



Volvo S80
(2014-2015)



Wiring Diagrams and Electric Model Year 2015



WIRING DIAGRAM 2015

Structure week 14w20 TP 39387031 - VOLVO S80 (07-), V70, XC70 (08-) -

Table of Contents

Explanations & Abbreviations

How to use the wiring diagrams 1:2.....	9
How to use the wiring diagrams 2:2.....	10

Electrical distribution

Overview without Start/Stop function.....	11
Overview with Start/Stop function.....	12
Overview, Distribution box in engine compartment.....	13
Overview, Distribution box in engine compartment.....	14
Overview, Distribution box in passenger compartment.....	15
Overview, Distribution box in luggage compartment.....	16

Fuses

Distribution box, engine compartment F1 - F2.....	17
Distribution box, engine compartment F3 - F7.....	18
Distribution box, engine compartment F8 - F21.....	19
Distribution box, engine compartment F22 - F31.....	20
Distribution box, engine compartment F32 - F36.....	21
Distribution box, engine compartment F37 - F38.....	22
Distribution box, engine compartment F38 - F38.....	23
Distribution box, engine compartment F38 - F39.....	24
Distribution box, engine compartment F40 - F44.....	25
Central Electronic Module (CEM) F1 - F3.....	26
Central Electronic Module (CEM) F4 - F14.....	27
Central Electronic Module (CEM) F15 - F24.....	28
Distribution box, passenger compartment F1 - F17.....	29
Distribution box, passenger compartment F18 - F30.....	30
Distribution box, cold zone, engine compartment F1 - F10.....	31
Distribution box, cold zone, engine compartment F11 - MF2.....	32
Distribution box, luggage compartment FA1 - FA12.....	33
Battery PF1 - PF2.....	34

Relays

Relays in the engine compartment.....	35
Relays in the engine compartment.....	36
Relays in passenger and luggage compartment.....	37

Ground connections

Overview.....	38
31/2-31/6.....	39
31/7.....	40
31/10.....	41
31/15.....	42
31/47-31/48.....	43
31/65-31/83.....	44
31/84-31/90.....	45
31/93-31/131.....	46
31/XX4-31/XX14.....	47
31/TRM-31/AL.....	48

Control modules

Overview locations.....	49
Overview designations.....	50
Central Electronic Module (CEM), 1:3.....	51
Central Electronic Module (CEM), 2:3.....	52
Central Electronic Module (CEM), 3:3.....	53
Data communication, high speed CAN, 1:2, EXC 4-CYL 2.0L.....	54
Data communication, high speed CAN, 2:2, EXC 4-CYL 2.0L.....	55
Data communication, high speed CAN, 1:2, 4-CYL 2.0L.....	56
Data communication, high speed CAN, 2:2, 4-CYL 2.0L.....	57
Data communication, intermediate speed CAN, LHD.....	58
Data communication, intermediate speed CAN, RHD.....	59
Data communication MOST.....	60
Data communication LIN, 1:3.....	61
Data communication LIN, 2:3.....	62
Data communication LIN, 3:3.....	63
Steering Wheel Module (SWM).....	64

Group 26 Cooling system

Cooling fan, 4-CYL 1.6D.....	65
Cooling fan, 4-CYL 1.6P.....	66
Cooling fan, 4-CYL 2.0D.....	67
Cooling fan, 4-CYL 2.0P.....	68
Cooling fan, 5-CYL D.....	69
Cooling fan, 5-CYL P.....	70
Cooling fan, 6-CYL.....	71

Group 27 Engine controls

Cruise control, 4-CYL 1.6D.....	72
Cruise control, 4-CYL 1.6P.....	73
Cruise control, 4-CYL 2.0D.....	74
Cruise control, 4-CYL 2.0P.....	75
Cruise control, 5-CYL D.....	76
Cruise control, 5-CYL P, 6-CYL.....	77
Start-/Stop function, 4-CYL 1.6D.....	78
Start-/Stop function, 4-CYL 1.6P.....	79
Start-/Stop function, 4-CYL 2.0D.....	80
Start-/Stop function, 4-CYL 2.0P.....	81
Start-/Stop function, 5-CYL D.....	82
Start-/Stop function, 5-CYL P.....	83

