

# AUTOMATIC TRANSMISSION

## SERVICE DATA

SS0C5-09

2JZ-GE		
Line pressure (Wheel locked)	Idling D position R position Stall D position R position	395 – 455 kPa (4.0 – 4.6 kgf-cm <sup>2</sup> , 57 – 65 psi) 0 1,200 – 1,360 kPa (12.2 – 13.8 kgf-cm <sup>2</sup> , 174 – 196 psi) 1,655 – 1,960 kPa (16.9 – 19.8 kgf-cm <sup>2</sup> , 240 – 282 psi)
Engine stall revolution (D position)		2,700 ± 150 rpm
Time lag	N → D position N → R position	Less than 1.2 seconds Less than 1.5 seconds
Engine idle speed (N position and A/C OFF)		700 ± 50 rpm
Drive plate runout	Max.	0.20 mm (0.0079 in.)
Torque converter clutch sleeve runout	Max.	0.30 mm (0.0118 in.)
Torque converter clutch installation (Correct distance)		More than 0.1 mm (0.004 in.)
Extension housing oil seal drive in depth from flat end		2.0 mm (0.079 in.)
Shift schedule (NORM and PWR mode)		
Differential gear ratio 3.916		
D, M position (Throttle valve fully opened)	1 → 2 2 → 3 3 → 4 4 → 5 5 → 4 4 → 3 3 → 2 2 → 1	52 – 62 km/h (32 – 38 mph) 81 – 91 km/h (50 – 57 mph) 123 – 139 km/h (76 – 86 mph) 176 – 193 km/h (109 – 120 mph) 170 – 184 km/h (105 – 113 mph) 111 – 123 km/h (69 – 76 mph) 62 – 69 km/h (38 – 43 mph) 34 – 39 km/h (21 – 24 mph)
(Throttle valve fully closed)	4 → 5 5 → 4	39 – 45 km/h (24 – 28 mph) 22 – 27 km/h (14 – 17 mph)
3 position (Throttle valve fully opened)	1 → 2 2 → 3 4 → 3 3 → 2 2 → 1	52 – 62 km/h (32 – 38 mph) 81 – 91 km/h (50 – 57 mph) 128 – 140 km/h (79 – 87 mph) 62 – 69 km/h (38 – 43 mph) 34 – 39 km/h (21 – 24 mph)
2 position (Throttle valve fully opened)	1 → 2 3 → 2 2 → 1	52 – 62 km/h (32 – 38 mph) 86 – 94 km/h (53 – 58 mph) 34 – 39 km/h (21 – 24 mph)
L position (Throttle valve fully opened)	2 → 1	16 – 21 km/h (10 – 13 mph)

## SERVICE SPECIFICATIONS – AUTOMATIC TRANSMISSION

Shift schedule (SNOW mode)		
Differential gear ratio 3.916		
D, M position		
(Throttle valve fully opened)	1 → 2	36 – 51 km/h (22 – 32 mph)
	2 → 3	57 – 76 km/h (35 – 47 mph)
	3 → 4	88 – 113 km/h (55 – 70 mph)
	4 → 5	126 – 158 km/h (78 – 98 mph)
	5 → 4	67 – 92 km/h (42 – 57 mph)
	4 → 3	40 – 56 km/h (25 – 35 mph)
	3 → 2	18 – 32 km/h (11 – 20 mph)
(Throttle valve fully closed)	4 → 5	39 – 45 km/h (24 – 28 mph)
	5 → 4	22 – 27 km/h (14 – 17 mph)
3 position		
(Throttle valve fully opened)	1 → 2	36 – 51 km/h (22 – 32 mph)
	2 → 3	57 – 76 km/h (35 – 47 mph)
	4 → 3	128 – 140 km/h (79 – 87 mph)
	3 → 2	18 – 32 km/h (11 – 20 mph)
2 position		
(Throttle valve fully opened)	1 → 2	36 – 51 km/h (22 – 32 mph)
	3 → 2	86 – 94 km/h (53 – 58 mph)
L position		
(Throttle valve fully opened)	2 → 1	16 – 21 km/h (10 – 13 mph)
Lock-up point (Differential gear ratio 3.916)		
(Throttle valve opening 5 %)		
5th gear (D position)	Lock-up ON	55 – 62 km/h (34 – 38 mph)
	Lock-up OFF	54 – 60 km/h (33 – 37 mph)
4th gear (4 position)	Lock-up ON	55 – 62 km/h (34 – 38 mph)
	Lock-up OFF	54 – 60 km/h (34 – 37 mph)
Flex lock-up point (Differential gear ratio 3.916)		
(Throttle valve opening 3 %)		
D position (When accelerating)		
5th gear	Lock-up ON	39 – 45 km/h (24 – 28 mph)
	Lock-up OFF	38 – 43 km/h (24 – 27 mph)
4th gear	Lock-up ON	29 – 35 km/h (18 – 22 mph)
	Lock-up OFF	28 – 33 km/h (17 – 21 mph)
4 position (When accelerating)		
4th gear	Lock-up ON	29 – 35 km/h (18 – 22 mph)
	Lock-up OFF	28 – 33 km/h (17 – 20 mph)
3UZ-FE		
Line pressure (Wheel locked)		
	Idling	
	D position	395 – 455 kPa (4.0 – 4.6 kgf-cm <sup>2</sup> , 57 – 65 psi)
	R position	0
	Stall	
	D position	1,200 – 1,360 kPa (12.2 – 13.8 kgf-cm <sup>2</sup> , 174 – 196 psi)
	R position	1,655 – 1,960 kPa (16.9 – 19.8 kgf-cm <sup>2</sup> , 240 – 282 psi)
Engine stall revolution (D position)		2,450 ± 150 rpm
Time lag		
	N → D position	Less than 1.2 seconds
	N → R position	Less than 1.5 seconds
Engine idle speed (N position and A/C OFF)		750 ± 50 rpm
Drive plate runout	Max.	0.20 mm (0.0079 in.)
Torque converter clutch sleeve runout	Max.	0.30 mm (0.0118 in.)
Torque converter clutch installation (Correct distance)		More than 0.1 mm (0.004 in.)
Extension housing oil seal drive in depth from flat end		2.0 mm (0.079 in.)

