 8/32 Mtg. Screw $166^{\prime}$ L. $1+15 \mathrm{c}$
C15457- $3 / /^{\prime \prime}$ O.D. with No. $10 / 32$.



For Additional Savings Write For Quantity Prices.

## . <br> xasi <br> Midget Variable <br> 

 SPECIAL VALUES SmantidyCompact 130 mmi , mudget variable condenser ideal for use in receivers, small transmitters, and wiping contact on rotor which insures absolute alignment. and ceramic insulation. Has $14^{\circ}$ diam-
eter shaft $7 / 5^{\circ}$ long and mounts on eter shaft $7 /{ }^{\circ}$ long and mounts on
panel or chassis by means of two 4/36 nachine screws. Requires $1^{\prime \prime}$
$\times 11 / 4$ panel space, extends $2^{\prime \prime}$ behind panel.
Specially prleed

## Push Button

## Gang

## Condensers

Don't overlook heled double bar reled opportu- gjo apرent nity ! Here is your chance to con-
vert that oid set to a modern vert that old set to a modern push button receiver Price! May not be
believable Low offered again for the duration. Compactly built two gang condensers with attached mechanical push buttons which are easily set and locked for any station. The four with regular tuning, and require only sligitt pressure to operate. and have $Y^{\prime \prime}$ shafts extending $11_{2}^{\circ}{ }^{\circ}$ No push button knobs supplied Counter-clockwise rotation. C9725-Two gang 410 mmfd . with cut section with trimmer for
456 KC .
Your Cost.............. C9726-Two gang 410 YRF. Cost.

ow d. $\begin{aligned} & \text { resiating in } \\ & \text { sulation. Fit }\end{aligned}$ highly resistant to ignition noiges. C5301-Spark Plug C5302-Distributor C5303-Slip-On
Any Type, Each............... 53.24
Per 10 Asst.................


Meissner Midget Align-Aire Bakelite cased 1 to
12 mmfd. midget air trimmer. Mounts by means of bracket at
tached to tached to novable inches.
C9740-Your Cost 214 Dual Padder Unusual value in a
standard type of standard type of Dual ceramic padder. $10-140 \mathrm{mmfd}$. each section. Specially priced. c9773-Your Cost. 10 for
...............

## Trutest Midget

 Single Gang CondensersWith all the features and characeristics of larger units. Ideal for
imited space aplimited space ap paratus, Rotor and stator plates, irmly staked into position. Lo-loss bakelite insulation. Improved ballbearing. Counter-clockwise rotation for all types. 16 shafts. Overall dim.: $1 \frac{13}{4} \times 13 x^{13} 136^{\circ}$ deep. Less

| No. | Mmid. | Each |
| :---: | :---: | :---: |
| C10189* | 15 |  |
| C10190* | 25 |  |
| C10191* | 35 |  |
| C10193* | 75 |  |
| C10194 | 100 |  |
| C10197 | 365. |  |

## *Double Spaced.



## 3 Gang 365 Mmid.

## TRF

## Condenser

3 sang 365 mmfd
Expra heavy const
Extra lon construction. Overall size $3^{\circ}$ wide, $17 /^{\circ}$ high, and $47 \%^{\circ}$ deep, ${ }^{8 / 8}$ shaft extends rimmers
C9734-Shpg. wt. 3 lbs. 7 Cost...........

## (2:595) <br> 3-Gang TRF <br> Condenser

Three gang ,000365 clockwise TRF con-
denser. With 315 dial drive pulley attached. Shpg wt. 2 lbs.

## Speclall

## 3 Gang 410 Mmfd . TRF Condenser


#### Abstract

Three gang 410 mmfd .


Two Gang TRE Condenser
Precision
built of
proved proved, depend-
able qualable qual-
ity materials to
stand up

and deliver long lasting service.Order now, while still in stock. Snall size two gang TRF condenser without trimmers, with $3 / 8$ " shafts extending $135 \%$. Overall size $2^{3}$. wide, $21 / /^{\prime \prime}$ deep and $15 / 8^{\circ}$ high wide, Clow rotation.
C9732-410 mmfd.
Your Cost.
cach

3 Gang 450 Mmfd. TRE Condenser Three gang 450 mmid. TRF condenser, heavily constructed. Over $\left.\begin{array}{l}\text { No, Prongs Each } \\ \text { c13090 } \\ \text { C13091 } \\ 5\end{array}\right\} 24482$ C13092
C13093
7

## 

## Combination Sockets C13095-4, 5, 6 prons <br> C13096-5, 6, small 7 prong 10 for 52.16 E. Each, Elther Type...... <br> $$
\frac{\text { Each, Elther Type....... }}{\text { No. } 12 \text { EBY Sockets }}
$$

$$
\begin{aligned}
& \text { Molded Bakelite, } \\
& \text { For sub or top of } \\
& \text { panel moun. Firm } \\
& \text { gripping positive }
\end{aligned}
$$ contacts.




Spec
10 for
C13136-Midget molded octal sockcts, 1810 mounting centers with metal mounting plate and four
ground lugs.
Specially Priced, Each..... 10 for.
C13180- Octal 6 prong wafer typ socket. $11 / 2$ in. mounting Specially Priced, Each. 10 for mounting plate $11 / 2$ in. mounting center.
Specially Priced, Each..... 5 10 for
C13127-Öcial Wafer socket is mounting centers. ©f 10 For
45 c

SHURE MAGNETIC RECORDING HEAD


High quality, wide-response record equipment. Standard replacement for thousands of magnetic cutters which are in service today With a few minor circuit changes, will replace crystal cutting heads and provide more lasting service. Designed to operate diectly from voice coil winding of output transforner, with stif moving, but highly sensitive, recording element to permit cutting of practically all recording materials. Exceptionally rugged and stable under all climatic conditions. Will match $4-8$ ohn voice coil windings. No mounting brackets are provided, but tapped mounting holes facilitate re-use of orackets on unit to be replaced. Size $21 / 4 \times 13 / 8 \times 3 / 4$ with needle screw and 4 -inch flexible leads. Steel alloy-tipped or sapphire cutting be used. Less stylus. Shpg. wt. 802 C13799-Y
$\$ 4.95$

## RCA CAPACITY-OPERATED <br> ELECTRONIC CONTROL

Employs no light source yet at the approach of any human or animal, relay is momentarily tripped. Can be used with nanual or electrical resct relay to provide continuous contact after actuation. Ideal for protecting safes, induscounting ivestock, etc. Pro-
 tects an area within several feet from the control in all directions at ance. Sold complete with 6SQ7, 6F8G. VR-150-30 and 6X5 tubes and full operating instructions. For 110 V. 60 cycles AC only $61 /{ }^{\prime}$ Shpg. wt. $61 / 2 \mathrm{lbs}$.
c17193-RCA No. 41903 Vour Cost
$\$ 6.95$


## PERMEABILITY TUNED COIL ASSEMBLY



A timely value priced extra low to give you bigger savings. Complete permeability tuned oscillator and antenna coil assembly consisting of five separate sets of oscillator and antenna coils to cover a frequency
range of 540 to 1600 KC . Each set. of coils has an individual adjust ment for setting stations and each antenna coil has a separate adjustment in order to insure proper and a six button push button and a six button push button sembly can be used to convert any super with 456 KC IF to a modern push button receiver. The coils in the set do not have to be removed and manual tuning is in no way affected by installation of this unit. Overall size $4 \times 3 / / 4 \times 1$ inch with tapped mounting bracket mount unit $11 / 2^{\circ}$ above chassis. C9973-Shpg. wt. 1 lb . Your Cost

## PERMEABILITY TUNING ASSEMBLY

Antenna, RF, and oscillator coil as sembly permeability tuned. Separate adjustnent for each coil to in. ure tracking. A sturdy, shockproof
unit covering 540 to 1600 KC , it requires no tuning condenser Designed for 456 KC IF frequency. Each coil has individual copper shield can. Overall size $2 \% / 8 \times 29 / 8 \times 4^{*}$ with three tapped holes for mounting. Shpp. wt. 2 lbs. C9974-Your Cost


## CHAMPION Code Key

Here is your chance to buy a really fine telegraph key-and at a real saving! It will last for years, because despite the low price, there's been no compromise with quality. Heavy black-wrinkled cast base, $3 / 10^{*}$ aligned contacts, and chrome-plated key arm, with tension and side play fully adjustable.
C14068-Specially Priced


## V. Oil-filled

 Capacitor Oil impregnated and filled-permitting efficient operation over widest range of tem perature. Hermetically scaled case unaf fected by time, huHidity or operating temperatures. High-glaze porcelain insulators. Non-corrosive and lac-quer finished lead coated steel case. Conservatively rated. 3 Mfd .3000 V.D.C. Dimensions:

Shpy, wt. 6 Hss.
$\$ 8.97$

## 6 Mid. 600 V. Capacitor

Same construction as above but with riveted lug terminals. Uses highest grade condenser
tissues insuring a long ife. 6 Mid. 600 V.D.C.

Aerovox 2 Mid. 3000 V . Capacitor Impresnated and fill new super-dielectric oil. Hermeticallysealed insturdy weld-
ed-steel aluminumfinished cans, leakproof and seepage-proof. High tension pillar terminals fitted with locknuts and soldering lugs. Exceptionally compact. Excellent for transmitters, amplifiers, etc. Provided with the
new universal mounting bracket for mounting any height above or below chassis platform. $41 / 1 \times 3 / 3 x$ V.D.C. Your Cost $\$ 10.58$ C4825 Your Cost

4 Mfd. 600 V. Capacitor

$x=3$
$\cdots=1$
$-\quad-3$Oil filled and impreg nated transmitting connenser. 4 Mfd. 600 V.D.
C. Riveted lug terminals. $3 y^{\prime \prime} 1^{\prime} \times 1^{13} 16^{\circ}$
W. Wt. $1^{1} b^{3}$ C4800-
$\$ 2.94$

## IF TRANSFORMERS

Outstanding in quality at mazinglylow prices. I igh quality double-tuned airmatched sets. one stanmatched sets, one stanmidget. Double tuned with compression type mica trimmers from top of can RMA color ooded full length leads. Shpg. wt. 1 lb .
C10067-456 KC Input with grid lead from top of can. With grid lead from top of can.
clip. Size $13 \times 18 / 8 \times 21 / 2$
C10068 Matched 456 KC Output. Size 13 , $\times 1 \frac{18}{3} \times 21 / /^{\prime \prime}$.
C10069-456 KC Input. Size $13 / \mathrm{yx}$ $1.8 \times 3^{\circ}$.
 Size $13 \times 13,53^{\prime \prime}$.
Your Cost, any type, ea. 4 ,

Input or Output IF Coil High gain 262 KC color coded leads Double tuned, with compression type mica trimmers accessible Size. $11 / 1 \times 11 / \times 216$.

Your Cost

ICA Portable Jacks Single Open

## Circuit

Accurately machined jacks for ICA and other make phone plugs. Barrel molded of black bakelite. Overal size 13 " Diameter $3^{\prime \prime}$.
4.4

## Special Value

## Metal Phone Plugs



Nickel plated brass phone plug for 1 or 2 sets of cords. Fully insulated C14970 Your 10 For Asabove, $2 \%$ overall.
c14959 Your cost, ca. 24 10 For .......................... $\$ 3.75$

## Volume Control and

 SwitchSmall diameter controls for use in midget radios. Noiseless elements of extra-hard composition. $134^{\prime \prime}$
shafts extending from $\% 8^{\circ}$ bushing. 7/" behind panel. Supplied with switch. A hish quality unit at a very low price. Dependable performance.
C8124-1.000 ohms
C8120- 2500000 ohms Each
39 C8122-1 Meg.
 wave band switch. Shorts out unused coils. Quantities are limited and cannot be furnished at these prices after the present supply is
depleted.
c12829-Specially Priced.
Shielded Antensa Coil

Small size, high impe dance coil with lug terminals. Tunes 550 to 1600 KC with 365 mimfd condenser. Fully shielded with grid lug on top of can. Size $13 / 5 \times 13 / 5 \times 2^{\circ}$.
C10074-Your Cost


Permeability Tuned Oscillator Coil Midget 262 KC oscilMidget 262 KC oscillator coil on ceramic
low-loss form with protective cardboard cover. Tunes 550 to cover. Tunes 550 to
1600 KC with 365 mmfd TRF condenser and 750
mmfd series fixed padder. With mmfd series fixed padder. With
color coded leads.
C10075 Your Cost......

18
TRUTEST Litz-Wound

## AC-DC Coils

175-550 Meters Matched highgain coils furnished unshielded ceivers. High impedance primaries
 with 4 -bank litz-wound secondaries. 25 "long, $7 / 8$ " diam. Tunes with .000365 mid., condenser. With mig. brackets and diagrams C10012-Antenna coil. C10095-R.F.Coil. Your Cost Each. C10096-Set of 2 Coils.

Never before offered at theselow prices! Brand-new genuine RCA radio cabinets are now offered for the first time at a fraction of their original resale price. Exact replacementcabinets for RCA sets, also excellent for use In replacing many other types of cablnets.

All table model cablnets, beautifully finished, in sturdy woods and exquisite plastics. Each cabinet is supplied In its original factory sealed earton. Extremely limited quantities. No more when these are gone. Rush your orders NOW!


MODEL 36X Specially Priced \$3.95


MODEL 18T Specially Priced $\$ 4.95$


MODEL 6Q1 Specially Priced $\$ 3.95$


MODEL 16T3
Specially Priced \$3.95

MODEL $36 \times$ (at left). A handsome, dark walnut cabinet with modern roll front top edge. $838^{\circ}$ high, $133 / /^{\prime \prime}$ wide and $716^{\prime \prime}$ deep. Will accommodate chassis up to $121 / 4 \times 6^{\circ}$ Inside height $712^{\circ}$. Takes a $41 / 3^{\circ}$ speaker. Has wood louvre front speaker grille and three control mounting holes in inset control panel. Dial opening $121^{\prime \prime}$ wide. $2 \frac{1}{6}$ high. Excellent satin-rubbed finish. Shpg.
wt. 6 lbs. C25703-Your Cost.
s3.95
MODEL $16 T 4$ (at right). Sturdily constructed, modern design walnut cabinet with contrasting shade top. $948^{\circ}$ high. $1910^{\circ}$ wide, $83^{3}$ deep. For chassis up to $179^{\circ 8} \times 7^{\circ}$ : inside height $812^{\circ}$. Can mount a $7^{\prime \prime}$ speaker. Dial opening $7^{\prime \prime}$ wide by $33 /^{\prime \prime}$ deep, with push button opening $41 / 4 \times 11 / /^{\prime}$. Ilas curved louvred wooden speaker grille opening and four control mounting holes. Beautifully finished. Shpg. wt.
9 lbs.
$\mathrm{C} 25704-$ Your Cost. . . . . . . . . . . . . . C25704-Your Cost.

