

Subaru Select Monitor

CONTINUOUSLY VARIABLE TRANSMISSION (DIAGNOSTICS)

6. Subaru Select Monitor

A: OPERATION

1. HOW TO USE SUBARU SELECT MONITOR

For detailed operation procedures, refer to “PC application help for Subaru Select Monitor”.

2. READ CURRENT DATA

For detailed operation procedures, refer to “PC application help for Subaru Select Monitor”.

- Non-turbo model

Item	Display	Unit of measure
Engine speed signal	Engine Speed	rpm
Turbine speed sensor signal	Turbine Speed	rpm
Accelerator position sensor	Accel opening angle	%
Vehicle speed converted from secondary speed sensor signal	Front Wheel Speed	km/h or MPH
ATF temperature sensor signal	A/T Oil Temperature	°C or °F
Lock-up duty solenoid set duty ratio	Lock Up Duty Ratio	%
AWD solenoid set duty ratio	Transfer Duty Ratio	%
Gear ratio	Actual Gear Ratio	—
Primary speed sensor signal	Primary Rev Speed	rpm
Secondary speed sensor signal	Secondary Rev Speed	rpm
Stop light switch signal	Stop Light Switch	ON or OFF
Secondary fluid pressure sensor signal	Actual Secondary Pressure	MPa
Secondary solenoid indicator current	Secondary Set Current	mA
Secondary solenoid actual current	Secondary Actual Current	mA
F&R solenoid indicator current	F&R Linear Solenoid Set Current	mA
F&R solenoid actual current	F&R Linear Solenoid Actual Current	mA
Battery voltage	ECU ACC	V
Primary UP solenoid set duty ratio	Primary UP Duty	%
Primary DOWN solenoid set duty ratio	Primary DOWN Duty	%
Parking range signal	P Range	ON or OFF
Reverse range signal	R Range Signal	ON or OFF
Neutral range signal	N Range	ON or OFF
Drive range signal	D Range Signal	ON or OFF
L range signal	L-range	ON or OFF
X mode condition	X Mode	ON or OFF
Shift step in manual mode	Shift Step in Manual Mode	—
Manual mode switch signal	Tiptronic Mode Switch	ON or OFF
Manual mode up switch signal	Up Switch	ON or OFF
Manual mode down switch signal	Down Switch	ON or OFF
Secondary fluid pressure A/D converted value	secondary pressure sensor voltage.	V
ATF temperature sensor voltage	ATF Temp sensor voltage.	V
AT OIL TEMP light 2 Hz blink condition	Diagnosis Lamp	ON or OFF
AT OIL TEMP light ON condition	ATF Temperature Lamp	ON or OFF
AT learning mode condition	AT learning	Completed or Not Completed

Subaru Select Monitor

CONTINUOUSLY VARIABLE TRANSMISSION (DIAGNOSTICS)

- Turbo model

Item	Display	Unit of measure
Engine speed signal	Engine Speed	rpm
Turbine speed signal converted from primary speed sensor signal	Turbine Speed	rpm
Accelerator position sensor	Accel opening angle	%
Vehicle speed converted from front wheel speed sensor signal	Front Wheel Speed	km/h or MPH
ATF temperature sensor signal	A/T Oil Temperature	°C or °F
Lock-up duty solenoid set duty ratio	Lock Up Duty Ratio	%
Lock-up ON/OFF solenoid set	Lock-Up ON/OFF Solenoid	ON or OFF
AWD solenoid set duty ratio	Transfer Duty Ratio	%
Gear ratio	Actual Gear Ratio	—
Primary speed sensor signal	Primary Rev Speed	rpm
Secondary speed sensor signal	Secondary Rev Speed	rpm
Front wheel speed sensor signal	Front Wheel Speed	rpm
Stop light switch signal	Stop Light Switch	ON or OFF
Secondary fluid pressure sensor signal	Actual Secondary Pressure	MPa
Secondary solenoid indicator current	Secondary Set Current	mA
Secondary solenoid actual current	Secondary Actual Current	mA
F&R solenoid indicator current	F&R Linear Solenoid Set Current	mA
F&R solenoid actual current	F&R Linear Solenoid Actual Current	mA
Battery voltage	ECU ACC	V
Primary UP solenoid set duty ratio	Primary UP Duty	%
Primary DOWN solenoid set duty ratio	Primary DOWN Duty	%
Parking range signal	P Range	ON or OFF
Reverse range signal	R Range Signal	ON or OFF
Neutral range signal	N Range	ON or OFF
Drive range signal	D Range Signal	ON or OFF
SI drive mode (control data)	SI Drive mode (Control)	I, S or S#
X mode condition	X Mode	ON or OFF
Shift step in manual mode	Shift Step in Manual Mode	—
Manual mode switch signal	Tiptronic Mode Switch	ON or OFF
Manual mode up switch signal	Up Switch	ON or OFF
Manual mode down switch signal	Down Switch	ON or OFF
AT OIL TEMP light 2 Hz blink condition	Diagnosis Lamp	ON or OFF
AT OIL TEMP light ON condition	ATF Temperature Lamp	ON or OFF
AT learning mode condition	AT learning	Completed or Not Completed
AT ignition power supply relay	AT Power Relay	ON or OFF

Subaru Select Monitor

CONTINUOUSLY VARIABLE TRANSMISSION (DIAGNOSTICS)

3. READ FREEZE FRAME DATA

For detailed operation procedures, refer to “PC application help for Subaru Select Monitor”.

