PURPOSE

Aerial Outfit AQ1 is used with Type 983 and Display Outfit XS (Panel 1A8) for accurate height-finding. When not required for height-finding it can be used for providing surface and low air warning. When height-finding it is trained on the target by asilation from a Type 903/960 display.

WIDTH

Horizontal = 5° (to half field strength)
Vertical = 2.5° (to half field strength)

POWER REQUIREMENTS

220V. D.C. = 20 amp (60 amp peak)
220V. 110 c/s. 1 PH = 1 amp (inc. supply to the 200/20V. transformer in Distribution Board)
20V. 110 c/s. 1 PH = 7 amp (from the 200/20V. transformer in Distribution board)
120V. 333 c/s. 3 PH = 2.6 amp (13.6 amp for first 4 mins.)
50V. 50 c/s. 3 PH = 5 amp.

MAJOR UNITS

Aerial Outfit AQ1 comprises the following D.E.E., D.N.O. and D.E.F. Items as follows:

D.E.E. ITEMS

1. Patt. 53177 Air Conditioning Unit Des. 6
2. Patt. 56773 Waveguide Size 'A' Matching Unit
3. Patt. 56007 Standing Wave Ratio Indicator
4. Patt. 57992 Control Unit 2MM
5. Patt. 57600 Deck Plane Corrector
6. Patt. 59997 Waveguide Size 'A' Flare Des. 17
7. Patt. 54109 Automatic Stabilisation Corrector Des. 2
8. Patt. 60110 Clutch Unit Outfit AQ1/T
9. Patt. 65114 Waveguide Size 'A' Joint Encasing Des. 1
10. Patt. 65115 Waveguide Size 'A' Joint Rotating Des. 2
11. Patt. 65116 OIL Pressure Generating Unit Des. 1
12. Patt. 65117 OIL Pressure Generating Unit Des. 2
13. Patt. 65118 Clutch Operating Unit Outfits AQ1/T
14. Patt. 59127 Holstering Gear for Outfit AQ1
15. Patt. 53000 Air Conditioning Unit Design 31
16. Patt. 55294 Amplifier WS
17. Patt. 66699 Contactor Unit Design 10
18. Patt. 56997 Indicator Bearing Tape Type

Items 2, 3, 6, 7, 8, 9, 10, 11, 12, 13 and 17 are components of Item 15. Item 16 is a component of Item 5.

* Only one Patt. 57600 Deck Plane Corrector is allowed per ship irrespective of number of Outfits AQ1/T.

D.N.O. ITEMS

1. Stabiliser M Mk I
2. Stabiliser M Mk II

D.E.F. ITEMS

1. Metadyne Set comprising:
   (a) Metadyne Generator (100/750W)
   (b) Twin Metadyne Generator (100/750W)
2. Motor (mill along and mill across) AT1198
4. Auto Starter (30 amp D.H.M.) for Metadyne Set
5. R.P.C. Contactor Control Panel

PHYSICAL DATA

Aerial Unit weighs approximately 7 tons

Reflector Measures 14' 6" high by 5' wide.

BRIEF DESCRIPTION

The aerial is triaxially stabilised to 6 minutes of arc and has a training speed continuously variable to maximum of 7 revs. per minute.

Control of aerial training in local control is done by P.t. 57592 Control Unit 204. Remote control of training and elevation (normally in Radar Display Room) is determined by settings on P.t. 57839/55939 Control Units 302/2.

HANDBOOK

B.E.2107 (1)(2)(3).

ESTABLISHMENT LIST

E.954

INSTALLATION SPECIFICATION

B.671 (Key Diagrams)

B.673 (Aerial Outfit Act)
RESTRICTED

AERIAL OUTFIT AQT

SUMMARY OF DATA

PURPOSE

Aerial Outfit AQT is used with Type 983 and
Display Outfit 25 [Panel 142] for accurate height-
finding. When not required for height-finding it
also can be used for providing surface and low air warning.

BEAM WIDTH

Horizontal - 5° (to half field strength)
Vertical - 1.5° [to half field strength]

BRIEF DESCRIPTION

The aerial is triaxially stabilised in 6 minutes of
arc and has a training speed continuously variable to
maximum of 7 revs per minute.

MAJOR UNITS

Aerial Outfit AQT comprises the following B.E.E.,
B.E.D. and C.E.E. items as follows:

B.E.E. ITEMS

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<td>18.</td>
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Items 2, 3, 4, 6, 8, 9, 10, 11, 12, 13 and 17 are components
of Item 15. Item 16 is a component of Item 5.

Note: one Part, 57600 Deck Plate Corrector is allowed per ship irrespective of number of Outfits AQT

B.E.D. ITEMS

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C.E.E. ITEMS

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<td>1.</td>
<td>Metadyne Set comprising:-</td>
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<tr>
<td></td>
<td>a. Metadyne Generator [M/950/A]</td>
</tr>
<tr>
<td></td>
<td>b. Twin Metadyne Generator [M/950/25C]</td>
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<tr>
<td>3.</td>
<td>Motor Training [12114/23]</td>
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<tr>
<td>4.</td>
<td>Auto Starter [30 mm B.L.W.E.] for Metadyne Set</td>
</tr>
<tr>
<td>5.</td>
<td>U.P.E. Contactor Control Panel</td>
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</tbody>
</table>

Item 1 (B.E.E.), Item 2 (C.E.E.), Item 2 (C.E.E.) and Item 3 (C.E.E.) are components of Item 15 (B.E.E.).

PHYSICAL DATA

Aerial unit weighs approximately 7 tons
Rectangular Measures 24 ft 6 in high by 5 ft wide.

RESTRICTED

8.37
POWER REQUIREMENTS

- 220 V d.c. - 30 amps [60 amps peak]
- 24 V d.c. - 20 amps [inc. 5 amps for stabilisers]
- 200 V/1000 Hz 3 phase - 3 amps [inc. supply to the 200/20 V transformer in Distribution Board]
- 200 V/1000 Hz 1 phase - 1.4 amps (from the 200/20 V transformer in Distribution Board)
- 115 V/333 Hz 3 phase - 2.4 amps (13.6 amps for first 4 minutes)
- 110 V 50 Hz 3 phase - 6 amps

HANDBOOK
BR 2107(1)(2)(3)

ESTABLISHMENT LIST

E 854

INSTALLATION SPECIFICATION

- 0 612 (Key Diagrams)
- 0 673 (Serial Fitout AQ7)