MODEL 187 (at left). Matched-grain walnut cabinet for inset dial mount in tpp front. $111^{\prime \prime}$ high, $117 / 0^{\circ}$ wide, $10^{\circ}$ deep. For chassis up to $16 \times 8^{\circ}$; Beautiful gold frieze speaker grille opening, $111 /{ }^{\text {; }}$ wide, $4^{414^{\prime}}$ high. Push button opening $5 \times 116^{\circ}$ high. opening, inset in front top edge, $111^{\circ}$. wide, $3^{\circ}$ deep. 4 control openings. Shpg. wt. 11 lbs . Your Cost
$\$ 4.95$
MODEL T65 (at right). A two-tone walnut table console cabinet, moderny designed and beautifully finished. $121 / 8^{\circ}$ high, $141 /^{\circ}$ wide, $91 / /^{\circ}$ deep, with gold frieze speaker grille $41 / 2^{2} 9^{\circ}$ wide. Dial opening, $431^{\circ}$, high, $7 \%^{\circ}$ " wide. Will accommodate up to $121 / 2881^{\prime \prime}$ chassis. Inside height $1114^{\circ}$. For $6^{\circ}$ speaker. Two control openings. Matched grain with light con-
trastinc stripe. Shpg. Wt. 9 lbs. c25702-Your Cost
\$4.95
MODEL 6Q1 (at left). Altractive mahogany plastic cabinet of ultra modern design. Sturdy high, $1655^{\circ}$ wide, $11^{\prime \prime}$ deep. Has extending dial opening $81 / /^{\prime \prime} \times 3^{\circ}$ high. Speaker opening $91 / 6^{\prime} \times 51 /{ }^{\prime \prime}$ opening Will accommodate chassis $16 \times 9^{\circ} ; 111 / 2^{\circ}{ }^{\circ}$ high inside. Room for $6^{\prime}$ speaker. Two molded control openings. All one piece shell. Shpg. wt. 13 lbs. Your Cost.
\$3.95
MODEL 12AX (at right). An exquisite brown plastic portable cabinet with carrying handle. $6 \%$ high, $10^{\circ}$ wide, $6^{\circ}$ deep. Has top front dial opening 5\% wide, $1^{1 /}$ high. Louvre front speaker grille; chassis. Simulated flame grain finish. Sturdy shell. Two control mount holes. Shpg. wt. 4 lbs. C25700-
Your Cost
${ }^{5} 1.95$
MODEL 16T3 (at left). Handsome flame-grain two-tone wainut cabinet with rounded edges. $10^{\circ}$ high, $18^{\circ}$ wide, $813^{\prime \prime}$ decp. Has $7^{\circ} \times 31 / 2^{\prime \prime}$ dial opening and $41 / 5 \times 11 /{ }^{\text {" }}$ push button opening. Will accommodate $161 / 4 \times 7^{\circ}$ chassis; inside height $813^{\circ}$. For $633^{\circ}$ speaker. Four control mounting holes on inset control panel. Beautiful overall louvre pattern. Shpg. trol panel
wt. 8 lhs.
${ }^{\text {wt. }} \mathbf{C 2 5 7 0 6 - Y}$ Your Cost
$\$ 3.95$
MODEL $16 \times 14$ (at right). A modern roll front walnut cabinet with contrasting dial and speaker grille panel. $916^{\circ}$ high, $15^{\circ}$ wide, $63^{\circ}$ " deep. Speaker opening $101 /^{6}$ wide. $312^{\prime \prime}$ high. Panel has 6 push button troles spaced $7 / /^{\circ}$ apart. For up to $121 / 653 /{ }^{\circ}$ chassis; inside height $8^{\circ}$. Will take $5^{\circ}$ speaker;



MODEL $16 T 4$
Specially Priced $\$ 4.95$


MODEL T65 Specially Priced $\$ 4.95$


MODEL 12AX Specially Priced $\$ 1.95$


MODEL 16X14
Specially Priced \$3.95

MODEL 14BT2 (not illustrated). Two tone wainut cabinet with light contrasting horizontal stripes. $93^{\circ} /^{\circ}$ high. $18^{\circ}$ wide, $10^{\circ}$ deep. Dia! opening $6 \% \times 34^{\circ}$ high. Has wood louvre grille and will nount a $6^{\circ}$ ipeaker. Accommodates up to $141 / 4 \times 8 \% 4^{\text {ch }}$ chassis. Three control mounting
ioles. Shpg. wt. 10 lhs . ioles. Shpg. wt. 10 lhs
C25708-Your Cose.

## MODEL $46 \times 24$ (not illustrated). A two tone walnut cabinet with

 MODEL $46 \times 24$ (not illustrated) $A$ two tone wainut cabinet with $415^{\circ}$ high. Speaker grille opening same size. Will mount a $6^{\circ}$ speaker 41/3 high. Speaker srille opening $15 \times 5^{\circ}$. Push button opening $3^{3} 3 x^{8} 1^{\circ}$ high. Shpg, wt. 7 lbs. C25709-Your Cost.
## SPECIAL VALUESS

## RCA TELEVISION CHASSIS



A remarkable buy in one of the linest television receiver chassis ever manufactured! Complete sound and picture channels for 5 bands, $44-50 \mathrm{MC}, 50-56 \mathrm{MC}$, $66-$ $72 \mathrm{MC}, 78-81 \mathrm{MC}$ and $81-90 \mathrm{MC}$. Overall video band width, 4 MC . Scanning is interlaced, 441 lines. Of course we removed the tubes and sent them to war, but the parts alone are worth more than the price we are asking. Includes a complete High-Frequency band switching coil assembly with coils wound on polystyrene forms, 11 wide hand IF Transformers wound on Styrol (Humidity-resisting) forms, over 75 tubular by-pass condensers and FP type filter condensers, over 100 resistors, 7 potentiometers, steatite sockets, numerous chokes, etc. All components are ideal for high-frequency experimentation.
Chassis measures: $17 \times 16 \times 81 / 2$ ins, overall. Uses $36 A C 7,26 j 5,56 A B 7$, $26116,16 S Q 7,16 S K 7,46 \mathrm{~N} 7,16 \mathrm{Y} 6 \mathrm{G}, 16 \mathrm{~L} 6,15 \mathrm{~V} 4 \mathrm{G}$ and 1 1803-P4 or $11804-\mathrm{P}_{4}$ (No tubes are supplied). Complete with circuit diagrams and instructions. Shpg. wt. 23 lbs.

## C22263

Specially Priced.
\$29.50

## GE Mazda Fluorescent Lamps

White" lamps provide a quality of light approximating that of the ordinary incandescent lamp. Daylight" lamps approximate that of ordinary daylight. All supply several times the usable light output of ordinary incandescent lamps. Rated life better than 2500 hrs .
White Daylight GE Dimen. Watts Each Lots Each of Each
Stock No. Stock No. No. LxD. Wh
 $\begin{array}{ll}\mathrm{C} 25527 & \mathrm{C} 25528 \\ \mathrm{C} 25496 & \end{array}$ C25496 C25497 C25525 C25526 C25529 C25530 C25535 C25536 $\begin{array}{ll}\mathrm{C} 25537 & \mathrm{C} 25538 \\ \mathrm{C} 25539 & \mathbf{C 2 5 5 4 0}\end{array}$ C25539 C25540 C25531 C25532 100-watt lamps have mogul 2-pin base; all others have standard 2-pin base. Approx. shipping weights: 6 \& 8 -watt- 11
2 lhs.; $30 \& 40$ watt- $31 / 2 \mathrm{lbs}$; 100 -watt -8 lbs.
NOTE: When purchasing lamps with any fuorescent fixture listed use ist "Lots of" price instead of single price.


## ser ThammititinaKEYS

| SIISNAL | Practice Key |
| :---: | :---: | :---: |
| Model |  |
| R-50 |  |

SIGNAL Key With Switch A telegraph
kev with a
switch to
ER cor tacts. Polished lacquered brass base. Shpg. wit. $1 \mathrm{lb} . \$ 2.00$
calont-Your Cost c1 1005 -Less Switch


FCr all types of communications wrork where speed and perfect Morse pairs of contact points; one for dets, other for dashes. Easy to ac just. Has unlimited sending prssibilities. Polished parts with
bl lcklase. Supplied complete with cerd and wedge. Shpg. wt. 5 lbs.
C. 4057 - $\$ \$$.

## SIGNAL Model R-68 Code Practice Set <br> 

Key and high frequency buzzer on a polished hardwood base. Hook
hattery to terminals ( $1 / 2$ volt cell required, not supplied) and it is

 Type R-60 BUZZER ONLY: Fully adjustable. Has standard resistance of 2
lacquer finish c14006-Your Cost
$73^{\text {f }}$
"Champion" Vibroplex


Inexpensive and has exceptional sending qualities; clarity, speed and ease of operation. Single lever with (wo pairs of contact por for dashes). Ensy to adjust. Black crystal finish metal base. All parts above base in bright finish. With cord and wedge. Shpy. wt. 4 lbs
C14058-Each.... $\$ 9.95$


## Carrying Case For Keys

Plush-lined case finished. in handsome black morocco. Reinforced corners. Flexible leather rocco. Reinforced corners. Fexible leather
carrying handle. Has lock and key. Inside dimensions: $6^{2 / 2}$ long, $3^{3 / 4}$ wide, $41 / /^{\prime \prime}$ high dimensions: 1 ws.
Shpa. wt. Yong.
Cl4059-Your Cost Each..... $\$ 3.50$

## SPEED-X KEYS and ACCESSORIES Model 321 Senior Key



General purpose key with molded black Yell insu contacts. Navy type knob. Die cast heavily plated base and key arm. Adjustable steel bearings; concealed brass connector strip Shir. wt. 2 lbs. $\$ 2.35$
c14039 Your Cost.
Model 300 Practice Key PR 日 - $\begin{aligned} & \text { Hastwo } \\ & \text { adjust- } \\ & \text { ments. }\end{aligned}$ (i) $\begin{aligned} & \text { Base of } \\ & \text { molded }\end{aligned}$ hakelite. $1 / 6^{\prime \prime}$ coin silver contacts Machined parts in bright finish.
Wt. 1lb. Your Cost ? ?
c1i041Mod. 305. As above, with metal C14053-Your Cost.
51.03

Model 310 Manual Key

$\$ 1-26$ silver contacts.
C14040-Each As above, with switch
C14044-Your Cost
.$\$ 1.47$

Model 515 Hi-Speed Key


Sturdy, heavy duty high speed key for communications work. Has two sets of $11^{\prime \prime}$ silver contacts. Metal parts heavily plated; base has black wrinkle finish, is $3 \times 61 / 1 \mathrm{x}$ 3. High quality construction. Less switch, cord and plug. Shps.
wt. 4 lbs.
C14033-Each...... Cord and plug for abo
C14054-Your Cost.

Code Practice Set


## Model 450

Comprises constant fre quency ad
justable buz
er and a
hand key with 1 " silver contacts. mounted on a brown bakelite lase 6x.4. Metal parts plated. Code card included. Uses 2-1 1/6 vol cells (not included). C14027-Single Set. Your Cost.
c19840-11/2V. cell. Ea.
\$1.62
C14021-Your Cost... 734 C19840-11/2V. oells. E

30 c

## G.L. Automatic Tape

## Serders

Model 1.
Compact.
easy to op-
erate and highly accu-
rate. Blank tape is
spaced and punched. th in run through the sender at spieds from 10 to 60 words per minute. For $110-120$ volts a.c. Win wi h 5 rolls of blank tape. Shipped Pestpaid in U.S.A. C14022
$\$ 12.50$
Eich.
SPEED-X Practice Key
Standard spring adjustable hand key with $1 / 8$ pure silver contacts mounted on a moulded brown bakelite base $2{ }^{\circ} \times 5^{\circ}$ with circuit closAll machine parts nickel plated. Wt. 8 oz .
 C14071-Your Cost.

$\$ 1.47$


SPEED-X Professional Semi-Auto. Key A High-Speed chromium plated heavy steel base key with four non-slip rubber feet. $6 M^{\prime \prime} \times 31 / 2^{\prime \prime} \times 1 /{ }^{\prime \prime}$. Heavy
 brass connector strins mounted under base. Frame has signed to obtain slowest and fastest speeds. Two sets of $114^{"}$ pure silver contacts. Pigtail connections to vibrating to any required height. Furnished with circuit closing switch. Wt. 4122 lbs.
$\$ 10.29$

## ICA Deluxe Signa-tone

- Code Practice Set \#Keying Monltor

A perfected Audio Oscillator, having different output frequencies and a continuof phones and keys may be connected for class room or radio club instruction. No well-equipped station should be without this keying monitor. An invaluable aid in
 "buroving any hams fist. Audil speeds. The Alow the
similar to those of high quality conmercial CW stations. $714^{\prime \prime} \mathrm{W}$ $4^{\circ} \mathrm{D}$ Shpr wt. 4 lbs. Complete with tube and self-contained speaker, for 110 V . AC-DC
$\$ 1.16$

## ICA Signa-Tone


$\star 3$ tone audio output
$\star$ Continuously varlable volume control Primarily designed for class and radio club use. Originally intended for use with headphones, speakers may also be used. For 110 V. AC-DC. Complete instructions furnished for a class room setup for sendreceive practice.
C14076-Complete with tube-
Your Cost.

## BUD Oscillator



An audio oscillator with a buile-in magnetic speaker that will operate up to twenty headphones. The internal speaker is automatically cut out of the circuit when headphones are inserted. Provided with a variable volume control and a variahle pitch control for individual adjusting. Any number of keys may be connected in parallel to the oscillator for group practice. Metal case finished in grey


IINGUAPHONE Code Lesson Records


Learn $\begin{array}{llll}c & 0 & d \\ t & \mathrm{c} \\ \mathrm{t} & \mathrm{i} & \mathrm{s}\end{array}$ easy way at
 convenience.
 or speed up your phono as you proyress. Will operate on any phono or rec5 double-faced $10^{\circ}$ discs (in album). Shpy. wt. 6 lis.
c21895 $\$ 8.82$

30 years of experience in the world of radio-telegraphy is back of the McElroy equipment listed on these pages. T. R. [McElroy has long been known as a designer and builder of communications equipment worthy of a champion. The fact that McElroy-engineered products are now to be found in every branch of communications and in use by Army, Navy, Coast Guard in the field and in their schools, as well as in private and public schools only serves to enhance their already enviable reputation. These products embody every proven feature to be found in comparable equipment PLUS the many important advances available ONLY in McElroy units.

Ease of operation, maintenance and repair make McElroy equipment outstanding for school use. Capable of service under the most severe conditions, they have long set the standard for operational excellence. Built to the exacting specifications of the armed forces. Because of the critical materials used in the construction of McElroy equipment, its sale is restricted to users such as the armed forces, governmental agencies, training schools and industrials who are authorized by the War Production Board to purchase such equipment. All inquiries concerning priorities, technical data not found below, and other information should be addressed to our Technical Advisory Service.

## G-813-A Electronic Keyer



An electronic keying device which utilizes a 930 photo-cell tube to produce aural reproduction of dots and dashes from a standard $2 / 8^{\circ}$ wide ink-recorded tape up to a maximum speed of 40 words per minute The clarity and even spacing with which the signals are reproduced greatly assist students in the mastery of high-speed code. Only the signal line of the tape actuates the photo-cell; there are no chirps or key-clicks, no annoying constant tone at beginning or end of tape. or during adjustment. Adjustment and operation of the machine are surprisingly simple and non-critical. Tapes which have undergone excessive wear will still operate the unit with surprising efficiency. No sprockets are used in tape puller-rubber drums supply light pressure to propel tapes, so that they have an extremely long useful life. Tapeholders acoommodate standard 16 mm . 400 foot movie reels. A 400 foot roll of tape will provide one hour of code practice at 20 words per minute. Sufficient output is prowided to operate up to 300 pairs of headphones in parallel, with no special impedance matching necessary. Headphone jack on keyer allows monitoring of output at all times.
The complete unit consists of Electronic Keying Unit, with audio oscillator and amplifier: a dependable variable speed tape puller and a well built hand rewind. Uses one 930 photocell, one T7 exciter lamp, and four 117N7GT tubes. Keyer Chassis measures $10 \%^{\prime \prime}{ }^{\prime \prime} 111 / 8^{\prime \prime}=$ $111 / 2^{\prime}$. Tape Puller measures $81 / 2^{\prime \prime} \times 51 / /^{\prime \prime} \times 4 \pi / 8$
C14094-McEIroy G-813-A Electronic Keyer complete with all tubes, exciter lamp instructions, ready to operate. For 110 volts $\AA$ C or DC Shpx. wt. 50 lbs
Your Cost
$\$ 150.00$

McElroy Hand Rewind
 An excep tionally well-built unit for all Ues steel cut gears with bearing bearing
mounted steel shafts. Sturdy, screw mount base. Comes complete with one 400 foot 16 mm . reel. Shpg, wt. 3 lbs. $\$ 9,00$ Additional 400 ft . reel C14089-Your Cost

## HIGGINS' Drawing Ink

Ideal for code tapes for use with Electronic Keyer G-813-A. Opaque and waterproof. C15318-1/2 pt.
our
$\$ 2.00$
McElroy Tape Stand


A sturdy unit with heavy diecast base and adjustable reel holder. Accommodates a 400 ft .16 mm . reel Shpg C14078-
Your_Cost
$\$ 30.00$
Telegraph Blue Ink One of these concentrated ink capsules makes a quart of ink. For sight read tapes. Cannot be used with Electronic Keyer
Your Cost
Your Cost

## G-913-A School Recorder

## With TP-845

## Tape Puller

The Model G-913-A School Recorder will operate at speeds of up to 100 words per minute, recording clearly, on standard $3 /{ }^{\circ}$ " wide blank paper tape, signals of readable strength from any radio communi cations receiver, or by
 terminais provided. hand sending by students or instructors. Operators are enabled to examine actual printed examples of their techniques providing a visual demonstration of the defects in their sending, and by utilizing the G-813-A Keyer, may listen to an accurate and faithful reproduction of the signals they have sent. Ideal for making special tapes for instructional purposes. Tapes can be used for teaching sliptape sight reading, or used in the G-813-A Electronic Keyer for regular code instruction. Consists of the TP-845 tape puller, an electronic "Sound Gate," and an inked-stylus recording head all housed in a sturdily buit metal cabinet for table operation. The unit can also be mounted on a standard parel for rack mounting Tape puller boe induction type AC motor for constant speed regardless of setting of speed control. Use telegraph blue ink for sight reading, and Higgins India or any other fast drying opnque ink for use with Electronic Keyer. Complete with two 117 N 7 GT and one 11726 GT tubes. Overall Keyer. Complete with two 117N7GT and
dimensions, $25^{\prime \prime}$ long, $14^{\circ}$ wide, $14^{\prime \prime}$ deep.
C14095-McEIroy Model G-913-A School Recorder as described above, complete with tubes and instructions. For operation on 110 Your Cost
\$150.00


