



# Electrical troubleshooting manual

**Series 3 – E36 (316i, 318i, 318is, 320i, 323i, 328i, M3, 318tds, 325td, 325tds incl. Convertible and Touring)**

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Rear LH door contact switch, S16 ..... 5126.2-04  
Rear lid lock relay, K117 ..... 5126.0-03  
Rear lid microswitch, S213 ..... 5430.1-02  
Rear RH door contact switch, S15 ..... 5126.2-04  
Rear right ABS sensor, B3 ..... 3450.0-02  
Rear right ABS sensor, B3 ..... 3450.1  
Rear right brake pad sensor, B17 ..... 6211.0-01  
Rear right converter, B37 ..... 6621.0-01  
Rear right door contact, S124 ..... 6100.0-04  
Rear right door DWA conductor loop, R22 ..... 6100.0-06  
Rear right flasher unit, H5 ..... 6313.0-03  
Rear right power window motor, M99 ..... 5133.0-05  
Rear right power window, S129z ..... 5133.0-04  
Rear right speaker, H45 ..... 6510.0-00  
Rear right speaker, H45 ..... 6510.1-02

Rear right window monitoring switch (DWA), S101 ..... 6100.0-06  
Rear window blower microswitch, S196 ..... 6424.0-02  
Rear window blower motor, M105 ..... 6424.0-02  
Rear window blower relay, K99 ..... 6424.0-02  
Rear window defogger I, E9 ..... 6424.0-01  
Rear window defogger/antenna ..... 6424.0  
Rear wipe/wash interval control unit, A36 ..... 6160.1  
Relay module, A5 ..... 5133.0-02  
Remote control ZV/DWA ..... 6610.2  
Remote thermometer sensor, B2009 ..... 1220.0-00  
Remote thermometer sensor, B6232 ..... 1210  
Remote thermometer sensor, B6232 ..... 6211.0  
Reversing light switch, S2113 ..... 6322.0-00  
Reversing light switch, S8511 ..... 6322.0-00  
Reversing lights ..... 6322.0  
Right brake light, H31 ..... 6325.0-01  
Right catalytic converter thermal sensor, B24 ..... 6211.0-09  
Right fog light, E27 ..... 6312.0-00  
Right front high range speaker, H50 ..... 6510.0-00  
Right front high range speaker, H50 ..... 6510.1-02  
Right front low range speaker, H51 ..... 6510.0-00  
Right front low range speaker, H51 ..... 6510.1-02  
Right front mid-range speaker, H54 ..... 6510.1-04  
Right headlight beam angle adjust actuator, M81 ..... 6312.0-04  
Right headlight, E14 ..... 6312.0-03  
Right headlight, E8 ..... 6312.0-03  
Right headlight, E8 ..... 6314.0-01  
Right heat exchanger sensor, B12 ..... 6450.7-02  
Right high beam, E12 ..... 6312.0-03  
Right horn, H3 ..... 6133.0-00  
Right licence plate light, E44 ..... 6320.0-00  
Right mid-range/high range speaker, H43 ..... 6510.1-04  
Right outside mirror, Y6 ..... 5116.0-01  
Right parking light, E19 ..... 6314.0-01  
Right parking light/licence plate light relay, K25 ..... 6314.0-02



Right rear high range speaker, H53	6510.1-04
Right rear lid light, E47	6313.0-03
Right rear lid light, E47	6314.0-01
Right rear lid light, E47	6314.0-04
Right rear lid light, E47	6322.0-00
Right rear lid light, E47	6325.0-01
Right rear lid light, E47	6325.0-02
Right rear low range speaker, H52	6510.1-04
Right reversing light, H28	6322.0-00
Right tail light, H39	6314.0-01
Right vent window motor, M104	5133.0-06
Right windscreen washer jet heater, E52	6169.0-00
Rollover sensor, N24	5430.1-03
Selector lever potentiometer, A140	2460.12-09
Shift lock selector lever lock, Y19	2460.11-00
SMG selector lever, S1134	2460.12
Solenoid clutch, Y2	6450.7-04
Solenoid valve, injection timing device, B2011	1360
Speed sensor EGS, Y8516	2460.12-04
Speedometer reed contact, B10	6211.0-07
Starter	1240.0
Starter, M2025	1240.0-01
Starter, M6510	1240.0-01
Switch for electrically operated convertible soft top, S143	5430.1-01
Symbols	0140.0
Tail light, left, H25	6314.0-01
Tail light, right, H30	6314.0-01
Temperature regulator, A32y	6410.5-00
Temperature sensor, transmission oil, B5238	2460.12-04
Thermal switch (LA Japan), K20	6211.0-09
Thermal switch, heated jets, S198	6169.0-00
Throttle heating, E104	3450.1-02
Throttle potentiometer, R6252	1210
Tilt/slide sunroof control unit, A56	5410.1
Tilt/slide sunroof switch (SHD), S38	5410.1-00

Top Hifi switch, S303y	6510.1-01
Trailer coupling	6328.1
Transmission shift unit, Y2121	2460.3-01
Transmission switch, Y8551	2460.11-01
Transmit/receive module (EWS II), A835	6135.0-00
Turn indicator/low beam selector, S7	6312.0-00
Turn signal/hazard warning system	6313.0
Unloader relay terminal 15, K9	5203.0-00
Unloader relay, terminal 15, K6326	1210
Valve for secondary air pump, Y6164	1210.21-04
VANOS sensor 1 (inlet), B6277	1210.21-06
VANOS sensor 2 (exhaust), B6278	1210.21-06
VANOS valve 1 and 2 (exhaust), Y5220	1210.21-06
VANOS valve 1 and 2 (inlet), Y5210	1210.21-06
VANOS valve 1, Y6275	1210.17-05
Ventilation flap regulating motor, M44	6450.7-03
Volute spring, C101	3234.0-00
Wash water level switch, S64	6581.2-03
Washer pump, M4	6160.1-01
Water valves, Y4	6410.5-00
Window lifter door rear LH (centre console), S128y	5133.0-03
Window lifter door rear LH (door), S41y	5133.0-03
Window lifter door rear RH (centre console), S129y	5133.0-03
Window lifter door rear RH (door), S42y	5133.0-02
Windscreen cowl panel lock microswitch, S231	5430.1-00
Windscreen washer jet heaters	6169.0
Windscreen wiper switch, S5	6160.1-01
Wipe-wash module (Low II), A64	6160.1-03
Wipe/wash module (WWM)	6160.1
Wipe/wash module, A51	6160.1
Wiper motor, M3	6160.1-00
ZKE control unit, A104	6100.0
ZV drive tank flap, M16	5126

## Schematics

The schematics divide the entire vehicle electrical system into individual circuits. Interacting electrical components are shown on one common schematic.

Switches and other components are represented in such a way that their general layout and function are self-explicit. They are arranged on the sheet such that the current path can be followed from positive (top) to negative (bottom).

**Important:** The components and wires are not drawn to scale. For instance, a lead with a length of over 1m can be shown as a lead which is only a few cm long. To ensure clear arrangement, all connectors, line branches and connected components from the fuses to the component and from the component to ground connection are not shown within the individual cells. If required, reference can be made to the cells **0670.3 Fuse Details** and **0670.4 Ground Distribution** where all lines are illustrated with all plug connections, line branches and connected components.

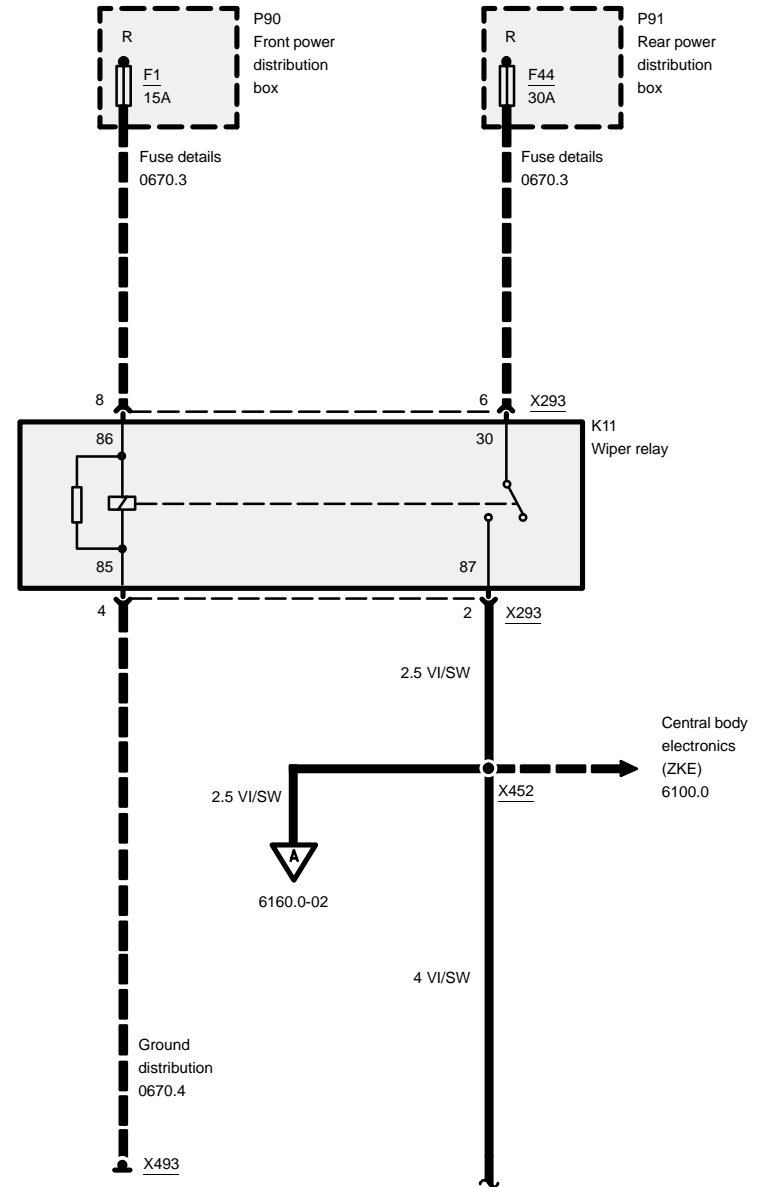
All circuit symbols used are listed and explained in the cell **0140.0 Symbols**.

In cell **7000.0 Component Location Chart** all important connectors, ground points and components are listed in tabular form. It provides a precise description of the component locations in the vehicle.

In cell **7100.0 Component Location Views** the locations of the connectors and components which are difficult to locate are shown in line arts or illustrations. In cell **8000.0 Solder Connector Location Views** all splices are listed in numerical order and illustrations are provided to assist in locating splices on larger harnesses. In cell **8500.0 Connector Views** diagrams of connectors with more than 2 pins are illustrated.

### Example

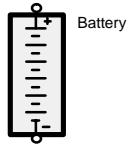
General conventions can be explained based on the following schematic example.



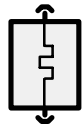


### General conventions

1. Switches and relays are always shown in rest position (e.g. K11).
2. A component shown in a dashed frame signifies that the component is illustrated only in part (e.g. P90 and P94).
3. A component shown in a completely drawn frame signifies that the component is illustrated in full (e.g.K11).
4. The dashed line between pin 8 and pin 6 at the connector X293 indicates that both pins belong to the connector X293.
5. The dashed line from fuse 1 to pin 8 of the connector X293 shows the positive supply of the relay K11. If required, refer to cell **0670.3 Fuse details** at fuse F1 for the complete line progression with all plug connections, line branches, wire colours and cross sections.
6. The dashed line with arrow at the connector X452 indicates that several wires lead to the connector X452. All lines leading to the connection are illustrated in cell **6100.0 Central body electronics (ZKE)**. An uninterrupted line with arrow indicates that only this one line leads to another circuit.
7. The dashed line from pin 4 of connector X293 to ground X493 shows the ground supply of the relay K11. If required, refer to cell **0670.4 Ground distribution** at ground X493 for the complete line progression with all plug connections, line branches, wire colours and cross sections.
8. The uninterrupted line from connector X452 with an **A** in the open arrow is continued on Page 6160.0–02.  
Termination of the wire 4 VI/SW from connector X452 with a wavy line indicates that the wire is continued on the opposite page.



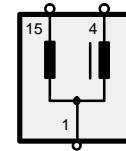
Battery



Heating element



Potentiometer Wiper moved by external force



Ignition coil



Fuses



motor with blower or fan



Potentiometer Change by pressure or temperature



Control/performance electronics



Fuse link



Loudspeaker without horn



Diode Current flows in direction of arrow only



Radio



Bulb



Z-diode for voltage control



Hall-effect sensor



Variable resistor



Transistor switch



Automatic cut-out



Overtemperature protection



LED



Knock sensor



Solenoid coil



Permanent magnet motor one speed



Solenoid valve



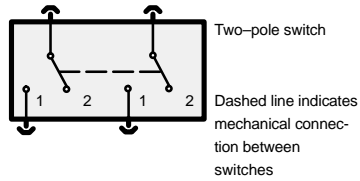
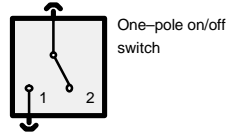
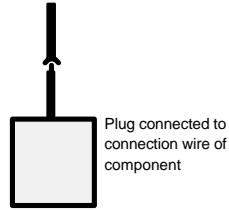
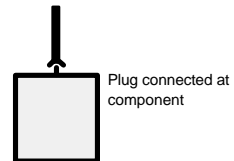
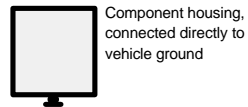
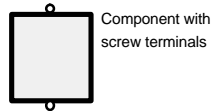
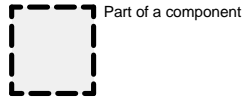
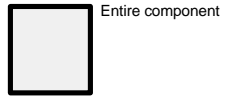
Permanent magnet motor two speeds