Table of Contents

Group 28 Ignition and control system

Engine management system, 1:3, 4-CYL 1.6D.....	84
Engine management system, 2:3, 4-CYL 1.6D.....	85
Engine management system, 3:3, 4-CYL 1.6D.....	86
Engine management system, 1:2, 4-CYL 1.6P.....	87
Engine management system, 2:2, 4-CYL 1.6P.....	88
Engine management system, 1:3, 4-CYL 2.0D.....	89
Engine management system, 2:3, 4-CYL 2.0D.....	90
Engine management system, 3:3, 4-CYL 2.0D.....	91
Engine management system, 1:3, 4-CYL 2.0P.....	92
Engine management system, 2:3, 4-CYL 2.0P.....	93
Engine management system, 3:3, 4-CYL 2.0P.....	94
Engine management system, 1:3, 5-CYL D.....	95
Engine management system, 2:3, 5-CYL D.....	96
Engine management system, 3:3, 5-CYL D.....	97
Engine management system, 1:2, 5-CYL P.....	98
Engine management system, 2:2, 5-CYL P.....	99
Engine management system, 1:2, 6-CYL 3.0P.....	100
Engine management system, 2:2, 6-CYL 3.0P.....	101
Engine management system, 1:2, 6-CYL 3.2P.....	102
Engine management system, 2:2, 6-CYL 3.2P.....	103
Emission control, 1:2, 4-CYL 1.6P.....	104
Emission control, 4-CYL 2.0P.....	105
Emission control, 5-CYL P.....	106
Emission control, 6-CYL 3.0P.....	107
Emission control, 6-CYL 3.2P.....	108

Group 32 Alternator and voltage regulator

Power supply, Start/Stop, 4-CYL & STOSTA.....	109
Power supply, Start/Stop, 5-CYL.....	110
Power supply, W/O Start/Stop, 4-CYL & W/O STOSTA.....	111
Power supply, W/O Start/Stop, (5-CYL, 6-CYL) & STOSTA.....	112

Group 33 Starting system

Starting system, Start/Stop, 4-CYL 1.6D 1:2.....	113
Starting system, Start/Stop, 4-CYL 1.6D 2:2.....	114
Starting system, Start/Stop, 4-CYL 1.6P STOSTA 1:2.....	115
Starting system, Start/Stop, 4-CYL 1.6P STOSTA 2:2.....	116
Starting system, Start/Stop, 1:2, 4-CYL 2.0L.....	117
Starting system, Start/Stop, 2:2, 4-CYL 2.0L.....	118
Starting system, Start/Stop, 1:2, 5-CYL P.....	119
Starting system, Start/Stop, 2:2, 5-CYL P.....	120
Starting system, Start/Stop, 1:2, 5-CYL D.....	121
Starting system, Start/Stop, 2:2, 5-CYL D.....	122
Starting system, W/O Start/Stop, 4-CYL 1.6P.....	123
Starting system, W/O Start/Stop, 5-CYL D	124
Starting system, W/O Start/Stop, 5-CYL P.....	125
Starting system, W/O Start/Stop, 6-CYL	126

Group 35 Lighting

High and low beam - Halogen.....	127
High and low beam - Dual Xenon.....	128
Beam length adjustment, manual.....	129
Running/Parking light, Tail lights, V70, XC70.....	130
Running/Parking light, Tail lights, S80.....	131
Fog lights, V70, XC70.....	132
Fog lights, S80.....	133
Brake lights, V70, XC70.....	134
Brake lights, S80.....	135
Reversing lights, V70, XC70.....	136
Reversing lights, S80.....	137
Follow-me-home lighting, LHD.....	138
Follow-me-home lighting, RHD.....	139
Interior lighting, 1:2, LHD.....	140
Interior lighting, 2:2, LHD.....	141
Interior lighting, 1:2, RHD.....	142
Interior lighting, 2:2, RHD.....	143
Active headlight.....	144
Lighting in door sill trims, Accessories.....	145
Auxiliary lights.....	146
Lighting mug holder and floor, Accessories.....	147