## New Model TP-890-A Tape Puller

This professional type tape puller is perfectly adaptable to both commercial and instructional use. Has newly designed motor, oversized and capable of sustaining constant speeds. Speed control permits adjustment to speeds of up to 100 words per minute, with extreme accuracy. Motor unit is housed in a louvred metal cabinet $11^{\prime} \times 10^{\circ} \times 10^{\prime \prime}$. Take up reel can be disengaged for rewinding or operation of motor while tape is stopped. Shpg. wt. 18 lhs. C14096-Your Cost
$\$ 135.00$

## McElroy Code Practice Tapes

For use with Model G-813-A Electronic Keyer or similar unit These tapes are made from U.S Army master rolls and are excellent for all training purposes. Uses International Morse Code, heav ily inked. Each tape will provide approximately one hour's practise at $20 \mathrm{w} . \mathrm{p} . \mathrm{m}$. Set comprises 15 tapes on 400 ft. reels. Housed in slotted and numbered wood carry ing case with lock-on cover. Wt ing cas
20 lbs .
$\underset{\substack{\text { cianor } \\ \text { rour cost..... } \\ \hline}}{ }$


## Blank Tape for Recorders

For use with G913-A or SR900-A recorder or any commercial recorder using $\$$ "tape. Rolls 400 feet long; will take an hour's recording at 20 w.p.m. 25 rolls per package. Shpg. wt. 15 lbs. Per Package

# CODE APPARATUS 

## RADIG TELEGRAPHBR

## Model 200 "Stream" Hand Key



C14092-Your Cost

## Model 300 DE LUXE

A professional telegraph key in both performance and appearance. Uses $8 / 16^{\circ}$ coin silver contacts. The scientilically designed key lever is balanced between two accurately machined bearing screws and the entire key is mounted on a sturdy black crackle finished metal base, equipped with a circuit closing switch.
Shpg, wt. 2 lbs. $\$-$

Me "Stream" Hand Key The finest hand key obtainable. Similar to Model 200, polished chrome and nickel
¢3.45

## Model CP 500 Speed Key

Makes rhythmical sending a real pleasure. Contact points are $8 / 10$ inch silver. Right and left arm tension springs, contact spacings and vibrating arm are fully adjustable. Base is Grey wrinkle finish-all other metal partsare bright chrome. Size: 3
C14087-Wt. 6 lbs Your Cost
$\$ 11.85$

## Model CP 800 DE LUXE Speed Key

The finest commercial or amateur bug available. Same as above but massive base is finished in a highly polished chrome, as are all the metal parts of the super-structure and lever. Main and U-spring of carefully selected blue steel. With connecting curd.
C14093 Your Cost..............................
$\$ 15.90$

## New Model McElroy SR-900A High Speed Recorder

Records Signals At Speeds Up To 1000 Words Per Minute


Unlike recorders which require overcoming inertia of a mechanical spring action, this High Speed Recorder utilizes a constantly energized exciter con. Change in polarity occurs when a signal impulse is transmitted to it, and coil and stylus move without resistance. At end of signal impulse polarity of coil is changed and stylus returns to nosignal position with equal force
Operates directly from output of any radio communications receiver. Background noises, weaker interfering signals and static are rejected by amplifier and selector incorporated in this recorder. Inking mechanism feeds directly down; pen records in vertical position. Tape puller built in with tape reel mounted on panel.
Completely enclosed for table operation, but can be mounted in standard radio panel for monitoring purposes if desired. Size: $14^{\circ} \mathrm{z}$ $221 / 2^{*} \times 19^{\circ}$. Shpg. wt. 90 lbs.
C14083-McElroy SR-900A. Recorder.
Your Cost
\$600.00
McElroy Model TG-815 Tape Bridge


For use with $3 / /^{\circ}$ wide ink-recorded tape, and any make of typewriter. Allows tape to pass freely and smoothly before operator for transcription on typewriter. Bridge supports are readily adjustable to suit individual preference. Maximum overall height $10^{\circ}$ C14080-Your Cost
$\$ 30100$


| NATIONAL <br> aft Couplings and | Mexible Shaft Couplings <br> Isolantite insulation with short length of flexible shafting. Will drive shaft at any angle up to $90^{\circ}$, hafts | Thutest <br> Midget Single Gang Condensers |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Bushings |  | With all the features and characteristics of larger units. Ideal for limited space apparatus. Rotor and |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  | bakelite insulation. Improved ball beang, couf- <br>  |  |  |  |  |  |
|  |  | No. Mmfd. Each No. Mmid. Each No. Mmfd. Each |  |  |  |  |  |
| ${ }_{C 15006}^{C 15014}$ |  |  |  |  |  |  |  |
| C15008 115 |  |  |  |  |  |  |  |
| $\begin{array}{ll}\mathrm{C15017} \\ \mathrm{C15018} & \mathrm{Cl15004} \\ \mathbf{C 1 5 0 0 5}\end{array}$ |  |  |  |  |  |  |  |
| C15009 |  | THTest Gang Condensers |  |  |  |  |  |
| Any Type. |  |  |  |  |  |  |  |
|  |  | All feature heavy metal plates, ball bearing rotors and bakelite insulation. Two and three gang units |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| O-Your Cost Each |  | , |  |  |  |  |  |
| .................. S4c |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
| ass and | $\square$ - All tape $\square^{\circ}$ | All 365 mmfd . per section except cut sections on 456 Kc Super types. |  |  | Rotation |  |  |
|  |  | No.R.Fech |  |  |  |  |  |
| $0^{\circ}{ }^{\text {ex }}$ Brass |  | C9710 |  |  | unte |  |  |
| 5011-6. ${ }^{\text {a }}$ Fibre |  | C9712 |  |  |  |  |  |
| Your | TX-9: Steatite insu- | ${ }_{\text {C9720 }}$ |  |  | counter-clo clock wise clockwise |  |  |
| $\mathrm{Cl}^{15013} 12^{\circ} \mathrm{Fib}$ |  | C9722 1.3 <br> $\mathbf{C 9 7 2 2}$ 2.05 | 3 |  | clock wise |  | . 10 |
|  | TX-10: Canvas bakelite insulation.C8471-Each.............36c |  |  |  |  |  |  |
|  |  | Imm ICA Midget Condensers |  |  |  |  |  |
|  | nel Bearing Assemb | 7\%all ${ }^{\text {a }}$ For communications receivers and transmit |  |  |  |  |  |
|  |  | Compact, rugged and highly efficient. Ceramic Insulation, sturdy lug terminals, single hole mount- |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  | C9731-Capacity 6 to 80 mmid . 11 plates. E |  |  |  |  |  |
|  | Bearing only...........11c | C9727-Capacity 14 to $100 \mathrm{mmid}$.14 plates. Ea |  |  |  |  |  |

## ITHAMMMARLUMDZMaill CONDENSERS

 gal ; $0225^{\circ}$ plates, ${ }^{2}$ shaft. can be sanged; sil ver plated Beryllium wiper; 500 -volt a.c. test.

| No. | Plates | Cap.Mmid | Each |
| :---: | :---: | :---: | :---: |
| C8 ${ }^{\text {03 }}$ | 3 | 5.5-20 | 51.32 |
| C8; ${ }^{\text {2 }}$ * | 5 | 6.35 | 1.38 |
| C8 ${ }^{\text {0 }}$ \% ${ }^{*}$ | 7 | 6.5-50 | 1.44 |
| C8306 $\dagger$ | 11 | 8-80 | 1.56 |
| C8;07* | 11 | 7.3-80 | 1.56 |
| C8508 ${ }^{\text {² }}$ | 14 | 8.3-100 | 1.68 |
| C8509 $\dagger$ | 14 | 7.5-100 | 1.68 |
| C8510t | 19 | 9-110 | 180 |
| C8514* | 19 | 10-140 | 1.80 |
| C8511+ | 27 | 10.3-200 | 1.98 |
| C8512 | 34 | 12-260 | 2.16 |
| C8513 $\dagger$ | 43 | 13.5-320 | 2.40 |

## Dual-Spaced Midgets

 $0175^{\circ}$ air gap: Isolantite insula ticn; single-hole mount; compact. No. Type Mmid Each CE527 MC20MX CE 488+ MC35MXC5 $489+\mathrm{MC} 50 \mathrm{MX}$
Cs502 MC100
Type APC
Aid-Padding Condensers

dered brass plates. $0.15^{\circ}$ air-yap: only $17{ }^{13}{ }^{13} / 6 \times 11 / /^{\prime \prime}$ high.
Screw-driver adjustment: maintain constant capacity under all climatic conditions.

| No. | Cap. Mmid. |  |  | Each |
| :---: | :---: | :---: | :---: | :---: |
| C8623 | 3 | to | 25 | \$0.78 |
| C8624 | 3.9 | to | 50 | . 90 |
| \|C8625 | 1.5 | to | 75 | 1.02 |
| C8626 | 5.5 | to | 100 | 1.14 |
| C8743 | 6.5 | to | 140 | 1.35 |

## Type "HFA" and "HFB' Condensers <br> All cadmium plated brass parts. Iso

 lantite end plates HFB models have insulated control shafts especially designed for circuits where high voltage is connected directly to the rotor: more compact; higher factor of per sonal safety. $100 \%$ soldered construc tion. $1 /{ }^{\circ}$ shafts; all plates sermi-cir-
plates. All rear bearings are single ball thrust

| Stock No. | Hamml'd No. | $\begin{aligned} & \text { Per } \\ & \text { Mmfd. } \end{aligned}$ | Section <br> No. Plates | $\begin{aligned} & \text { Air } \\ & \text { Gap } \end{aligned}$ | Length Ins. | $\begin{aligned} & \text { Your } \\ & \text { Cost } \end{aligned}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C7225 | HFBDIOOC | 100 | 23 | . 050 | 45 | 54.98 |
| c7226 | HFBDIOOE | 100 | 29 | . $070{ }^{\circ}$ | $611 / 16$ | 5.40 |
| C7227 | HFB100E | 100 | 29 | . 070 * | $313 / 6$ | 3.48 |
| C7228 | HFB100F | 100 | 39 | . 100 | 57/8 | 4.14 |
| C7229 | HFAD100A | 100 | 19 | .020 ${ }^{\circ}$ | 238/2 | 3.18 |
| C7230 | HFADI40A | 140 | 27 | . $0200^{\prime \prime}$ | 31/8 | 3.54 |
| C7231 | HFAD100B | 100 | 27 | . 030 " | 320/4 | 3.24 |
| c7232 | HFAD15E | 15 | 9 | . $070{ }^{\prime \prime}$ | 2336 | 2.40 |
| C7233 | HFA100A | 100 | 19 | . $020^{\circ}$ | 113/6 | 1.56 |
| c7234 | HFA140A | 140 | 27 | . 020 " | $13 / 4$ | 1.80 |
| C7235 | HFA10B | 10 | 3 | . 030 " | 35/4 | 1.20 |
| c7236 | HFA15B | 15 |  | . $030^{\prime \prime}$ | 7/8 | 1.26 |
| C7237 | HFA25B | 25 | 7 | . $030^{\circ}$ | $11 / 6$ | 1.32 |
| C7238 | HFA50B | 50 | 14 | . $030{ }^{\circ}$ | 13/8 | 1.44 |
| C7239 | HFA15E | 15 | 9 | . $070{ }^{\circ}$ | 13\% | 1.32 |
| C7240 | HFA30E* | 30 | 17 | . $070{ }^{\circ}$ | 21/2 | 1.50 |

- Uses rear Isolantite panel.
"TC/I X'mitting Condensers
Moderately priced heavy duty transmittin Condensers featuring: heavy aluminum end
plates; Isolantite cross bars; non-inductive Beryllium self-cleaning contacts; full float
ing rotor bearings. Type $L$ has $.025^{\circ}$ plates with plain edges; all others with power outputs ranging from 200 watts to 1 kilowatt

| Stock No. | $\begin{aligned} & \text { Type } \\ & \text { No. } \end{aligned}$ | Cap. <br> Mmid. | Plates | Plate Spacing | Length Ins. | Your Cost |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C9049 | TC-55-F | 60 | 15 | $230{ }^{\circ}$ | 5 | \$4.80 |
| C9048 | TC-150-G | 165 | 37 | $200{ }^{\circ}$ | 93/4 | 8.88 |
| C9043 | TC-110-H | 115 | 23 | .171* | 55 | 5.40 |
| C9035 | TC-90-K | 95 | 11 | .084* | 21 | 3.42 |
| C9034 | TC-440-L | 465 | 43 | 070* |  | 5.46 |
|  |  | "TCD" | Dual | ts* |  |  |
| C8940 | TCD-50-H | 53 | 11 | 171* | 55. | 5.88 |
| C8934 | TCD-80-L | 90 | 9 | 070 | 3215 | 4.98 |

*TCD units are identical with type TC except that stator sections
NOTS! All items on this page are available on please include highest authorized preferencerating.

## "MCD" Split-Stator <br>  Entire ser built n a trong Isolanbase Shield plate between stators Capacities ane for each section. All $31 /{ }^{\circ}$ behind panel <br> \begin{tabular}{|c|c|c|c|} \hline No. \& Type \& Mmid. \& <br> \hline $8519 *$ \& CD140 \& \& 4 <br> \hline C8520* \& C \& 100 \& 3.00 <br> \hline C8521 \& 50N \& 50 \& 2.76 <br> \hline \multicolumn{4}{|l|}{\multirow[t]{3}{*}{Double-Spaced Split-Stator Have wide (.0715') spucing of plates. Other specs. as above}} <br> \hline \& \& \& <br> \hline \& \& \& <br> \hline \multicolumn{2}{|l|}{\multirow[t]{2}{*}{$$
\begin{aligned} & \text { C8490* MCD35MX } \\ & \text { C8528 MCD35SX } \end{aligned}
$$

} \& 131 \& \$2.88 <br>\hline \& \& - \& 2.88 <br>
\hline \multicolumn{4}{|l|}{*Midline. $\ddagger$ Semi-Circular plates.} <br>
\hline \multicolumn{4}{|l|}{"HF/" Micre Condensers} <br>

\hline \multicolumn{4}{|l|}{\multirow[t]{4}{*}{| Single |
| :--- |
| Cadmiumplated, soldered brass plates; Isolantite insulation; single-hole mounting or base nounting. |}} <br>

\hline \& \& \& <br>
\hline \& \& \& <br>
\hline \& \& \& <br>
\hline No. \& Mmid. \& Plates \& Each <br>
\hline C8700 \& 17.5 \& 5 \& \$0.84 <br>
\hline C8701 \& 35 \& 10 \& . 96 <br>
\hline C8702 \& 50 \& 14 \& 1.02 <br>
\hline C8703 \& 100 \& 27 \& 1.26 <br>
\hline C8704 \& 140 \& 37 \& 1.44 <br>
\hline C8705* \& 30 \& \& <br>
\hline
\end{tabular}

## Specs, are given Dual Units

|  |  |  |  |
| :--- | :--- | :--- | ---: |
| C8706 | 50 | 14 | S2.16 |
| C8707 | 100 | 27 | 2.46 |
| C8708 | 140 | 37 | 2.70 |
| C8699* | 16 | 11 | 2.04 |
| C8709* | 28.5 | 19 | 2.28 |

-NOTE-
We can supply any Hammarlund or Bud product not listed here at usual discounts. Specify Mif's. number.