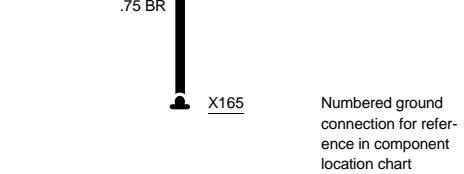
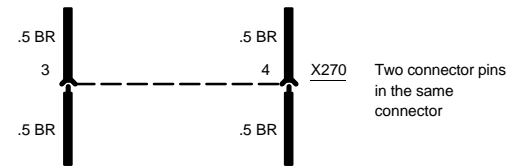
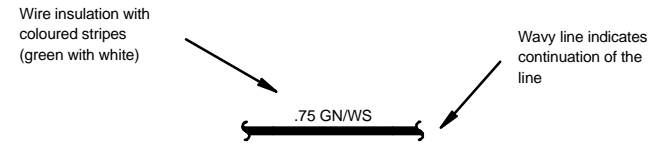
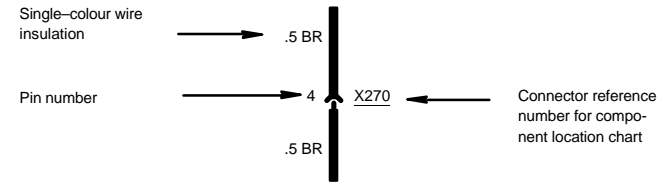
Oxygen sensor

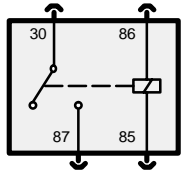


Heating element

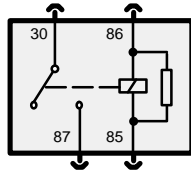


Wire colour	
BL	blue
BR	brown
GE	yellow
GN	green
GR	grey
OR	orange
RS	pink
RT	red
SW	black
VI	violet
WS	white
TR	transparent

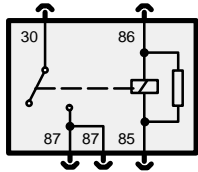




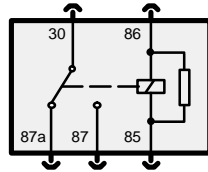
Contact relay



Contact relay with protective resistor

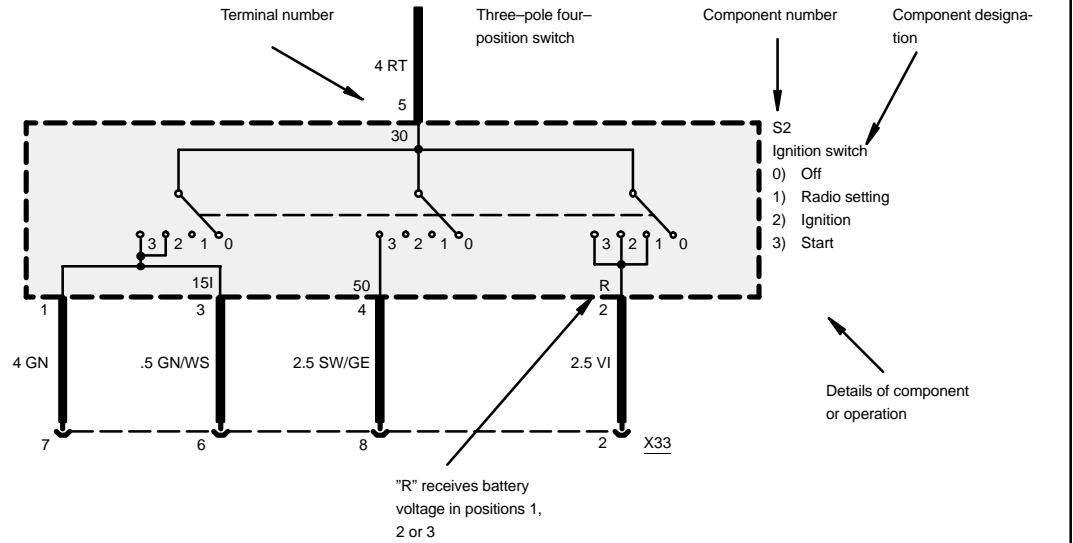


Contact relay with 2 outputs

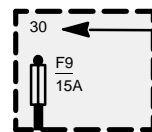


Centre-zero relay with 2 outputs

Terminal number	Designation
30	Relay input
85	Relay output (coil)
86	Relay input (coil)
87	Relay output (switched)
87a	Relay output (non-switched)



Terminal number	Designation	Terminal number	Designation
50	Battery voltage: Ignition switch in position 3	15I	Battery voltage: Ignition switch in position 2
30	Battery voltage: Supplied constantly	R	Battery voltage: Ignition switch in position 1, 2 or 3
15	Battery voltage: Ignition switch in position 2 or 3	31	Ground

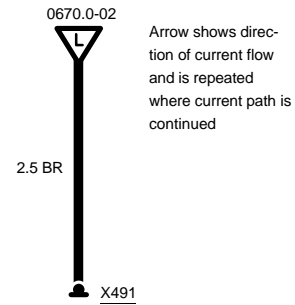
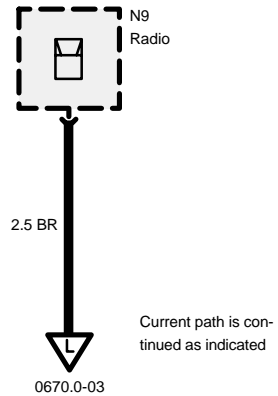
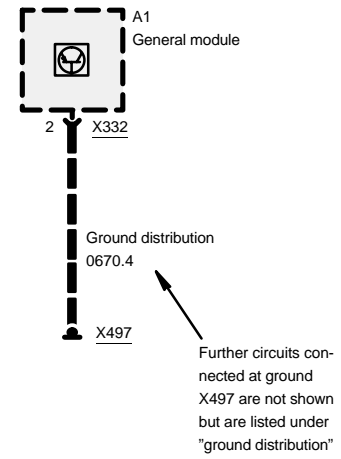
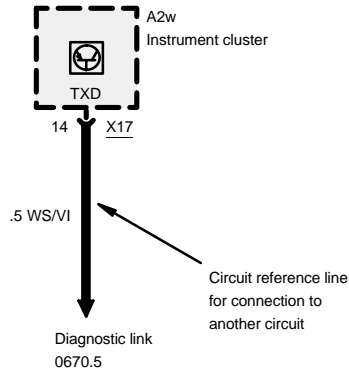
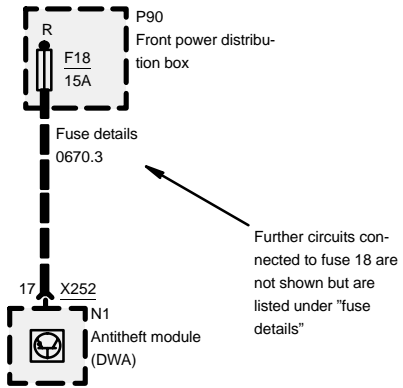


Fuse constantly connected in current path

Terminal number	Designation
30	Battery voltage: Supplied constantly
15	Battery voltage: Ignition switch in position 2 or 3
R	Battery voltage: Ignition switch in position 1, 2 or 3



