

A.P. 102C-1513-3A
(FORMERLY AIR PUBLICATION 4321J
VOLUME 3, PART 1)
1st EDITION
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SCHEDULE OF SPARE PARTS
FOR
AVON MARK 10900 SERIES
AERO-ENGINE CHANGE UNITS

ENGINE AND E.C.U. SPARES R.A.F. VOCABULARY SECTION 36 VV

FUEL SYSTEM COMPONENTS R.A.F. VOCABULARY SECTION 36 LL

MINISTRY OF DEFENCE
(For use in the Royal Air Force)

MEMORANDUM OF INSTRUCTIONS

1. CONTENTS. This schedule contains a complete list of Parts embodied in the AVON 10900 Engine Change Unit.

2. MULTI-INDENTATION SYSTEM. The parts in the schedule are arranged in alphabetical order and items are indented to show their correct relationship to each other. The following is a key diagram of the layout as used throughout the body of this schedule:-

1	2	3	4	5
MAIN ASSEMBLY				
				details of main assembly
SUB ASSEMBLY				
				details of sub assembly
SUB SUB ASSEMBLY				
				details of sub sub assembly
SUB SUB SUB ASSEMBLY				
				details of sub sub sub assembly
PARTS NOT INCLUDED IN MAIN ASSEMBLY				

3. MR AND C/S COLUMN. Items indicated M/ are required for Major Repair purposes only and will not normally be held in stock by Units other than those carrying out major repair work. A, B or C indicates class of store.

4. NUMBER OFF COLUMN. The number off shown against an Assembly or detail Part indicates the quantity required in the position shown and does not preclude the recurrence of the Assembly or detail Part in other positions in the complete major Assembly. In order to assess whether or not the Part recurs, reference should be made to the Reference/Part Number Index which quotes all pages where the Part/Assembly appears.

5. REF NO COLUMN. This schedule is being amended in stages to cover the conversion of domestic Stores Ref Nos to NATO Stock Nos. In future Amendmennt Lists only the Reference Number and Part Number indices will be fully amended, and the pages of text embodying items affected by retrospective coding or modification action will be re-issued with the Ref No column left blank. Therefore where blank Ref No columns appear in the spares breakdown of this Schedule the Part Number Index should be referred to for the appropriate Stores Reference/Stock Number of any item required.

MEMORANDUM OF INSTRUCTIONS (Continued)

6. DEMANDS. The demand must quote the appropriate Vocabulary Section and Reference/Stock Number for each item. Unreferenced parts are not normally provisioned as spares and demands for such items must quote the Vocabulary Section, Maker's Part Number, and the name and type of the equipment. The location of each part within the equipment should be clearly indicated. Demands are to be prepared in accordance with the procedure laid down in AP830 Volume 1.

NOTE. The Vocabulary Sections and Reference Numbers applicable to this Schedule are subject to change by reason of retrospective NATO codification action - SEE PARA NO '5' ABOVE BEFORE DEMANDING ITEMS.

7. ESTABLISHMENT. The normal establishment of spares to be maintained is to be in accordance with the procedure laid down in Air Publication 830, Vol.1.

8. OBSOLESCE STOCK. An asterisk placed against a part or Assembly indicates that further purchases to that design will not be made but existing stocks are to be used until stocks are exhausted.

9. AMENDMENTS. Amendments to this Schedule will be published as and when necessary. Amendment Lists will be numbered consecutively, and the Commanding Officer will give the necessary instructions for the upkeep of the Schedule and completion of the Amendment Certificate.

A summary of all Amendment Lists distributed will be published in Air Ministry and/or Admiralty fleet Orders.

10. ILLUSTRATIONS. Since it is not practicable to correct the illustrations in the Schedule at the time of amending the text, new plates will be issued at a later date.