Group 36 Additional electrical equipment

Rain sensor.....	148
Direction indicator and hazard warning flashers, LHD V70, XC70.....	149
Direction indicator and hazard warning flashers, LHD S80.....	150
Direction indicator and hazard warning flashers, RHD V70, XC70.....	151
Direction indicator and hazard warning flashers, RHD S80.....	152
Wiper/washer windshield.....	153
High pressure headlight washer.....	154
Wiper/Washer rear window, V70, XC70.....	155
Keyless vehicle, 1:2.....	156
Keyless vehicle, 2:2.....	157
Horn.....	158
Anti-theft alarm.....	159
Parking assistance.....	160
Collision warning with power brake booster.....	161
Tire Pressure Monitoring System (TPMS).....	162
Alcohol lock.....	163

Group 37 Wiring and fuses

Diagnostics system.....	164
Outlet 12V.....	165
Outlet 12V, S80.....	166
Cable harness towbar/tow hitch 4-pin, V70, XC70.....	167
Cable harness towbar/tow hitch 4-pin, S80.....	168
Cable harness towbar/tow hitch 7-pin, V70, XC70.....	169
Cable harness towbar/tow hitch 7-pin, S80.....	170
Cable harness towbar/tow hitch 13-pin, V70, XC70.....	171
Cable harness towbar/tow hitch 13-pin, S80.....	172

Group 38 Instruments

Seat belt reminder.....	173
Driver information system.....	174

Table of Contents

Group 39 Other

TV receiver/TV control module.....	175
Cellular phone, 1:2.....	176
Cellular phone, 2:2.....	177
Audio, 1:2.....	178
Audio, 2:2.....	179
Audio High/Premium, 1:3, IAM.....	180
Audio High/Premium, 2:3, IAM.....	181
Audio High/Premium, 3:3, IAM.....	182
Audio High/Premium, 1:3, IHU.....	183
Audio High/Premium, 2:3, IHU.....	184
Audio High/Premium, 3:3, IHU.....	185
DAB Radio.....	186
Bluetooth Handsfree.....	187
Multimedia monitor with DVD, Dual Screen, Accessories, V70, XC70.....	188
Satellite radio.....	189
Parking camera.....	190
Parking camera, Wide angle, Front.....	191
Navigation system & Traffic information, portable.....	192
Vehicle Information and Communication System, VICS, JP.....	193
Sensus Connected Touch.....	194

Group 43 Transmission

Automatic transmission, AWF21.....	195
Automatic transmission, AWF22.....	196
Automatic transmission, MPS6.....	197
Manual Transmission, M66.....	198
Differential Electronic System (DEM).....	199

Group 55 Parking brake

Electric parking brake.....	200
-----------------------------	-----

Group 59 Brake system

Brake control system.....	201
---------------------------	-----

Group 64 Steering

Power steering, EHPAS.....	202
Power steering, EPAS.....	203

Group 76 Shock absorbers

Four-C.....	204
-------------	-----

Group 83 Doors and openings

Central locking front doors, LHD.....	205
Central locking front doors, RHD.....	206
Central locking rear doors.....	207
Central locking tailgate, V70, XC70.....	208
Central locking tailgate, S80.....	209
Central locking fuel filler flap.....	210
Signal receiver central locking.....	211
Power windows front doors, LHD.....	212
Power windows front doors, RHD.....	213
Power windows rear doors.....	214
Power sunroof.....	215

Group 84 Exterior decorative elements, etc.