# Symbols

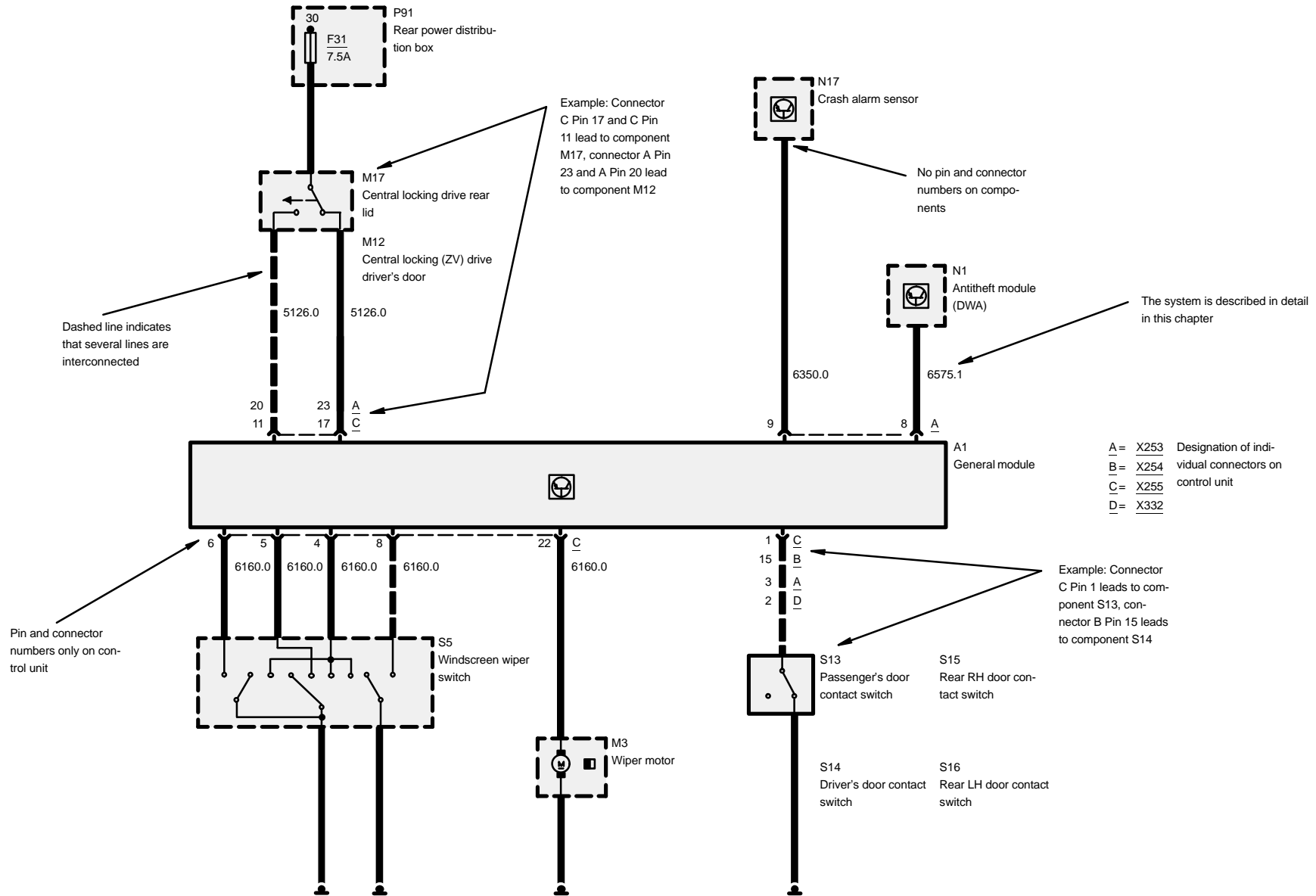






# Symbols

## Block diagram

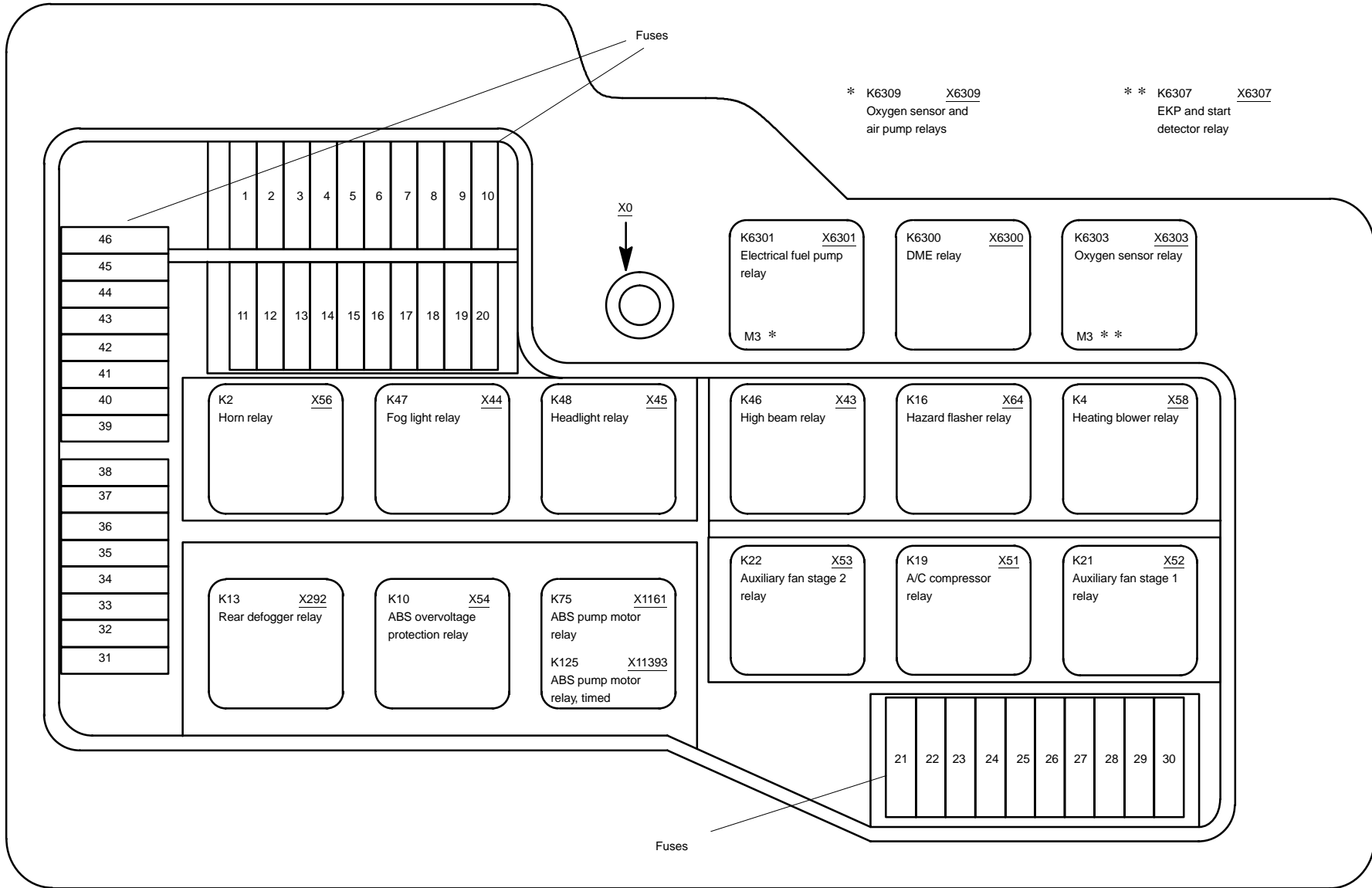




# 0670.0 Power distribution chart

Petrol-driven vehicle

## Front power distribution box

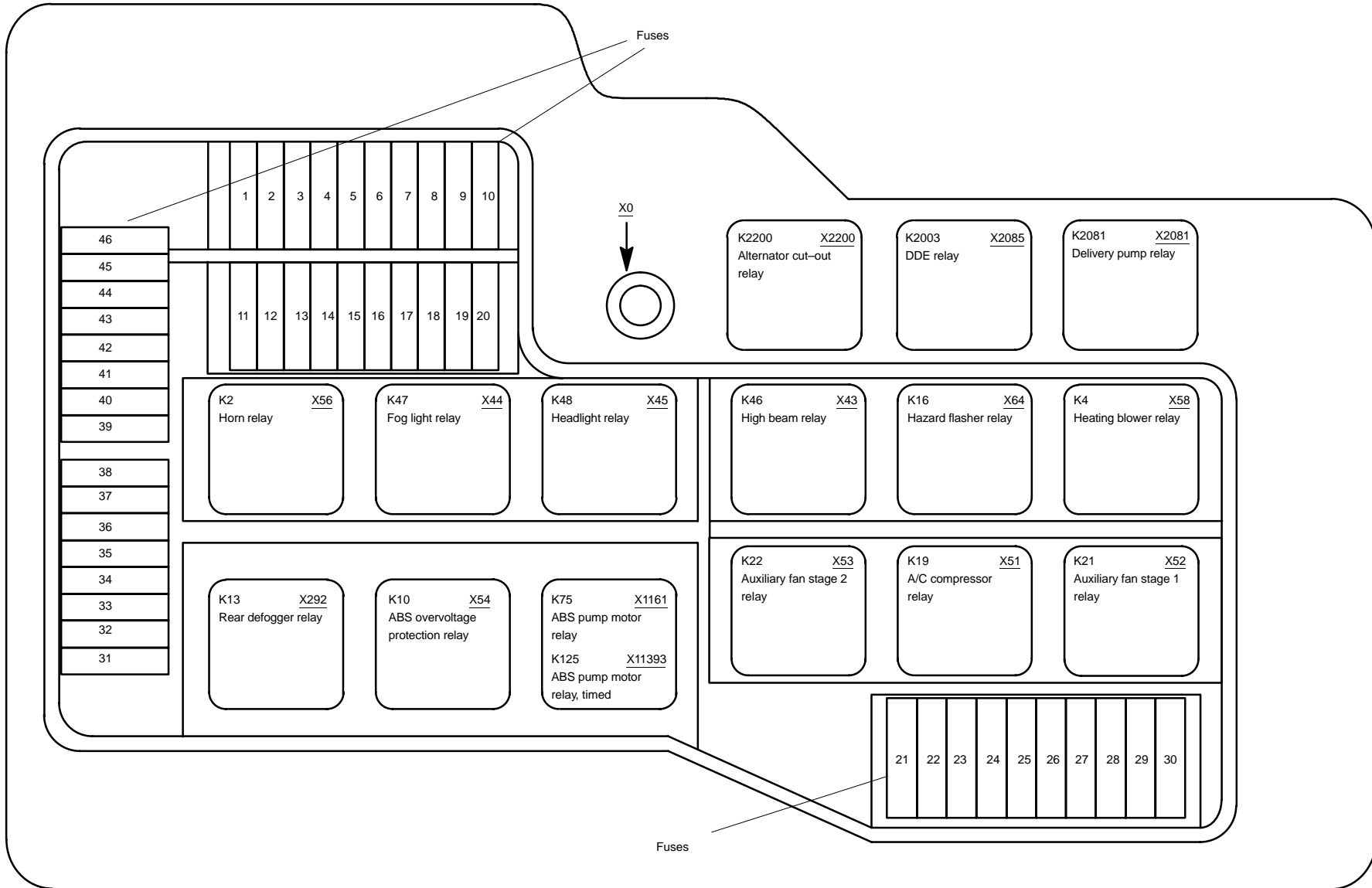




# Power distribution chart

Diesel

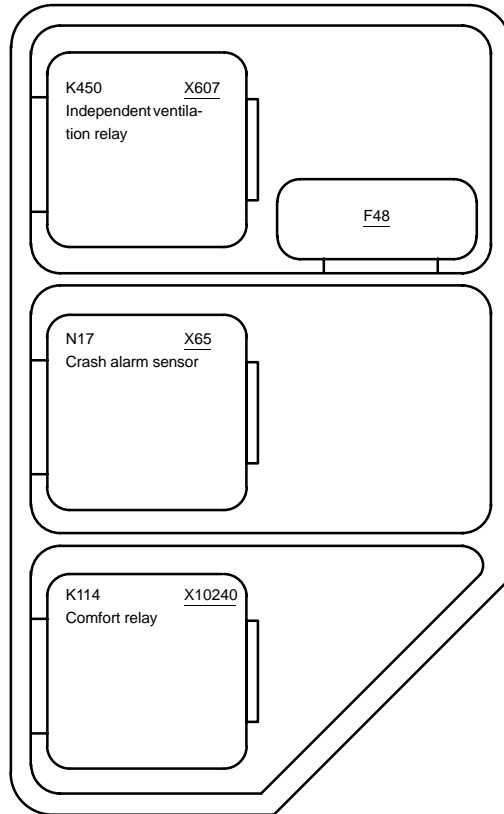
## Front power distribution box





# Power distribution chart

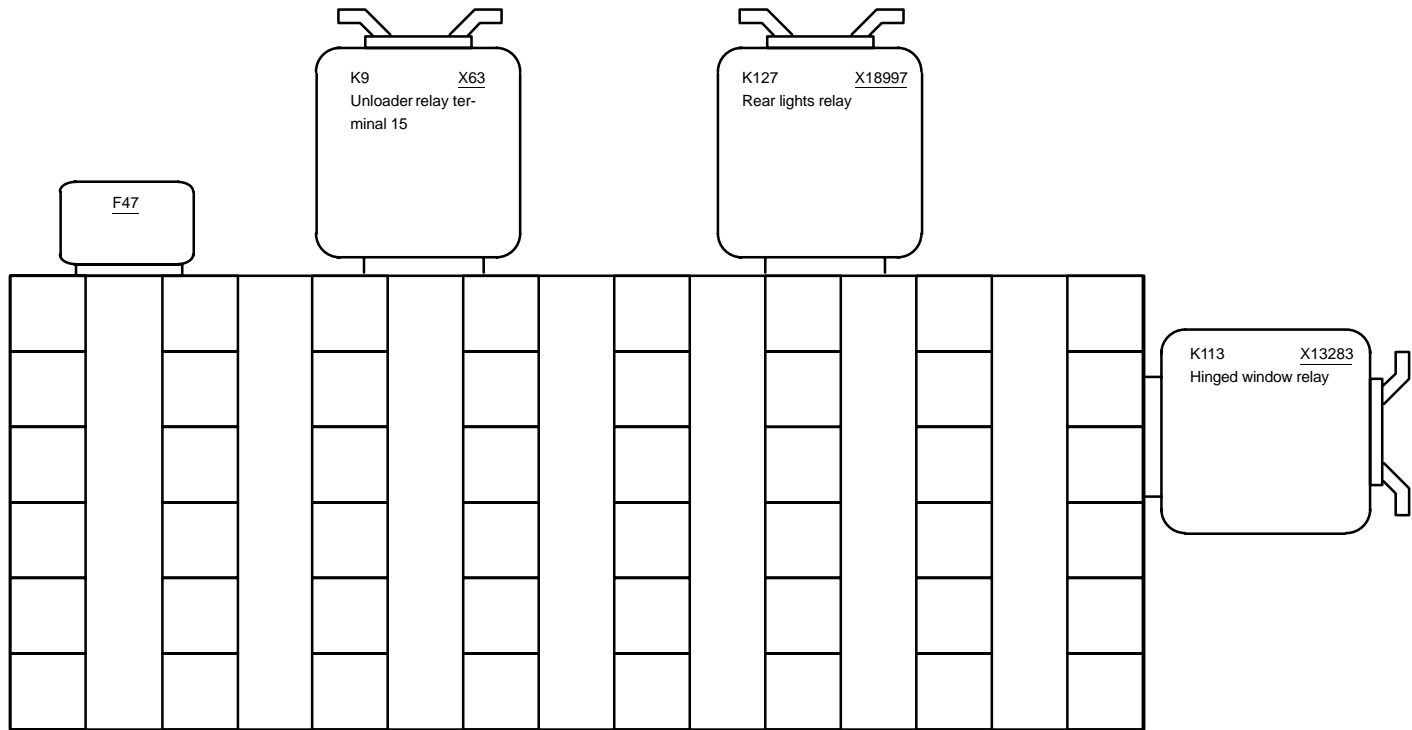
## Relay carrier under LH side of dash





# Power distribution chart

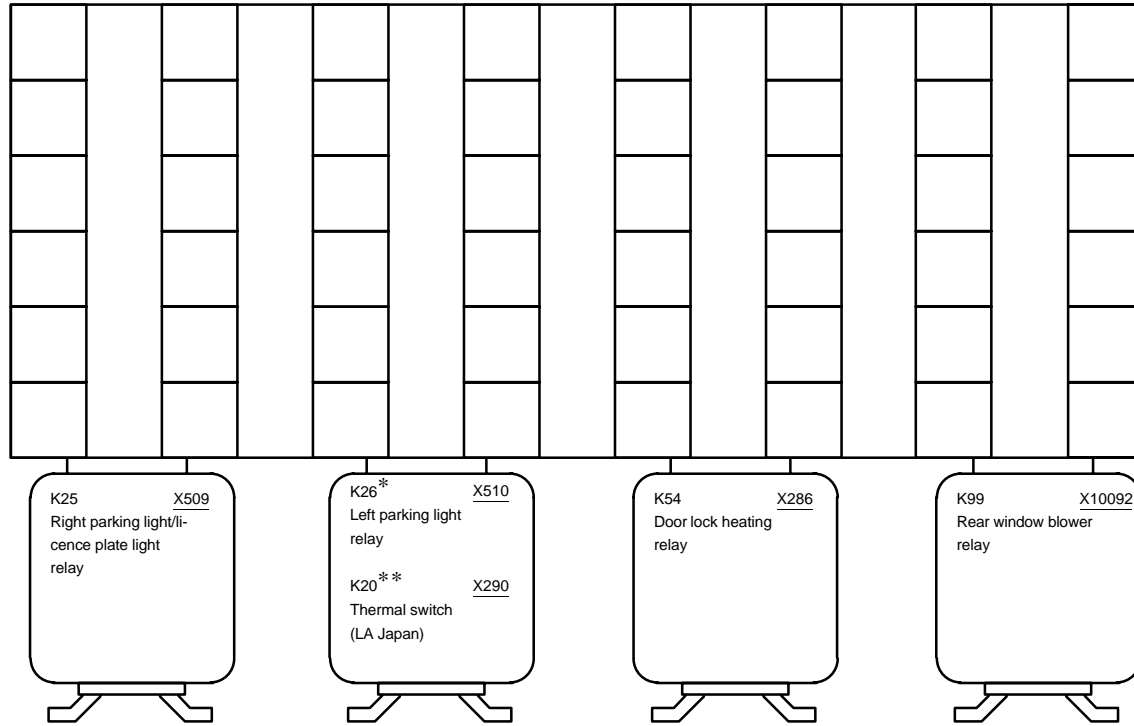
Connector strip under LH side of dash





# Power distribution chart

Connector strip under RH side of dash



\* (N) (S)  
\*\* (J)



# 0670.1 Fuse chart

## Fuses 1 to 29

	Fuse number																												
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29
	30A	15A	30A	15A	30A	30A	5A	15A	20A	30A	7.5A	7.5A	5A	30A	15A	5A	10A	15A	30A	30A	5A	5A	5A	10A	5A	10A	5A	5A	7.5A
<b>1210.17</b> Engine management MS41.0 (6-cylinder M52)																●		●											
<b>1210.19</b> Digital motor electronics (DME M1.7.3, 4-cylinder M43)																●		●											●
<b>1210.20</b> Digital motor electronics (DME M5.2, 4-cylinder M44)																●		●											
<b>1210.21</b> Digital motor electronics (DME MSS50, 6-cylinder S50 B32)																●		●								●			
<b>1220.0</b> Preheating system																											●		
<b>1230.0</b> Alternator																										●			
<b>1240.0</b> Starter																													●
<b>1360.2</b> Digital diesel electronics (DDE 2.1, 6-cylinder M51)																●		●								●	●	●	
<b>1360.3</b> Digital diesel electronics (DDE 2.1, 4-cylinder M41)																●		●								●	●		
<b>2460.2</b> Electronic transmission control (EGS A4S 310R)																										●		●	
<b>2460.3</b> Electronic transmission control (EGS A4S 270R Diesel)																										●		●	
<b>2460.4</b> Electronic transmission control (EGS A5S 310Z)																										●		●	
<b>2460.5</b> Electronic transmission control (EGS A5S 310Z Diesel)																										●		●	
<b>2460.11</b> Electronic transmission control (EGS A5S 300J M52)																										●		●	
<b>2460.12</b> Sequential M-transmission (SMG)							●																			●		●	
<b>3234.0</b> Airbag (AB)																												●	
<b>3450.0</b> Antilock brake system (ABS)											●										●		●				●		
<b>3450.1</b> Automatic stability control (ASC)											●										●							●	
<b>5116.0</b> Power mirrors																									●		●		
<b>5120.0</b> Door lock heating (ZKE/TSH)							●																						



# Fuse chart

## Fuses 1 to 29

	Fuse number																												
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29
	30A	15A	30A	15A	30A	30A	5A	15A	20A	30A	7.5A	7.5A	5A	30A	15A	5A	10A	15A	30A	30A	5A	5A	5A	10A	5A	10A	5A	5A	7.5A
5120.1 Door lock heating (ZVM/TSH)							●																						
5126.0 Central locking system (ZKE/ZV)							●																						
5126.2 Central locking module II (ZVM II)							●																						
5133.0 Power windows (ZKE/FH)												●	●						●										
5200.2 Electric seat adjustment and lumbar support					●																								
5203.0 Heated seats				●																			●						
5410.1 Power tilt/slide sunroof (SHD)	●																												
5430.1 Electrical convertible soft top							●																				●		
6100.0 Central body electronics (ZKE IV)							●							●															
6133.0 Horn								●																					
6135.0 Electronic immobiliser (EWS II)																												●	
6160.1 Wipe/wash module (WWM)			●																										
6167.1 Headlight washer system (SRA)			●																										
6169.0 Windscreen washer jet heaters																									●				
6211.0 Instrument cluster																							●				●		
6213.1 Analogue clock																													
6213.2 Multi-function clock																							●			●	●		
6214.0 On-board display																							●				●		
6300.0 Light switch																						●				●			
6312.0 Headlight/fog light											●	●			●		●					●	●		●				●