## BUD Jr. X'mitting

 Condensers

Excellently suited for low and medimitters, etc. Each req sire pancl space of $3 \times 27 / \mathbf{S}^{\prime}$. Rigid anc perfectly spaced. Alsimag sta or insulation. Brass rotor and sta or plates, cadmium plated Panel m't'g., plus brackets for chassis m't'g.

| 8 ork | Max. | Air | Rear |  |
| :---: | :---: | :---: | :---: | :---: |
| No. | Murd. | Gap | Lith. | Cost |
| C10621 | 50 | .051* | 21/2 | \$2.15 |
| C10622 | 100 | . $051{ }^{-1}$ |  | 2.32 |
| C10623 | 145 | . $051{ }^{*}$ | $3 \mathrm{H} / 6^{\circ}$ | 2.73 |
| C10624 | 250 | .051 | $4{ }^{6} 16$ | 3.38 |
| C10625 | 25 | . 078 | $2^{7} 16^{\circ}$ | 2.11 |
| C10626 | 55 | . $078{ }^{\circ}$ | 3 | 2.47 |
| C10627 | 110 | . $078{ }^{\text {* }}$ | 4)180 | 3.00 |
| C! 0628 | 20 | .144* | 3* | 2.32 |
| C. 0629 | 55 | .144* | 45/8* | 3.0 |
| C 0630 | 105 | .144* | 71/0 | 4.00 |
| C 0631 | 18 | .175* | $3^{3} 11_{60}$ | 2.59 |
| C 0632 | 55 | .173* | $5{ }^{16}{ }^{\circ}$ | 3.85 |
| C 0633 | 100 | .175* | 9112 | 5.11 |

## 6L6 Neutralizing

## Condenser

 Range 1 to 9 mmfd For tubes like 6L6 $6 \mathrm{~V} 6,807$. RK49.RK39, ctc. Shpg. wt. 1 lb
Your Cost 884


## Tiny-Mite Condensers

Designed for u.h.f. circuits. Extremely compact. Have rigid construction, close fitting bearings, excellent Alsimag 196 insulation. Soldered brass plates are bright cadmium plated. 3 -way mounting. Shaft arrangement on sink
required $11 / 2 \times 11 / 3$

## Single-Gang Condensers

| No. | Mmfd. | Plates | Each |
| :---: | :---: | :---: | :---: |
| C9539 | 3-15 | 5 | \$0.76 |
| C9540 | 4-25 | 9 | . 88 |
| C9541 | 5-35 | 13 | . 94 |
| C9542 | 6-50 | 19 | 1.00 |
| C9543 | 9-100 | 37 | 1.23 |
| C9545* | 4-10 | 7 | . 82 |
| C9546 ${ }^{\circ}$ | 5-15 | 11 | 1.00 |
| C9547* | 5.5-25 | 17 | 1.09 |
| C9548* | 6-35 | 21 | 1.29 |

## BUD TLNY-MITE

 Air Padder Condensers Ideal for circuits requiring a constant conditions, such as oscillator padding circuits. I.F. trans formers.
tuned circuits, etc. Fit standard $132^{\prime \prime}$ dia. forms. Screwdriver or hex wrench adjust ment.
Stock Mmid. L'th. B'hd. Your $\begin{array}{lll}\text { No. Range Panel Cost } \\ \text { cloos8 } & 3-15 & 7 / 8^{\circ} \\ 76 c\end{array}$ $\begin{array}{llll}\text { C10088 } & 3-15 & 7 / 8^{\circ} & 76 c \\ \text { C10089 } & 4-25 & 11 / 8 & 76 c\end{array}$
C10090 6-50 1s: 88c

Single Bearing Midgets
For portable and
mobile use. Single
spaced. Has rotor
spaced. Has rotor
removable rotor
shaft extension. When rotor shaft extension is removed, adjustment is made by means of driver slot. Alr gap . $030^{\circ}$

| Stock | Cap. | B'hd | Your |
| :---: | :---: | :---: | :---: | :---: |
| No.l | Mmid. | Panel | Cost |
| C8394 | $4-15$ | $3 / i$ | $\$ 1.00$ |
| C8395 | $6-35$ | 1 | 1.09 |
| C8396 | $7-50$ | 1. | 1.21 |
| C8397 | $8-75$ | 1, | 1.35 |
| C8398 | $9-100$ | $13:$ | 1.31 |
| C8399 | $10-150$ | $2 \%$ | 1.62 |

Double-Spaced X'mitting Midgets
Hard drawn brass plates and rods elec-tro-soldered and heavAlsimag 196 insula tion Double spring fotor contacts. Wide plate spacing. Double bear ings on single and 2 gang units.

| No. | Mmid. | Gap | Plates | Each |
| :---: | :---: | :---: | :---: | :---: |
| C10827 | 5-15 | . 0840 | 5 | \$1.21 |
| C10828 | 7-35 | . 015 | 11 | 1.41 |
| C10829 | 8-50 | .061* | 15 | 1.50 |
| C10830 | 10-75 | .060 | 23 | 1.85 |
| C10831 | 13-100 | . 060 | 31 | 2.06 |

## 2-Gang Double-Spaced X'mitting Midgets

Heavy ceramic base permits mounting these double-smaced \begin{tabular}{c}
condensers directly to the chassis <br>
\hline C10832 <br>
\hline $6-20^{*}$ <br>
\hline

 

C10832 \& $6-20^{*}$ \& $.060^{*}$ \& $6^{* *}$ \& 52.29 <br>
Cl0833 \& $7-35^{*}$ \& $.060^{\circ}$ \& $11^{*}$ \& 2.44 <br>
\hline
\end{tabular}

## Receiving Midgets

 Semi-circular plate type. Have single bearing (except 2-gang which is builc on ceramic base and has two bearings) and spacing suitable for receivers and $x$ trs.| No. | Mmids.) | Gap | Plates | Emel |
| :---: | :---: | :---: | :---: | :---: |
| C10835 | 4-15 | .024" | 3 | 655 |
| C10836 | 5-35 | . 024 " | 5 | 71 c |
| C10837 | 6-50 | . $024^{\prime \prime}$ | 7 | 76 e |
| C10838 | 7-100 | . 024 " | 14 | 94 e |
| C10839 | 7-140 | . 024 | 19 | \$1.03 |
| C10834 | 7-100* | .024* | 14* | 2.44 |

# TRANSMITTING DIALS-KNOBS 

GORDON Hand Wheels
 Bakelite Wheel with pointer. Fits Tuning controls the appearance of X -mituas and electronic equip-C14641-3 $-3 \mathrm{y}^{\circ}$ Wheel and Pointer with $180^{\circ}$ scale. Each.... 51.23 with $180^{\circ}$ scale. Each.... S1,06 With $180^{\circ}$ scale. Each . . . $\$ 1.09$ C14644-11/8 Wheel and Pointer C14645-11/8 Wheel and Pointer with $270^{\circ}$ scale for gain control Your Cost Each .......... 50.82 HAND WHEELS with pointer only, less scale.

|  |
| :---: |
|  |  |
|  |  |
|  |  |

JOHNSON Shaft Couplings A) $\&$ (B) Ultrasteatite insulated is obtained by cadmium plated phosphor
 bronze spring. (C) A solid insulated Ulraleakage path and accu-
 rate alignment. (D) compression unit.
Cik. No.
C14313*
C14314**
C14316*
C14318
A \& B type. + C type. + D type.
JOHNSON Handle Indicators Etched scales, zero lite handles.
No. 204.
C13015-Each
C13016-Each

## X'MITTER Knobs



For 14
Plack bakelite (except* which black lacquered wood). No. Type Size Each 10 For C13022 A $11 . \mathrm{D}^{\mathrm{d}}$. Each 10 For C13018 C13018
C13004
C13017
$C 130$
Cl
Cl 30
$C 130$
$C 989$

ature Dials Chrome Silver
dials with black dials with black etched numerals
Equipped with finger grip black knob. Only 18 Diameter. Fit from 1-10 over 180 and also 270 degrees. Ideal for matching dials on instruments,
C14234-0-10.180. Your Cost 50c C14235-0-10.270 ${ }^{\circ}$ YourCost50c
MILLEN Worm Drive Right-angle assembly for
variable convariable con
densers, etc May be panel or Ratio 16 to 1
Frame of cast aluminum, Em
 10a
gears which eliminate back lash Driveshaft $1,{ }^{\circ}$ diam. ;geared-shaft means of flexible coupling (not supplied). Excellent for transmitters and receivers. Shjng. Croon-Type $10.000 \$ 4 . \$ 0$
Your Cost Each


MILLBN Dial
0 to 100 Counter
gauge nickel silver gauge nickel silver
dial. Metal scale is insulated from the shaft by a large black bakelite Overall diameter $31 / \mathrm{s}^{\circ}$. Wt. 1 lb . C8078 Your Cost



Pointer and Lever Knobs


Pollsued Black bakelite. All have filled pointers except "D"
ridged top). For $/ 1 / 4$ shafts.

|  | Letb. |  | Type | ch |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C13027 |  |  |  |  |  |  |
| C13028 | 1 |  |  | (A) 6 c |  |  |
| Cl 3029 | 21 |  |  | (B) 9 c |  |  |
| C13055 |  |  |  | (C) |  |  |
| C13052 | 21 |  |  | C) |  | 75 |
| ${ }^{\text {Cl3053 }}$ |  |  |  |  |  |  |
| C13024 |  |  |  |  |  |  |
| C9650 |  |  |  |  |  |  |
| C9651 |  |  |  | (D) |  |  |
|  | dit |  |  |  |  |  |
| NATIONAL HRI |  |  |  |  |  |  |
| Bakelite Knob |  |  |  |  |  |  |
| Yiv2 21 ers and X'irs. $2^{28^{\circ}}$ diani. |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| Fits $1 /{ }^{\circ}$ shafts. Wt. 4 oz |  |  |  |  |  |  |
| C24564 |  |  |  |  |  |  |

## Molded and polished walnut bakelite knobs for $1 / /^{\prime \prime}$ shafts. All are set screw type except those marked with * which are push-button with knobs. <br> 

## NEW! G.C. Knob Puller

Knobs that are
hard to grip can
be easily removed be easily removed
with this knob with this knob
puller. Simplv puller. Simplv
slip the G-C puller slip the G-C puller
behind the knob
and pull it off. Saves thee, bue cato inet, and the knob. Have one in your shop and in your to
C15042-Your Cost.

NATIONAL Type "ACN"


5-Range scale for hand calibra tion, with 0-100 linear scale as guide. 2 extra scales furnished Lucite dial and pointer. 5:1 VerShafts. Wh. 2 lhs. Each. $\$ 3.00$

NATIONAL R \& O Dials


Type R-15/8" Dial. Etched nickel silver, used on many receivers. 180 degrees. Marked 0 -C14568-Your Cost.

Type 0-31/20 Dial. Nickel silver. Marked $0-100.180^{\circ}$ counter-clock wise. Large easy-to-grip knoh c14567-Your Cost

ICA Chrome Silver Dial Plates
Attractive grain
satin finish. Have
graving on Chrome
graving on Chrome
Silver Background
Mates. Finished in 3 differentsizes With various markings. Calibra
tions: $0-100$ tions: $\mathbf{0 - 1 0 0}$
Stock De- Dia, of Your
No. grees Dial Cost


## Etched Metal Plates

## Raised let <br> ters on a hlack etched hackground, SPEAKER O

 wide by ${ }^{1 / 2}$ " highWith following markings:
$\begin{array}{ll}\text { A.C. Input } & \text { Modulator Grid } \\ \text { Amp. Grid Curr. } & \text { Modulator Ilate }\end{array}$ Amp. Grid Curr. Antenna Buffer Plate Curr. lst Buffer Grid 1st Bufier IMate Fílament Voltage Filament foltage 1250 hm Otput Fin. ist ON; 2nd OFF 200 Ohm Output Gain Control Input
50
Ohm Input 125 Ohm Input 200 Ohm Injut 500 Ohm Input
Microphone
ne Ind
Modulation Ind Send
Specify marking desired. 7 C
C9898-Any Type, Each...
10 For (any selection)


## AIL PURPOSE INSULATORS



## National

Siteatite Stand-Offs
 centers. GS-8 has nut and bolt hardware; GS-9 has jack C14486-GS Each. C14187-GS-9. Your Cost Each.

## Steatite "Cones"

Small units tapped $8 / 32$ at tapped 10/32.

| No. | Type | ht | Ea |
| :---: | :---: | :---: | :---: |
| C14493 | GS-10 | ${ }^{1}$ | 7 c |
| C14483 | GS-5 |  | 24 c |
| C19484 | GS-6 |  | 42 |
| C14485 | GS-7 | $3^{\circ}$ | 75c |

## PYREX Insulators

Used by the U.S. Army, Navy and conmercial services. Finest glass insulators made. Long life.
 C1;806 67017 73, Kw. 79 C1 180767021 12 4 11/2 Kw. 2.40

## PYREX Double Lead-Ins

 Have high dielectricstrenkth and low loss. Flanges are wisle and flat. Supber gaskets for jasn nuts, two metal w: shers and two rubber washers ter operation under ter operation under
adverse conditions. W. 2 lbs . C No. Type O.D. C 681467105 2 C $681767115 \quad 6$ 㢈

## Isolantite Plug \& Socket

 For use with XR-16 coil forms.
PB 16 Plug.

Glazed Porcelain Wall Insulator For supporting wiring or apparatus. celain; 218 ${ }^{\circ}$ high. Plated
screw.

1] C16735
10 For


Pyrex Stand-Offs
Non-hygroscopic. Oval glass $110^{\circ}$. Flashover respectively (whendry). Shps. wt. 27
C16808-Each.
c16809-Each $\$ 2.00$
 length 4* With brass No. 67080. fittings as illus
c16810-Each
PYREX "Navy" Bowls
 Clear, Navy type dielectric strength dielectric strength
and low loss. OverHave hole for center Have hole for center
C16815-No. 67009. Base $61 /{ }^{\prime}$ \} ${ }^{80 \mathrm{C}}$ C16816-No. 67037. Base 61516\} ea
 Both types have flanges $8 \%^{\circ}$ in dia. with six $h^{10}$ studs equidistantly spaced
on $7,1^{\circ}$ bolt circle and are approximately $6^{\circ}$ high from bottom of lower flange to top of center pin. $113 /{ }^{\circ}$ per inch. Clear Pyrex bowls
No. 67071 (left) has studs $1^{17}$ 后" lony and in bottom flange three countersunk ${ }^{11} / 88^{3}$ holes on $73 / 4^{\circ}$ circle.

## Strap Insulator

 Heavy duty porcelain tubing or antennas to poles and vent pipes. $18^{\circ}$ to $6^{\circ}$ diam. $10-24 \times 3^{\circ}$ stud. 25C17106 Your Cost Ea. 25 NATIONAL

## Isolantite Stand-Offs

 Metal mounted top andbottom. Shaped for maxi mum efficiency. Ideal for

## r.f. choke



Large Stand-off Insulator
Extra-heavy glazed porcelain. Ribbed body for increased surface. 4* long. Has hole for wire. C16800 Your Cost


NATIONAI Insulators - AA-3Feed er Spread er (top 51/8 diamg.
ter. Will give 600 ohmsur 364 ance with No. 12 wire AA-6 Antenna insulat


## BIRNBACH X-mitter

## Lead-in Insulators



Each $23^{3}$ " high, of vitrified glazed porcelain. With nickel-plated and cork washers to make watertight seals.

| No | Rod | Bushin | Each |
| :---: | :---: | :---: | :---: |
| $C 17037$ | $10^{*}$ | Metal |  |
| C17038 | $15^{\circ}$ | Metal | 76 c |
| C17039 | $10^{\circ}$ | Porcelain | 88 |
| C17040 | 15* | Porcelain | \$1.1 | Feed-Through Hashigh dielectricand mechanical strength. Extra long leakage path. Bottom sleeve base dia. $2^{\prime \prime}$; mtr. C16712-...326

## ICA Standoff

 Insulators Made of white glazed insulex.C16730-1* High... 7 C16731-1 ${ }^{\frac{1}{3}}$


## ICA FEED-



INSULAT C16733-8/4 High, re quir

## HAMMARLUND

## Heavy-Duty R.F. Choke

 por hi rigs working in the $20,40,80$
and $160-$ met er
hands. Six pies on Isolantite core carry 500 ma., cont inuous. Inductance 2.5 mh., d.c. resist. 80 hms . For parallel kc. Type $\mathrm{CH}-500$. \$1 5 Isolantite R.F. Choke For short and ultra-short wave re ceivers and transmitters. Four windings carry 125 ma., induct ance 8 mh . d.c. resistance 70 ohms $13\left\{\mathrm{x} 77^{\circ}\right.$ Type $\mathrm{CH}-8.90$ \&
c8524- Your Cost.

## Midget R.F. Choke

 Suniversal-woundpies on lolatite
core in diamer d.c. resistance 35 ohms, rated at 125 ma
C10002-Type CH-X
Your Cost Each.
$30^{\circ}$ 250 Ma. Choke
Similar to above in design but
rated at 250 ma. for use in medium power riss: inductance 10 ohms d.c. res.
C10038-Each.


BUD UHF R.F.Choke 5.7 microhen-
ries
750 ma

DC resistance 1.4 ohms, 184
C10108-Each.............

