

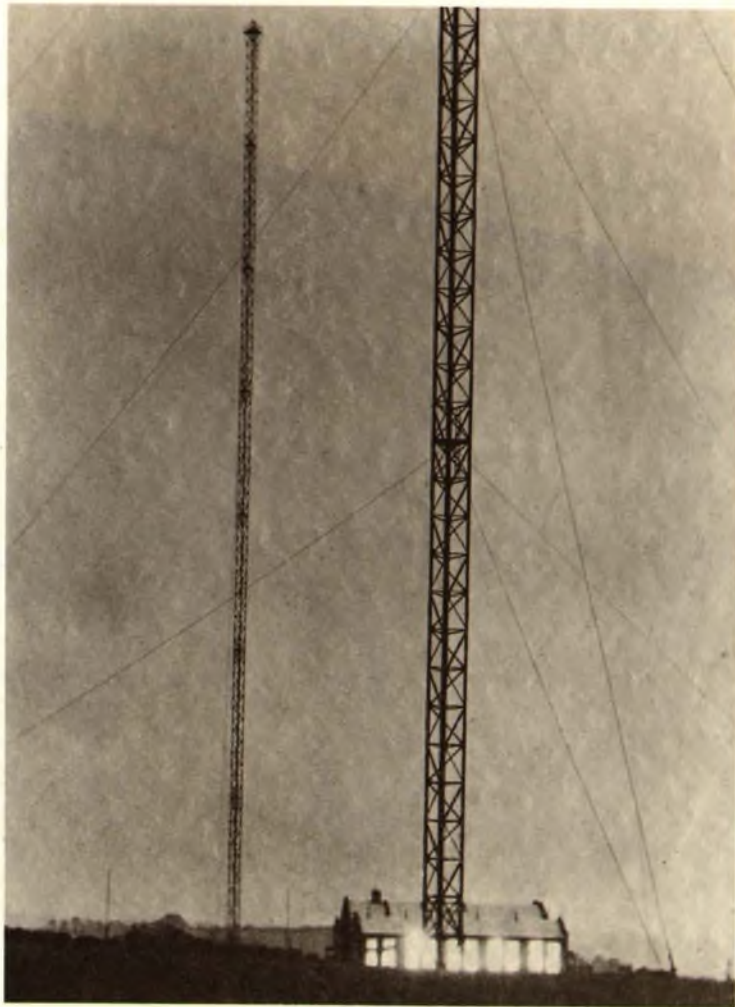




BBC DAVENTRY

1925-1992

DAVENTRY CLOSING....



The closure, at 11.30 GMT on Sunday 29 March 1992, of Daventry's Sender 24, transmitting on 15070 kHz to South West Europe and North Africa, marked the end of nearly 67 years of BBC Broadcasting from the Borough Hill site.

This booklet, which provides a short pictorial history of Daventry Transmitting Station, is a tribute to the technical innovation and achievement of those 67 years at Daventry and to the commitment and dedication of the staff.



OPENING

Daventry Transmitting Station was opened by His Majesty's Postmaster-General on 27 July 1925.

A special train brought the Postmaster-General, along with the Chairman and Directors of the British Broadcasting Company, from London Euston to Daventry. The opening ceremony included the recital of a poem, specially written for the occasion by Alfred Noyes, and a live broadcast on the new 5XX long-wave transmitter of music played in the London Studio by the 2LO Military Band.

5XX was the first of the BBC's transmitting stations to broadcast a national programme and to cover a sizeable proportion of the UK population. Prior to its opening BBC programmes were available to the local population at some of the larger towns and cities from 19 low power transmitter installations.



A group at the opening: Sir William Bull, Captain P.P. Eckersley (BBC Chief Engineer), Lord Gainford, Sir W. Mitchell-Thomson (Postmaster-General), and Mr (later Sir John) Reith (BBC Director-General).

THE STATIONS OF THE BRITISH BROADCASTING COMPANY JULY 1925

2LO The LONDON STATION started its transmissions in November, 1922

5IT	Birmingham	November	1922	5PY	Plymouth	March	1924
2ZY	Manchester	November	1922	5EH	Edinburgh	May	1924
5NO	Newcastle	December	1922	6LV	Liverpool	June	1924
5WA	Cardiff	February	1923	2LS	Leeds & Bradford	July	1924
5SC	Glasgow	March	1923	6KH	Hull	August	1924
6BM	Bournemouth	October	1923	5NG	Nottingham	September	1924
2BD	Aberdeen	October	1923	5ST	Stoke-on-Trent	October	1924
2BE	Belfast	October	1924	2DE	Dundee	November	1924
6FL	Sheffield	November	1923	5SX	Swansea	December	1924

5XX THE HIGH POWER STATION, DAVENTRY

27 July, 1925

THE DANE TREE

The opening of 5XX prompted the writing of the poem, 'The Dane Tree', by Alfred Noyes. It was recited at the opening ceremony.

Daventry calling ...Dark and still,
The dead men sleep, at the foot of the hill.
The dark tree, set on the height by the Dane,
Stands like a sentry over the slain.
Bowing his head above their tomb,
Till trumpet rends the seals of doom.
Earth has forgotten their ancient wars,
But the lone tree rises against the stars,
Whispering, "Here in my heart I keep,
Mysteries, deep as the world is deep.
Deeper far then the world ye know,
Is the world through which my voices go..."

Daventry calling ... Wind and rain,
Against my voices light in vain.
The world through which my messages fare,
Is not of the earth and not of the air.
When the black hurricane rides without,
My least melodies quell its shout.
My mirth and music, jest and song,
Shall through the very thunders throng.
You shall hear their lightest tone,
Stealing through your walls of stone.
Till your loneliest valleys hear,
The far cathedral's whispered prayer.
And thoughts that speed the world's desire,
Strike to your heart beside your fire.
And the mind of half the world,
Is in each little house unfurled.
Till time and Space are a dwindling dream,
And my true kingdoms round you gleam.

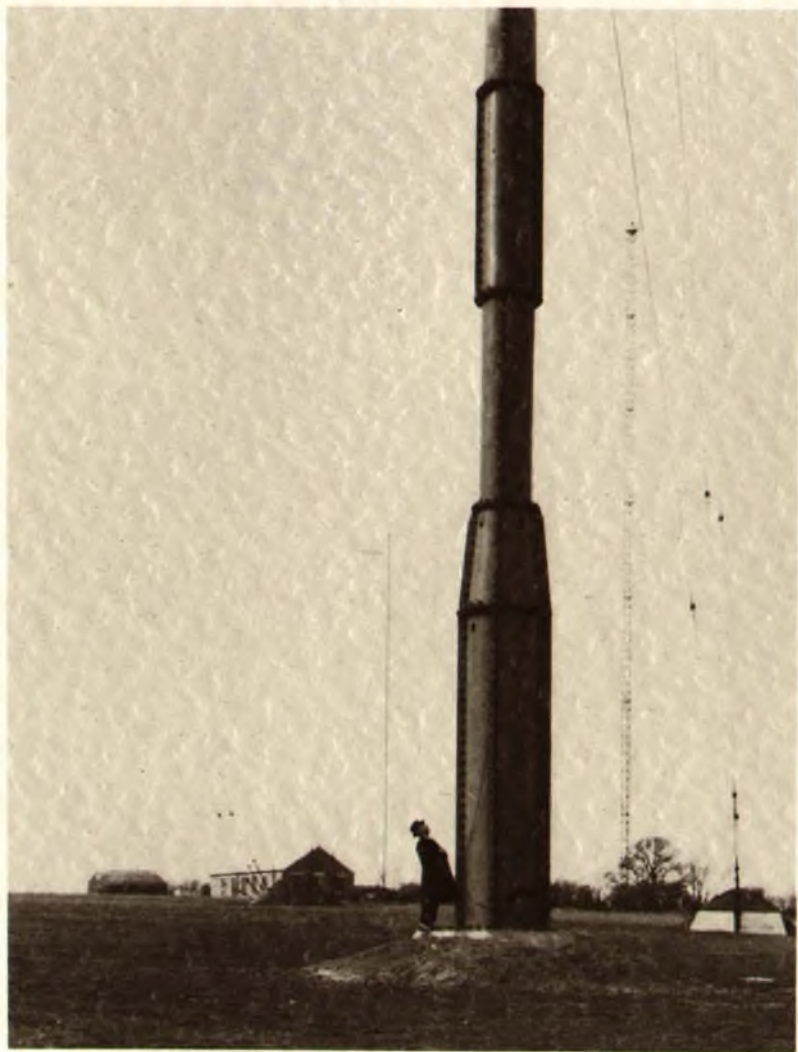
And ye discern the thing ye crave,
That I go deeper than the grave.
I, the sentinel; I, the tree,
Who bind all worlds in unity,
So that, sitting around your hearth,
Ye are at one with all on earth

