

	REGISTRO RECORD	REVISÃO REVISION 01
CODIGO CODE IAS-RG-0223	FICHA DE SERVIÇOS Service Sheet	PAGINA PAGE 1/15

COMPONENTE Component	O.S W.O	MODELO Model	PN	SN
FUEL CONTROL UNIT		DP-F2 Main Fuel Control Unit		

IDENTIFICAÇÃO IDENTIFICATION			
TÍTULO TITLE	FICHA PARA REGISTROS DE TESTE DA FUEL CONTROL UNIT FUEL CONTROL UNIT TEST SHEET		
PUBLICAÇÃO PUBLICATION	REFERÊNCIA REFERENCE	TLN	DATA DATE
COMPONENT MAINTENANCE MANUAL WITH ILLUSTRATED PARTS LIST	73-20-78	TLN02342	June 08/2021 Revision 02
CONJUNTO MAIOR MAIN PART			
		PN	SN

TESTE APPLICÁVEL AOS PART NUMBERS TEST APPLICABLE TO PART NUMBERS	
3244897-4	3244897-4 MOD 5

TESTE DA UNIDADE DE CONTROLE DE COMBUSTÍVEL FUEL CONTROL UNIT TEST				
ITEM Item	PROCEDIMENTOS TOLERÂNCIAS Procedures Serviceable limits	Resultado Result	Data Date	Executante Performed by
A	Remova o contra pino, porca e espaçador do eixo de aceleração. Instale o Quadrante de Aceleração na extremidade do eixo de aceleração e torqueie de 40-45 lb.in. <i>Remove cotter pin, nut, and spacer from throttle shaft. Assemble throttle quadrant and pointer on the end of throttle shaft and tighten to 40-45 lb.in.</i>			
B	Remova o plugue e instale o acessório especial de teste. Remova o plugue e instale um adaptador padrão nas portas. <i>Remove plug and assemble, special testing fixture. Remove plug and install a standard adapter into ports.</i>			
C	Mantenha uma pressão Po de 10-30 psig na conexão de Po, exceto quando houver outra especificação. Mantenha a pressão P2 dentro de ± 10 psi do valor especificado em pressões abaixo de 300 pph e dentro de ± 25 psig em pressões mais altas, usando a válvula reguladora de contrapressão Pn. <i>Maintain a Po pressure of 10 - 30 psig on Po pressure gage, except where otherwise specified. Maintain P2 pressure within ± 10 psi of the value specified at pressures below 300 pph and within ± 25 psig at higher pressures, using Pn back pressure regulator valve.</i>			
D	Ajuste o parafuso de pressão diferencial P1-P2 para uma pressão de 26-42 in.Hg. Ajuste o orifício da sleeve da metering valve até a pressão diferencial P1-P2 e o fluxo de injeção estarem de acordo com os limites especificados. <i>Adjust P1-P2 pressure differential adjustment screw for a pressure of 26 - 42 in.Hg. Adjust metering valve sleeve assembly orifice until P1-P2 pressure differential and nozzle flow are within the limits specified.</i>			
E	Torqueie as porcas de 35-40 lb.in e 25-35 lb.in respectivamente. Registre todas as pressões diferenciais de P1-P2 e o fluxo de injeção e adicionalmente, as pressões diferenciais de Pc-Px e Px-PY. <i>Torque nuts to 35- 40 lb.in and 25-35 lb.in respectively. Record all P1-P2 differential pressures and nozzle flows and additionally, Pc-Px and Px-Py differential pressures.</i>			
F	Ajuste a porca até que o fluxo de injeção leia 13 – 17 pph. <i>Adjust nut until the nozzle flow reads 13 – 17 pph.</i>			
G	Se o fluxo do injetor não estiver dentro dos limites especificados, troque o fluxo de ar Py. Torqueie o fluxo de ar Py de 9-11 lb.in. <i>If the nozzle flow is not within the specified limits, change Py air flow jet. Torque air flow jet to 9 – 11 lb.in.</i>			