# Fuse chart

## Fuses 1 to 29

	Fuse number																													
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	
	30A	15A	30A	15A	30A	30A	5A	15A	20A	30A	7.5A	7.5A	5A	30A	15A	5A	10A	15A	30A	30A	5A	5A	5A	10A	5A	10A	5A	5A	7.5A	
<b>6313.0</b> Turn signal/hazard warning system																								●						
<b>6314.0</b> Park/tail/underhood lights																										●				
<b>6320.0</b> Licence plate/luggage compartment lights																														
<b>6322.0</b> Reversing lights																											●			
<b>6325.0</b> Brake lights																														
<b>6328.1</b> Trailer coupling		●																												
<b>6330.3</b> Interior lights																														
<b>6332.0</b> Interior																														
<b>6350.0</b> Crash and alarm sensor											●	●														●				
<b>6410.5</b> Automatic heating control (HR)																						●		●						
<b>6412.10</b> Independent ventilation with HR																						●								
<b>6412.20</b> Independent ventilation with IHKA E36																						●								
<b>6424.0</b> Rear window defogger/antenna						●																		●						
<b>6450.7</b> Automatic climate control (IHKA E36)																●						●		●						
<b>6510.0</b> Radio/Stereo																														
<b>6510.1</b> Radio/HiFi/Top Hifi										●																				
<b>6561.0</b> Cellular telephone																														
<b>6571.0</b> Cruise control																														●
<b>6581.2</b> On-board computer (BC V)												●	●											●			●	●		



# Fuse chart

## Fuses 1 to 29

		Fuse number																												
		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29
		30A	15A	30A	15A	30A	30A	5A	15A	20A	30A	7.5A	7.5A	5A	30A	15A	5A	10A	15A	30A	30A	5A	5A	5A	10A	5A	10A	5A	5A	7.5A
6610.2	Remote control ZV/DWA							●																						
6621.0	Park distance control (PDC)																								●		●			



# Fuse chart

## Fuses 30 to 49

	Fuse number																			
	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49
	7.5A	5A	30A	10A	15A	25A	30A	10A	30A	7.5A	30A	30A	7.5A	5A	15A	7.5A	15A	15A	40A	20A
<b>1210.17</b> Engine management MS41.0 (6-cylinder M52)										●										
<b>1210.19</b> Digital motor electronics (DME M1.7.3, 4-cylinder M43)																				
<b>1210.20</b> Digital motor electronics (DME M5.2, 4-cylinder M44)																				
<b>1210.21</b> Digital motor electronics (DME MSS50, 6-cylinder S50 B32)										●										
<b>1220.0</b> Preheating system																				
<b>1230.0</b> Alternator																				
<b>1240.0</b> Starter		●																		
<b>1360.2</b> Digital diesel electronics (DDE 2.1, 6-cylinder M51)		●															●			
<b>1360.3</b> Digital diesel electronics (DDE 2.1, 4-cylinder M41)																	●			
<b>2460.2</b> Electronic transmission control (EGS A4S 310R)																	●			
<b>2460.3</b> Electronic transmission control (EGS A4S 270R Diesel)																	●			
<b>2460.4</b> Electronic transmission control (EGS A5S 310Z)																	●			
<b>2460.5</b> Electronic transmission control (EGS A5S 310Z Diesel)																	●			
<b>2460.11</b> Electronic transmission control (EGS A5S 300J M52)																	●			
<b>2460.12</b> Sequential M-transmission (SMG)																				
<b>3234.0</b> Airbag (AB)													●							
<b>3450.0</b> Antilock brake system (ABS)									●								●			
<b>3450.1</b> Automatic stability control (ASC)									●								●			
<b>5116.0</b> Power mirrors														●						
<b>5120.0</b> Door lock heating (ZKE/TSH)					●															



# Fuse chart

## Fuses 30 to 49

	Fuse number																			
	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49
	7.5A	5A	30A	10A	15A	25A	30A	10A	30A	7.5A	30A	30A	7.5A	5A	15A	7.5A	15A	15A	40A	20A
5120.1 Door lock heating (ZVM/TSH)				●																
5126.0 Central locking system (ZKE/ZV)						●														
5126.2 Central locking module II (ZVM II)						●								●						
5133.0 Power windows (ZKE/FH)																				
5200.2 Electric seat adjustment and lumbar support											●									
5203.0 Heated seats																				
5410.1 Power tilt/slide sunroof (SHD)																				
5430.1 Electrical convertible soft top													●	●					●	
6100.0 Central body electronics (ZKE IV)		●		●		●								●	●			●		
6133.0 Horn		●																		
6135.0 Electronic immobiliser (EWS II)		●														●				
6160.1 Wipe/wash module (WWM)							●	●							●					
6167.1 Headlight washer system (SRA)							●								●					
6169.0 Windscreen washer jet heaters																				
6211.0 Instrument cluster		●															●			
6213.1 Analogue clock		●																		
6213.2 Multi-function clock		●														●	●			
6214.0 On-board display		●														●	●			
6300.0 Light switch				●				●												
6312.0 Headlight/fog light	●							●												



# Fuse chart

## Fuses 30 to 49

	Fuse number																			
	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49
	7.5A	5A	30A	10A	15A	25A	30A	10A	30A	7.5A	30A	30A	7.5A	5A	15A	7.5A	15A	15A	40A	20A
6313.0 Turn signal/hazard warning system					●															
6314.0 Park/tail/underhood lights				●			●													
6320.0 Licence plate/luggage compartment lights				●			●													
6322.0 Reversing lights																				
6325.0 Brake lights																	●			
6328.1 Trailer coupling																				
6330.3 Interior lights				●										●						
6332.0 Interior		●	●				●						●	●						
6350.0 Crash and alarm sensor					●															
6410.5 Automatic heating control (HR)																				
6412.10 Independent ventilation with HR																				
6412.20 Independent ventilation with IHKA E36																				
6424.0 Rear window defogger/antenna																				
6450.7 Automatic climate control (IHKA E36)		●								●	●								●	
6510.0 Radio/Stereo															●					
6510.1 Radio/HiFi/Top Hifi				●										●	●					
6561.0 Cellular telephone				●										●						
6571.0 Cruise control																	●			
6581.2 On-board computer (BC V)	●		●				●									●	●			



# Fuse chart

## Fuses 30 to 49

6610.2 Remote control ZV/DWA

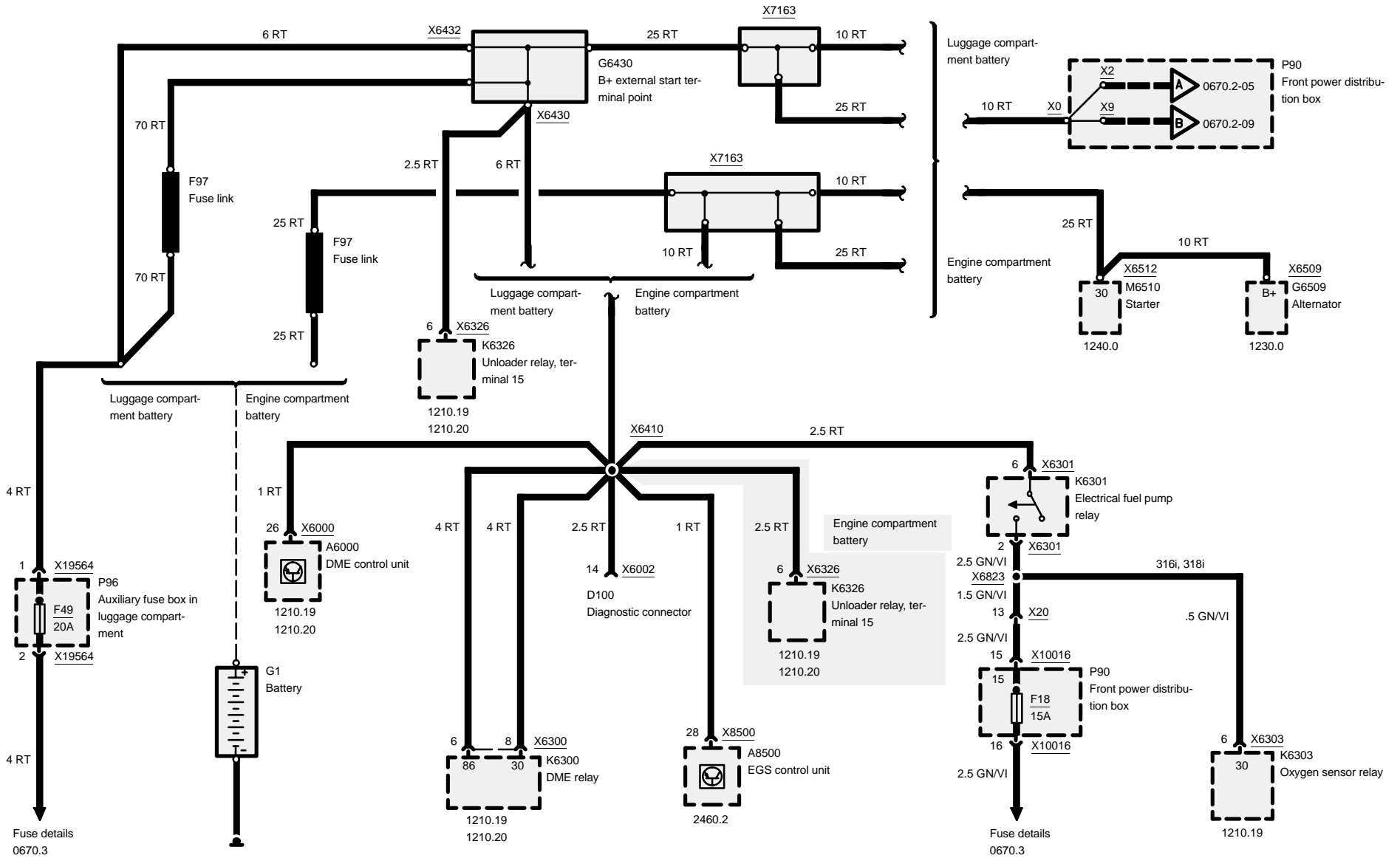
6621.0 Park distance control (PDC)

		Fuse number																			
		30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49
		7.5A	5A	30A	10A	15A	25A	30A	10A	30A	7.5A	30A	30A	7.5A	5A	15A	7.5A	15A	15A	40A	20A
6610.2 Remote control ZV/DWA															●						
6621.0 Park distance control (PDC)			●																		