11. MODIFICATIONS. Modifications incorporated in this Schedule are indicated on the Modification Record Sheet.

HOW TO USE THIS SCHEDULE

A

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BK.12462	36Q/601	30
BK.12463	-	30
BK.12553	-	60
BK.12554	-	60
BK.12599	-	158
BK.12600	-	158
BK.12601	-	158
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BK.12639	36Q/489	58
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BK.13242	-	48

REF No	PART No	DESCRIPTION	No OFF	MATL SPEC	MR CL of ST	PL & ILL No
1	2	3	4	5		
36Q/506	BK.12281	CASING, SCAVENGE PUMP ASSEMBLY	1	-	-	29/12
BK.679	BK.680	† Casing, scavenge pump	1	Alum	-	29/13
36JJ/2584	BK.680	Dwell, locating, scavenge pump casing to pressure pump casing	2	M.S.	-	29/14
36DD/72731	KL.260	Stud, 2 B.A. x 1.675" long, pressure pump casing securing	6	N.S.	-	29/15
36Q/200	BK.5581	Plug, locating, scavenge and pressure pump spindle	1	M.S.	-	29/16
36Q/507	BK.9934	Spindle, scavenge and pressure pump driven gearwheel	1	N.S.	-	29/17
36JJ/2655	BK.681	GEARWHEEL AND BUSH, DRIVEN OIL PUMP ASSEMBLY	1	-	-	29/18
BK.682	BK.683	† Gearwheel, oil pump driven	1	N.S.	-	29/19
36JJ/2579	BK.683	Bush, oil pump driven gearwheel	1	M.S.	-	
BK.9931	BK.9931	Gearwheel, shaft, scavenge pump driving	1	N.S.	-	
36JJ/2069	BK.876	Washer, keyed, .000" o/dia. x .3/5" i/dia. x .070" thick	1	M.S.	-	
36JJ/2070	BK.677	Washer, keyed, .000" o/dia. x .3/5" i/dia. x .070" thick	1	M.S.	-	
36DD/72667	KJ.4316	Nut, 1/2" x 1/4" x 1/2"	1	M.S.	-	
36Q/528	BK.9935	GR. FU. 1/2"	1	M.S.	-	
36JJ/2582	BK.9932	BK.687	1	M.S.	-	
36Q/529	BK.9936	GR. AN. 1/2"	1	M.S.	-	
36JJ/2581	BK.690	Pl. 1/2"	1	M.S.	-	
36JJ/2075	BK.1201	Pl. 1/2"	1	M.S.	-	

1. FIND PAGE NO IN INDEX OF PART NOS

2. TURN TO PAGE

3. LOCATE ITEM AND NOTE PLATE AND ILLUSTRATION NO

4. TURN TO PLATE

5. CHECK ITEM WITH ILLUSTRATION

PLATE 29

B

1. FIND PLATE NO IN LIST OF PLATES

2. TURN TO PLATE

3. LOCATE ITEM & NOTE PAGE & ILLUSTRATION NO

4. TURN TO PAGE

5. FIND ILLUSTRATION NO & READ OFF DETAILS

A

To identify an item when only the Part Number is known:

B

To secure the Part Number when the Name and Location in the engine is known; OR to secure the Part Name and Number when only the appearance and location is known.