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				TEST SPECIFICATION			AETS 68913																																															
							SHEET 2		SHEETS OF 9		REV. C																																											
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi																																												
						MIN	REC	MAX																																														
H. All adjustments are to be properly torqued. Test points indicated (*) require special attention and are to be checked following proper torquing. <table style="width:100%;"> <tr> <td style="width:45%;">1. Metering valve orifice torque</td> <td style="width:10%; text-align: center;">35</td> <td style="width:10%; text-align: center;"> </td> <td style="width:35%; text-align: right;">40 in. lb.</td> </tr> <tr> <td>2. By-pass setting torque</td> <td style="text-align: center;">25</td> <td style="text-align: center;"> </td> <td style="text-align: right;">35 in. lb.</td> </tr> <tr> <td>3. Min. M/V stop (breakaway) torque</td> <td style="text-align: center;">4</td> <td style="text-align: center;"> </td> <td style="text-align: right;">20 in. lb.</td> </tr> <tr> <td>4. Max. flow M/V stop torque</td> <td style="text-align: center;">20</td> <td style="text-align: center;"> </td> <td style="text-align: right;">25 in. lb.</td> </tr> <tr> <td>5. Max. gov. eccentric locknut torque</td> <td style="text-align: center;">7</td> <td style="text-align: center;"> </td> <td style="text-align: right;">7.5 in. lb.</td> </tr> <tr> <td>6. Max. throttle stop torque</td> <td style="text-align: center;">20</td> <td style="text-align: center;"> </td> <td style="text-align: right;">25 in. lb.</td> </tr> <tr> <td>7. Idle speed stop torque</td> <td style="text-align: center;">20</td> <td style="text-align: center;"> </td> <td style="text-align: right;">25 in. lb.</td> </tr> <tr> <td>8. Flow body to drive body torque</td> <td style="text-align: center;">20</td> <td style="text-align: center;"> </td> <td style="text-align: right;">25 in. lb.</td> </tr> <tr> <td>9. Drive body adapter to drive body torque - in 5 in lb. inc.</td> <td style="text-align: center;">25</td> <td style="text-align: center;"> </td> <td style="text-align: right;">30 in. lb.</td> </tr> <tr> <td>10. Bleeds torque</td> <td style="text-align: center;">9</td> <td style="text-align: center;"> </td> <td style="text-align: right;">11 in. lb.</td> </tr> <tr> <td>11. Man. Override stop nut</td> <td style="text-align: center;">20</td> <td style="text-align: center;"> </td> <td style="text-align: right;">25 in. lb.</td> </tr> </table> I. Speed for test points indicated (#) (3.01, 3.02, 4.01, 4.02, 4.03, and 6.01) is to be set to within ± 2 RPM of specified value. All other points are to be set within ± 20 RPM of specified value. J. Total supply is to be set to ± 20 PPH of the specified value or within limits when shown. When aircraft pump is used, ignore total supply and Po pressure settings. K. Maintain manual override fully CCW except where otherwise indicated. L. Before calibration, check for external air leakage using "Leo-Tec". Slow bubbling is permitted at the joint of drive body and air adaptor, at the torsion shaft cover and at the bellows and torsion shaft locknuts. No leakage is permitted at any other point. Pc = 100 PSIA. If leakage is considered excessive, measure Px - Py with Pc = 100 PSIA, RPM = 0, and T/A = MAX. Px to be measured at the bellows ratio lever cover. Px - Py = ± 1.2 in. Hg. maximum											1. Metering valve orifice torque	35		40 in. lb.	2. By-pass setting torque	25		35 in. lb.	3. Min. M/V stop (breakaway) torque	4		20 in. lb.	4. Max. flow M/V stop torque	20		25 in. lb.	5. Max. gov. eccentric locknut torque	7		7.5 in. lb.	6. Max. throttle stop torque	20		25 in. lb.	7. Idle speed stop torque	20		25 in. lb.	8. Flow body to drive body torque	20		25 in. lb.	9. Drive body adapter to drive body torque - in 5 in lb. inc.	25		30 in. lb.	10. Bleeds torque	9		11 in. lb.	11. Man. Override stop nut	20		25 in. lb.
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TEST SPECIFICATION						AETS 68913				
						SHEET 3	SHEETS OF 9		REV. C	
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, P/PH			P1 - P2 "Hg	P2 psi
						MIN	REC	MAX		
<u>CHECK RELIEF VALVE OPENING</u> (a) Cap outlet port. (b) Increase fuel flow until supply is within limits specified and observe P1-Po differential. (c) If P1-Po differential is out of limits, shim as required. Add shims to increase differential.										
1.01	1 A.R.	5 200-275	2 MAX	3 +105	4 85.0	Relief valve opening P1 - Po 950 1000 psi				
<u>CHECK PRESSURIZING VALVE OPENING</u> (a) Increase supply pressure with outlet port open, observe start of nozzle flow. (b) If P1-Po is out of limits, shim as required. Add shims to increase differential.										
1.02	1 A.R.	5 A.R.	2 MAX	3 +105	4 85.0	Pressurizing valve opening P1 - Po 55 88 psi				
If valve cover has been removed and reassembled, torque screws to 4.5 - 5.0 in.-lb. in 1 in.-lb. increments maximum while alternating between the screws.										
<u>METERING VALVE ORIFICE AND BY-PASS HEAD (P1-P2) "HG SETTING</u> (a) Test points 2.01 thru 2.03 are interrelated and should be recorded after all three (3) adjustments have been made. (b) If at T.P. 2.03, P1-P2 is higher than 41 in. Hg, remove by-pass valve cover and replace existing spacer P/N 3240905 with thicker spacer P/N 3240905-1. If P1-P2 is lower than 33 in. Hg., remove and discard existing spacer. (c) Retorque the by-pass valve retaining screws to 20 in.-lb in increments of 5 in.-lb and recalibrate T.P. 2.01 to 2.03.										
2.01	3 5800	4-6 1350	1 MAX	2 +105	5 40.0	228		238		150
Adjust head and orifice, P1-P2 = 28-42 in Hg.										
2.02	2900	720	30-32	+105	40.0	80		84		
Pn = 75-90 psig Set minimum M/V stop after removing Py line. Open back pressure valve.										