# 0670.2 Power distribution

## 316i, 318i, 318is



Fuse details  
0670.3

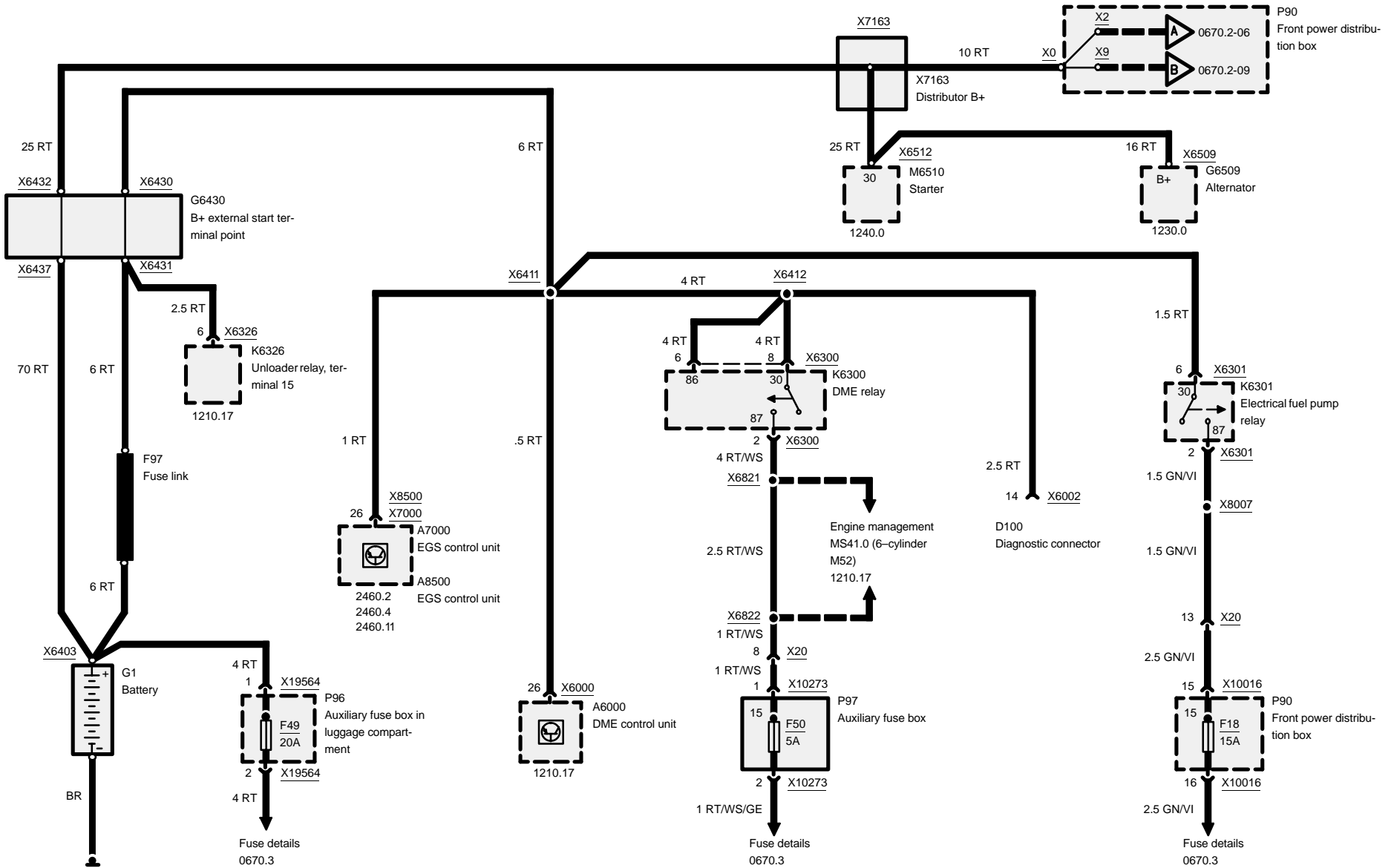
Fuse details  
0670.3

Fuse details  
0670.3



# Power distribution

## 320i, 323i, 328i

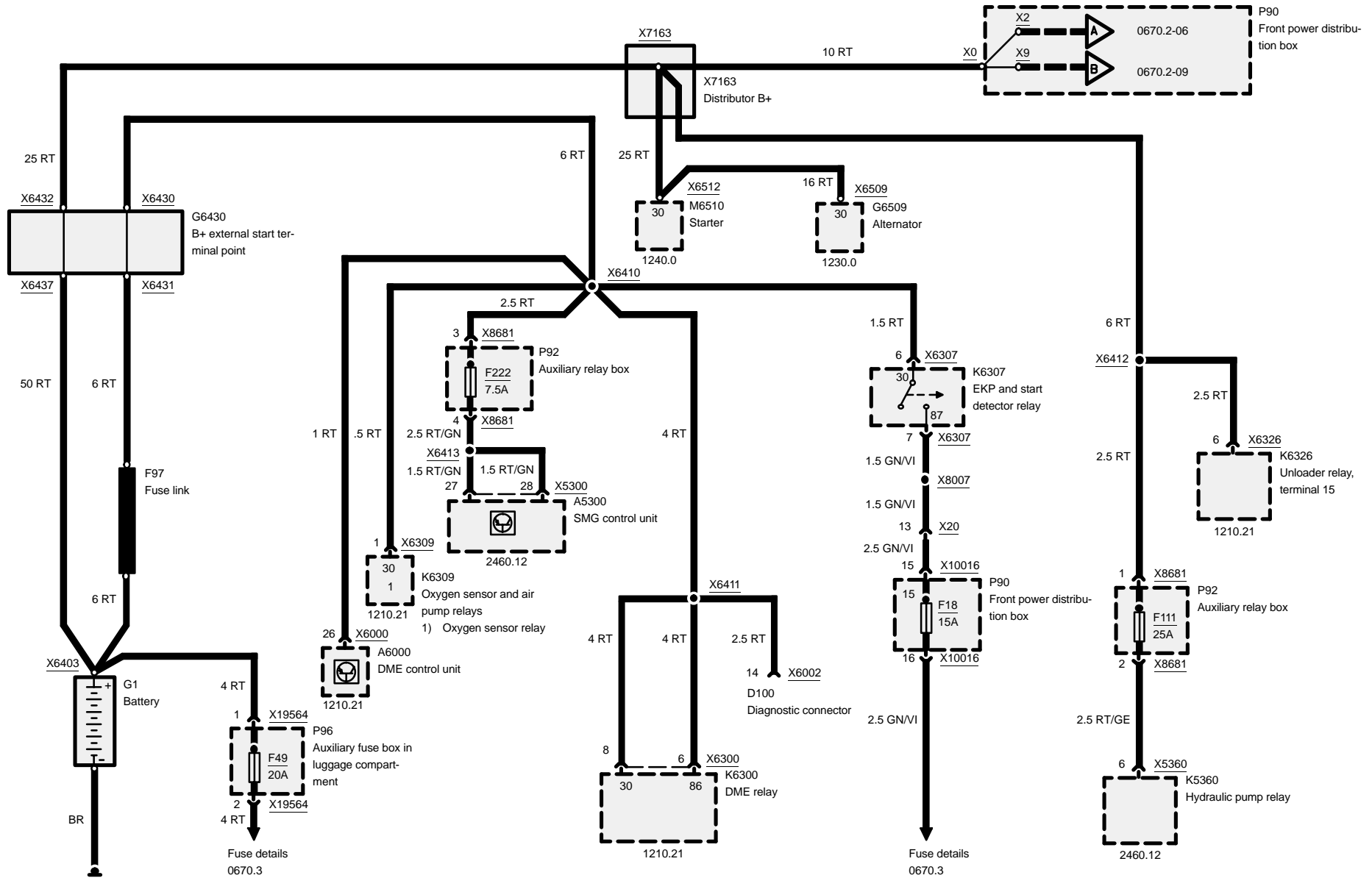






# Power distribution

## M3



05/99

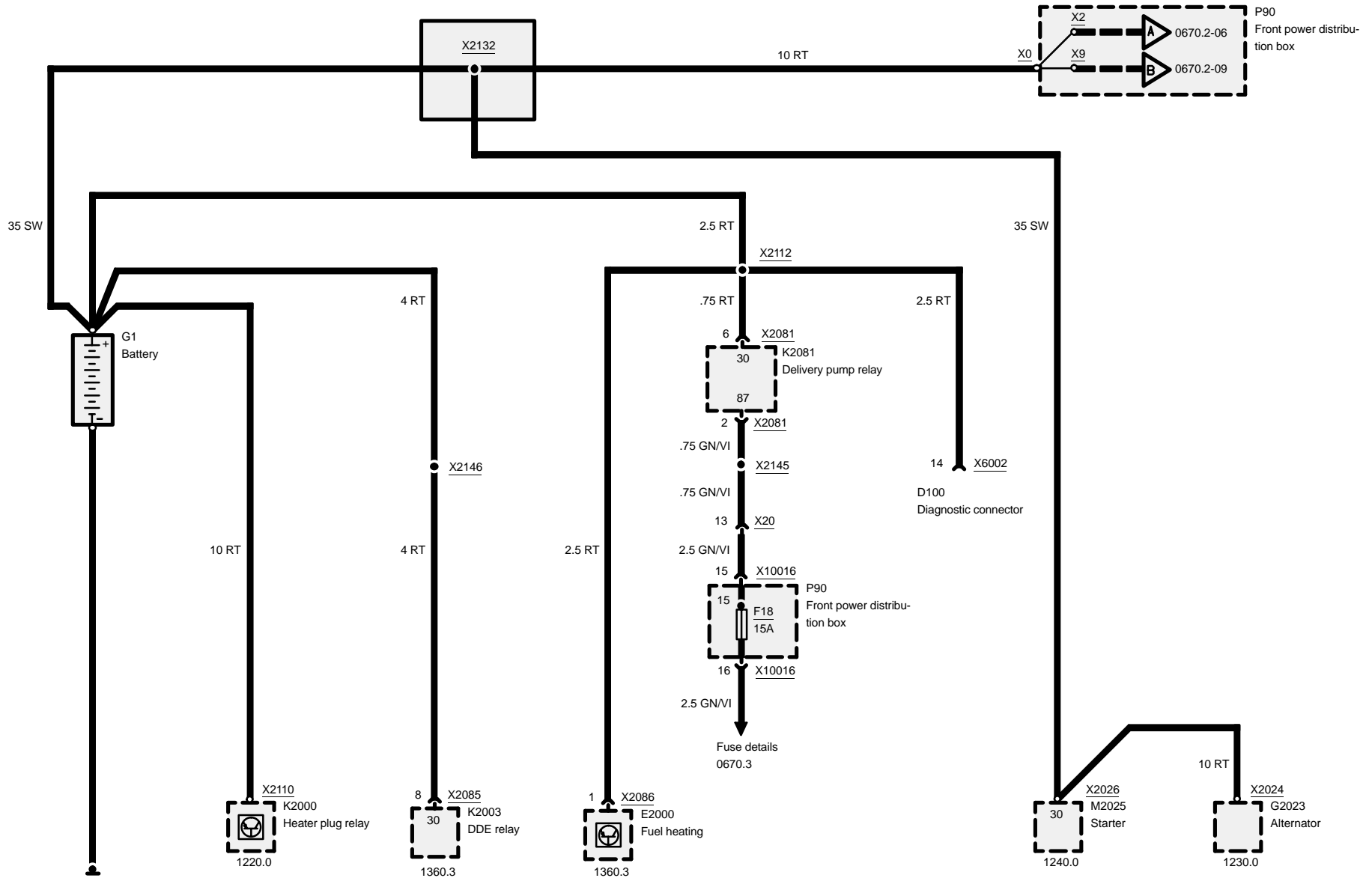
0670.2-02

1998