Daventry calling: memory, love,
The grave beneath, and the stars above.
Even in my laughter you shall hear,
The power to whom the far is near.
All are in one circle bound,
And all that ever was lost is found.

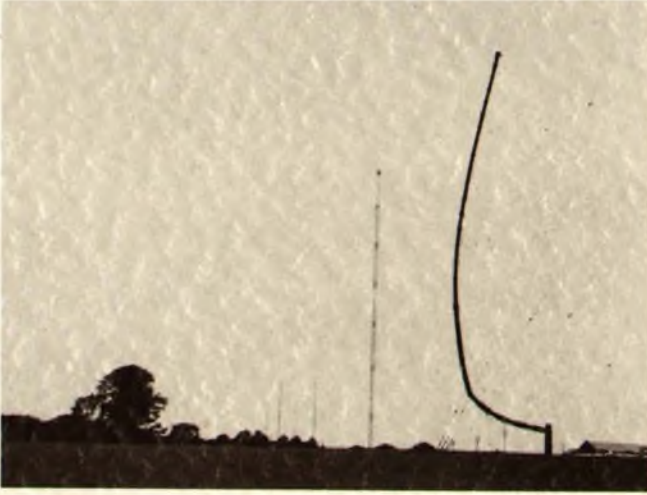
Daventry calling ... Daventry calling ...
Daventry calling ... Dark and still ...
The tree of memory stands like a sentry
Over the grave on the silent hill.



5GB mast in 1928.



5GB



Falling..... demolition of the 5GB mast in August 1932.

5 GB was the BBC's first high power medium wave transmitter. The 30 kW transmitter was designed and built by BBC staff in a matter of months — a remarkable achievement.

A new building and two 325 ft high tubular steel masts supporting a 'T' aerial were provided for the 5GB transmitter installation, and its introduction into service, on 21 August 1927, inaugurated the BBC's Regional scheme.

The service was also transferred to Droitwich along with 5XX in the mid-1930s.

5GB and 5XX staff in 1931. Three generations of the Bird family have worked at the Station: In the back row Jim Bird is fifth from the left, and his son Bill is fourth from the right. On the opposite page Bill's son (Bill Bird junior) is in the third row from the front, third from the right.