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						TEST SPECIFICATION		AETS 68913			
								SHEET 4 OF 9		SHEETS	
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi	
						MIN	REC	MAX			
2.03	5800	1350	MAX	+105	70.0	405		415			
P2 = 470 480 psig Retrim head and re-adjust 2.01 - 2.02 if out of limits. Px - Py 1.2 in Hg. max. As per note (b), check appropriate box.											
						Original spacer					
						Spacer removed					
						Spacer replaced					
2.04	5800	1350	MAX	+105	100.0	506		520		750	
Set maximum M/V stop.											
2.05	5800	1350	MAX	+105	40.0	-10		+10		150	
Hysteresis of T.P. 2.01.											
After by-pass valve adjustment has been completed (T.P. 2.01 thru 2.05) and detent cup has been locked in position.											
a) Record T.P. 2.08 to 2.08. b) T.P. 2.09, same conditions as T.P. 2.08, rotate detent cup 3 clicks CW from original position, nozzle flow must increase by 5 pph min. from T.P. 2.08. Record values, and return detent cup to original position per T.P. 2.08. c) T.P. 2.10, same conditions as T.P. 2.08, rotate detent cup 3 clicks CCW from original position, nozzle flow must decrease by 5 pph min. from T.P. 2.08. d) T.P. 2.11, return detent cup to original position and retest T.P. 2.08.											
2.06	2192	680	MAX	+105	18.0	103		107			
Pn = 75 - 90 psig											
2.07	3130	790	MAX	+105	20.0	114		119			
Pn = 95 - 105 psig											
2.08	5010	1170	MAX	+105	65.0	370		387		425	
2.09	3 clicks CW					X		X			
Inc. from T.P. 2.08						+5		X			