# Power distribution

318tds



05/99

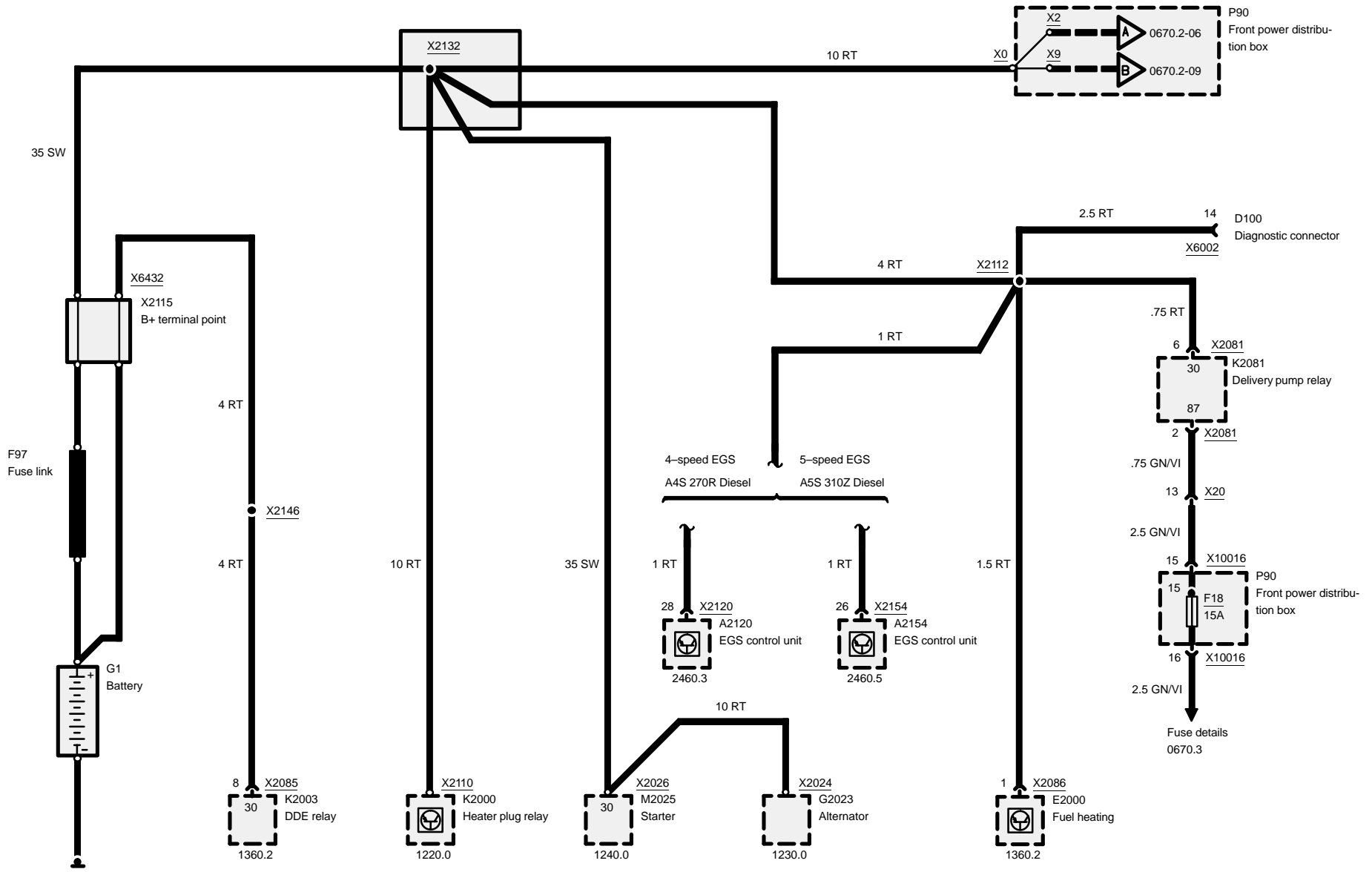
0670.2-03

1998



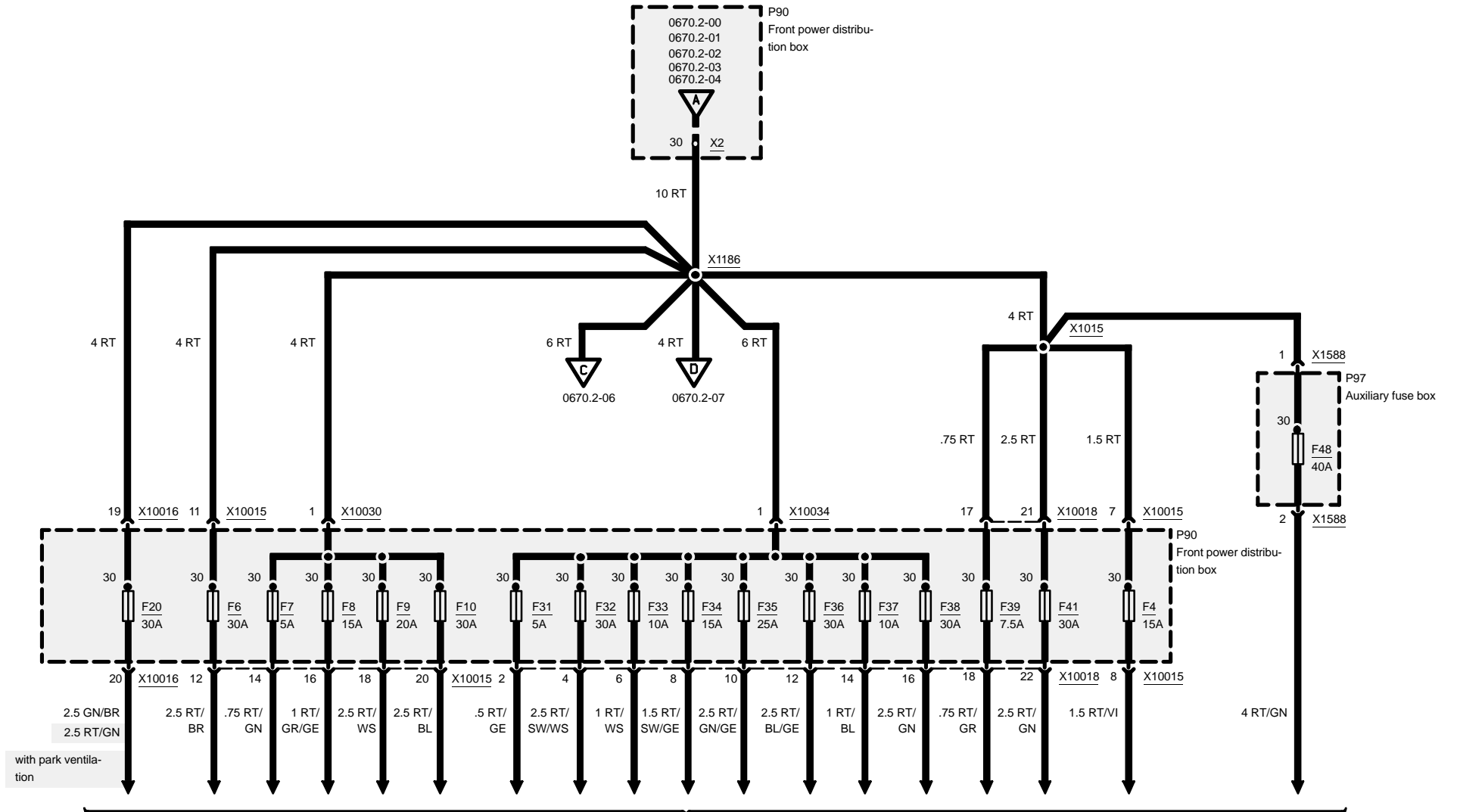
# Power distribution

## 325td, 325tds





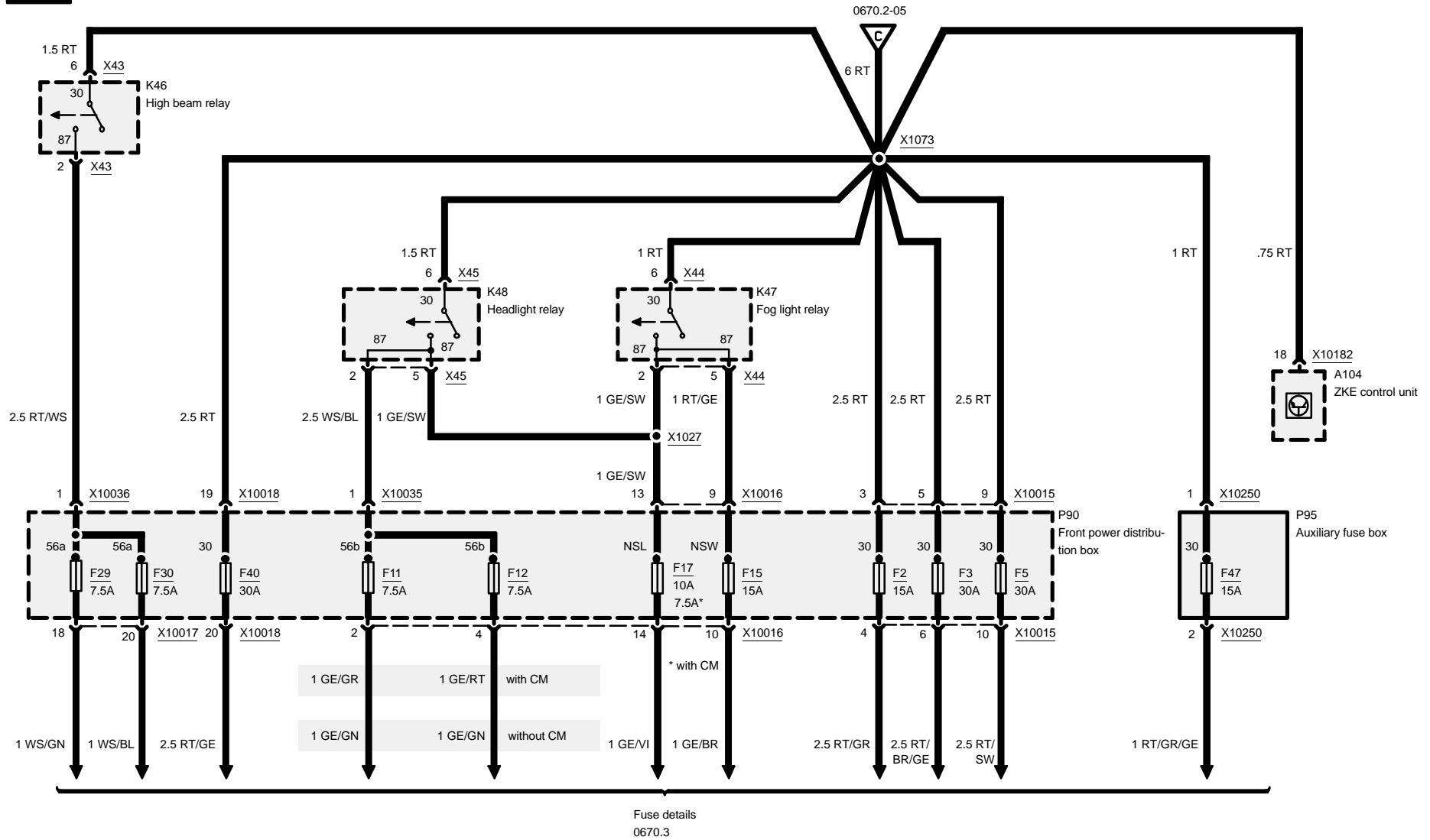
# Power distribution



Fuse details  
0670.3

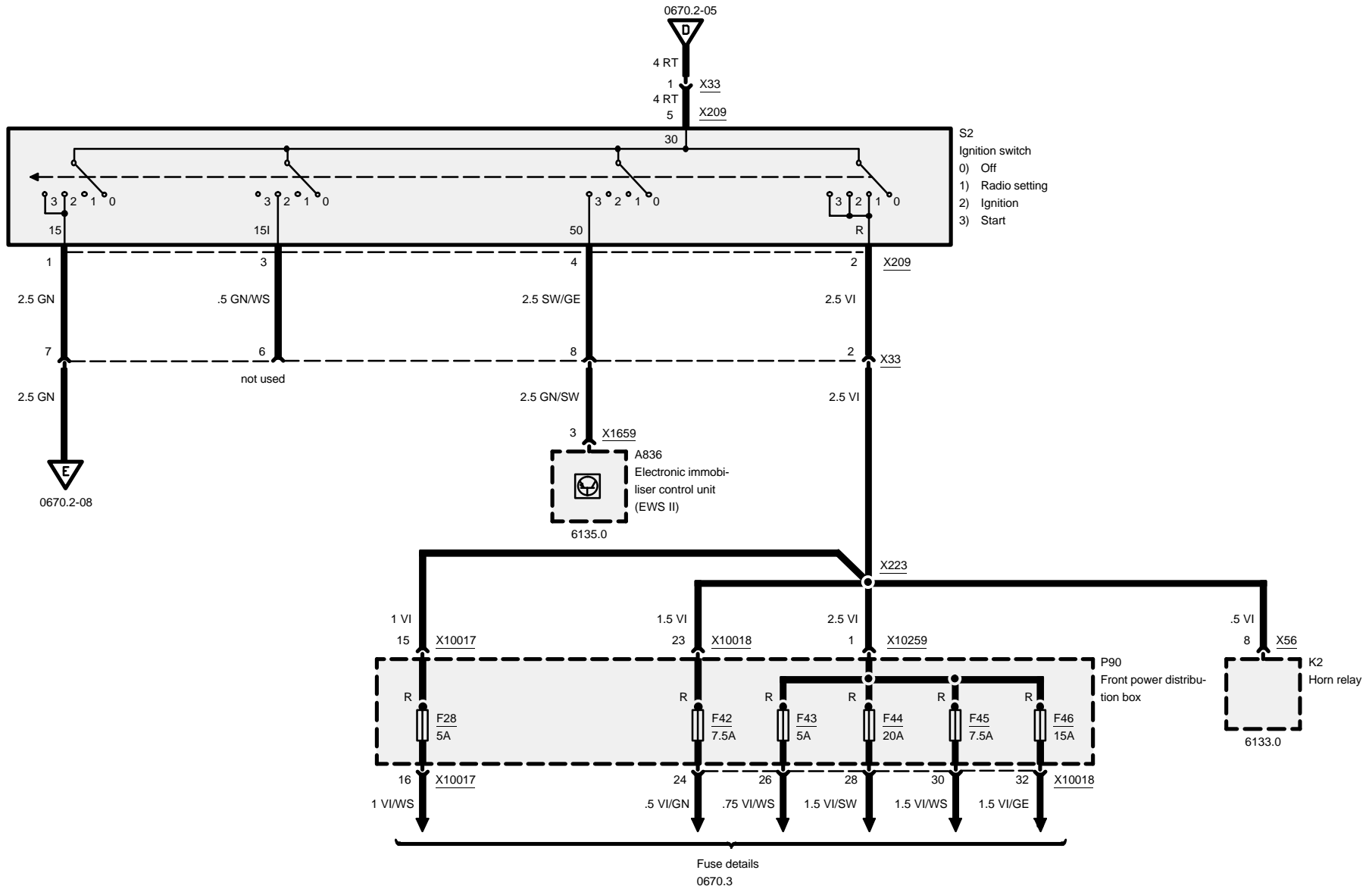


# Power distribution



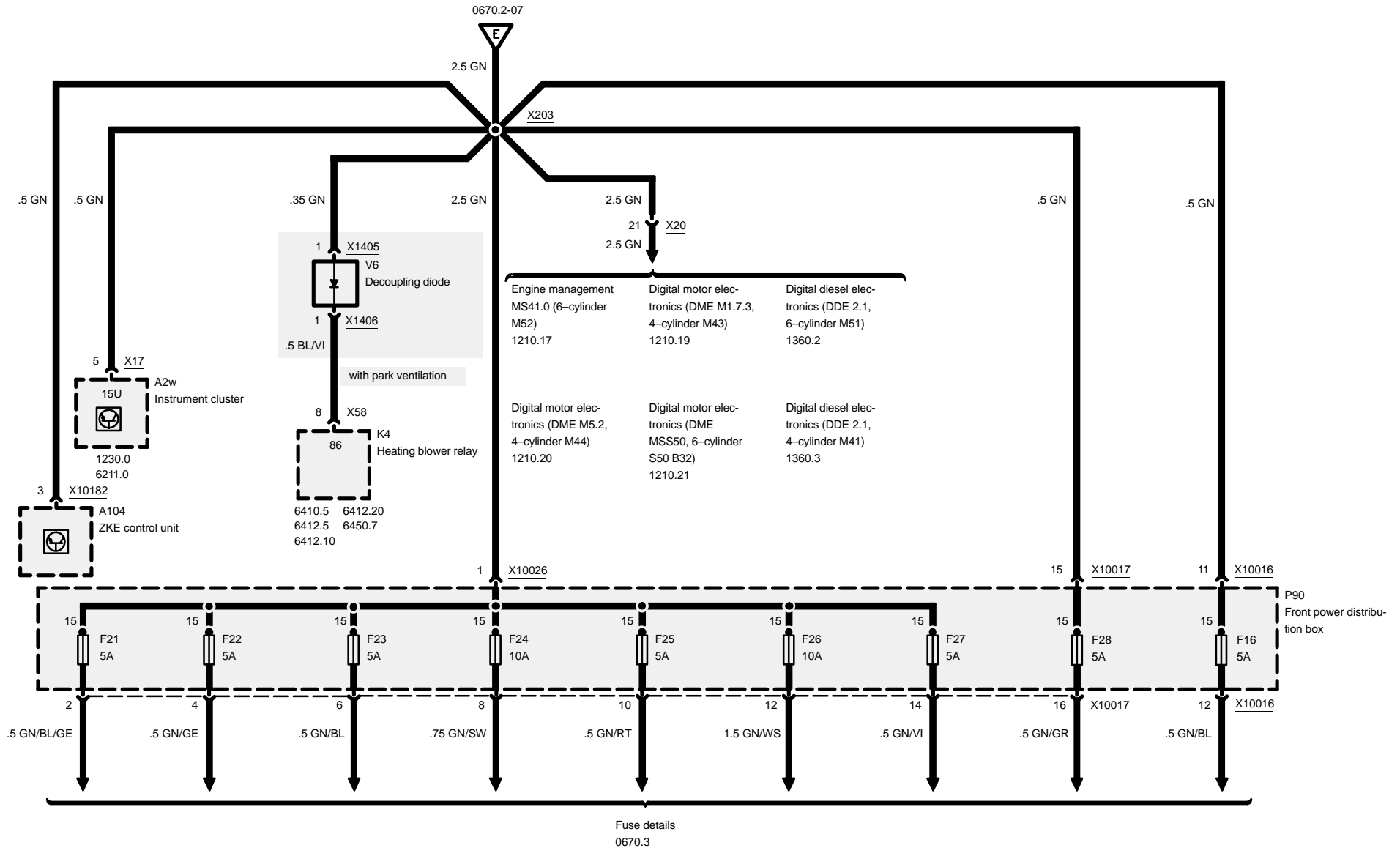