NATIONAL
R100, 100U, 300 Chokes


R100. (A) For receivers and low-power trans-
mitters. Four sections on Isolantite. Wir leads. Induct., $21 / 2 \mathrm{mh}$. DC resist., 50 ohms. rating, 125 ma .
dist. ca., 1 mmid.
C14429-Each....... 30 \& R100U - Same as above, for chassis mounting. (B) $\mathbf{C 1 4 4 2 4}$-Your cost R300-Like R100, but 1 mh . in ${ }^{1}$ mmifd. dist. cap. (A) 304

## HAMMARLUND

 Bakelite-Cased Chokes Very effective forbroadcast and SW receivers. Large in-
ductance, low distributed capacity
Bakelite case 1510 ,
dian diam., ${ }^{18}{ }^{\prime \prime}$ high.
 mas ${ }^{420-\text { ohms cour cost } \$ 210}$ BUD H.F. R.F. Choke g vily C10124

## PIUG-IN COIL

## BUD 50-W Plug-

 In Coils cillator and buifer sis visy
coils. Fit $5-p r$. socicet. End link coils not tap-
ped ot hers centerped. tapped. Ceramic base.

Center Find Yari. Cap You | Link | Link | Link | Band Mitd Cost |
| :--- | :--- | :--- | :--- |
| C10634 | C10640 |  |  |
| C10602 | HiOM | $90+51.03$ |  | C10635 Cl0641 Cl0603 80M 7 Ci0636 Cl0642 Cl0604 40M 5 C10637 Cl 0643 Cl $10605 \quad 20 \mathrm{M} 33$ Cto6 38 Cl06.41 Clo606 $10 \mathrm{M} 28 t$ C10639 C10645

Clo $\qquad$ * 95 mmfd . for variable link coil
$\$ 21 \mathrm{mmfd}$ for variable link coil

## TRUTEST Bakelite

Ribbed Plug-In Coil Kit


On ribbed, natural oolor Bakelite forms. Space windings. Wave range printed on card on each coil Windings comprise tickler ang grid input.
grid input. Set of four 4-prong coils cover 15 to 217 meters. Cost. $\$ 1 . \$ 7$ $190-550$ meters. Cost. $\$ 1.8$
C9983 Your

## TRUTEST Tube Base



Short-WaveCoils wound on Bakelite tube bases with prongs. Covers 16 to 225 meters. Tunes 00015 mfd . condenser C9981 - Set of 4 coils 724

HAMMARLUND "XP53" Short-Wave Plug-In Coils


Provide maximum signal strength and greatest selectivity on al bands. Precision wound on natural flange grips for easy handling, and meter indexes for wave-length inscriptions. $11 / 2^{\circ}$ diameter. 27/ ${ }^{\circ}$ long (exclusive of prongs). Have
shelf for padding condenser. Fit shelf for padding
standard sockets.

## SWK4-4-Prong Kit

Kit for four 2-winding coils cover mmid. condenser. $\$ 255$ Individual 4-Prong Colls

## Stock No. Meters Each

C8500 10 to 20 75c
C8474
C8475
C8476
C8477
33 to 75
66 to 150
C9790 250 to 560

SWK6-6-Prong Kit
Kit of four 3-winding coil mmid condense c9789-Your Cost $\$ 3.00$
Individual 6-Prong Colls

## Stock No.

C8501
C8478
$C 8479$
$C 8480$
$C 8480$
$C 8881$
C9791

OHMITE R.F. Chokes


Solenoid chokes designed to avoid fundamental or harmonic resonations. All 1000 ma . No brackets on $21 / 2$ or 5 meter chokes.
Stock Band Mic. Dimens.Your

No. Meters LIys. L. Dia. Cos $\begin{array}{lllll} & 10083 & 21 / 2 & 2.0 & 1^{3} 1 \times 1 / 4 \\ 15\end{array}$ | $C 10079$ | 5 | 5.5 | 13 | 31 |
| :--- | :--- | :--- | :--- | :--- | :--- |
| 10 |  |  |  |  | $\begin{array}{llllll}C 10080 & 10 \& 20 & 30 & 3 \pi \\ \text { C10081 } & 20 \text { \& } 40 & 90 & \text { fx } \\ \text { 7le }\end{array}$ C10082 20 to $160 \quad 200 \quad 61 / 2 x^{3}=97 c$

TRUTEST R.F. Chokes (1) F o u $r$ p ie e $\| \begin{aligned} & \text { on } 1 \text { solant ite } \\ & \text { form. } 2.5 \mathrm{mh} . \\ & 150 \mathrm{ma.} 50 \mathrm{ohms} \\ & \text { de. resistance }\end{aligned}$ distributed cap. 1 mmíd. 15 个 C10107-Sam
ily impregnated. Each..19
C10109 $2.1 \mathrm{mh}, 250 \quad 234$

## MILLEN

## Hash Filters

To eliminate interfer ence caused by mer cury vapor rectifier
82 or 83 yhe
for 86 tis. Connect in each plate lead, close to tube
C 8060
Your $\begin{aligned} & \text { Cost... \$1. }\end{aligned} \mathbf{0}$



## TRUTEST

Transmitting Chokes


1 mmfd . D.C. resistance is 5 ohms for the first, 12.5 ohms for the sec. ond and 34.9 ohms for the last.

| Stock <br> No. | Milli- <br> henrys | Cap. <br> Ma. | Your <br> Cost |
| :---: | :---: | :---: | :---: |
|  | C10234 | 2.8 | 1000 |
| C10235 | 5.5 | 500 | $\mathbf{\$ 1 . 2 9}$ |
| C10229 | 5.9 | 200 | 1.14 |

## Millen RF Choke

Brass tap insert molded in diecast end, with Stea ite standoff at other end sistance, 125 ma . capacity c8058
YourCost Each 364


## NATIONAL

## R-175 Choke

Suitable for series or parallel feed circuits in rigs up to 3000 volts ply. DC resistance 6 ing 800 ma.; inductance 225 merohenries: distrib.cap 0.6 mmfd . 12,500 volts insul. C14398-\$1, 80

# IREPLACFMENT COI/S SuCHOKES 

## CARRON Standard

## I. F. Transformers

Built to highy exacting standards, these double will assure. excellent will assure excelient re-
sults. Low loss trimmers. sults. Low loss trimmers. can. Spaced leads elimi nate "flutter"under vibra-
tion Frecuency 456 Kc C10147-Input
Either Above, Each.... 884

## CARRON Midget

## Iron Core \& Standard

1. F. X'formers

Designerl for use with modern tubes. Wound base trimmer; polystyrene impregnated winding forms double uner spaced away trim mer spaced away from in windings. For use in one
Only $21 / 2$ inches high, $11 / 4$ ' square

## Iron Core 456 Kc

## c10204-Input <br> Cl020s-Cutpu

Either Above, Each
$\$ 1.03$
Standard 456 Kc.
c10206-Input
C10207-Output
$73^{c}$
CARRON Cartwheel I. F.


10456 K
C10146-Each
For unshielded oper
"Universal-Adjustable"

## IronCore Anteana,

R.F. and Oscillator

## Coils

Will replace broadcast band coils in practically curately track with other coils in the receiver when properly adjusted. Exact induc lance of burned out coil easily matched with screw driver adjust ment of the iron core. Will im-
prove gain and selectivity. Oscil prove gain and selectivity. Oscil-
lator coil can be adjusted from 175 to 520 kc . and used witheither cut plate or padding condenser circuits.

Unshielded Coils Stock No. Type
c10007-A Antenna C10007-Antenna C10008-RF Fina $80^{\circ}$ C1000s-Oscillator

## Shielded Colls

 As above but with Black crackle C10120-Antenna Each $\left.\begin{array}{l}\text { c10121-RF } \\ \text { c10123 ()scilator }\end{array}\right\} \$ 1 \begin{aligned} & \text { Each } \\ & 29\end{aligned}$

## 'Permeability Tuned'r I.F.'s

Drift-proof transformers similar to the above but permeability tuned with adjustable iron cores. $13 / 4 \times 13 / 8 \times 314^{\circ}$ C10386- 456 kc .* Input C10387-456 kc.* Interstage C10388- 156 kc .* Output *Range $440-500 \mathrm{kc}$. $\$ 1$
Any Above Each.

## 

## Electrical Coils to Your Specifications

## We are prepared to furnish all types of electrical windings to your

 specifications-solenoid, form and bobbin windings, universal and universal progressive wound coils. Send us your coil specification for quantity quotations and del
pla Replacement Primaries Permit serviceman to
make repairs with make repairs with
minimum of expense and time. Antenna in ductance 1.7 MH Mif Individuall packed to prevent tangling of long leads. Stock No. C10300 C30301 C10302 C10303 C10304 C30305 C10306
Any Type Above
Yny Type Above,

## Type Inside Diam

 Anten$\qquad$
$\qquad$ R.F.
Antenna
R Antenna ntenna

Dowel Type Primaries For use inside of coil form. Drille dowels $1 / 1 / 2$ inch long. R.F. inducM.

C10201 $)^{\text {P }}$ Outside Coil Diam. C10202 $1 / 2^{\prime \prime}$ Outside Coil Diam Elther Above
Your Cost, Each

> Oscillator Coils for Electroa Coupled' Converter Tubes


Use with converter
tubes such as the 6 SA . Urnished in dowel wound I. F. frequencies only. 4.4
C10237-Your cost.

## CARRON R. F. Chokes All purpose r.f. chokes wound on steatite dowels. Both winding and $\quad$ If sealed permanently

 against humidity.
## gainst humidity.

curately rated. Mounted on "L" hracket, placing lugs in easy con-
necting position. necting position. Excellent replacements.

| ock | Inductanc | Your |
| :---: | :---: | :---: |
|  | in MH. |  |
| C10209 | 5.5 | 14 |
| c10210 | 7.5 |  |
| c10211 | 10.0 | 29 |
| C10212 | 30.0 |  |
| C10213 | 60.0 |  |

## Unshielded Universal

## Adjustable Coils

 Exact inductance of replaced ooil cover-
ing $550-1715 \mathrm{KC}$ matched easily Oscillator coil adjust-
able from 175 to 520 kc . Have universal mounting facilities and can be mounted in originar shield or used as is.
ductance adjusted by slipping core in or out of coil and then set with radio cement. c10307-Antenna C10308-Auto Radio Antenna C10309-R.F
C10310- Oscillator Any Type Above,
$59^{〔}$
Your Cost, Each

For listing of Carron replacement cones
see page 23.

Ultra Midget Coils
Furnished shielded and unshielded. Universal Progressive "litz" wire on impregnated on imTapped for the police Tapped for the police band. Even gain over broadcast hand. Tune
 $550-1715 \mathrm{kc}$ with 365 MMF condenser. Size $13 / 6 \times 1 \%^{\circ}$ long. Mount ing centers Shíeld
10311 Shielded Type
C10311-Antenna
Each
41 ${ }^{\text {¢ }}$

## Unshielded Type

c10313-Antenna
324
C10314-R.F. Each We and R. F. Coils
Pee Wee


Designed for service replacement in miniature sets. Secondaries pro gressive" wound with pregnated forms. I ligh impedance primaries and coupling turns provided to ive couping turns provied to 3.C. band. Ear lug mounting also perforated bracket for all mountng methods.
C10315-Antenna
C10316-R.F.
Each $32^{¢}$
Litz Ant. \& R. F. Coils Employ new type bank
winding for practically onstant gain and selec-
ivity over B.C. band.
High impedance priwith 356 MMF condenser mprermated $7 / 6 \times 21 /$ " tube Round cans with spade bolt mtg on $1^{2}$ centers. 17 /621/4

## Shielded ype

C10318-R.F.
Unshielded Type

Univ. bracket; standoff mountg C10319-Antenna

## -Meismer COILS

## MEISSNER "Plastic" I.F. Coils

 Stable-Compact-Wide RangeA new transformer in which the trimmer base and the special plastic material permits holding dimensions to ${ }^{\text {spenthin }} .0005^{5}$. Trimners "floated" away from the base with an air-gap between the bottom plate and plastic base. Wide range. Compact in size; $1 / 4$ square by $24 / 2$ high. Specially-served Litz wire. Double tuned. Meta shield can. Unaffected by tem.
$\left.\begin{array}{lllll}\text { Silk. No. } & \text { Meissner No. } & \text { Set at Kc. } & \text { Range KC } & \text { Each } \\ \text { C10373 } & 16-6649 & 175 & 140-200 \\ \text { C10376 } & 16.6652 & 262 & 200-310 \\ \text { c10379 } & 16.6655 & 370 & 305-480 \\ \mathbf{C 1 0 3 8 3} & 16-6658 & 456 & 400-550\end{array}\right\} \mathbf{6 5 4}$

Oscillator Coils For 190 to 550 meter broadcast band. Used with .000365 mid condensers;
Shielded type is 13 1/ Hith1 ${ }^{1 / 2}$. D. Used
w.
wirs.and r.f. and anten
not supplied.

No. Freq. Padder
Shiclded K.C. Mmid
$\begin{array}{lll}C 10029 & 175 & 900 \\ \text { C10031 } & 456 & 350\end{array}$
Your Cost-
Shielded.
Your CostUnshlelded.

In addition to the Meissner items Ilsted above, we are stlll able to supply many of the Meissner numbers formerly avallable. Write for Information and prices on your requirements. mounted in $1^{\prime \prime \prime}{ }^{\prime} \mathrm{d}$. cans $2^{\prime \prime}$ high. Shpg. wt. 1 lb, each.
C10005- SHIELDED
C10006-R,F. Coil $\}$ Ea. 394 C10003 UNSHIELDED
$\left.\begin{array}{l}\text { c10003-Ant. Coil } \\ \text { c1000-R. Coil }\end{array}\right\}_{\text {Ea. }} 294$

Compact
Ant. and R.F. Coils
Compact coils designed particularly for use where 17 ? ard
space is limited $190-550$
meters with 365 nmmfd meters with 365 mmid
variable condenser. High impedante primary. Litz fनि diam., 1\% long. Shielded coils

## DeLuxe Air-Tuned

 Iron Core I.F. X'formersHigh gain Ferrocart I.F. transformers tuned
with "Align-Aire" airtuned trimmers. Excellent for communicaceivers. Non-microphonic. Air trimmers permit $3600^{\circ}$ of micrometer tuning. Double tuned. Black crackle finished cans $2 \times 2 \times 433^{\prime \prime}$. Set at 456 KC Freq. range 415 to 540 KC .
C10264-Input
C10265- Interstage
C10266-Output
Ferrocart (Iron Core)

## IF Transformers?

Double-tuned I.F.'s with low-loss trimmers.
Accurately made of the best materials and oscil-loscope-tested for gain and selectivity. Mounted in $133^{\circ}$ square by finished cans. Leads are RMA-color-coded.

Input Output KCt at Range | Input | Output | Ke |  |
| :--- | :--- | :--- | :--- | Your Cost Each.

## MEISSNER Manual

A handy "How to Build" instruc tion manual. Instructions on how o build all Meissner models rom 1 tube through FM and tele. vision receivers.
 C19978-Your Cost..


Relays by GUARDIAN Overload Relays
Oversize silver SPST contacts rated at 1500 watts non-inductive or 1000 watts induc-
tive 110 volt AC load. Contacts lock open, cannot be reset. or held in contact until overload is removed. Coil insulated for 200
volts- to be used in series with negative lead in DC power supplies.
C14113-Guardian L250. Breaks circuit at 250 MA. Max- $\$ 5$
imum drop across coil 10 volts. Your Cost.............
C14122-Guardian L500. Breaks circuit at 500 MA. Max-C14122-Guardian L500. Breaks circuit at 5000 MA Mä. Mä- $\$$ S. Antenna and High Frequency Relays
oversize silver contacts handle 1 KW in AF Low capacity oversize silver contacts handle 1 KW in AF or RF circuits at frequencies up to 28 MC. Alsimar insulation; 110 volt AC coils.

C14118-Model R-100 SPST, Normally Open. Your Cost..... 51.85 | C14115-Model R-100-B SPST, Normally Closed. Your Cost.. | 1.85 |
| :--- | :--- |
| C14117-Model A-100 DPDT. Your Cost......................... |  | C14114-Model A-100-C SPDT. Your Cost.