- Non-turbo model

Item	Display	Unit of measure
Relative time since detection	Relative time since detection	ms
Engine speed signal	Engine Speed	rpm
Turbine speed sensor signal	Turbine Speed	rpm
Accelerator position sensor	Accel opening angle	%
Vehicle speed converted from secondary speed sensor signal	Front Wheel Speed	km/h or MPH
ATF temperature sensor signal	A/T Oil Temperature	°C or °F
Lock-up duty solenoid set duty ratio	Lock Up Duty Ratio	%
AWD solenoid set duty ratio	Transfer Duty Ratio	%
Gear ratio	Actual Gear Ratio	—
Primary speed sensor signal	Primary Rev Speed	rpm
Secondary speed sensor signal	Secondary Rev Speed	rpm
Stop light switch signal	Stop Light Switch	ON or OFF
Secondary fluid pressure sensor signal	Actual Secondary Pressure	MPa
Secondary solenoid indicator current	Secondary Set Current	mA
Secondary solenoid actual current	Secondary Actual Current	mA
F&R solenoid indicator current	F&R Linear Solenoid Set Current	mA
F&R solenoid actual current	F&R Linear Solenoid Actual Current	mA
Battery voltage	ECU ACC	V
Primary UP solenoid set duty ratio	Primary UP Duty	%
Primary DOWN solenoid set duty ratio	Primary DOWN Duty	%
Parking range signal	P Range	ON or OFF
Reverse range signal	R Range Signal	ON or OFF
Neutral range signal	N Range	ON or OFF
Drive range signal	D Range Signal	ON or OFF
L range signal	L-range	ON or OFF
X mode condition	X Mode	ON or OFF
Shift step in manual mode	Shift Step in Manual Mode	—
Manual mode switch signal	Tiptronic Mode Switch	ON or OFF
Manual mode up switch signal	Up Switch	ON or OFF
Manual mode down switch signal	Down Switch	ON or OFF
Secondary fluid pressure A/D converted value	secondary pressure sensor voltage.	V
ATF temperature sensor voltage	ATF Temp sensor voltage.	V
AT OIL TEMP light 2 Hz blink condition	Diagnosis Lamp	ON or OFF
AT OIL TEMP light ON condition	ATF Temperature Lamp	ON or OFF

Subaru Select Monitor

CONTINUOUSLY VARIABLE TRANSMISSION (DIAGNOSTICS)

- Turbo model

Item	Display	Unit of measure
Relative time since detection	Relative time since detection	ms
Engine speed signal	Engine Speed	rpm
Turbine speed signal converted from primary speed sensor signal	Turbine Speed	rpm
Accelerator position sensor	Accel opening angle	%
Vehicle speed converted from front wheel speed sensor signal	Front Wheel Speed	km/h or MPH
ATF temperature sensor signal	A/T Oil Temperature	°C or °F
Lock-up duty solenoid set duty ratio	Lock Up Duty Ratio	%
Lock-up ON/OFF solenoid set	Lock-Up ON/OFF Solenoid	ON or OFF
AWD solenoid set duty ratio	Transfer Duty Ratio	%
Gear ratio	Actual Gear Ratio	—
Primary speed sensor signal	Primary Rev Speed	rpm
Secondary speed sensor signal	Secondary Rev Speed	rpm
Front wheel speed sensor signal	Front Wheel Speed	rpm
Stop light switch signal	Stop Light Switch	ON or OFF
Secondary fluid pressure sensor signal	Actual Secondary Pressure	MPa
Secondary solenoid indicator current	Secondary Set Current	mA
Secondary solenoid actual current	Secondary Actual Current	mA
F&R solenoid indicator current	F&R Linear Solenoid Set Current	mA
F&R solenoid actual current	F&R Linear Solenoid Actual Current	mA
Battery voltage	ECU ACC	V
Primary UP solenoid set duty ratio	Primary UP Duty	%
Primary DOWN solenoid set duty ratio	Primary DOWN Duty	%
Parking range signal	P Range	ON or OFF
Reverse range signal	R Range Signal	ON or OFF
Neutral range signal	N Range	ON or OFF
Drive range signal	D Range Signal	ON or OFF
SI drive mode (control data)	SI Drive mode(Control)	I, S or S#
X mode condition	X Mode	ON or OFF
Shift step in manual mode	Shift Step in Manual Mode	—
Manual mode switch signal	Tiptronic Mode Switch	ON or OFF
Manual mode up switch signal	Up Switch	ON or OFF
Manual mode down switch signal	Down Switch	ON or OFF
AT OIL TEMP light 2 Hz blink condition	Diagnosis Lamp	ON or OFF
AT OIL TEMP light ON condition	ATF Temperature Lamp	ON or OFF
AT learning mode condition	AT learning	Completed or Not Completed