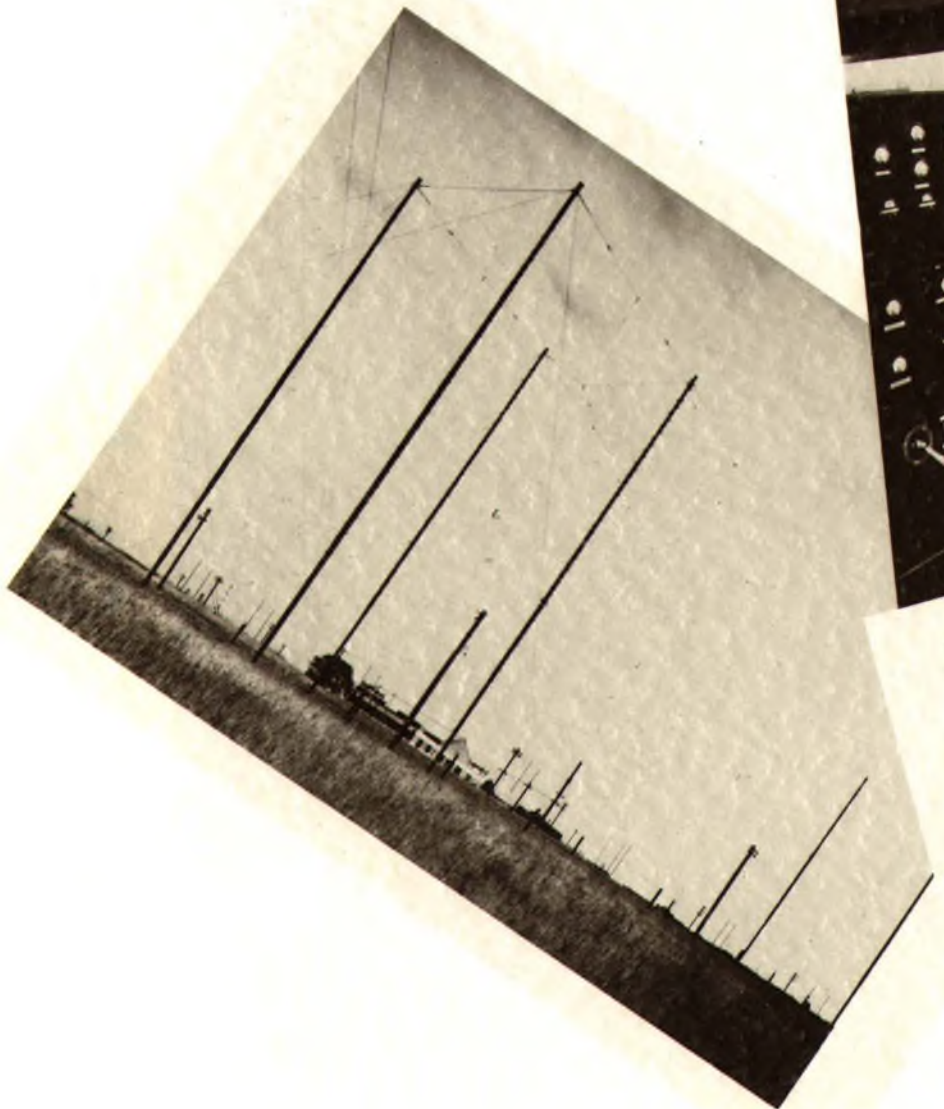


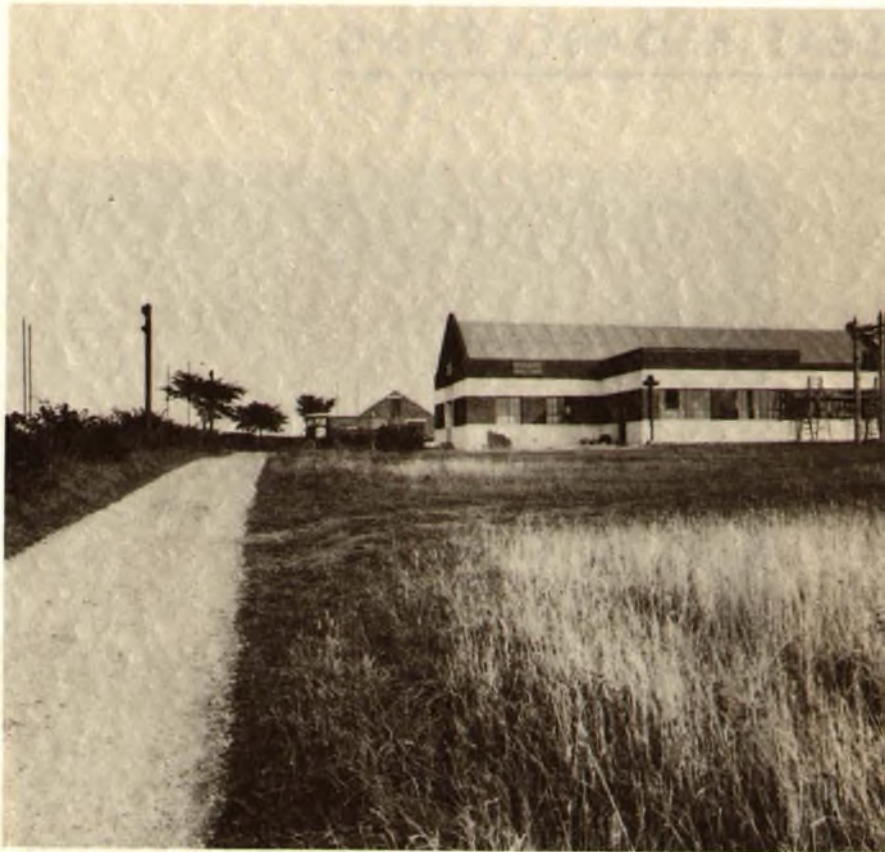




Handwritten blue ink scribbles on the right side of the page, including the letters 'A', 'S', and 'E'.

SHORT-WAVE BROADCASTING
THE EMPIRE SERVICE





The Empire Service, the forerunner of today's World Service, started from Daventry on 19 December 1932 in time for the first 'Round the Empire' Christmas Broadcast by King George V. There were two STC transmitters, Senders 1 and 2, housed in the newly constructed Empire Building, and



*Left:
The Empire Service building
in 1932.*

*Opposite page:
An array for West Africa,
the transmitter hall, and
the site.*

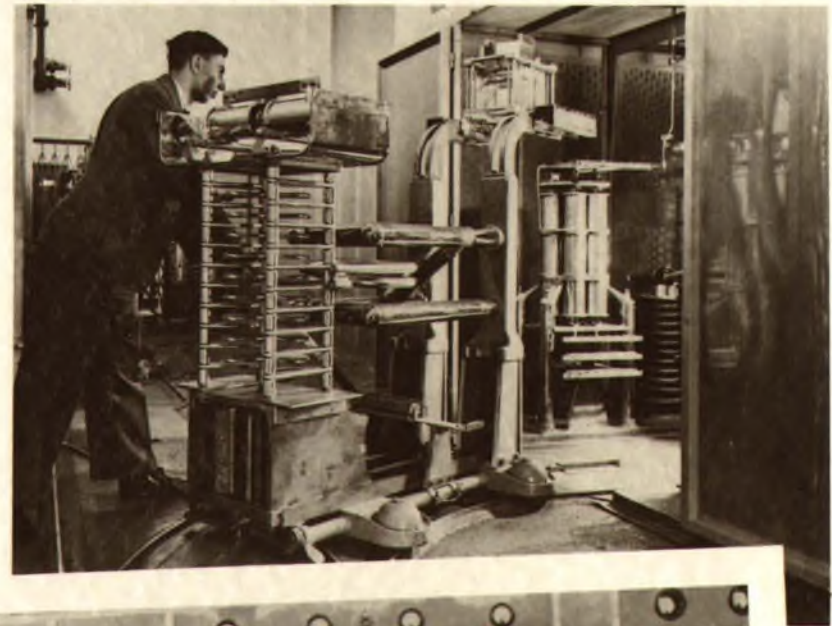
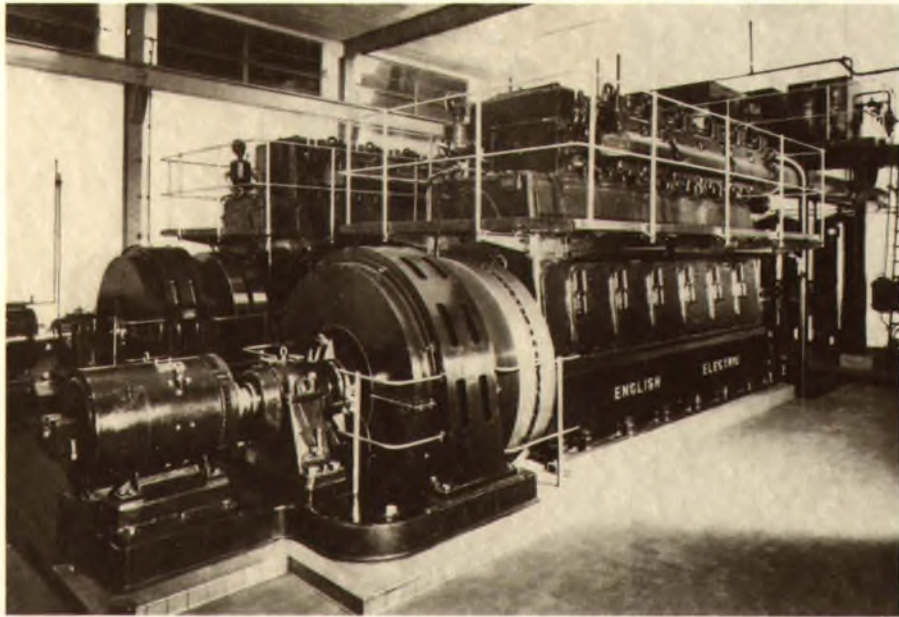
*All these photographs were
taken in 1932.*

these two Senders had access to twelve directional antennas and six omni-directional antennas.

Early Empire Service programmes were broadcast only in English and targeted to the whole of the then British Empire. Foreign language services, initially in Arabic, Spanish, and Portuguese, did not begin until 1938.



EXPANSION OF OVERSEAS BROADCASTING

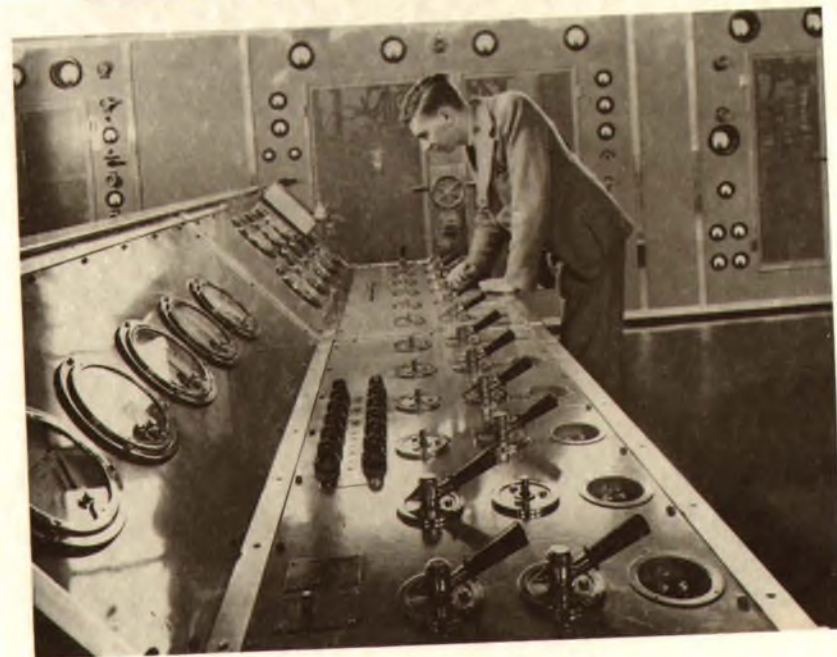


*Clockwise:
Diesel engine room, 1937.*

*Sender 6 final amplifier RF
truck, 1938.*

*Sender 6 control desk,
1938.*

*Sender 6 intermediate
amplifier RF truck, 1938.*





Government concern at the aggressive radio propaganda of Hitler and Mussolini led to the expansion of the BBC's Overseas Broadcasting into Foreign Language Services. The