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TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi
						MIN	REC	MAX		
2.10	3 clicks CCW					X		X		
	Dec. from T.P. 2.08					-5		X		
2.11	Return to original position, nozzle flow to be within ± 2 pph of T.P. 2.08.					-2		+2 pph		425
MAX. GOVERNOR SPRING SETTING										
(a) Adjust eccentric shaft to meet flow limits. (b) If unable to set with eccentric, maximum T.A. may be varied within T.A. limits. (c) If unable to set with eccentric or max. T.A. maintain eccentric shaft scribe line in position furthest away from drive body and determine amount of RPM off. (d) Split control and adjust gov. spring as required. (CW adj. of governor spring delays break, approximately 1 flat on adj. nut per 50 RPM). (e) If gov. slope is not in limits, select Py bleed per parts list (Higher number bleed to increase difference in flow).										
BLEED SIZE 56 64										
3.01	5 6475	4-7 1440	1 	2 +105	3-6 85.0	335		345		325
Set governor break T.A. at 89° - 91°										
3.02	6825	1530	"	+105	"	X		X		140
Diff. from T.P. 3.01 (Gov. slope)						105		125		
3.03		1440	"	+105	"	X		X		325
Hysteresis -50 0 RPM of T.P. 3.01										

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TEST SPECIFICATION						AETS 68913			REV. C	
						SHEET 6	SHEETS OF 9			
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi
						MIN	REC	MAX		
<u>IDLE SPEED STOP SETTING AND PICK-UP ANGLE</u>										
(a) At T.P. 4.03, increase T.A. until 4 pph max. fuel flow from 4.01 is observed. (T.A. where flow starts to increase is pick-up angle). (b) If throttle cam pick-up angle is out of limits, replace governor spring. 1) Use a higher numbered spring to increase pick-up angle. 2) Use a lower numbered spring to decrease pick-up angle. 3) Adjust spring tension to same load as set on spring removed. 4) Re-set governor break at T.P. 3.01 and re-run T.P.s 3.02 and 3.03 inclusive. 5) Re-set idle stop at T.P. 4.01.										
# 4.01	4 3200	1-7 800	5 28-30	2 +105	3-6 30.0	104		112		
Pn = 95 - 105 psig. Set idle stop screw (CW adj. to increase flow). Decrease and re-set speed after adjustment throttle pick-up angle.										
# 4.02	3350	890	*	+105	*	X		X		
Diff. from T.P. 4.01						X		X		
# 4.03	3200	800		+105	30.0		Pick-up	Δ 30°		34°
							Spring stripe			
<u>LOW END OF ACCELERATION FLOW AND THROTTLE MOVEMENT EFFECT</u>										
(a) After recording nozzle flow at test point 5.02 move throttle to 30° T.A. (b) Observe nozzle flow change and record.										
5.01	3 815	5 200	4 40	2 +105	1 Local	60		X		
Pn = 75 psig										
5.02	2100	670	40	+105	25.0	136		148		
Pn = 100 - 110 psig										
Move T.A. to 30°							5 PPH maximum decrease			

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								SHEET 7 OF 9		SHEETS	
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi	
						MIN	REC	MAX			
<u>MAX. IDLE RESET STOP ADJ.</u>											
#	1	4-6	5	2	3-7						
6.01	5000	1170	-	+105	55.0	188			197		
	Pn = 100 - 115 psig										
	Set Max. idle reset stop.										
					Record T.A.						
<u>MANUAL OVERRIDE</u>											
A) At T.P. 7.01, move manual override lever C.W. until 2 to 4 P.P.H. nozzle flow increase is observed. Record override angle.											
B) At T.P. 7.02, set manual override flow. Rotate override lever C.W. such that lever stop is in contact with adjusting screw. Rotate adjusting screw C.C.W. to increase flow.											
C) At T.P. 7.03, record the manual override total angular travel.											
	1	5	2	3	4						
7.01	5000	1170	32	+105	Local		25°		35°		
7.02	5000	1170	32	+105	Local	485		475		470	
7.03	Record manual override total angular travel						85°		95°		
<u>CUT-OFF MODULATION AND CUT-OFF LEAKAGE</u>											
A) At T.P. 8.01, set test condition with 20° T.A.											
(a) Move throttle to 30° T.A. and observe nozzle flow change.											
(b) If nozzle flow change is excessive -											
1) Re-set throttle to 20° T.A.											
2) Back off override adj. nut on cut-off link.											
3) Adjust cut-off link longer to meet max. flow change limits.											
	3	4-6	1	2	5						
8.01	2000	500	20	+105	A.R.	180			170		
	Pn = 90 - 105 psig										
	Nozzle flow change							4 PPH max			
B) At T.P. 8.02, check cut-off leakage.											
(a) Remove nozzle outlet from control.											
(b) Set total supply with throttle in cut-off position. (Highest T.A. position where no leakage is observed at outlet fitting).											
(c) Increase T.A. to permit flow out the outlet fitting.											
(d) Decrease T.A. as required until no leakage is observed at outlet fitting (Observe T.A.).											