# Power distribution





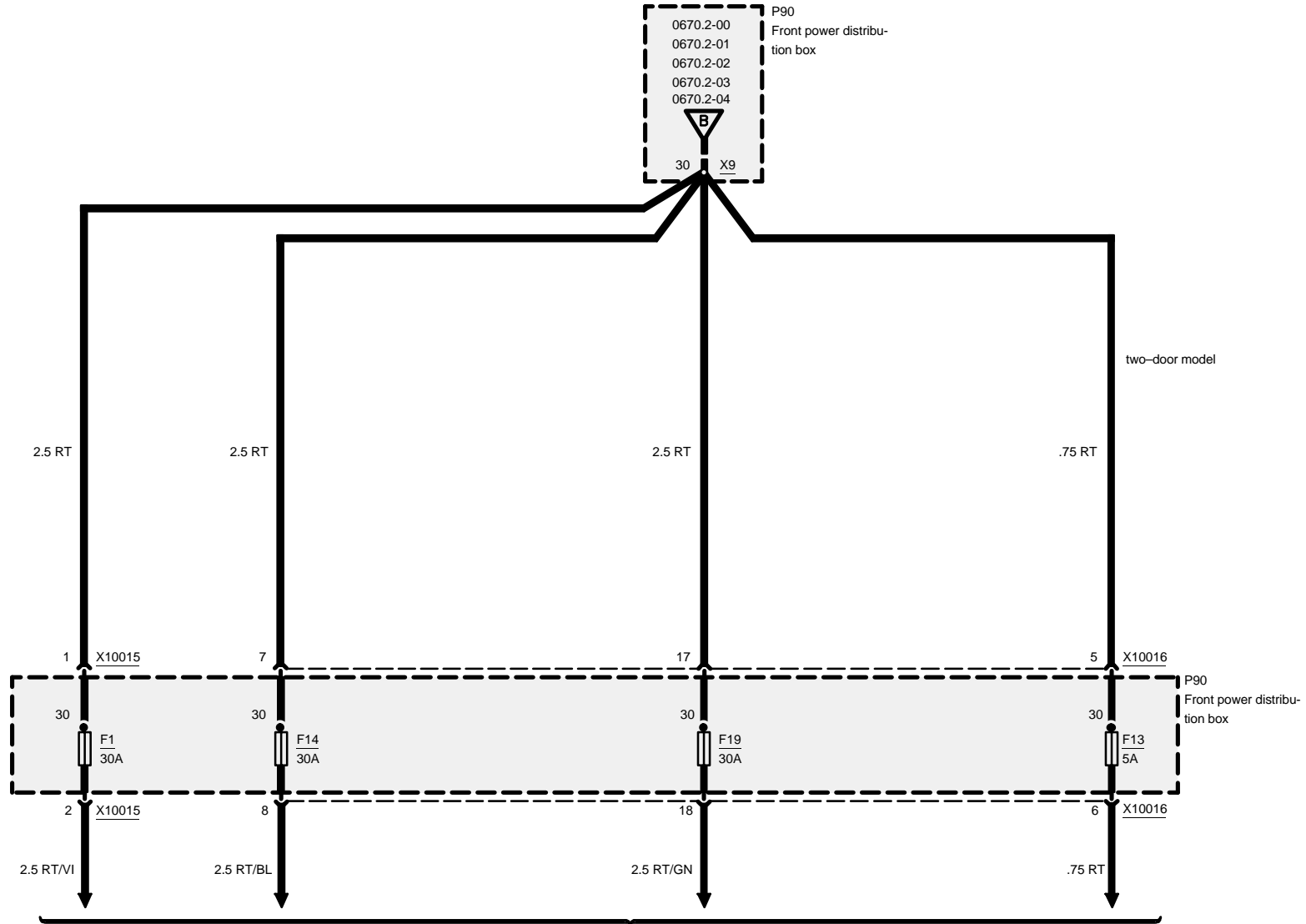
# Power distribution



Fuse details  
0670.3



# Power distribution



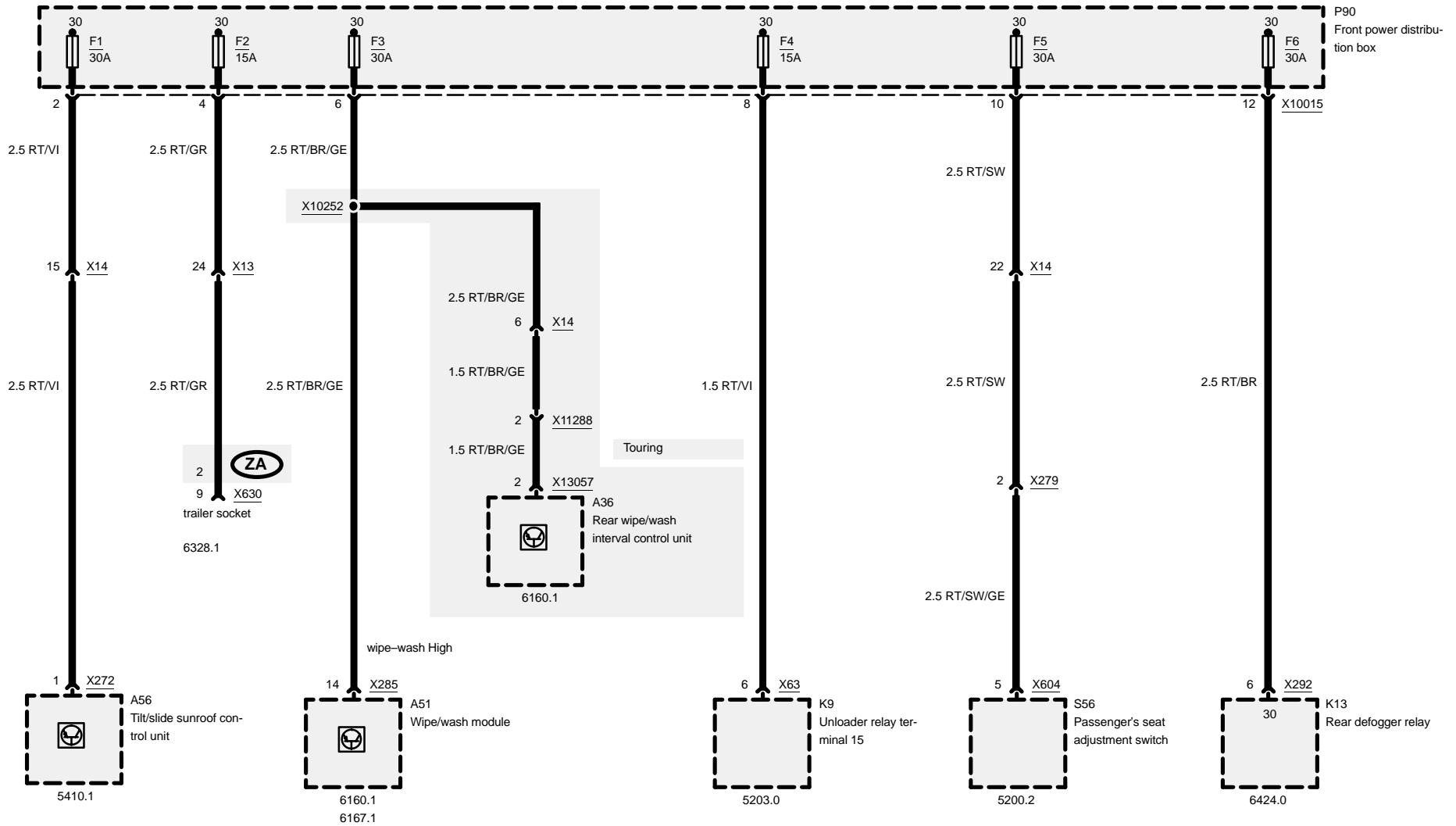
Fuse details  
0670.3





# 0670.3 Fuse details

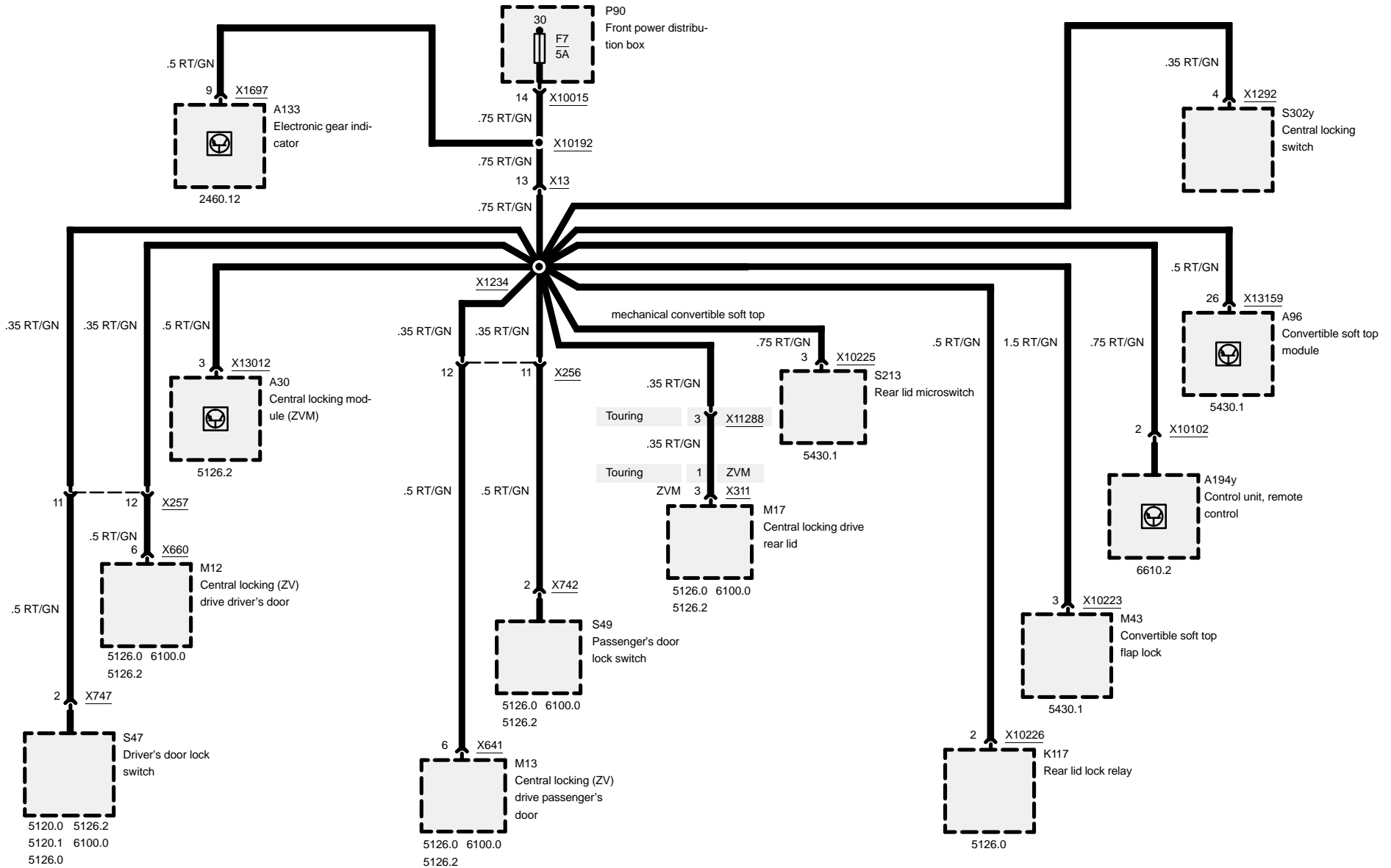
## Fuses 1, 2, 3, 4, 5 and 6





# Fuse details

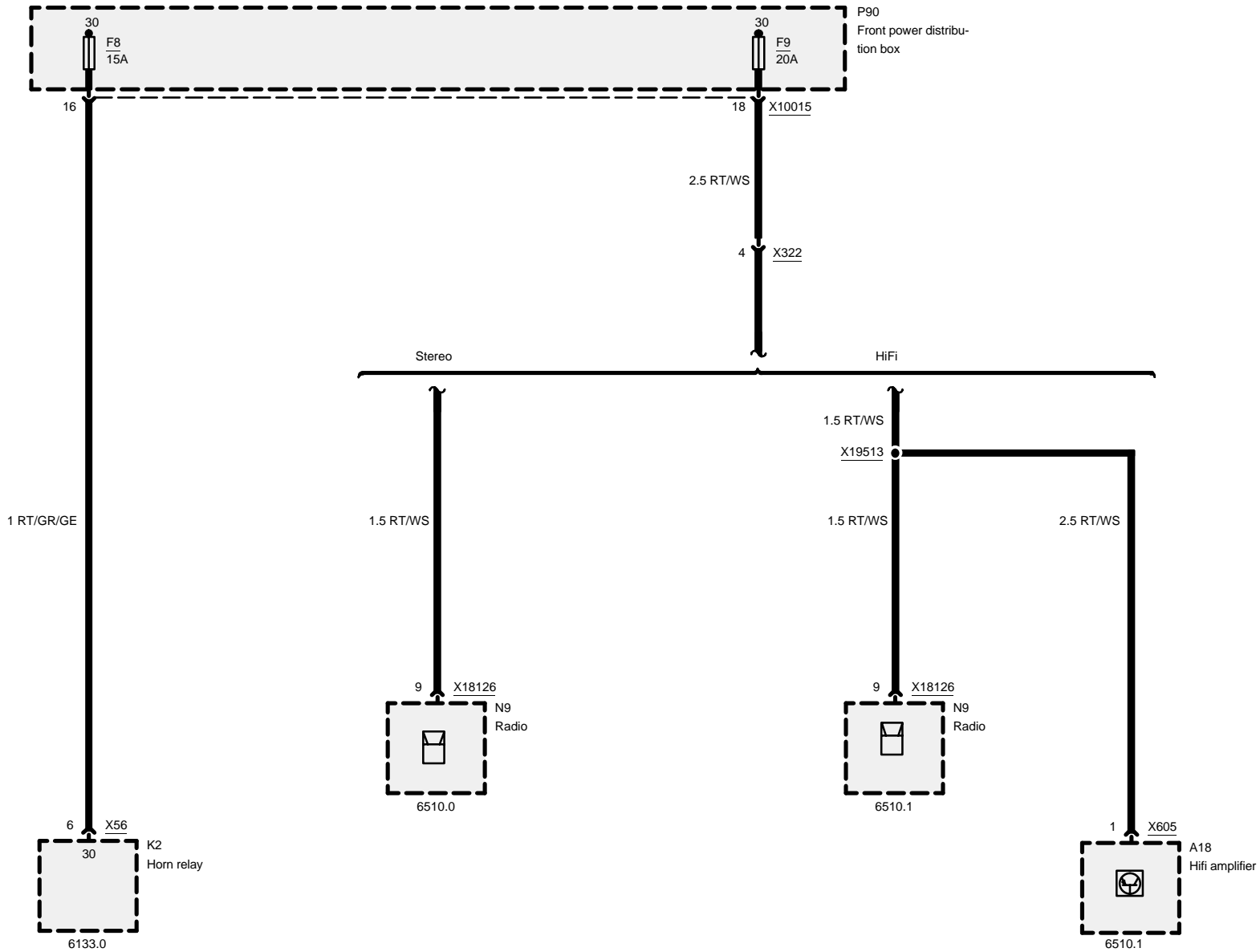