Power door mirrors, LHD.....	216
Power door mirrors, RHD.....	217
Heated door mirrors, LHD.....	218
Heated door mirrors, RHD.....	219
Blind spot information system, LHD.....	220
Blind spot information system, RHD.....	221
Heated windscreen, LHD.....	222
Heated windscreen, RHD.....	223
Heated rear window.....	224

Group 85 Interior equipment

Power driver's seat with memory function, LHD.....	225
Power driver's seat with memory function, RHD.....	226
Power passenger seat, LHD.....	227
Power passenger seat, RHD.....	228
Heated steering wheel.....	229
Heated front seats with fans.....	230
Heated front seats without fans.....	231
Heated rear seat.....	232
Lumbar support driver, LHD.....	233
Lumbar support driver, RHD.....	234
Lumbar support passenger, LHD.....	235
Lumbar support passenger, RHD.....	236

Group 87 Climate control system

Climate control system, 1:2, 4-CYL 1.6D.....	237
Climate control system, 2:2, 4-CYL 1.6D.....	238
Climate control system, 1:2, 4-CYL 1.6P.....	239
Climate control system, 2:2, 4-CYL 1.6P.....	240
Climate control system, 1:2, 4-CYL 2.0.....	241
Climate control system, 2:2, 4-CYL 2.0.....	242
Climate control system, 1:2, 5-CYL D.....	243
Climate control system, 2:2, 5-CYL D.....	244
Climate control system, 1:2, 5-CYL P.....	245
Climate control system, 2:2, 5-CYL P.....	246
Climate control system, 1:2, 6-CYL.....	247
Climate control system, 2:2, 6-CYL.....	248
Climate control system PTC-elements.....	249
Parking heater, auxiliary heater.....	250
Parking heater, remote start.....	251