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TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi
						MIN	REC	MAX		
(e) If T.A. is out of limits, shim cut-off valve seat. (1) Remove shims under C.O. valve seat to increase T.A. (.002" thickness shim changes T.A. approx. 2°). (f) Same Pc as established for T.P. 8.01. (g) Record cut-off leakage. (h) Record P1.										
8.02	3 2000	4-6 500	1 8-10	2 +105	5 -	0		0.5		
						cc/min.				
						P1 pressure 250 psig max.				
C) At T.P. 8.03 (-5° T.A.) (a) Observe P1 pressure (b) Adjust override nut for .005" - .010" clearance between nut and bushing. (c) Adjust upper lever (idle reset lever) stop to just contact lever. (d) At 0° T.A. lower C.O. lever to be within ± 5° of horizontal. (e) Pc same as in T.P. 8.01.										
At test point 8.04										
(a) Operate throttle lever over full range of travel. (b) Record throttle torque.										
8.03	3 2000	4-6 500	1 -5	2 +105	5 -					
P1 pressure equal to or less than T.P. 8.02						P1			psig	
8.04	2000	500	Min-Max-Min		Local					
						Throttle torque 15 in-lb max.				
SPECIFIC GRAVITY ADJUSTMENT RECORD										
9.01	At the specific gravity index line measure the gap between the by-pass valve retaining plate and the specific gravity adjustment dome.									
						GAP inch.				
EXTERNAL LEAKAGE CHECK										
A) Cap Po at drive flange by-pass tap. B) Remove Po line to control and install Po plug. C) Cap outlet port and both spill valve ports. D) Set P1 pressure to 1000 psig.										

TEST SPECIFICATION						AETS 68913				
						SHEET 9 OF 9			REV. C	
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi
						MIN	REC	MAX		
E) Observe leakage for 2-3 minutes. F) No leakage permitted.										
						OK REJECT				
Record shipping weight						X		5.2 lbs. max.		
						Checked By:				
						Inspected By:				
						Accepted By:				

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TESTE AETS 68914 | AETS 68914 TEST

		TEST SPECIFICATION		Number AETS 68914	Rev. C
				Sheet 1 of 6	
Orig By: G. Chan	Chk By: W.H. Foster	Project Leader: M. Taylor	MFG Approval:		
Date:	Test Stand No.:	Operator:	S/N:		
Unit: Automatic Fuel Control		Model: DP-F2	P/N: 3244897		
REL DATE 03 JUN 96	REV. A	REL DATE 16 MAR 96	REV. B	REL DATE 04 APR 96	REV. C
		SIT REV 1	SIT REV 2	SIT REV 3	SIT REV 4
		SIT REV 5	SIT REV 6	SIT REV 7	SIT REV 8
		SIT REV 9	SIT REV 10	SIT REV 11	SIT REV 12
		SIT REV 13	SIT REV 14	SIT REV 15	SIT REV 16
		SIT REV 17	SIT REV 18	SIT REV 19	SIT REV 20
		SIT REV 21	SIT REV 22	SIT REV 23	SIT REV 24