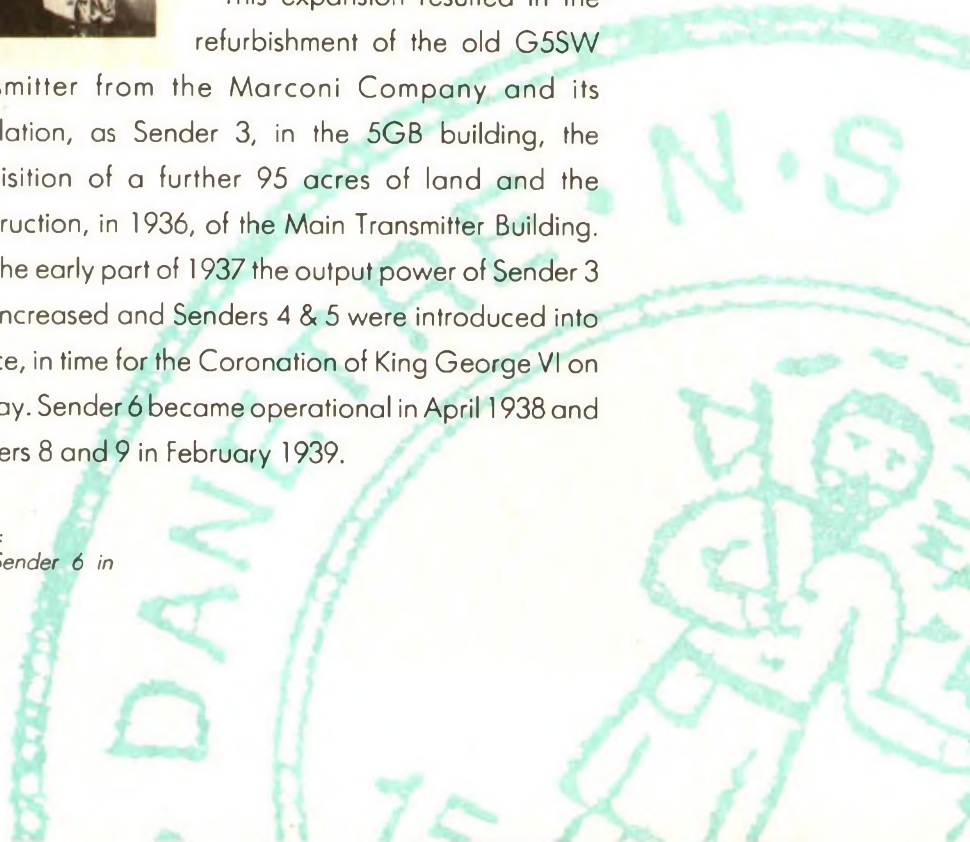


Arabic Service started on 3 January 1938, the Latin American Service two months later and the French, German and Italian Services started in the autumn of the same year.

This expansion resulted in the refurbishment of the old G5SW transmitter from the Marconi Company and its installation, as Sender 3, in the 5GB building, the acquisition of a further 95 acres of land and the construction, in 1936, of the Main Transmitter Building.

In the early part of 1937 the output power of Sender 3 was increased and Senders 4 & 5 were introduced into service, in time for the Coronation of King George VI on 12 May. Sender 6 became operational in April 1938 and Senders 8 and 9 in February 1939.

*Above and left:
Working on Sender 6 in
1938.*



THE SECOND WORLD WAR

There was an enormous and very rapid expansion of foreign broadcasting by the BBC, at the request of the British Government, during the first two years of the war. Initially, this expansion was directed to Europe and then later to the countries of Asia.

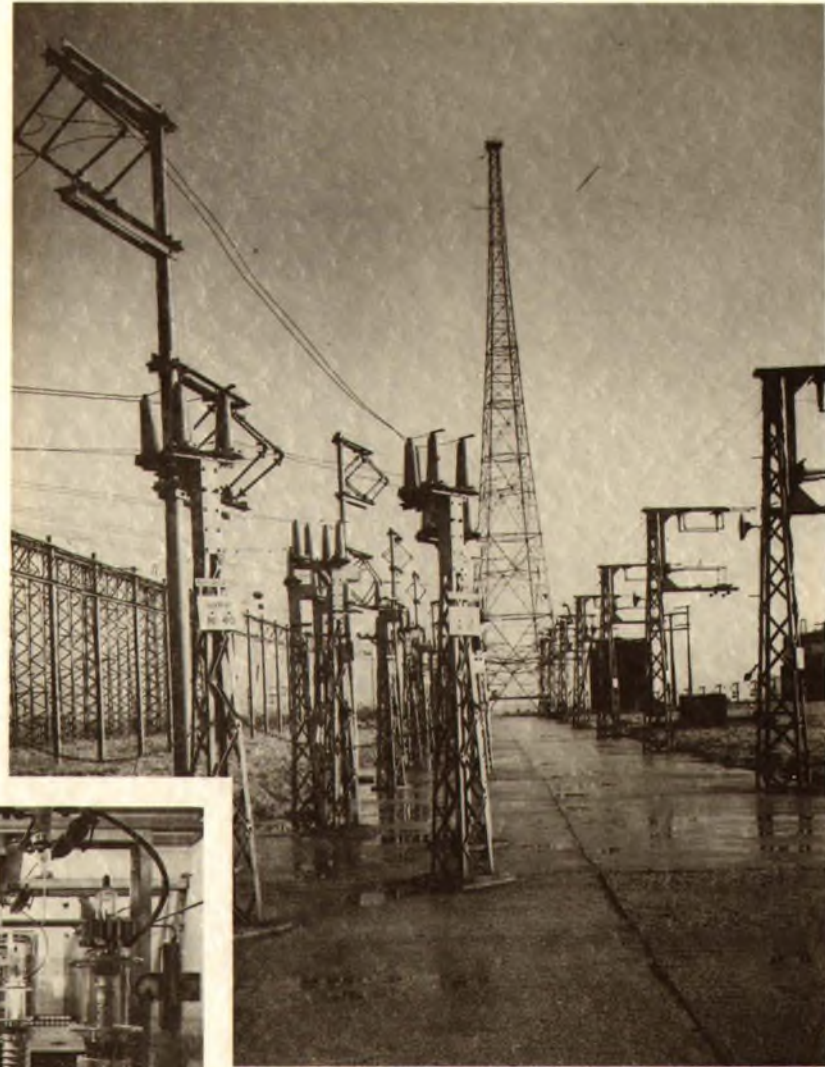
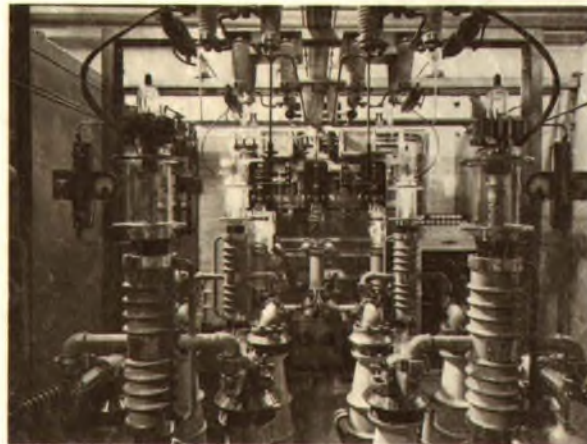
New Short Wave Transmitting Stations were opened at Rampisham, Skelton and Woofferton, and Daventry expanded with the addition of Senders 7, 10 and 11.