MODIFICATION RECORD SHEET

A.L.37

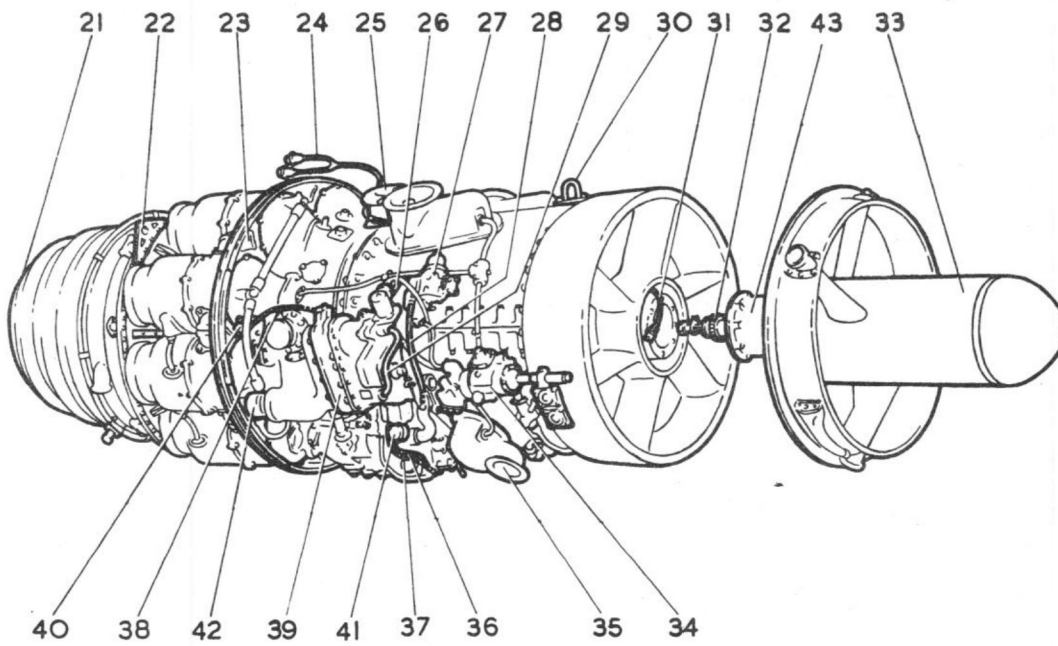
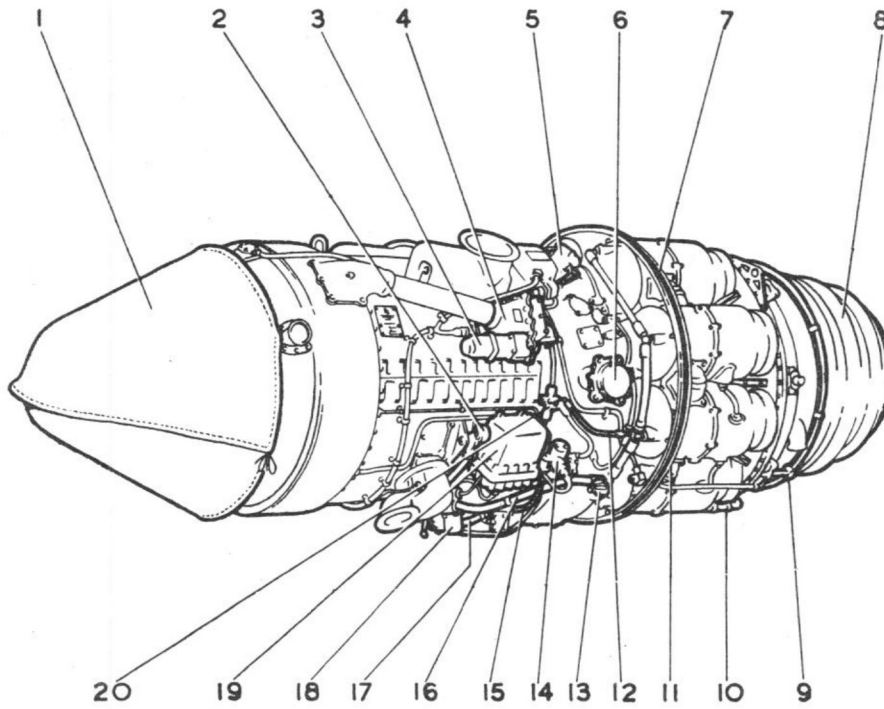
MOD. No.	A.L. No.	MOD. No.	A.L. No.	MOD. No.	A.L. No.	MOD. No.	A.L. No.	MOD. No.	A.L. No.	MOD. No.	A.L. No.	MOD. No.	A.L. No.
5215		5260		5305	17	5350	17	5395	18	5440	24	5485	31
5216	NA	5261		5306	16	5351	29	5396	18	5441	24	5486	NA
5217		5262		5307		5352		5397		5442	NA	5487	
5218		5263	16	5308	16	5353		5398	NA	5443	34	5488	
5219		5264	NA	5309		5354	NA	5399		5444		5489	
5220		5265	16	5310	NA	5355	NA	5400		5445		5490	32
5221	NA	5266	NA	5311	NA	5356	17	5401	NA	5446	25	5491	
5222	16	5267		5312	NA	5357	20	5402	20	5447	25	5492	
5223	NA	5268	NA	5313	17	5358	17	5403	18	5448		5493	
5224	NA	5269		5314	NA	5359	NA	5404		5449	25	5494	
5225		5270		5315	17	5360	NA	5405		5450		5495	
5226		5271		5316	17	5361	NA	5406		5451	26	5496	
5227	NA	5272		5317	NA	5362		5407	19	5452	28	5497	
5228		5273	17	5318	17	5363		5408		5453		5498	34
5229		5274	17	5319	17	5364	21	5409		5454	26	5499	
5230	16	5275		5320	17	5365		5410		5455		5500	34
5231		5276	16	5321	16	5366		5411	19	5456	26	5501	
5232		5277	17	5322	16	5367	17	5412	19	5457		5502	34
5233	NA	5278	NA	5323	17	5368		5413		5458	27	5503	35
5234		5279	16	5324		5369		5414		5459		5504	35