Keying Relay-SPST Normally Open
Silver contacts handle 1500 watts non-inductive or 1000 watts induc-
tive at 110 volt AC. Clean make and break at potentials of to volts. Insulated for 5000 volts. Coil operates on $11 / 2$ to 4 volts DC or C10123-Model K-100. Your Cost. Break In Relay
Specifically designed for break-in operation of transmitters. $1 /$ ind $^{*}$ fine
silver contact points handle 1500 watts non-inductive or $1000^{\text {wat }}$ wats silver contact points handle 1.500 watts non-inductive or 1000 watts
inductive 60 cycle AC. Two sets of SPST contacts, 110 volt 60 cycle C14125-Model B-100. Your Cost...................... \$5.06


LEACH Four-Pole Relay
A heavy duty relay with two sets SPST contacts, normally open. All metal parts are brightplated and ally sonamelled to prevent corrosion. Contact arms and springs are heat-treated beryllium copper, and contacts are $1 /{ }^{\prime \prime}$ pure silver, slightly crowned. Each set of contacts is rated at 6 amperes at 115 volts AC. Relay coil consumes 6 VA at
115 volts AC . Normal pull-in voltaye, 92 volts; drop-out voltage 75 volts. Base and insulation are natural brown canvas bakelite. Base size C14251-Leach No. 2129BF. Your Cost
$\$ 3.95$
ALLIED Control Relays
Type "PC". Available for AC, DC and plate cirbe adjusted to pull in at from 6 to 8 ma. and drop out at 3 to 5 ma. Contact ratings of all models 5
amps. of non-inductive AC load (not to exceed 10 operations per minute at maximum rating; speed can be increased with smaller
coin silver. Insulated bracket.

| S.P.D.T. | Each | Coil | D.P.D.T. | Each |
| :--- | ---: | :---: | :---: | ---: |
| C14105 | $\$ 1.57$ | $2500-$ ohms | C14097 | $\$ 2.94$ |
| C1106 | 1.67 | $6 \mathrm{~V} . \mathrm{AC}$ | C14098 | 3.14 |
| C14107 | 1.57 | $6 \mathrm{~V} . \mathrm{DC}$ | C14099 | 2.94 |
| C14108 | $\mathbf{1 . 6 7}$ | $110 \mathrm{~V} . \mathrm{AC}$ | C14121 | 3.14 |



# HEADPHONES $\operatorname{Cr} A C C E S S O R I E S$ 



Compact, efficient phones featuring power

ful magnets, molded caps, steel head hands with new type adjustable clips concealed terminals. With C13928-2000 ohms Per Set
C13929-3000 ohms Your Cost, Per Set C13930-5000 ohms Your Cost, Per Set

## BRUSH Crystal Phones

Range 60 to 10.000 c.p.s. High impedance. Molded brown cases sealed to insure against tampering. Light and comfortable.
Double Headset. Fig. A. Two With 5 ft . cord. C13924-
Your Cost
Single Headset. Fig.
\$6.47 hearband with rubber
. Metallic c13922 Y Yur cost... $\$ 3.47$ Lorgnette Phone: Fig. C. Single phone with chromium and black enameled handle. Extends from $12^{\prime \prime}$ to 17. 5 ft cord. Shpg. C13923\$4.41


## ARMY-NAVY Type

 Detector Dust-proof. Aneasily adjusted crystal unit equipped
with a super-sensiwith a super-sensicats whiske Cl3916-234

Stand with Crystal Ball and socket swivel arm for point on crystal quickly and easquickly and easily. Attractively nished with
 crystal that is tested for extra sensitivity. Clip termina
C13917-Complete $14{ }^{\circ}$ 10 For \$1.26

Fixed Crystal Detector in Bakelite Case Supersensitive point found by meters and fixed permanently. In Bakelite case
tions.
C13913 Your Cost
4.5

Mounted Galena Crystal Galena (lead sulphide) has been used for years be cause of its extreme sens:tivity. These units have
beencarefully selected and beencarefully selected and tested. 10 For 54c.
C13900-Your Cost

Super-Sensitive Crystal

[37Gets more stations and gets
them louder. Each crystal is meter-tested after selec-C13901-Each 10 For


Cat Whiskers Finestwire-correct tension-hive spot
C13921
Envelope of 3. Your Cost

All Headphones are currently avallable only on priority. For mmedlate delivery, please extend your highest priority ratling with your order.

2000-Ohm Headset
C13892 Complete. Your Cost.
C13893-3000 ohms Your Cost. C13894-Cap for above.


## $\$ 1.05$ <br> $\$ 1.33$

## "EMPIRE" DX Type Headphones

 Made especially for DX fans. Have featherweight shells and a one-pieceadjustable steel headhand with adadjustable steel headhand with adjustable clips. Each unit has a power-
ful bi-polar magnet and a BAKELITE $\mathrm{C} \wedge$ P. Nlighly sensitive. Wt. 2 lbs. 2000-0hm Headset C13895-Diaphragm. Each
"EMPIRE
 " Single Unit Headsets Similar to above, but one phone. Clock-siee C13896- 1000 -ohm single set. Your Cost c13897-15 00 -ohn single set

714 Your Cost.


## TRIMM Featherweight Phones

Liphtweight-only 4 oz. Reautifully made. Bakelite shell and cap. Forged coble
magnets. Adjustable steel headband.
C13919-24,000 ohms impedance. C13918- 1,000 ohms impedance. $\$ 5.88$ Your Cost Each.

TRIMM Dependable Headset Well made low priced set. Bakelite shells and caps. Chrome steel magnets. c13914-2000 ohms. Your Cost Per Pair
$\$ 2.23$
 Professional Headset: Similar but 4,000 ohms. C13915-Each $\$ 2.73$ Professional Headset: DeLuxe super-sensitive phones. Exceptionally rugked. 3 year guarantee. A favorite of commercial operators. C13908-17,000 ohms imp., with army-navy type plug. C13939-Same but 600 ohms impedance. Your Cost, Either Type C13912 Same as C13908 but less plug
$\$ 9.40$ C13938-Same as C13939 but less plug
8.23
8.23

CANNON-BALL Headphone Kit


When installed, the user can enjoy headphone reception only, speaker reception only or both together comnecting cable, adapter with connecting cable, adapter with three-way switch and an insulated panel, spejacks on an insulated panel, special Empire phones with $6-12$ cord
and complete installation instructions. Shpg. wt. 3 llss. C13944Your Cost
Complete Kit.... \$208

Camnon Ball "Chief'

## All Bakelite Phones

1 High grade, sensitive phones in
molded bakelite mousings. Proleather covered adjustable head band and $5-\mathrm{ft}$. cord. Concealed termina
2 llss.
2000 ohms imp. C13948-Per Set 3000 ohms imp. C13949-Per Set.


Extension Cord Connector Has 2 openings, at eit her end, for inserting two pintips. Moided body.
C23051
10 For.

Headphones
 Moisture proof. Shps. wt. 2 lbs. C1392s-17,000 ohms impedance. C13927-Same as above, but low Your Cost Each \$10.53 Either Type....... Hard rubber insulation. Black acetate shell. Fits standtate shell. Fits stand-
ard phone jacks. Each. Headphone Cushions Soft rubber. Fit all headphones.
C13943-Pai
 10 Pairs for

Phone and Speaker Cords


## Cotton Braid Insulation

 $\left.\begin{array}{rcc}\text { No. } & \text { Type } & \text { Feet } \\ \text { C13955 } & \text { Double* } & 5 \\ \text { C13956 } & \text { Doublet } & 5\end{array}\right\}$ Y C13957 Singlet 5 14e Headphone cord. Cor Cords Tinsel Center Double cotton braid insulation $\begin{array}{lcc}\text { Stock No. } & \text { Feet } & \text { Your Cost } \\ \text { C13945 } & 10 & 25 c\end{array}$ C13946 20 36c C13947t 30 55c *Spade tips one end; straight tips other. $\dagger$ Pin tips both ends.Popular Phone Plugs

## U1 Le? $\begin{aligned} & \text { For } 1 \text { or } \\ & 2 \text { phone } \\ & \text { or speak- }\end{aligned}$ er cords. Bahelite shell. $28^{8} x^{2}$ i"

 C14974-BlackC14971-Red. Each
10 For
Metal Shell Type Same with niciseled brass shell $32 \times 3 / 0$ For $\$ 4.75 \quad 534$
C14970-Each. "Stubby" Metal Shell As above but with short metal shell
$2^{1}$ overall. 10 For $\$ 3.75$ 21 overall. 10 For $\$ 3.75$
C14959-Each Midget Bakelite Plug Bakelite shell. 21/4" overall $\times$ "盾 diameter. Solder lug connections. C14960-Black C14963-Red Your Cost 10 For $\$ 2.85$ 32f Each
RAAAAAAAAAAAAABAB 4 For a completelisting of all types of phone plugs please $\checkmark$ refer to pages $19,26,86$.


A progressive radio training program, from fundamentals through basic receiver and transmitter operation, may be designed around these kits. After construction of the complete series, matched Individual units may be hooked up together for further instruction in modulation, frequency checks, antenna measurements, etc. (Lafayette's Engineering Service wlli gladly supply other kits, should your program so require.)
These kits include all components required as well as hardware, wire,
solder, etc. Chassis and cases are punched and finished. Large, easy-to-read schematic diagrams are supplied. Quallty parts and ease of assembly permit units to be torn down and re-wired time and again.
These kits have been supplied in large quantities for use in the U. S. Army Training Schools and the U. S. Army Signal Corps courses. For more detailed Information on our Training Kits send for our speclal Radio Training Kits Circular.


## 7 Tube TRF Demonstrator Kit

Comprises many progressive project possibilities in one unit. Can first be assembled to operate as a battery-powered detector. Rec tifier can then be wired in for A.C. operation. This can be followed tifier can then be wired in for A.C. operation. This can be followed
by a single r.f. stage, then a single a.f. stage. Later another stage by a single r.f. stage, then a single a.f. stage. Later another stage of r.f. can be wired, to be completed by the final push-pull power
output stage. Tip jacks and jumpers are provided as a means of output stage. Tip jacks and jumpers are provided as a means of
operating each stage separately or in conjunction with other stages after assembling. Chassis of ample size so that voltage output and other measurements can be made conveniently from the top of chassis. Frequency coverage from 550 to 1700 Kc .

Tubes used: 2 -6SK 7 r.f. amplifier stages; 1-6C5 detector; 1 - 6 L .5 1st a.f. and $2-6 \mathrm{~V} 6 \mathrm{GT}$ push-pult beam power audio output and an 80 rectifier. Operates from 115 volt A.C. $50-60$ cycle source; battery supply plug provided for use in primary stages until power supply section is completed
Chassis has corner posts to supnort assembly on bench. Chassis size: $3 \times 13 \times 17^{\prime}$. Complete with all parts, tubes, speaker, but less size: $3 \times 13 \times 1 \mathrm{l}$. Smp . wt .20 ibs . LRC-70-Your Cost


## Power Supply Kits

Designed as companion units to operate the Lafayctte kits requiring external power source. Use of these power supplies reduces cost and unnecessary duplication of parts since only one or two supplies are needed to operate a complete series of kits. Tapped variable voltage divider provides intermediate voltages which, with both filament and high voltages, are terminated at a standard 7 prong socket. All Lafayctte kits use the same standardized socket and plug arrangement, allowing instant interchangeability. Three section fifter, with two heavy-duty chokes, and a switch to disconnect the input fitter condenser to demonstrate differences between condenser and choke filter input. In addition to their use as power source for the Lafayettc kits described, these dependable units may also be used as a hum-free supply for other receivers, amplifiers, and small transmitters. Complete with all parts and an 80 type rectifier tube: ready to assemble and wire. Chassis size: $5 \times 91 / 2 \times 111^{\prime \prime}$. For 115 volts 50 - 60 cycles A.C LRC $-20-350 \mathrm{~V}$. at 70 Ma and 6.3 V . at 3 A . Shpg. wt. 12 lbs . Your Cost
LRC-30-350 V. at 140 Ma and 6.3 V . at 3 A Shpg. wt. 15 lbs . Your Cost
$\$ 7.75$
$\$ 11.00$


## High

Frequency Transmitter Kit
An ideal unit for instruction in high frequency techniques, exciter circuits and frequency multipliers. Oscillator circuit operates on 7 MC as either crystal controlled or electron coupled oscillator at the fip of a toggle switch. Second stage operates as doubler or quadrupler depending on choice of finat operating frequency, and final stage operates as doubler to 28 or 56 MC . Jacks are provided in the cathode circuits of each stage for plate current readings. The LRC4.0 amplifier kit may be used as a modulator, and power may be supplied for both modulator and transmitter by one LRC-30 or two LRC20 power supply kits. One LRC-20 will operate the transmitter alone.
Complete with three 6V6GT tubes, 28 and 56 MC coils, and all other necessary parts. Less crystal. Chassis, $51 / 2 \times 10 \times 3^{\prime \prime}$. Shpg. wi. 8 lbs .
LRC-60-
Your Cost
\$15.90

## Audio Amplifier Kit

A high gain two stage resistance coupled amplifier, utilizing a GSJ7 input stage, and 6F6 out put stage. llas sufficient gain to operate with high impedance microphones or phono pickups. Because of its excellent response characteristics and simplicity it is ideal for use in plotting response curves and in teaching basic audio response curves and in teaching basic audio
theory. Fully shielded output transformer with 4-8-16-500 ohm output impedances. Can be used to amplify the LRC-10 kits, or as a modu. lator for the LRC-60 transmitter kit. One LRC20 supply will operate the unit alone; use two LRC-20 or one LRC- 30 supply if used with the LRC-60 transmitter. Complete with input and output connectors, tubes, and all other necessary parts. May be used with any good PM sary parts. May be used with any good PM Shpg. wt. 8 lbs.
LRC-40-
Your Cost

## Signal Generator Kit

All essentials for building an electron coupled oscillator using a 6SK7 tube to provide a reliable unmodulated signal source free from frequency drift. May be used to align receivers or to demonstrate oscillator circuits, and ir properly calibrated, as a simple frequency meter. Plug-in coil form and magnet wire furnished; Winding coils to desired frequency provides excelient training in computing inductance and capacity. (Factory wound coils for specified frequencies can be supplied on quantity orders.) Has phone jack on front panel for external modulation, and pin jacks for output on top of case. Requires LRC-20 power supply for operation. Metal cabinet measures $5 \times 9 \times 6^{*}$, with carrying handle. Complete with tube, all necessary parts, and diagram, but less power supply. Shpg. wt. 9 lbs.
LRC-100
Your Cost.
$\$ 8.50$

## IIffillilitw inllivirwewate



## 5-TUBE AC-DC DEMONSTRATOR

An excellent demonstration unit desikned principally to simplify instruction in the theory of radio circuit design and operation, circuit analysis and trouble shooting, and proper use of test equipment in repair work. Multiple snap connectors are used on each tube element for signal and voltage measurement; also at circuit junctions so that each coil, condenser or resistor may be opened, or, where it will not damage the unit, shorted out to simulate actual conditions in defective receivers. Circuit diagnosis by use of test equipment can be practised receivers. Circuit diagnosis becessity of wiring in parts which are actually defective. All trimmers are easily accessible from the front of the panel for demon-
stration of alignment procedure. stration of alignment procedure.
Consists of a 5 tube $A C-D C$ superheterodyne, covering a frequency range of 540 to 1600 KC , with the following tube line-up: 12SA7 ist detector and oscillator; 12SK7 intermediate frequency amplifier; 12 SQ 7 and detector and 1st audio; 50L6 beam power output; 3525 rectilier.
Component parts are mounted adjacent to their schematic positions om a large diagram printed in four colors on an off-white background. Grid circuits are in green, plate circuits are in blue, positive potential (B plus) circuits are in red, and the balance of the circuit is in black, in accordance with RMA standards. Durable enamels, which will not easily chip or scratch, are used throughout.
The imprinted $30^{\circ} \times 36^{\circ}$ Lignolite panel mounts in a handsome blacklacquered hardwood frame, doubly reinforced at each corner, which measures $30 \% 4^{\prime \prime}$ high, $363^{3 /}$ long, and $3^{\prime \prime}$ deep. The assembled unit may he hung on a wall, or placed on a desk or bench in vertical position. Two removable mounting feet provide adequate and sturdy support.
For operation from any $110-120$ volt. AC or DC, $50-60$ cycle power
For For operation from any $110-120$ volt. AC or DC , $50-60$ cycle power
source. Available in kit form, with every necessary part supplied, and source. Available in kit form, with every necessary part supplied, and
with four-color panel completely finished and drilled, or in completely assembled and wired form, ready for operation.
LRC-80-Lafayette Demonstrator, in kit form. Your Cost
LRC-81-As above, assembled and wired.
\$39.50
$\$ 57.50$


## COMPLETE TRANSMITTER TRAINING KIT

This excellent training kit consists of a 6L6G Hartley type oscillator, a 6L6G neutralized amplifier, a 6L6G modulator and 52,3 rectifier. All coils are ready-wound on porcelain forms, using heavy copper wire to prevent easy damage. Completely punched and formed chassis of heavy enamelled steel. With the exception of meter and microphone every necescary part is supplied, including a neon bulb for meter-less tuning and a Mazda bulb for dummy loading. An antenna tuning circuit is provided, which works into low impedance antenna or a dummy load. Cathode circuit of the modulator tube provides button current for any single button carbon mike.
All controls and switches are located on the front panel with the exception of the gain control, which is located on the rear of the chassis and may be adjusted by means of a screwdriver. Three toggle switches control the power supply, one in the AC line, one in the nepative power supply lead (to control the plate supply to the tubes without the necessity of removing filament voltages), and one to remove the plate supply to the RF amplifier stage while neutralizing. A red pilot piate supply to the RF amplifier stage while neutralizing. A red pilot green pilot light in series with the negative lead lights when plate voltage is applied and at the same time acts as a fuse to prevent excessive current from damaging any of the component parts. The green pilot also aids in tuning if no meters are available, with lowest brilliance indicating resonance. Off resonance current, however, will not injure tubes or parts. Oscillator tuning control calibrated throughout range of transmitter, 3.1 to 6.5 Mc . Oscillator circuit may be keyed for CW. Metering jacks provided in oscillator, amplifier and modulator cathode circuits.
Chassis measures $17 \times 10 \times 3^{\prime \prime}$ with corner posts extending $5^{\circ}$ above chassis to permit placing unit in any position for wiring or test. Kit includes all tubes, coils, chassis, wire, hardware, solder, etc., all packed in a compartmentized carton with location diagram printed in lid of carton. Parts list, chassis layout and oversize schematic diagram supplied with each kit. Shpg. wt. 20 lbs. LRC-250-Your Cost.
$\$ 29.00$


## One and Two Tube Kits

Ideal for use in elementary radio training, for instruction in detector operation, regeneration. and simple alignment procedure. Both kits use a 6J5GT regenerative detector, and the two tube kit has a 6SK7CT RF stage in addition. Identical chassis and panels are used in both kits, so that the one tube kit may be easily converted to a two tube with an RF stage with a minimum of additional parts. Frequency range 550 to 1700 KC . Operates from either LRC 20 or LRC 30 power supplies. Chassis and panel completely formed and punched. Panel size, $51 / 2^{\prime \prime} \times 7^{\prime \prime}$; Chassis 7 " $\times 4 \frac{1}{1 / 2} \times 131^{\prime \prime}$. Complete with tubes, but less headphones and power supply. Shpg, wt. 3 lhs.
LRC-10A-One tube kit.
$\$ 452$
Your Cost
Cost
LRC-10B-Two tube kit. Your Cost LRC-10C-Parts to convert 1 tube
into 2 tube. Your Cost.