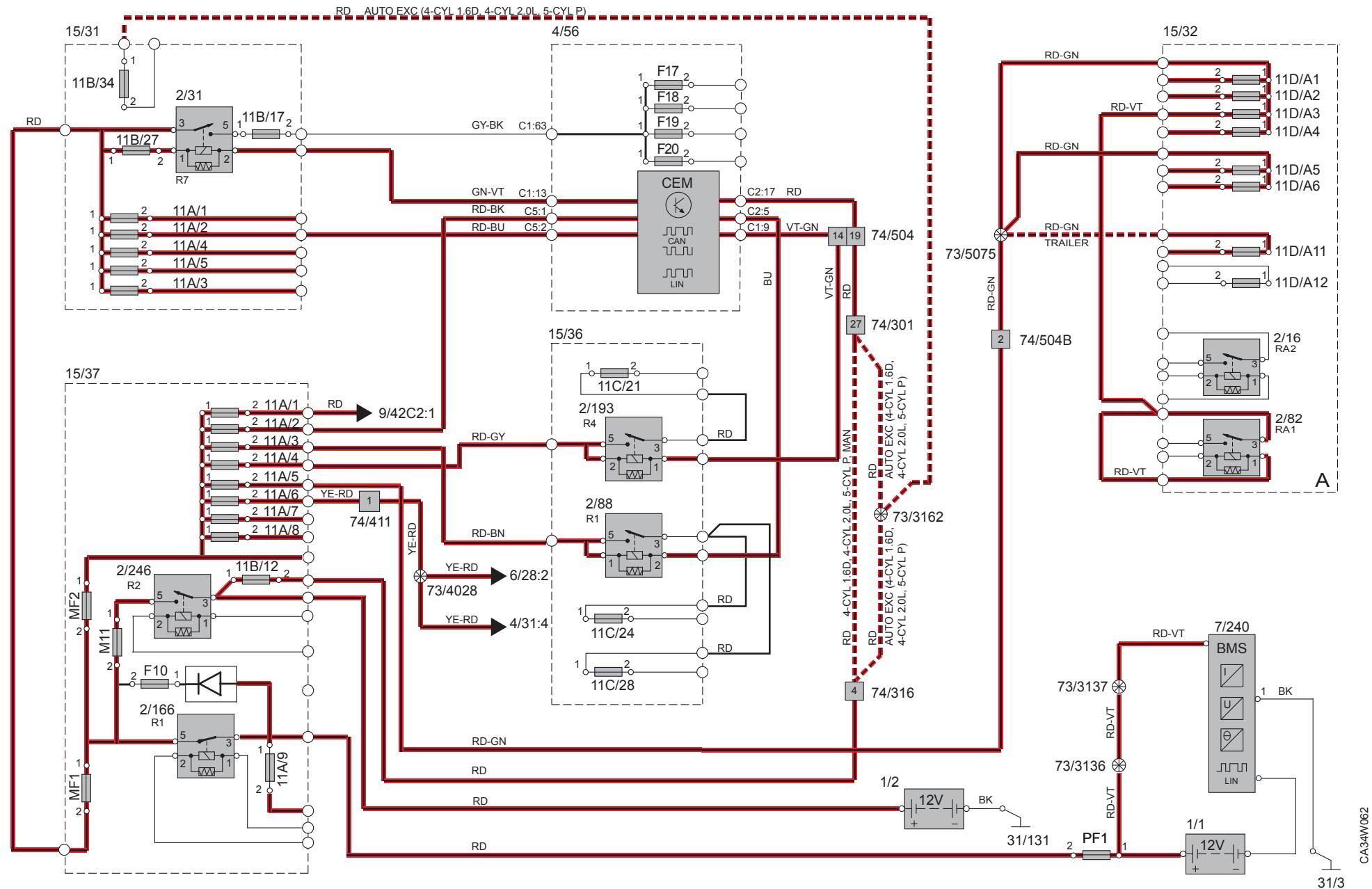
Group 88 Internal equipment

Supplemental restraint system, 1:2.....	252
Supplemental restraint system, 2:2.....	253
Power folding headrest.....	254
Remote control garage opening.....	255
Rear-view mirror with automatic dimming.....	256