5235	16	5280		5325	17	5370	17	5415	19	5460	30	5505	NA
5236	NA	5281	NA	5326	17	5371	17	5416	20	5461		5506	35
5237		5282	17	5327	17	5372		5417		5462		5507	35
5238		5283		5328	NA	5373	17	5418		5463	26	5508	35
5239		5284	16	5329		5374	17	5419	21	5464	27	5509	
5240		5285		5330		5375	NA	5420		5465	NA	5510	
5241	NA	5286		5331	17	5376	NA	5421		5466		5511	
5242	NA	5287	16	5332	17	5377	NA	5422		5467	NA	5512	
5243	NA	5288	NA	5333	17	5378	NA	5423		5468		5513	
5244	NA	5289		5334	17	5379	17	5424		5469		5514	
5245	NA	5290	NA	5335	17	5380	17	5425		5470	28	5515	
5246	16	5291	16	5336	17	5381	18	5426		5471	29	5516	
5247	NA	5292	C	5337		5382		5427	22	5472	28	5517	36
5248		5293	NA	5338	NA	5383		5428		5473		5518	
5249	NA	5294		5339		5384		5429	22	5474	29	5519	
5250	NA	5295	16	5340		5385		5430	23	5475		5520	
5251		5296		5341	17	5386		5431		5476		5521	37
5252	NA	5297		5342	17	5387		5432		5477		5522	37
5253	16	5298	NA	5343		5388	18	5433	NA	5478	28	5523	NA
5254	NA	5299		5344	17	5389	NA	5434	NA	5479	28	5524	NA
5255	NA	5300	16	5345	NA	5390	18	5435		5480	29	5525	36
5256		5301	NA	5346	17	5391	NA	5436		5481		5526	
5257		5302	NA	5347	17	5392	NA	5437	NA	5482	31	5527	
5258	17	5303	16	5348	17	5393		5438	23	5483		5528	37
5259	NA	5304		5349		5394	18	5439		5484		5529	
												5530	37