AUDIT SPECIFICATION

- A. See AEEI-48022 for location of adjustments and pressure taps.
- B. Connect TS-E2 Slave sensor to control. Mechanically position sensor needle to dial indicator reading as designated on sensor for +105° temp. station.
- C. (1) Install throttle quadrant fixture with a 4.0 lb. load applied to throttle lever to hold lever against maximum throttle stop.
(2) Index throttle quadrant to 90° T.A. Torque throttle quadrant fixture to 40-45 in.-lb.
- D. Control rotation CW as viewed from control shaft end.
- E. Maintain Po pressure of 10 to 30 psig at control by-pass tap, except where otherwise specified.
- F. P2 must conform to AEEI-48022 Figure 3 at all nozzle flow test points, except where Pn limit is required.
- G. Set test conditions (Temp., Speed, Supply, Po) in the sequence indicated by numbers 1, 2, 3, etc.
(a) When two numbers are listed, set and then trim test condition in the sequence indicated.
(b) Approach all speeds, total fuel supplies, and Po settings from a lower value, except at hysteresis points.
- H. Speed for test points indicated (9) (3.01, 3.02, 4.01, 4.02, 4.03, and 6.01) is to be set to within ± 2 RPM of specified value. All other points are to be set within ± 20 RPM of specified value.
- I. Total supply is to be set to ± 20 PPH of the specified value or within limits when shown. When aircraft pump is used, ignore total supply and Po pressure settings.
- J. Maintain manual override fully CCW except where otherwise indicated.

CURRENT DESIGN ACTIVITY
 CAGE CODE 06848
 HONEYWELL INTERNATIONAL INC
 ENGINE SYSTEMS & ACCESSORIES
 SOUTH BEND IN USA

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TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi	
						MIN	REC	MAX			
<u>CHECK RELIEF VALVE OPENING</u>											
(a) Cap outlet port.											
(b) Increase fuel flow until supply is within limits specified and observe P1-Po differential.											
1.01	1 A.R.	5 200-275	2 MAX	3 +105	4 85.0	Relief valve opening P1 - Po 950 1000 psi					
<u>CHECK PRESSURIZING VALVE OPENING</u>											
(a) Open outlet port.											
(b) Increase P1 pressure and observe start of nozzle flow.											
1.02	1 A.R.	5 A.R.	2 MAX	3 +105	4 85.0	Pressurizing valve opening P1 - Po 52 70 psi					
<u>METERING VALVE ORIFICE AND BY-PASS HEAD (P1-P2) "HG SETTING</u>											
2.01	3 5800	4-6 1350	1 MAX	2 +105	5 40.0	226		240		150	
2.02	2900	720	30-32	+105	40.0	80		85			
Pn = 75-90 psig Remove Py line. Open back pressure valve.											
2.03	5800	1350	MAX	+105	70.0	403		417			
P2 = 470 480 psig											
Px - Py 1.2 in. Hg. max.											
2.04	5800	1350	MAX	+105	100.0	505		525		750	
2.05	5800	1350	MAX	+105	40.0	-10		+10		150	
Hysteresis of T.P. 2.01.											
2.06	2192	680	MAX	+105	18.0	102		106			
Pn = 75 - 90 psig											

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						TEST SPECIFICATION			AETS 68914		
						SHEET 3 OF 8			SHEETS		REV.
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi	
						MIN	REC	MAX			
2.07	3130	790	MAX	+105	20.0	113		120			
	Pn = 95 - 105 psig										
2.08	5010	1170	MAX	+105	85.0	367		390		425	
MAX. GOVERNOR SPRING SETTING											
# 3.01	5 6475	4-7 1440	1	2 +105	3-6 85.0	310		370		325	
# 3.02	6825	1530	*	+105	*	X		X		140	
	Diff. from T.P. 3.01 (Gov. slope)					100		130			
3.03		1440	*	+105	*	X		X		325	
	Hysteresis -50 0 RPM. of T.P. 3.01										
IDLE SPEED STOP SETTING AND PICK-UP ANGLE											
(a) At T.P. 4.03, increase T.A. until 4 pph max. fuel flow from 4.01 is observed. (T.A. where flow starts to increase is pick-up angle).											
# 4.01	4 3200	1-7 800	5 28-30	2 +105	3-6 30.0	103		113			
	Pn = 95 - 105 psig.										
# 4.02	3350	800	*	+105	*	X		X			
	Diff. from T.P. 4.01					X		X			
# 4.03	3200	800		+105	30.0		Pick-up	Δ 30°		34°	