Shift schedule (NORM and PWR mode)		
Differential gear ratio 3.266		
D, 4 position		
(Throttle valve fully opened)	1 → 2	61 – 72 km/h (38 – 45 mph)
	2 → 3	93 – 105 km/h (58 – 65 mph)
	3 → 4	144 – 162 km/h (89 – 100 mph)
	4 → 5	211 – 231 km/h (131 – 143 mph)
	5 → 4	204 – 220 km/h (126 – 136 mph)
	4 → 3	136 – 149 km/h (84 – 92 mph)
	3 → 2	80 – 88 km/h (50 – 55 mph)
	2 → 1	42 – 48 km/h (26 – 30 mph)
(Throttle valve fully closed)	4 → 5	34 – 40 km/h (21 – 25 mph)
	5 → 4	25 – 30 km/h (16 – 19 mph)
3 position		
(Throttle valve fully opened)	1 → 2	61 – 72 km/h (38 – 45 mph)
	2 → 3	93 – 105 km/h (58 – 65 mph)
	4 → 3	153 – 168 km/h (95 – 104 mph)
	3 → 2	80 – 88 km/h (50 – 55 mph)
	2 → 1	42 – 48 km/h (26 – 30 mph)
2 position		
(Throttle valve fully opened)	1 → 2	61 – 72 km/h (38 – 45 mph)
	3 → 2	100 – 108 km/h (62 – 67 mph)
	2 → 1	42 – 48 km/h (26 – 30 mph)
L position		
(Throttle valve fully opened)	2 → 1	39 – 45 km/h (24 – 28 mph)
Shift schedule (SNOW mode)		
Differential gear ratio 3.266		
D, 4 position		
(Throttle valve fully opened)	1 → 2	36 – 54 km/h (22 – 33 mph)
	2 → 3	58 – 81 km/h (36 – 50 mph)
	3 → 4	87 – 115 km/h (54 – 71 mph)
	4 → 5	136 – 182 km/h (84 – 113 mph)
	5 → 4	84 – 114 km/h (52 – 71 mph)
	4 → 3	56 – 78 km/h (35 – 48 mph)
	3 → 2	5 – 44 km/h (3 – 27 mph)
	2 → 1	5 – 10 km/h (3 – 6 mph)
(Throttle valve fully closed)	4 → 5	34 – 40 km/h (21 – 25 mph)
	5 → 4	25 – 30 km/h (16 – 19 mph)
3 position		
(Throttle valve fully opened)	1 → 2	36 – 54 km/h (22 – 33 mph)
	2 → 3	58 – 81 km/h (36 – 50 mph)
	4 → 3	153 – 168 km/h (95 – 104 mph)
	3 → 2	5 – 44 km/h (3 – 27 mph)
2 position		
(Throttle valve fully opened)	1 → 2	36 – 54 km/h (22 – 33 mph)
	3 → 2	100 – 108 km/h (62 – 67 mph)
L position		
(Throttle valve fully opened)	2 → 1	39 – 45 km/h (24 – 28 mph)

## SERVICE SPECIFICATIONS – AUTOMATIC TRANSMISSION

Lock-up point (Differential gear ratio 3.266) (Throttle valve opening 5 %)		
5th gear (D position)	Lock-up ON	59 – 66 km/h (37 – 41 mph)
	Lock-up OFF	55 – 62 km/h (34 – 38 mph)
4th gear (4 position)	Lock-up ON	139 – 153 km/h (86 – 95 mph)
	Lock-up OFF	132 – 145 km/h (82 – 90 mph)
Flex lock-up point (Differential gear ratio 3.266) (Throttle valve opening 3 %)		
D position (When accelerating)		
5th gear	Lock-up ON	47 – 53 km/h (29 – 33 mph)
	Lock-up OFF	45 – 52 km/h (28 – 32 mph)
4th gear	Lock-up ON	35 – 41 km/h (22 – 25 mph)
	Lock-up OFF	34 – 40 km/h (21 – 25 mph)
3rd gear	Lock-up ON	25 – 30 km/h (16 – 19 mph)
	Lock-up OFF	23 – 28 km/h (14 – 17 mph)