Article A DAPT
Adapters, Resistance Cord 6 Adapters, Phone Plug... 19 Adapters, Phono

## AERIALS.

## Kits

Lead-in Strips Lightning Arrestors Loop
Alarm System
Albums, Record
Aligning Tools
Amplifiers, P.A.
Arc Welders
Arrestors, Lightning
Attenuators.
Audio Transformers
47, 48, 49, 50, 51
Auto Radio Accessories

## $3^{A}$ <br> FFLES, Speake

Ballast, Line
Batteries.
Batteries, Storage
Battery Plugs.
Belts, Drive.
Benches,
Binding Posts Bits.
Blanks. Record
Blow Torches
BOOKS 37, 45, 73, 76-80, 85
Brackets, Angle Brackets, Pilot Light
Brackets, Sub-pane
Bulles, flashlight
Bulbs, Fluorescent
Bulbs, 6 Volt
Bulbs, Neon
Bulbs, Pilot
Bulbs, Tungar
Bus Bar
Bushings
CABINETS Radio
Cabinets, Meta
Cabinets, Record. ${ }^{\text {12, 74, }} 75$
Cabinets, Speaker
Cable Connectors 56, 57, 65
Cable, Battery
Cable, Coaxia
64,65
Cables, Microphone. 19, 64 Cable, Speaker Carbon Granules Carbon Resistors 39, 40, 82 Cartridges, Pickup. Cases, Carrying Cement. $\qquad$
$23,53,68$
Charger, Battery
Chassis, Metal
Chokes, Filter . 47, 48, 79
Chokes, R.F 51, 52, 81, 84
Circle Cutters
Clamps, Cable
Clamps, Bridge
Alligator

## Battery <br> Cable.

Fahnestock
Code Apparatus
59.61
19.59

66, 89, 90, 91
coils
Antenna
Assemblies
Dope
Forms
1.F.

Oscillato
Plug
speaker Field
Coil Winder

Artic
CONDENSERS

## Bathtub.... $32-32-38,82$ By Pass By-Pass... 32-38.81.84 32-38, 81

 Electrolyti Filters. 1ica.. 32 Neutralizing
Oil-Filled.
36.3 Transmittine 32, 33,34 $35,37,38,86,92,93$ Trimmer
Variable
Vibrator.
Cones, Speaker
Connectors, Mike
Connectors, Cable
Controls, Line Voltage
Controls, Photo-Electric 51
Controls, Power. 41, 43, 44,
Controls, volume ...17, 43 ,
Converter P 44, 45, 46, 81
Converter, Power.
Cord, Connectors.
Cords. Appliance
Cords, Extension
Coupling, Shaft
Crystal Detector
Cushions, Phone
Cutters, Circle.
DIALS
Dial Drives
Dial Drives
Dial Lixhts
Dial L.jxhts
Dial Light Paint Dial Plates

## Drills

Driver Uni
Dry Cells

## ELECTRIC Eye Units

 Eliminators, Aerial Eliminators, Bater Eliminators, Noise EnamelExciter Lamps
Extension Cords
Extension Shafts. 44, 45, 92
FIELD Coils, Speaker 23 Filament TransformFilter Chokes... 48, 51,52 Filter Condensers. 32, 33 , Filters, Interference 34,3 Fittings, Microphone Flashlight Bulbs
Flashlight Cells
Fluorescent.
Flux, Solder
Fuses
Fuse Mounts
Fuse Retainer
GALENA, Crystal Gauges. Generators. Grille Cloth Grinder. Grommets Ground Clamps Ground Rods

HNDSET Telephone. 16 Hardware . .59, 60, 65

## Headphones

## \section*{Heater} <br> Horns

Hydrometers.

- NVERTERS Insulatars, Aerial Insulators, Aerial....65, 95 Insulators, Feed-through. 95 Insulators, Spreader. Insulators, Stand-off. . . 95 Inter-Communicators 14, 15 Interference Filters..53, 66 Inverters.

92, 94.
86, 99
Article Page

ACKS. 19, 26. $57,61,86$
Jewels, Pilot Light...
KEYS, Telegraph 86,8 KEYS, Telegraph.86, 89,

Aerial
Ballast Kits Cabinet Repair Coils. Coils...
Hardware . . . 38, 84,85 Hardware
Photo Cell. Resistor Training Volume Cont. 100, 101 Knobs, Nail-it
Knobs, Radio.
Knobs, X'mtg
AFAYETTE Baffles Converters Receiver Kits... 100,101 Speakers Training Kits.... 100, 101 Tubes
Lacquer.
Lamps, Exciter
Lamps. Neon.
Lead-ins, Aerial.
Leads, Test
Lightning Arresters
Lubricant
Lubricant
59. 60,61

McelROY Code A
Meters.
Meter Accessories.
MICROPHONES.
Accessories 17, 18
Cables.
Connectors
Contact Mikes
Stands.
Transformers
Motors, Phono
Motors, Timing
Mounting Strips.
NA ME Plates ceedles, Phonograph. Needies, Recording Neon Glow Neutralizins Tools Noise Eliminators
Noise Eliminators. 44

$\mathrm{O}^{\mathrm{H}}$0 HM Indicators. 53, 66 Practice.

## Outlets, Baseboard

PACKS, Batter
P. A AMPIIFIER

Paint PANELS
Paste, Soldering
Phone Cords
Phone Plugs
Phone Tips
PHONOGRAPH
Accessories
Adapters
Cabinets
Cartridges, Replace ment
Lubricants
Motors.
Needle Cups
Pick-ups
Stroboscope
Photo-Electric Cells
Photo-Electric Units
Pilot Light Brackets
Pilot Light Bulbs.
Pitch
Plating Outfits
Plugs, Attachment.56,
Plugs, Banana


Plugs, Phone
Plugs, Mike.
Pluge, Tip
Plugs, Tip.
Polystyrene
Potentiometers
Posts, Binding
Power Packs.
Power Transformers 47,48
Projectors, Speaker. .21, 22
Punch, Metal...71, 72, 75
ir
CKS. Radio Receivers 104 3rd Cover

Reamer
Receptacles
Records, Code Record Albums Record Cabinets Record Labels. Recording Discs Recording Heads Recording Needles Rectifiers, Copper Oxide. 6 Reducers.
Regulators, Voltage.... 6

## RESISTORS

## Carbon

39, 40, 82
Kits. C....
Meter Multipliers... 39-41
Sliders
Wire Wound
$7,56,64$
esistor Tubes
Resistor Tubes.
Resistance Indicators. . . 39
Rheostats

## Ruler

AWS, Hack Scratch Remover
Screen Grid Cap
Screws. ....... $59,60,84$
Screw Drivers Shafts, Extension . . 44, Sharpeners, Needle Shielding
Shields, Tube
Shims, Cone Centering ${ }^{53}$

## SHIPPING

## INFORMATION

Sliders, Resistor

## Sockets

Sockets, Tube
Solder.
Solder-Pots
Soldering Irons.

## Spacers

Spaghetti Tubing
SPEAKERS $20,21,22,83$

## Accesso

Cabine
Cones.
Driver Units
Field Coils
Housing.
Repair Service
Stands
Sprayers
Springs, Dial

| Springs, Microphone . $\quad . \quad 19$ |
| :--- |

Stands, Mike 18,
Stands,
Soldering Iron.
Stands, Speaker
Staples.
Storage Batteries
.65, 72
Strips. Terminal
Stroboscope
Suppressors.

## SWITCHES

Anti-Capacity. ......
Atlachment....
43-46
64

## Gang

Jack.
Mike Stand
Momentary
Mu.
Push-Button
Rotary . 43, 44, 45, 46,

Article
Tap.
Toggle.

# Lafayette Radio Componation 

## PRIORITY INFORMATION

RADIO SERVICEMEN - DEALERS - REPAIRMEN
GOVERNMENT AGENCIES - INDUSTRIALS - SCHOOLS
You are permitted, under W.P.B. order L-265 to purchase needed repair parts. For further information on how to do so see page 1.

Always submit your highest priority for best possible deliveries. High priorities frequently enable us to obtain material otherwise unavailable.

## HOW TO ORDER

Use our convenient order blank (additional blanks sent on request). Please write in ink, legibly, and not more than ONE item to a line. Make sure you write the exact stock number and that the price is the one quoted for the item you want. Specify how we shall make shipment by checking the preferred square "Parcel Post", "Express", etc. We shall follow your instructions, but will change them wherever we are sure that such a change is to your better interest. Please keep all correspondence or remarks relative to your order on a separate sheet of paper Make sure you include sufficient postage; all overpayments prompty refunded (if overpay-
ment is under 10 c , we will credit your account)

## DOMESTIC ORDERS

We buy for cash and sell for cash; this explains our low price policy. We do not carry credit ac counts, and we pass on to our customers all savings affected by the elimination of costly bookkeepink. We will ship C.O.D. if desired, providing a deposit of at least $20 \%$ accompanies your order. C.O.D. parcels may be shipped to $U$. S. territories. On small orders, remittance in full saves you extra costs.

## FOREIGN ORDERS

On foreign orders we require payment in the United States by irrevocable and confirmed letter of credit against documents, or $50 \%$ deposit with order, balance sight draft against B/L. All quotations F.O.B. our warehouse. with slight additional charge for export packing. Orders up to $\$ 25.00$ rayable in full in advance, including postage. All remittances payable in U. S. funds.

## $2 \%$ TRANSPORTATION

## ALLOWANCE

On mail orders of $\$ 25.00$ or more, we allow you to deduct $2 \%$ from the total as transportation allowance, with the following exceptions: All Lafayette and National Co. products; all items sold under Fair Trade regulations; all items marked "Shipped Postpaid"

## RETURNS

If you find it necessary to return any merchandise for adjustments, please write in advance stating the following: reason for return-when and where purchased - number of sales slip (if purchased over the counter). If your ship ment Is recelved damaged, obtain a report from the postmaster or express agent and mail it to us. Use a separate sheet of paper for all adjustment matter; do not add remarks to a new order for parts. Do not Include money in the package you return. When returning merchandise, pack carefully, insure, and write your name and address on all packages and letters. Adjustments may take 10 days.

## FINAL PRICES

Prices shown in this catalog are net, and except where marked POSTPAID, do not include postage. All discounts have been deducted, including $2 \%$ discounts for cash. Prices are subject to change without notice; we give customers the benent of all reductions taking place after

## POSTPAID ITEMS

Items marked "Shipped Postraid" do not require postage. Postpaid items refer only to shipments made within the 18 states of the U. S. only (does not include U. S. possessions).

## SENDING MONEY

The safest and best way to send money is by:
American Express; Post Ollice or Telegraph Money Order; bank drafts; firm checks; stamps. Do not send cash. If absolutely necessary to remit cash, send by registered mail only.

## PARCEL POST RATES FOR ALL ZONES

Parcels up to 8 ounces may be shipjed anywhere $\mid$ widest point. Example: a package 35 in. long, in the United States for 6c. Parcel post shipments to any zone must not exceed 70 pounds. The limit of size on all parcel post packages is 100 inches in length and girth combined, at

10 in . wide and 5 in . high measures 65 in . in length and girth combined (length 35 in., plus $t$ wice 10 in . width, plus twice 5 in. height, equals 65 in .).

| $\begin{aligned} & \text { Weight } \\ & \text { In } \\ & \text { Pounds } \end{aligned}$ | First Up to 50 Mi . | $\begin{aligned} & \text { Second } \\ & 50 \text { to } \\ & 150 \mathrm{Mi} . \end{aligned}$ | $\begin{aligned} & \text { Third } \\ & 150 \text { to } \\ & 300 \mathrm{Mi} . \end{aligned}$ | $\begin{aligned} & \text { Fourth } \\ & 300 \text { to } \\ & 600 \mathrm{Mi} . \end{aligned}$ | $\begin{gathered} \text { Fifth } \\ 600 \mathrm{to} \\ 1000 \mathrm{Mi} . \end{gathered}$ | $\begin{gathered} \text { Sixth } \\ 1000 \text { to } \\ 1400 \mathrm{Mj} . \end{gathered}$ | $\begin{aligned} & \text { Seventh } \\ & 1400 \text { to } \\ & 1800 \mathrm{Mi} . \end{aligned}$ | Eighth Over 1800 Mi . |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 | \$0.08 | \$0.08 | \$0.09 | \$0.10 | \$0.11 | \$0.12 | \$0.14 | \$0.15 |
| 2 | . 10 | . 10 | . 11 | . 14 | . 17 | . 19 | . 23 | . 26 |
| 3 | . 11 | . 11 | . 13 | . 17 | . 22 | . 26 | . 32 | . 37 |
| 4 | . 12 | . 12 | . 15 | . 21 | . 27 | 33 | . 41 | . 48 |
| 5 | . 13 | . 13 | . 17 | . 24 | . 33 | . 40 | 50 | . 59 |
| 6 | . 14 | . 14 | . 19 | . 28 | . 38 | . 47 | . 59 | . 70 |
| 7 | . 15 | . 15 | . 21 | . 31 | .43 | . 54 | . 68 | . 81 |
| 8 | . 16 | . 16 | . 23 | . 35 | . 49 | . 61 | . 77 | . 92 |
| 9 | . 17 | . 17 | . 25 | . 38 | . 54 | . 68 | . 86 | 1.03 |
| 10 | . 18 | . 18 | . 27 | . 42 | . 59 | . 75 | 95 | 1.14 |
| 11 | .19 | . 19 | . 29 | . 45 | . 64 | . 82 | 1.04 | 1.25 |
| 12 | . 21 | 21 | . 31 | . 49 | . 70 | 89 | 1.13 | 1.36 |
| 13 | . 22 | . 22 | . 33 | . 52 | . 75 | . 96 | 1.22 | 1.47 |
| 14 | . 23 | . 23 | 35 | . 56 | . 80 | 1.03 | 1.31 | 1.58 |
| 15 | . 24 | . 24 | . 37 | . 59 | . 86 | 1.10 | 1.40 | 1.69 |
| 16 | . 25 | . 25 | . 39 | . 63 | . 91 | 1.17 | 1.49 | 1.80 |
| 17 | . 26 | . 26 | . 41 | . 66 | . 96 | 1.24 | 1.58 | 1.91 |
| 18 | . 27 | . 27 | . 43 | . 70 | 1.02 | 1.31 | 1.67 | 2.02 |
| 19 | 28 | . 28 | . 45 | . 73 | 1.07 | 1.38 | 1.76 | 2.13 |
| 20 | 29 | 29 | .47 | .77 | 1.12 | 1.45 | 1.85 | 2.24 |
| For Each Addedlb. Add | 1c | 1c | 2c. | $31 / 4 \mathrm{c}$ | 5 c | 7c | 9 | 11 c |

## EXPRESS CHARGES

Express charges are also determined by the $\mid$ signee from shipper The following chart enweight of the shipment and distance of the con- $\mid$ ables you to estimate charges.