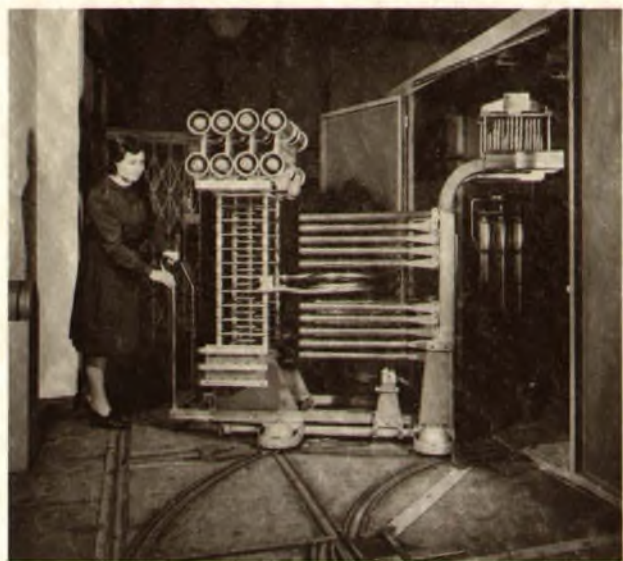
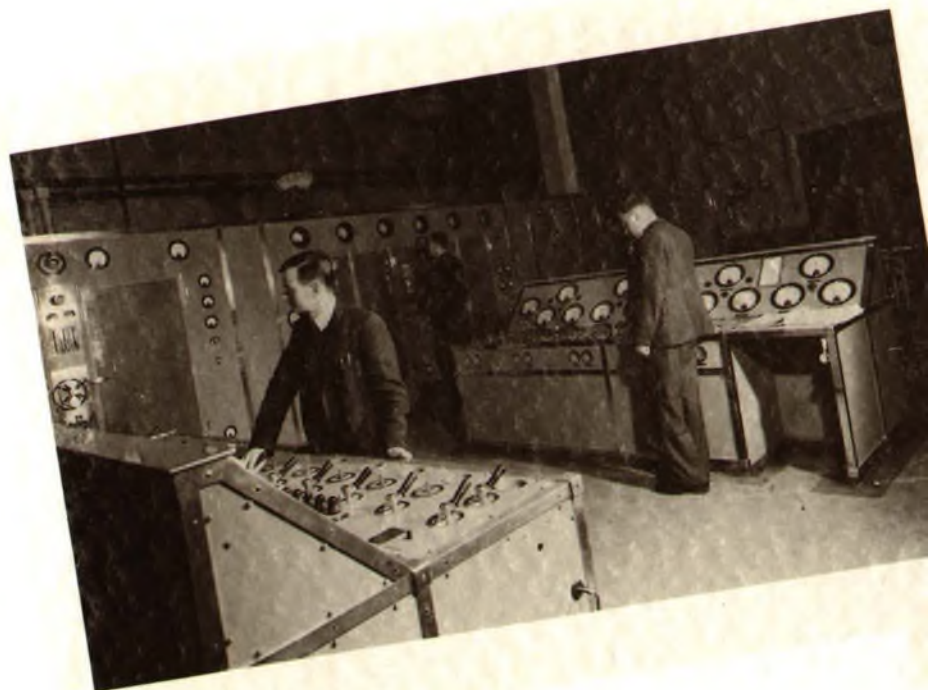
Daventry also became the master GEE station in the Eastern chain during this period and D.C. Birkinshaw, the then Engineer-in-Charge at Daventry, played an important role, along with some of his staff, in the design of the VHF transmitter installation which provided navigational aid for RAF aircraft.

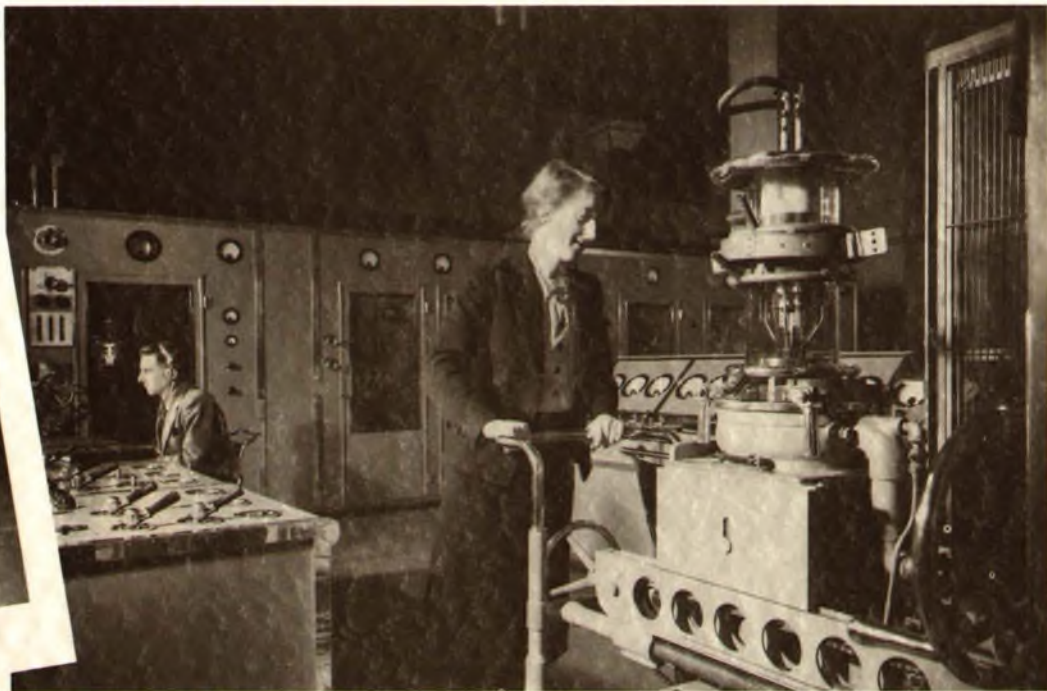
*Left to right:
Sender 1 in 1942.*

Sender 7 modulator, 1941.