Connectors..... 257

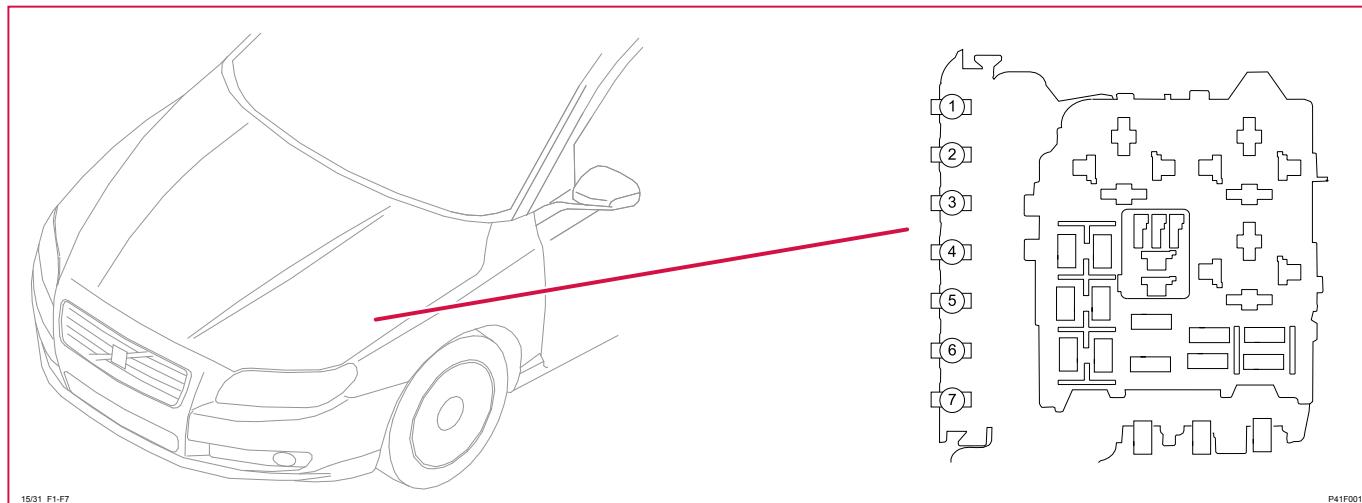
Branching points..... 307

Electrical distribution Overview with Start/Stop function



Fuses

Distribution box, engine compartment F3 - F7

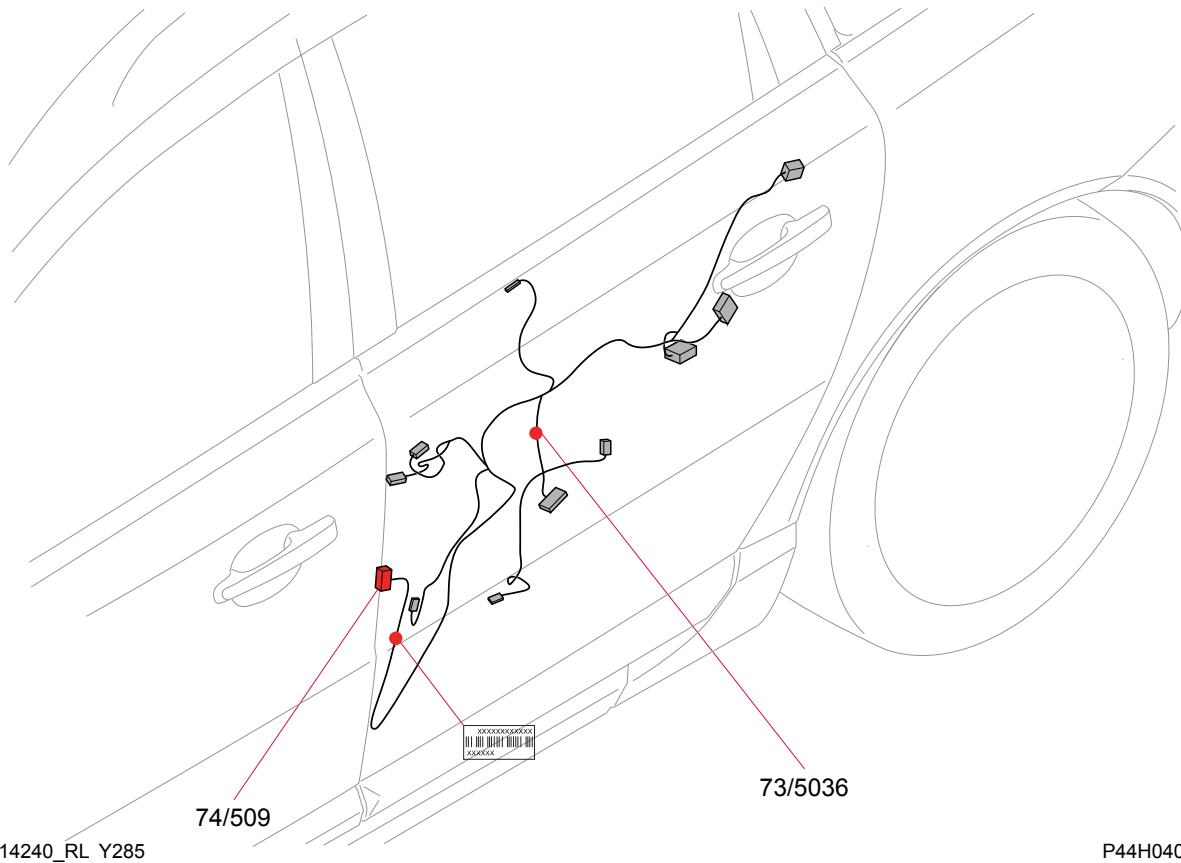


15/31 Distribution box, engine compartment

No.	No.	Fuse function	via	A
F3	11A/3	11D/A1-4 Fuses in distribution box luggage compartment, [15/32] W/O STOSTA 11D/A5-6 Fuses in distribution box luggage compartment, [15/32] V70, XC70 & W/O STOSTA & POT 11D/A11 Fuse in distribution box luggage compartment, [15/32] W/O STOSTA & TRAILER	- - -	60