* Modifications incorporated

C Modifications cancelled

N.A. Modifications not applicable to this schedule

RESTRICTED

CHECKING LIST ITEMS AL-9

AVON 109

AIR MINISTRY CHECKING LIST

For Avon 10901 Engine Change Units as installed
in Canberra B.Mk.6 and T.Mk.7 Aircraft

This checking list has been prepared to show only those items of a readily detachable nature or about which doubt may exist whether they should form part of, or should be transferred with the Engine Change Unit. The list consequently excludes those other Engine Change Unit components which are not liable to incidental removal, but personnel are not thereby relieved of the responsibility for checking and recording in accordance with the regulations, discrepancies of such components.

The Engine Change Unit is to be vouched as instructed in A.P.830 Vol.1 5th Edition, Part 2 Leaflet B9/1 quoting the Air Publication and latest issue number of the checking list.

1. The fitting of an alternative item of different type or part number but falling within the same generic heading of a checking list item does not constitute a discrepancy
2. During storage or transit of the Engine Change Unit all exposed apertures, pipe ends, unions etc., are to be suitably blanked off to prevent the ingress of foreign matter.
3. Every effort should be made to despatch the log book with the Engine Change Unit and the log book should record the shortage of major components.
4. It must be clearly understood that all items included in the checking lists are to be accounted for notwithstanding the fact that certain items may not be required for the specific airframes into which the Engine Change Unit is installed and the relevant issue or receipt vouchers and Forms 640 are to be suitably endorsed to show the shortages. Similar action is to be taken regarding surplus items (Forms 729 are also to be suitably endorsed by the resident Inspector-in-Charge, A.I.D. at contractor's works)
5. The Engine Change Unit is to be transferred complete to the checking lists unless instructions are issued to the contrary, or through exceptional circumstances e.g. parts lost in crash, modification. etc.

Continued

AIR MINISTRY CHECKING LIST

6. The items listed below are not to be regarded as part of, or transferred with, this Engine Change Unit.

1. Tool Kit
2. Jet Pipe

7. The amendment list number quoted in the issue number chart is the latest affecting the checking list, and may not necessarily be in numerical order, or the latest amendment to the Volume 3.

Item No.	Description	Qty. per Engine
<u>PART 1</u>		
<u>AERO-ENGINE AVON 109 BASIC ENGINE ITEMS</u>		
1.	Cover, blanking, for air intake	1
2.	Suspension front engine locating complete with two sphericals	1
3.	Actuator for engine anti-icing system	1
4.	Valve, gate, for engine anti-icing system	1
5.	Unit control, for bleed valve	1
6.	Shaft, coupling gear box drive	1
7.	Ring, sealing, for fireproof bulkhead (rubber)	1
8.	Unit, exhaust	1
9.	Pipes, fire extinguishing complete with interconnecting pipe and connection	1 set
10.	Pipes, fuel drain from combustion chamber to drain valve	2
11.	Plugs, high energy	2
12.	Pipe, flexible, fuel pilot manifold to pilot burners	1 set
13.	Filler, oil sump	1
14.	Transmitter, oil pressure	1
15.	Pipe, fuel drain from oil cooler to drain connection	1
16.	Pipe, fuel, pressurising valve to main burners	1
17.	Pipe, flexible, from fuel pump to barometric pressure control	1
18.	Unit, fuel control, comprises pressurising valve, shut-off cock and throttle valve, barometric pressure control and low pressure filter	1
19.	Cooler, oil, fuel cooled	1
20.	Connection, fuel burner pressure gauge, R.H. and L.H.	2
21.	Cover, blanking, for exhaust unit	1

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AIR MINISTRY CHECKING LIST Continued

Item No.	Description	Qty. per Engine
22.	Plates, lifting, engine rear	2
23.	Fireproof bulkhead (8 sections)	1
24.	Harness, electrical, complete with junction	1
25.	Connection, compressor rear seat air vent	1
26.	Pipe, flexible, servo, from fuel pump upper connection to acceleration control unit	1
27.	Unit, acceleration control	1
28.	Pipe, flexible, metered fuel from metering valve to acceleration control unit	1
29.	Pipe, flexible, fuel pump outlet pressure metering valve to acceleration control unit	1
30.	Eye, lifting, engine front	1
31.	Cables, electric, for turbo starter motor	1
32.	Gear, driving, setscrew and tab washer for turbo. starter motor (these items are attached to the dummy starter motor for transportation purposes)	1 set
33.	Fairing and exhaust manifold for turbo starter motor	1
34.	Ram, operating, inlet guide vanes	1
35.	Duct, upper and lower bleed valve R.H. and L.H.	4
36.	Pipe, flexible, servo, from fuel pump to barometric pressure control unit	1
37.	Pipe, fuel drain, from fuel pump to drain connection	1
38.	Pipe, fuel drain, governor pump to camplate housing	1
39.	Pump, fuel, complete with isolating solenoid	1
40.	Pump, governor, for operating ram	1
<u>PART 2</u>		
<u>ENGINE CHANGE UNIT ITEMS</u>		
41.	Switch, fuel pressure warning light	1
42.	Generator, tachometer, engine speed	1
43.	Starter, gas turbo.	1

ISSUE NUMBER OF CHECKING LIST

ISSUE No.	1	2			
AMENDT. No.	-	9			
DATE	Nov. 1953.	Apr. 1957.			

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) LOP.	BA.37117		
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) LOP.	BA.44898		
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