*Switching gantry and 'B'
tower, 1941.*





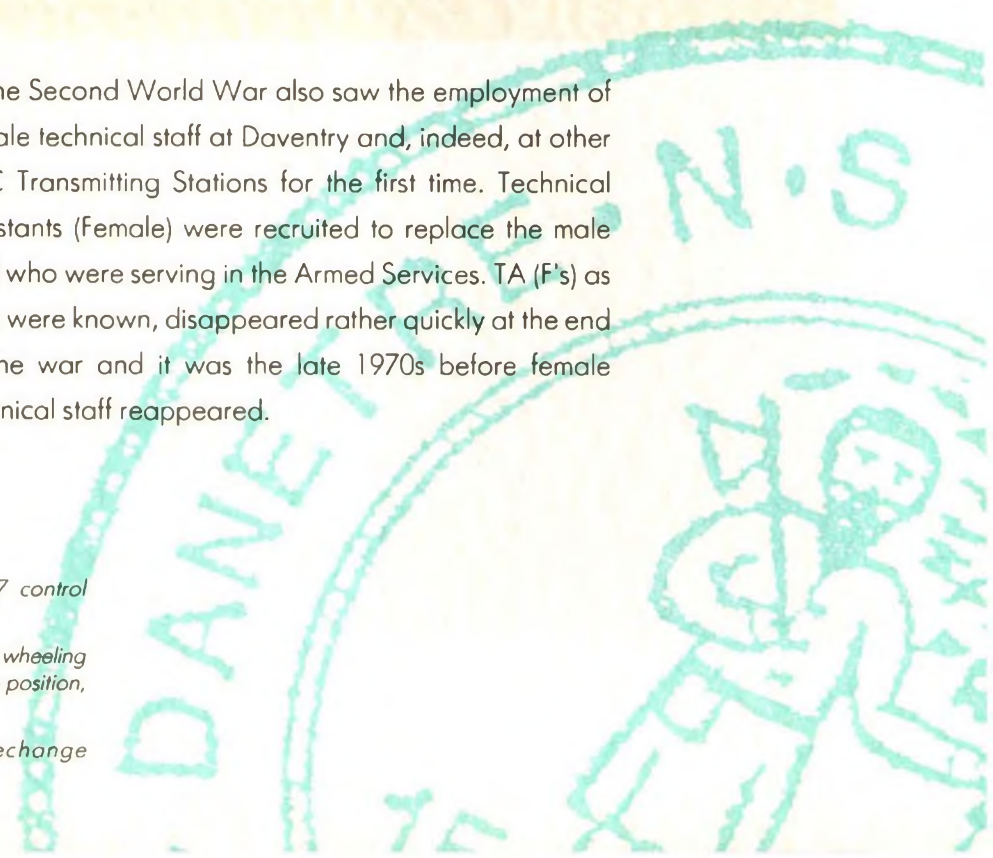


The Second World War also saw the employment of female technical staff at Daventry and, indeed, at other BBC Transmitting Stations for the first time. Technical Assistants (Female) were recruited to replace the male staff who were serving in the Armed Services. TA (F's) as they were known, disappeared rather quickly at the end of the war and it was the late 1970s before female technical staff reappeared.

*Clockwise:
Senders 6 and 7 control
desks, 1942.*

*Technical Assistant wheeling
a spare valve into position,
1942.*

*Sender 9 wavechange
truck, 1942.*



THE THIRD PROGRAMME/RADIO 3

Third Programme transmissions from Daventry began on 647 kHz on 15 March 1950. Initially, the service was carried on an experimental Marconi 'Ampliphase' transmitter but was transferred, on 8 April 1951, to the twin 100 kW transmitter

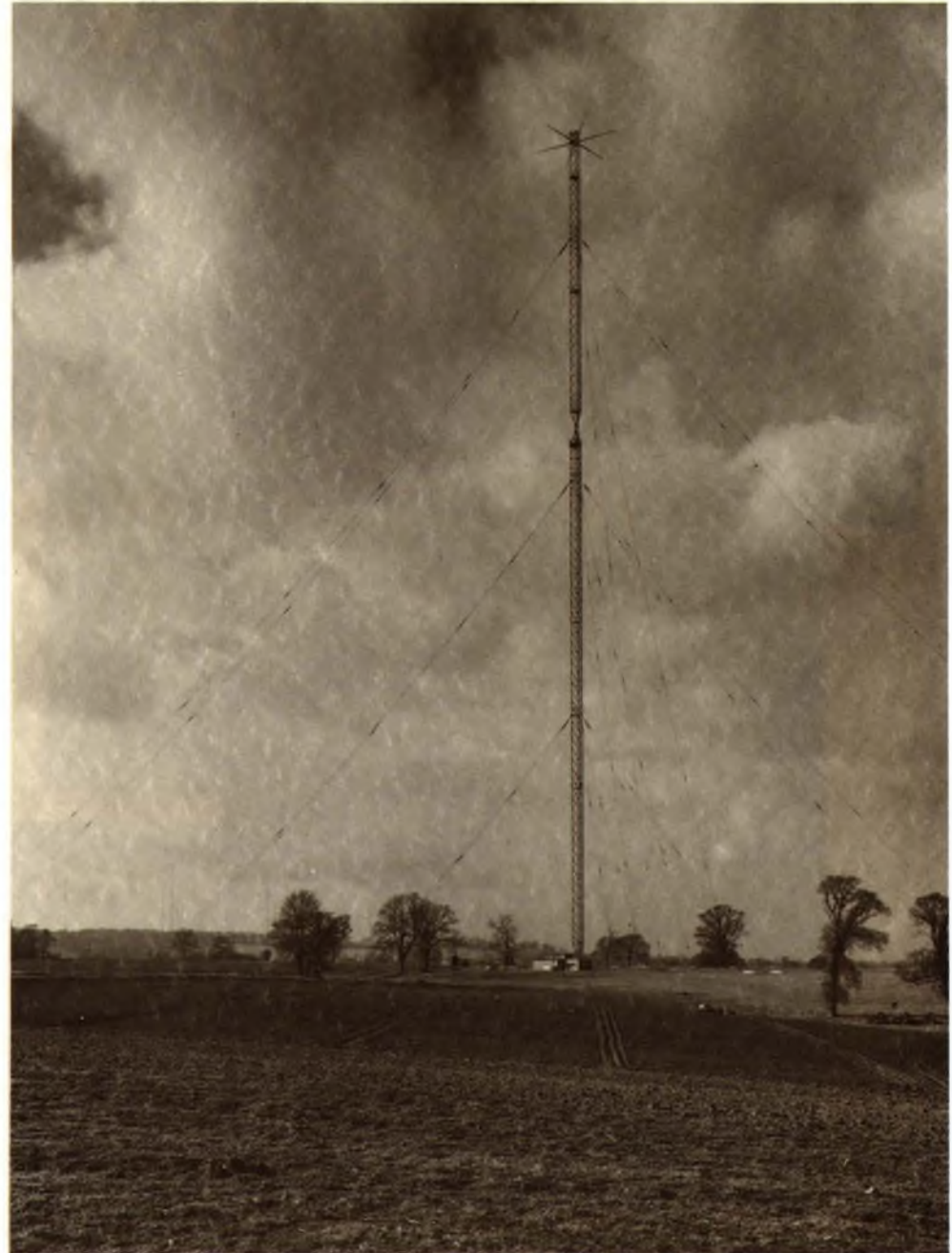
installation, known as T3, that was housed in the old 5XX building. The antenna system, a 725 ft mast radiator, was located at Dodford some 1½ miles distant. Despite the length of connecting feeder the losses from transmitter to antenna were less than 0.35 dB.

T3 was the first BBC transmitter to be operated without full-time staff attendance. Much of the work that made this possible was undertaken by BBC staff and paved the way for the provision of the wholly automatic BBC Domestic Services Transmitter Network achieved by the mid-1980s.



Left:
Changing a valve on the Third Programme transmitter, 1950.

Right:
The mast radiator at Dodford.