F4	11A/4	2/193 Relay, comfort functions, [15/36] 11C/1-15 Main fuses in engine compartment fuse box, [15/36] 11C/21-22 Fuses in distribution box passenger compartment, [15/36]	- - 2/193	60
F5	11A/5	2/88 Relay, 15-feed rear, [15/36], W/O STOSTA 11C/23-25 Fuses in distribution box passenger compartment, [15/36], W/O STOSTA 11C/26-30 Fuses in distribution box passenger compartment, [15/36], W/O STOSTA	- 2/88 2/88	60
F6	11A/6	- -	-	-
F7	11A/7	9/42 PTC-element, W/O STOSTA	-	100

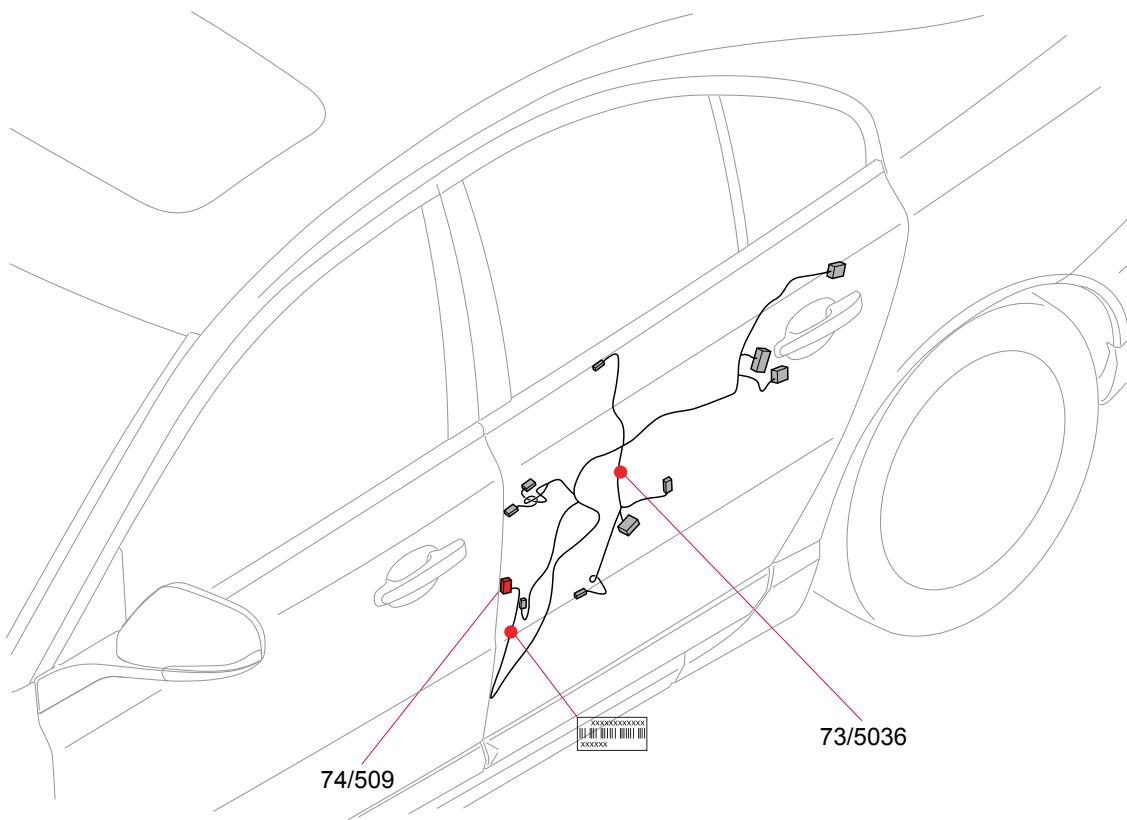
Continues

Cable harness routing in vehicle Rear door harness, left, V70, XC70



P44H040

Cable harness routing in vehicle Rear door harness, left, S80



P44H039