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		TEST SPECIFICATION					AETS 88914			
							SHEET 4 OF 6		SHEETS	
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 °Hg	P2 psi
						MIN	REC	MAX		
<u>LOW END OF ACCELERATION FLOW AND THROTTLE MOVEMENT EFFECT</u>										
(a) After recording nozzle flow at test point 5.02 move throttle to 30° T.A.										
(b) Observe nozzle flow change and record.										
5.01	3 815	5 200	4 40	2 +105	1 Local	60		X		
Pn = 75 psig										
5.02	2100	670	40	+105	25.0	133		151		
Pn = 100 - 110 psig										
Move T.A. to 30° 5 PPH maximum decrease.										
<u>MAX. IDLE RESET STOP ADJ.</u>										
#	1	4-6	5	2	3-7					
6.01	5000	1170	-	+105	55.0	188		197		
Pn = 100 - 115 psig										
Record T.A.										
<u>MANUAL OVERRIDE</u>										
A) At T.P. 7.01, move manual override lever C.W. until 2 to 4 P.P.H. nozzle flow increase is observed. Record override angle.										
B) At T.P. 7.02, set manual override flow. Rotate override lever C.W. such that lever stop is in contact with adjusting screw. Rotate adjusting screw C.C.W. to increase flow.										
C) At T.P. 7.03, record the manual override total angular travel.										
7.01	1 5000	5 1170	2 32	3 +105	4 Local		25°		35°	
7.02	5000	1170	32	+105	Local	480		480		470
7.03	Record manual override total angular travel						85°		95°	

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						TEST SPECIFICATION			AETS 88914		
									SHEET 5	SHEETS OF 6	REV. 
TEST POINT	SPEED RPM	SUPPLY PPH	THRO DEG.	TEMP °F	Pc psia	NOZZLE FLOW, PPH			P1 - P2 "Hg	P2 psi	
						MIN	REC	MAX			
<u>CUT-OFF MODULATION AND CUT-OFF LEAKAGE</u> A) At T.P. 8.01, set test condition with 20° T.A. (a) Move throttle to 30° T.A. and observe nozzle flow change.											
8.01	3 2000	4-6 500	1 20	2 +105	5 A.R.	160		170			
	Pn = 90 - 105 psig					Nozzle flow change 4 PPH max					
B) At T.P. 8.02, check cut-off leakage. (a) Remove nozzle outlet from control. (b) Set total supply with throttle in cut-off position. (Highest T.A. position where no leakage is observed at outlet fitting). (c) Increase T.A. to permit flow out the outlet fitting. (d) Decrease T.A. as required until no leakage is observed at outlet fitting (Observe T.A.). (e) Same Pc as established for T.P. 8.01. (f) Record cut-off leakage. (g) Record P1.											
8.02	3 2000	4-6 500	1 8-10	2 +105	5 -	0		0.5			
						cc/min.					
						P1 pressure 250 psig max.					
C) At T.P. 8.03 (-5° T.A.) (a) Observe P1 pressure (b) At 0° T.A. lower C.O. lever to be within ± 5° of horizontal. (c) Pc same as in T.P. 8.01.											
At test point 8.04											
(a) Operate throttle lever over full range of travel. (b) Record throttle torque.											
8.03	3 2000	4-6 500	1 -5	2 +105	5 -						
	P1 pressure equal to or less than T.P. 8.02					P1		psig			
8.04	2000	500	Min-Max-Min		Local						
						Throttle torque 15 in-lb max.					