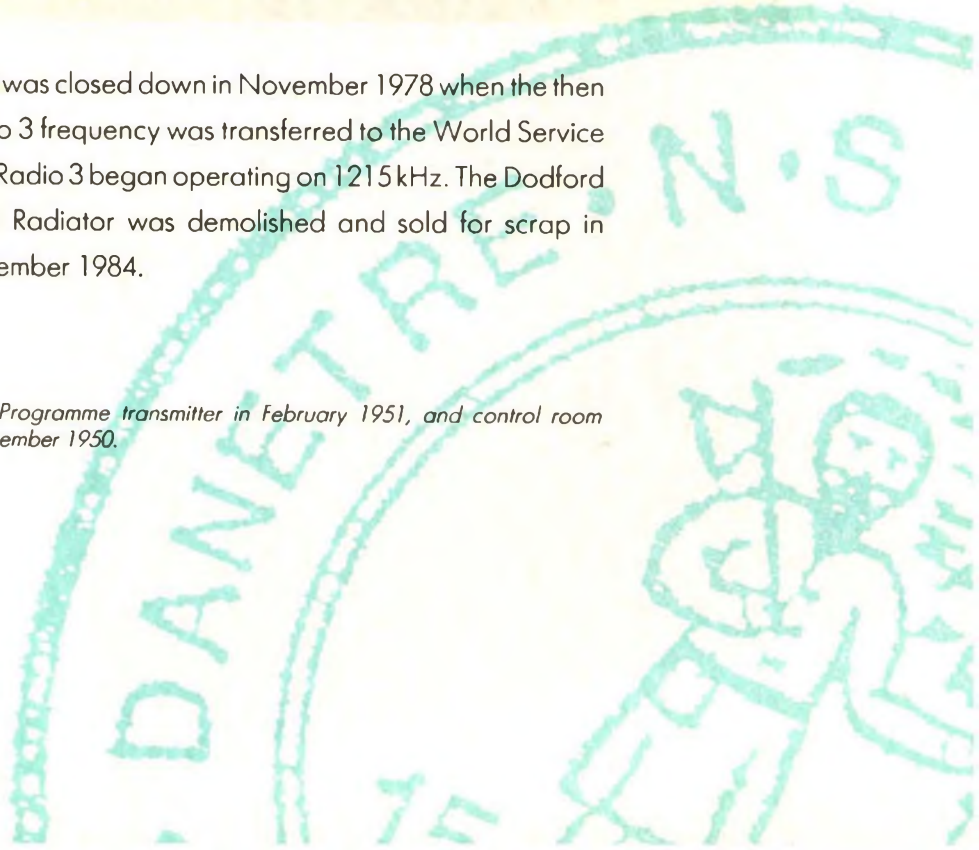




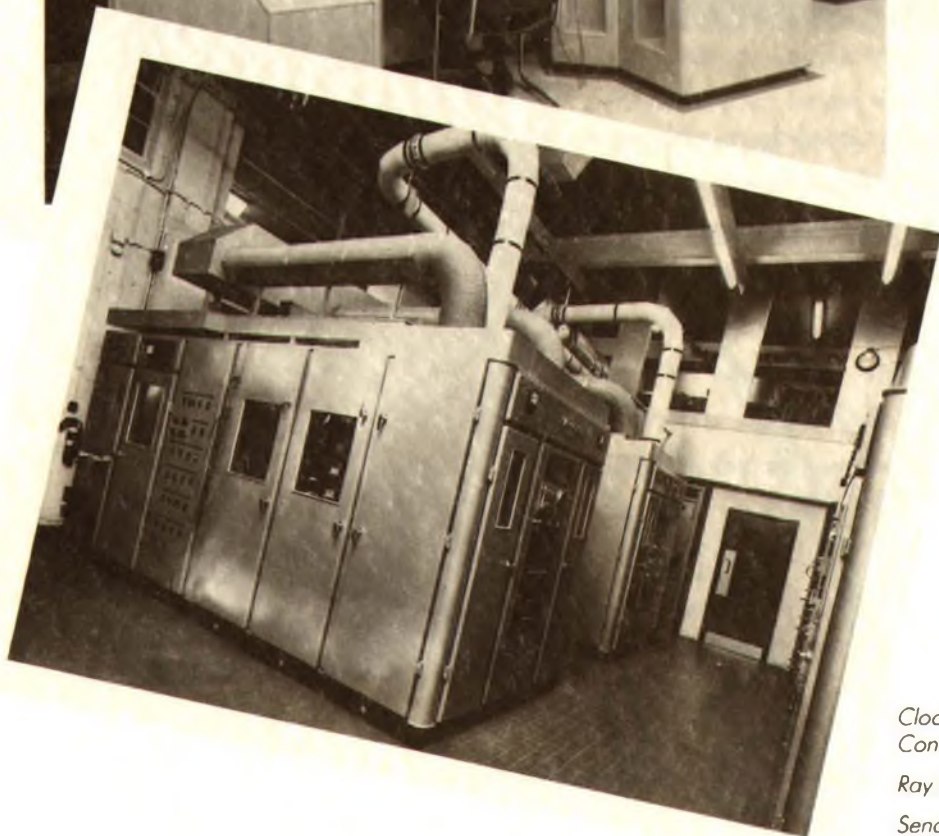
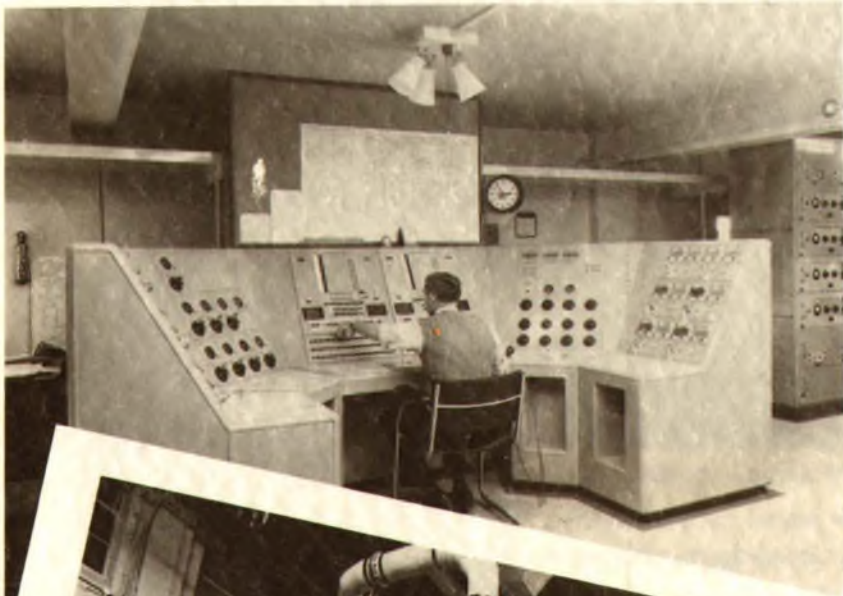


T3 was closed down in November 1978 when the then Radio 3 frequency was transferred to the World Service and Radio 3 began operating on 1215 kHz. The Dodford Mast Radiator was demolished and sold for scrap in September 1984.

Third Programme transmitter in February 1951, and control room in December 1950.



RE-ENGINEERING AND AUTOMATION



The first phase of re-engineering work started in April 1961 with the replacement of Senders 4 and 5 by two new 100 kW transmitters — Senders 12 and 13. By the end of 1966 Senders 1, 2 and 6 had been withdrawn from service and a further two 100 kW and four 250 kW senders had been installed and were in operation. Sender 10 was modified for SSB working and the parallel operation of two 250 kW transmitters into a single antenna, for transmission to the Far East, had started.

*Clockwise:
Control Room in 1965.*

Ray King working on Sender 14 in 1963.

Sender 21 in 1965.

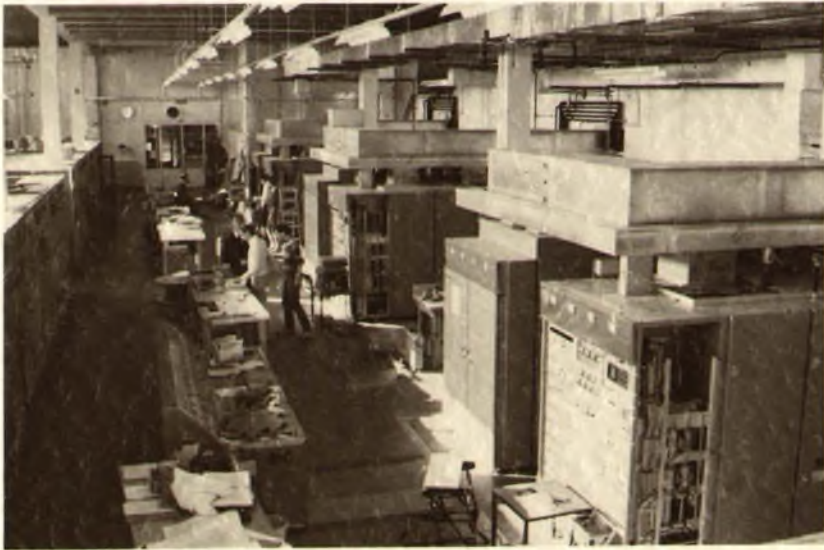
The antenna system was expanded during the 1970s, remote switching of arrays was introduced and the experimental four band array was erected and brought into service.