| Maximum Distance in miles | 50 Mi . | 150 Mi . | 300 Mi . | 500 Mi. | 750 Mi . | 1000 Mli | 1500 Mj. | 2000 Mi . |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| cost up to 5 lhs. 1 | \$0.25 | \$0.25 | \$0.25 | \$0.30 | \$0.35 | \$0.45 | \$0.50 | \$0.72 |
| " 10 lths. 1 | . 30 | . 30 | . 31 | . 40 | . 50 | 65 | 70 | 1.34 |
| $\cdots{ }^{*} 15$ lbs. 1 | . 30 | . 34 | . 41 | . 51 | . 67 | . 73 | 1.00 | 1.96 |
| " ${ }^{\circ} 20$ lbs. 1 | . 30 | . 42 | . 51 | 61 | 85 | 9.4 | 1.30 | 2.57 |
| * * 25 lbs. 1 | . 35 | . 50 | . 61 | . 78 | 1.04 | 1.15 | 1.60 | 3.19 |
| ** 35 Ibs. 1 | . 45 | . 66 | . 82 | 1.05 | 1.41 | 1.57 | 2.20 | 4.42 |
| ** 45 lns. 1 | . 55 | . 82 | 1.02 | 1.34 | 1.79 | 1.99 | 2.80 | 5.66 |
| " 55 lhe. 1 | . 65 | . 98 | 1.23 | 1.59 | 2.16 | 2.40 | 3.40 | 6.89 |
| ". 75 lbs. | . 85 | 1.30 | 1.63 | 2.13 | 2.91 | 3.24 | 4.60 | 9.36 |
| " **95 lbs. | . 99 | 1.60 | 2.04 | 2.67 | 3.66 | 4.08 | 5.80 | 11.83 |
| For Ea. 100 lbs. | . 99 | 1.60 | 2.04 | 2.70 | 3.74 | 4.18 | f. 00 | 12.34 |

## INSURANCE

Parcel post insurance rates are: 5 c for parcels up to $\$ 5.00$; 10 c for parcels from $\$ 5.01$ to $\$ 25.00$; 15 c for parcels from $\$ 25.01$ to $\$ 50.00$; 25 c for parcels from $\$ 50.01$ to $\$ 100.00$. After $\$ 100.00$ extra. ALL PARCELS WE SHIP MUST BE INSURED.
Express insurance rates are: for shipments under $\$ 50.00$, no extra insurance charge; for shipments valued from $\$ 50.01$ to $\$ 150.01$ charge is 10 c . For each additional $\$ 100.00$ value or portion thereof, charge is 10 c

## EXPRESS \& FREIGHT SEIPMENTS

Express and Treight shipments are sent trans portation charges collect. If your station has no agent, please send sufficient money to cover transportation. Charges are the same either way. All over-payments are promptly refunded.

## C.O.D. SHIPMENTS

Transportation charces on C.O.D. parcels are slightly higher than those sent prepaid. C.O.D. charges in addition to the regular postage costs outlined above are as follows (including insur ance): When value of parcel is up to $\$ 5.00$ the extra charge is $12 \mathrm{c} ; \$ 5.01$ to $\$ 25.00$ the extra charge is $17 \mathrm{c} ; \$ 25.01$ to $\$ 50.00$ the extra charge
is $22 \mathrm{c}: \$ 50.01$ to $\$ 100.00$ the extra charge is 32 c . is $22 \mathrm{c} ; \$ 50.01$ to $\$ 100.00$ the extra charge is 32 c ; $\$ 100.01$ to $\$ 150.00$ the extra charge is 40 c ; $\$ 150.01$ to $\$ 200.00$ the extra charge is $45 c$. For each $\$ 50.00$ value above $\$ 200.00$ the charge is 5 c more (including insurance). The Post Ofice also charges an extra small money order fee on each C.O.D. parcel. Save these fees by remitting in full.
NOTE: EEviriment bult or ordered esjecially to meet customers requirements not subject to exchange, credit or refund. All orders for special merchandise must be accompanied by a deposit.

## hallicrafters

 COMMUNICATIONS-EQUIPMENT

## Model S-22R SKYRIDER MARINE

While designed particularly for marine use in the 600 and 700 meter bands, this receiver is capable of covering a complete tuning range from 16.7 to 2730 meters ( 110 kc to 18 mc ) thus making it ideal for any commercial or other service requiring a receiver operating within this range. The complete range is covered in four bands with an accurately calibrated main tuning dial having a scale length with an accurately calibrated main tuning dial having a scale length
of $339^{\circ}$ and a separate mechanical hand spread dial. Both sensitivity of $339^{\circ}$ and a separate mechanical band spread dial. Both sensitivity and selectivity are of arligh order. Image rejection at the higher
frequencies is particularly good due to the use of 1600 kc i.f. transformers
Other features include: beat frequency oscillator, matched built-in speaker, automatic volume control, individual coils for each band, sensitivity and gain controls, pitch control, tone control, sendreceive switch and phone jack. The receiver is designed for operation from either 110 voles a.c. or d.c. Can be operated from 6 -volt d.c. storage battery by using converter listed below. The complete receiver is housed in an attractively finished steel cabinet measuring $181 / 2 \times 91 / 4 \times 8 \frac{1}{2}$
C21078-Model S-22R SKYR|DER MARINE for 110 V . a.c. or d.c. With tubes and speaker. Shpg. wt. 35 lbs .

## Your Cost.

$\$ 7450$
C14225-ELECTRONIC COnverter Model 302 for 6 -volt battery operation of Skyrider Marine. Shpg. wt. 11 lbs. Your Cost

S19.40


## Model S-20R SKY CHAMPION

The new improved model of this famous communications receiver now employs nine tubes and incorporates many new and valuable features. Covering the complete range from 545 kc to 44 mc in four bands it employs a stage of pre-selection on each band for added sensitivity and selectivity. It performs like a thoroughbred and is instantly responsive to each control. Among the controls provided are: r.f. gain or "sensitivity", audio gain or "volume", tone control. automatic volume control switch, beat frequency oscillator switch with its attendant "pitch" control, band switch, main tuning control and separate band spread control, "off-on" switch and "stand-by" or "send-receive" switch. Among the circuit features you will find: electrical band spread, automatic noise limiter, two i.f. stakes, drift compensated high frequency oscillator, r.f. amplifier, etc. While the receiver is designed for 110 volts $50 / 60$ cycles a.c. operation a plug and jack is provided to permit operation from batteries or vibrapack.
The tube lineup: 6SK7 R.F. Amplifier, 6 K 8 1st Detector-Mixer H.F. Oscillator, 6SK7 1st 1.F. Amplifier, 6SK7 2nd 1.F. Amplifier, 6SQ7 2nd Detector, A.V.C. 1st Audio, 6F6G 2nd Audio, 6H6 Noise Limiter, 6J5GT B.F.O. and 80 rectifier. A matched built-in speaker and inertia type tuning controls further add to the completeness of this excellent receiver. It is housed in an extremely attractive steel cabinet measuring $18 \frac{1}{2} \times 93 / 8 \times 8 \frac{1}{2}$. Shpg. wt. 34 lbs .
C21093-Model S-20R SKY CHAMPION complete with tubes and built-in speaker.
Your Cost.
\$54.50


The most sensational portable ever designed! Not just a midget stuck into a carrying case, but a precision-built communications recciver in portable form. All the selectivity, sensitivity and stability you would expect only from the finest fixed station sets is yours in this new receiver that is truly universal It will operate on either 110 volts a.c. or d.c. or from its self-contained batteries (approximate battery life 100 hrs .). It has a self-contained collapsible antenna which can be extended to nearly 3 feet. It covers four antenna which can be extended to nearly 3 feet it covers fou complete bands- $542-1490 \mathrm{kc}$, $1.43-4.35 \mathrm{mc}$, $4.12-11.9 \mathrm{mc}$ and automatic noise limiter, electrical bandspread, high gain antenna automatic noise limiter, electrical bandspread, high gain antenna
coupling circuit, permeability tuned r.f, and i.f. circuits, neon lamp coupling circuit
indicator, etc.
The average sensitivity is below two microvolts on all bands. Tube lineup: 1 T4 r.f. amp., 1R5 mixer, 1P5GT 1st i.f., 1P5GT 2nd i.f., 1H5CT 2nd det.a.v.c.1st audio, 305GT output amplifier, 1G4GT beat oscillator, 1G4GT noise limiter and 50 Y 6 GT rectifier. Controls include: main tuning-hand spread-R.F. gain-A.F.gain-band switch - power switch - a. Y.c. "off-on" switch - BFO "off-on" switch-ANL "off-on" switch-send-receive-standby switch Connectors: doublet antenna socket - long antenna socket phone jack. Dimensions: $7^{\prime \prime}$ high, $81 / 2^{\prime \prime}$ wide and $131 / 4^{\prime \prime}$ deep. All operating controls on front panel. Net weight including all batteries is 18 lbs. Shpg. wt. 23 lbs .
C21084-Model S-29 Sky Traveler.
Your Cost, Complete with Batteries
$\$ 69.50$


## Model SX-25 SUPER DEFIANT

One of the finest values that Hallicrafter has ever offered in the communications field! It has so many outstanding features that we hardly know where to begin. Most unusual in a receiver at this price are perhaps its extreme selectivity and its more and better audio amplification. Then there is the automatic noise limiter, the separate calibrated band spread dial for the $10,20,40$ and 80 meter bands, the compensated ultra-stable oscillator, the six-step variable selectivity control, the " S " meter, the 8 -watt push-pull output stage, the laboratory checked piezo quartz crystal filter. Four tuning bands cover the complete range from 540 kc to 42 mc . The tube lineup: 6SK7 1st r.f. amp.; 6SK7 2nd r.f. amp.; 6K8 lst detector-mixer-h.f. oscillator; 6SK7 lst i.f. amp.; 6SK7 2nd i.f. amp.; 6SQ7 2nd det.-AVC 1st audio amp.; 6SQ7 phase inverter; 2-6F6 p.p. output stage; 6 H 6 automatic noise limiter; 6.15GT beat frequency oscillator and 80 rectifier. Send-receive terminals, headphone jack, 5000 ohms or 500 ohm output, posts for single wire or doublet antenna are provided. Both i.f. stages are expanded in the "Broad IF" position for high fidelity performance. The automatic volume control circuit keeps nost signals at a uniform level. The automatic noise limiter reduces interference by as much as $70 \%$. The extremely low noise level of the Super Defiant makes it sensitive to very weak signals. Cahinet of the Super Deflant makes it sensitive to very weak signals. Cahinet
dimen.: $191 / 2^{2}$ long, $91 / 2^{\prime \prime}$ high and $111 /{ }^{*}$ deep. For 110 V . $50 / 60$ dimen.: $191 / 2^{2}$ long, $91 / 2$ high and $111 /$ deep. For 110 . $50 / 60$ cycle a.c. oferstion. A socket is provided for d.
either batteries or a vibrapack. Shpg. wt. 67 lbs .
C21240-Model SX-25 complete with tubes, crystal; less speaker. Your
s94.50
C21193-10" PM Speaker in Table Model Cabinet. Shpg. wt. 17 lbs. Your Cost.


## The Amplifier to Satisfy All Moderate Power P.A. Requirements $\star$ Foux Input Channels-Three Microphone and One Phono $\star$ New Triple Range Blectronic Compensator-Bass, Treble, Intermediate

Now, more than ever before, Industry and the Armed Forces require an amplifier which will deliver under the most severe condi-tions-and continue to stand up. Wherever the need may be, in industry, on the home front, or at the war front, a Lafayette amplifier will take the punishment and do the job-for the greatest length of time. This Lalayette 35 watt DeLuxe All-Purpose Amplifier is the perfect solution to your moderate-power public address and sound projection problems. Combining every desirable feature of advanced sound engineering with many new and worthwhle Lafayette developments, feature for feature it is far ahead of the field. Ideal for use in kactory, office, warehouse, barracks, of arsenal -or paging, music to boost morale Onir raid warnings, and many other uses Only one of its many outstanding features is the Triple Range Electronic Tone Compensator, offering complete and instant control of three tonal ranges-bass, treble and intermediate register, each governed by a separate electronic audio channel. The unique dual control system permits the operator to boost or attenuate the high or low frequencies to insure excellent tone and clarity, regardless of the acoustical qualities of the installation location. Com pletely different from conventional bass and reble equalizer circuits, inducing none of their power loss and distortion
Four input channels are provided for three high impedance microphones and one high impedance phonograph pickup. Any high impedance crystal, dynamic or velocity microphone may be used.
Full-range electronic mixing is accomplished between all of the microphoneinputs and the phono input. Each microphone channel has an individual preamplifier tube, which prevents interaction between input controls when mixing. In the Model

EL35 Lafayette amplifier, one of the micro phone inputs is of the low impedance type for uses where extromely long microphone lines are required. Taps are provided to supply input impedance of 50,200 , or 500 ohms. The remaining two microphone in puts and the phono input are high imped. ance type, and both low and high imped. ance type, and both low and high imped ance inputs may be mixed as in the EX35. A new built-in electronic remote control control permits mixing and full-range volume cantrol of any two inputs from a remote paint. The SRCSO remote control unit is sold as an accessory and need not be purchased when it is not desired to operate the amplifier from a remote point
Oatput impedances of $4,8,15,250$ and SCO ohms are brought out to a terminal strip and two speaker sockets. Output fmpedances at the speaker sockets may be instantly changed by means of a lead which is connected to the desired impedance on the terminal strip. This insures correct and ready matching for any number of speakers. Designed primarily for use with PM speakers or driver units, but speakers with AC field exciters may also be used. The AC line is brought out to two pins on the speaker socket for convenience in using this type of speaker.
Amplifier is housed in a sturdy, handsome metal cabinet with an illuminated sloping control panel
A complete line of microphones is listed on pages 16, 17 and 18, speakers, wall baffles and trumpets on pages 20, 21 and 22.

## Model EX35-L afayette 35 watt Ampli-

 lier with high impedance inputs and al features as described above, complete with tubes and input and output plugs, but less miczophone and speakers. Size $16 \mathrm{~m}^{\prime \prime}$, $\times 8$ l.". Your Cost.............. $\$ 8210$
## TECHNICAL SPECIEICATIONS

POWER OUTPUT: 35 watts normal. Less than $5 \%$ distortion); 50 watts peak.
GAIN: Microphone inputs 130 db ; Phono input 90 db
FREQUENCY RESPONSE: 30 to 14,000 cycles plus or minus 1 db . Tone compensa cyclas plus or minus 1 db . Tone compensa-
tor range; Bass Control - 15 db . to +13 db .
 +8 db at 10,000 cycles.
INPUT CIRCUITS: Four input channels-3 microphone inputs and 1 phono inputMay be mixed simultaneousiy
INPUT IMPEDANCES: All microphone and phono inputs high impedance. Model EL 35 has one low impedance input of 50,200 or 500 ohms and 2 high impedance micro phone and 1 high inupedance phono inputs. OUTPUT JMPEDANCES: $4,8,15,250$ or 500 ohras, available at terminal strip os two speaker sockets.
REMOTE CONTROL PROVISION: Built-inprovides complete mixing and fading any 2 of the 4 avalable CONTROL PANEL, Illuminated, with theee microphone controls, one phone contral, 2 electronic tone corrector controls and ÁC puwer switch.
TUBES: 3-7B4, 2-7F7, 1-7B4, 1-7C7, 1-6F6, 2-6L6G, 1-5W4 1-5X 4 POWER CONSUMPTION: 190-watts, 117 volts, $50-60$ cycles A.C.

## Remote Control Model SRC50-Remote

 contral for use with either of the amplifers listed. Complete with 50 ft. of cable and plugs. Shpg. wt. 10 lbs . Your Cost. . S647 Model EL35-Lafayette 35 watt Amplifler similar to EX35 but with one low impedance and two high impedance microphone inputs, and phono input. Low imped200 or 500 ohms.22. 

[^0]:    MILITARY AND INDUSTRIAL SUPPLIERS. Lafayette Radio Corp., as authorized distributors of Jensen speakers, can supply specially designed speakers manufactured to your individual requirements in reasonable quantities on priority. Send us your

[^1]:    ＂DA＂Metal Cased Paper By－Pass Condensers
     Non－inductively wound．Wax uy terminals．

    ## 400 Volts D．C．Wkg．

    No．
    ci277
    C1278
    C1278
    C1342
    C1343
    C1344
    C1345
    C1346 600 Volts D．C．Wkg． C 1348
    C 1350 Each
    $\$ 0.47$

[^2]:    We will make every effort to supply merchandise as ordered, but during the present emergency we must reserve the right to

    ## NOTE

[^3]:    5
    5
    5
    7
    7
    7
    7
    7
    7
    10
    10
    10
    10