*Left to right:
Dave Dymott working on
Sender 24 in 1992.*

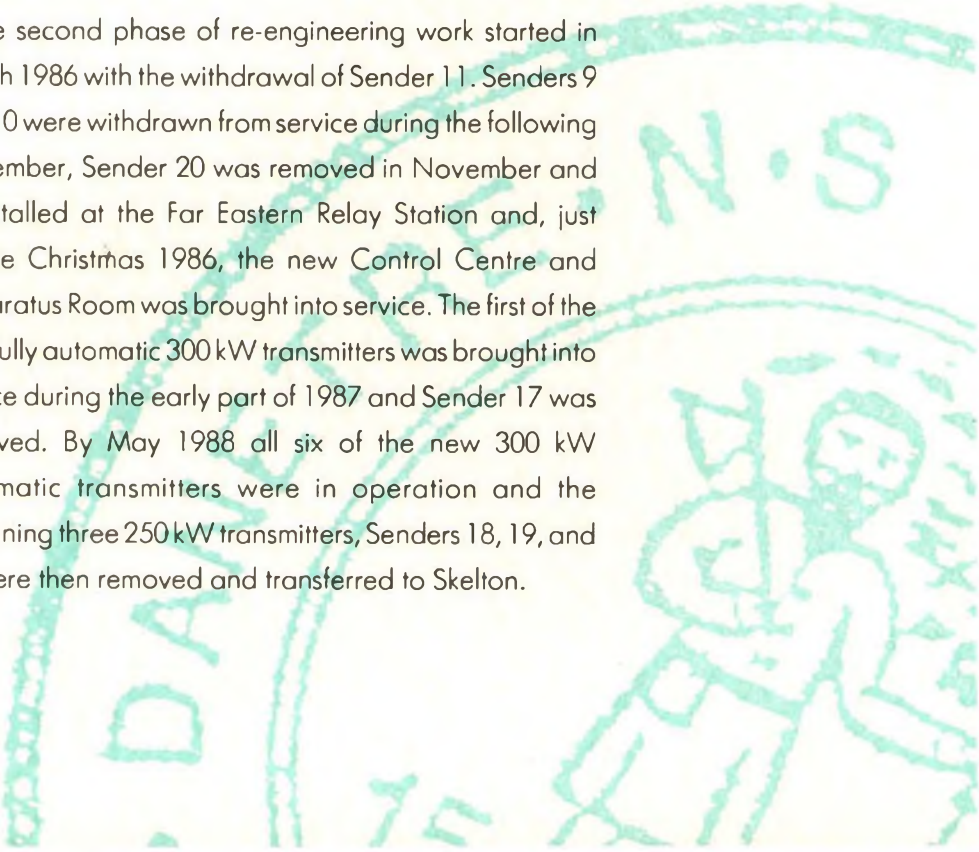
*Steve Hill working on
Sender 18 in 1975.*

*Re-engineering of East
Transmitter Hall, 1986.*





The second phase of re-engineering work started in March 1986 with the withdrawal of Sender 11. Senders 9 and 10 were withdrawn from service during the following September, Sender 20 was removed in November and re-installed at the Far Eastern Relay Station and, just before Christmas 1986, the new Control Centre and Apparatus Room was brought into service. The first of the new fully automatic 300 kW transmitters was brought into service during the early part of 1987 and Sender 17 was removed. By May 1988 all six of the new 300 kW automatic transmitters were in operation and the remaining three 250 kW transmitters, Senders 18, 19, and 21 were then removed and transferred to Skelton.



NON-BROADCASTING APPLICATIONS



The Daventry site has been the home of a number of non-Broadcasting applications.

Early Radar tests were conducted during 1935 using 49.59 m transmissions from Daventry, and the Air Meteorological service was established on the site in the same year. Following the closure of this service in September 1939, the installation was used by the Air Ministry for communication purposes and as a navigational beacon. The Air Meteorological service was restored in 1946 and remained until 1950.

5XX, which had been replaced by a new Long Wave transmitter at Droitwich in 1934, was pressed back into service during the Second World War years for the transmission of Overseas programmes. It had a further lease of life at the end of the war when it was transferred to an Air Ministry service using keyed morse transmissions.

SPECIAL OCCASIONS

Workshop and retired staff gather on the occasion of transmitter technician Bill Ashley's Investiture of BEM in 1979.

*Below:
A. E. Beaumont,
W.H. Thorneycroft
and Frank Henning,
by 250 kW Sender,
1964.*



Empire Programme from the Transmitter Hall, 1936.



Commissioning of two new B6126, 300 kW transmitters for Radio Canada International at Daventry 9 March 1987.





The Lord Lieutenant of Northamptonshire presenting the BEM to Bill Ashley in 1979.



Dave Juland received the BEM in the 1991 New Year's Honours List.

50th Anniversary of Empire Station 1932-1982: left to right:
George Mackenzie (Chief Engineer, Transmitters),
Alasdair Milne (Director-General), Maurice Williamson
(Senior Transmitter Manager, Daventry) and Bill Dennyay
(Chief Engineer, External Broadcasting).



Daventry staff, all celebrating
40 years' service in May 1983.



RENEWED INVOLVEMENT WITH THE BBC'S DOMESTIC SERVICES

Below: Sandy Heath UHF television transmitter.



Since 1985 staff at Daventry Transmitting Station have been additionally responsible for the maintenance of the BBC's Domestic Radio and Television Transmitting Stations within a 50/60 mile radius of Daventry. This includes the stations at Peterborough and Sandy Heath and those carrying the Radio Northampton Service.



Clockwise: Northampton FM Network and Local Radio transmitter. BBC CWR FM transmitter at Lark Stoke, serving South Warwickshire. Radio Northampton medium wave mast.

DAVENTRY TOWN

*"Where is the post that came from Montague?
By this at Daintry, with a puissant troop."*

Shakespeare: Henry VI, Part III, Act V, Scene I



The BBC were by no means the first occupiers of Daventry's Borough Hill. Atop the hill is probably the third largest iron age hill fort in the country with evidence of an earlier bronze age settlement and, within the fortifications, a Roman villa. The first settlement on the site of the town took place in late Roman times, in the area of the present churchyard.

Daventry has supplied the BBC with a significant number of staff over the years. One Daventry family has been represented throughout the entire life of the Transmitting Station. James Bird was on the staff at the very start in 1925. He was joined by his son Bill in 1928, who remained on the staff for 49 years, and was, in turn, joined by his own son, Bill junior, in 1975.

A good many BBC 'incomers' have made their careers at Daventry and settled happily into the local community. Others have stayed for a time — Daventry has played a major part in training BBC Engineers — and moved on.

Many have taken something of Daventry with them — a local girl for a wife!

Availability, within the local community, of particular skills in Electrical and Mechanical fitting have resulted in Daventry Transmitting Station providing a specialist repair and manufacturing service for the rest of the BBC's Transmitter Network — over 1100 Transmitting Stations within the UK and a further eight overseas.



Daventry Town Centre.

FUTURE

Although transmissions from Daventry have now ceased, the BBC link with the Borough Hill site will continue.

A single mast will remain for communications purposes, and Daventry will continue to be the base for the maintenance of BBC Domestic Services Radio and Television Transmitting Stations within a 50/60 mile radius of the site.

Other specialist maintenance and stores and supply services will also remain along with the Radio Tape Reclamation Service, and it is hoped that some form of permanent exhibition may be established locally illustrating the near-67 years life of the Daventry Transmitting Station.



B B C

TRANSMISSION



ALDA