## Fuse 7





# Fuse details

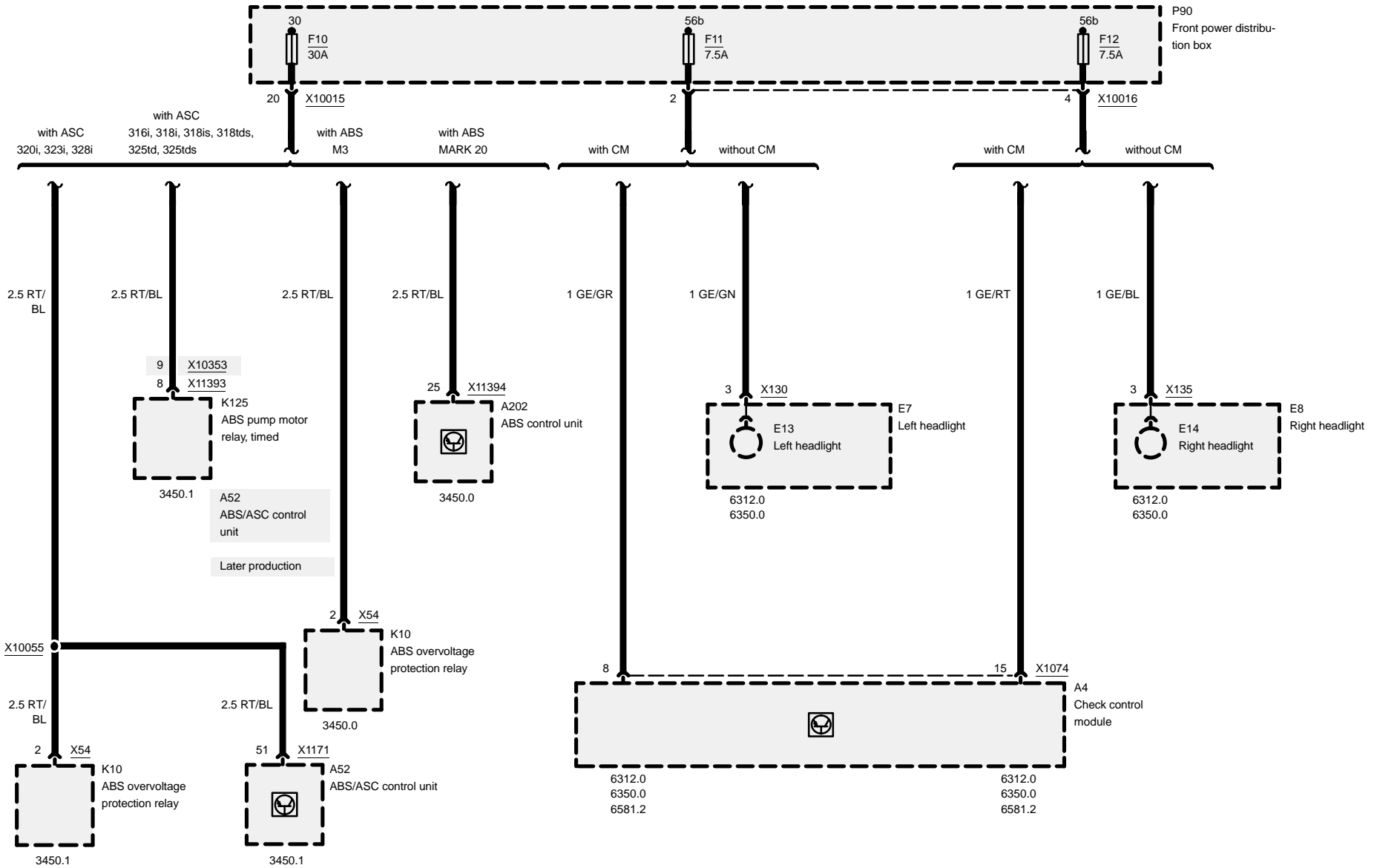
## Fuses 8 and 9





# Fuse details

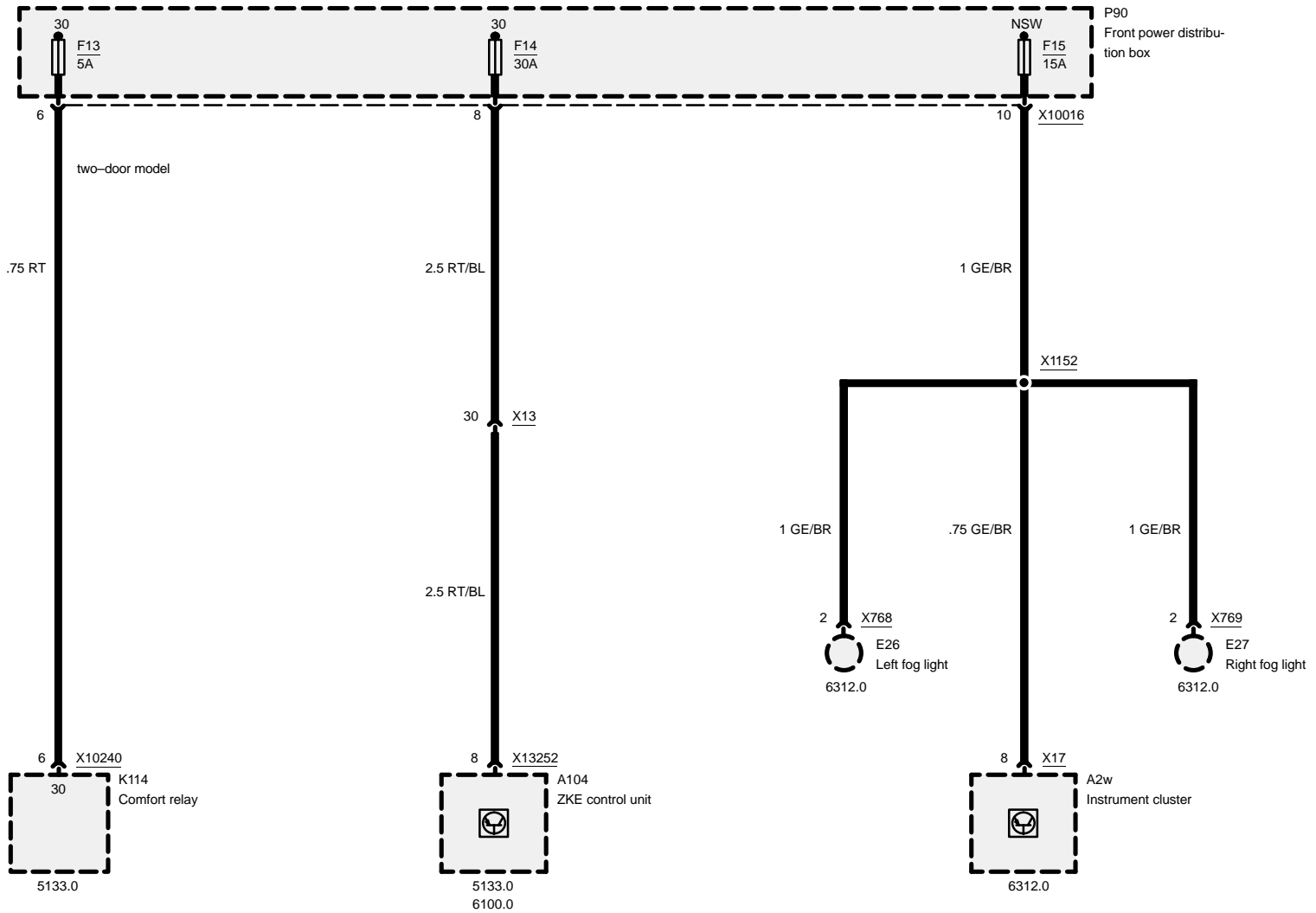
## Fuses 10, 11 and 12





# Fuse details

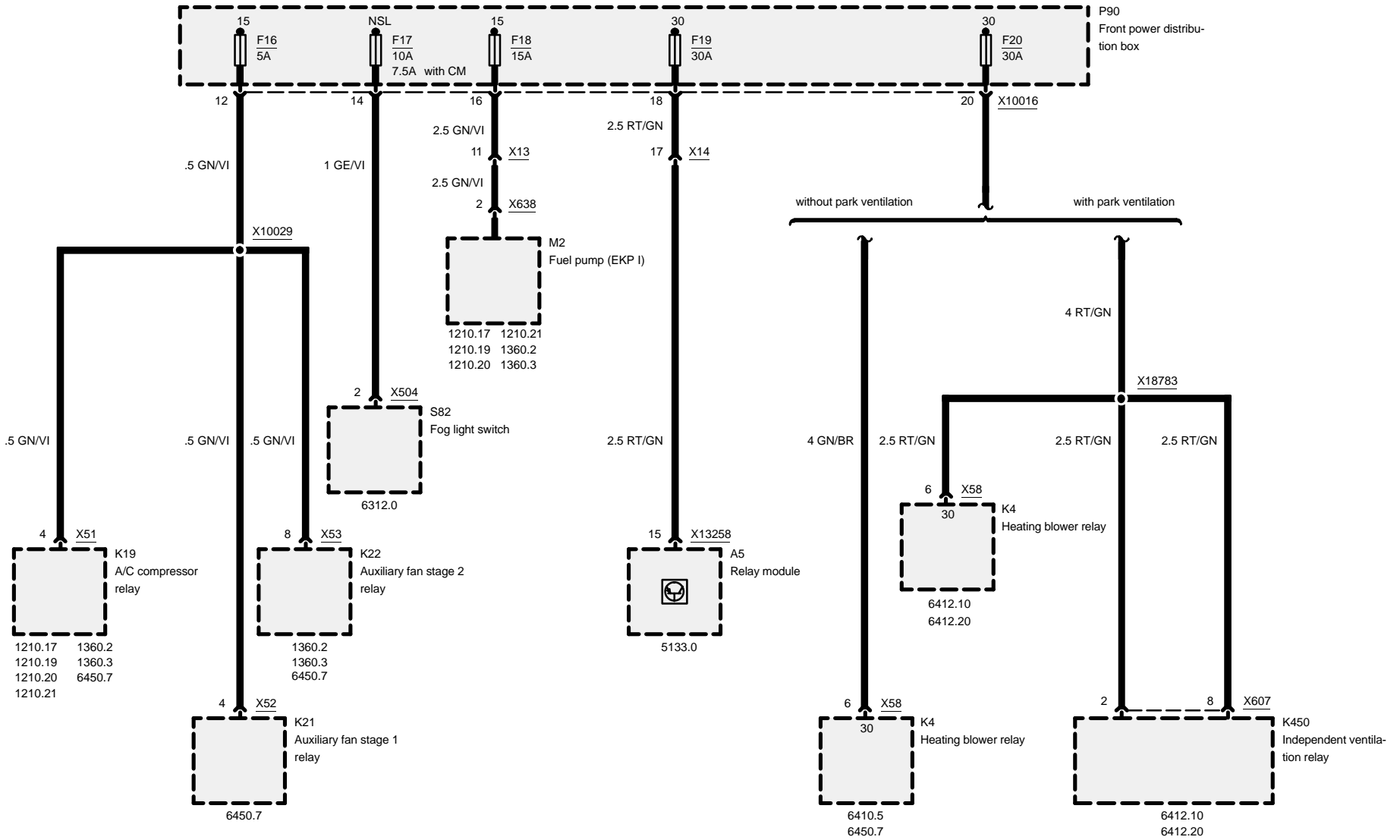
## Fuses 13, 14 and 15





# Fuse details

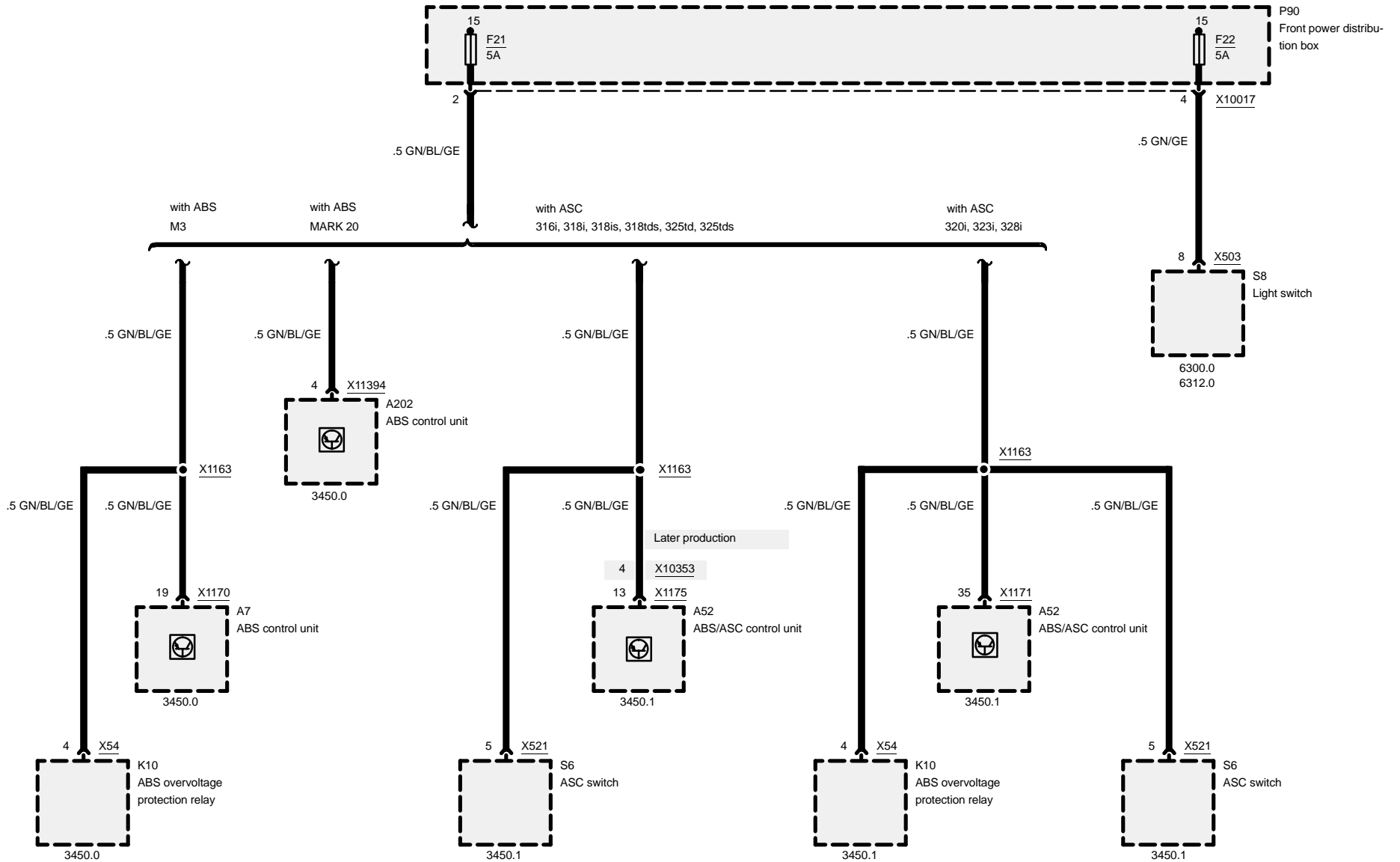
## Fuses 16, 17, 18, 19 and 20





# Fuse details

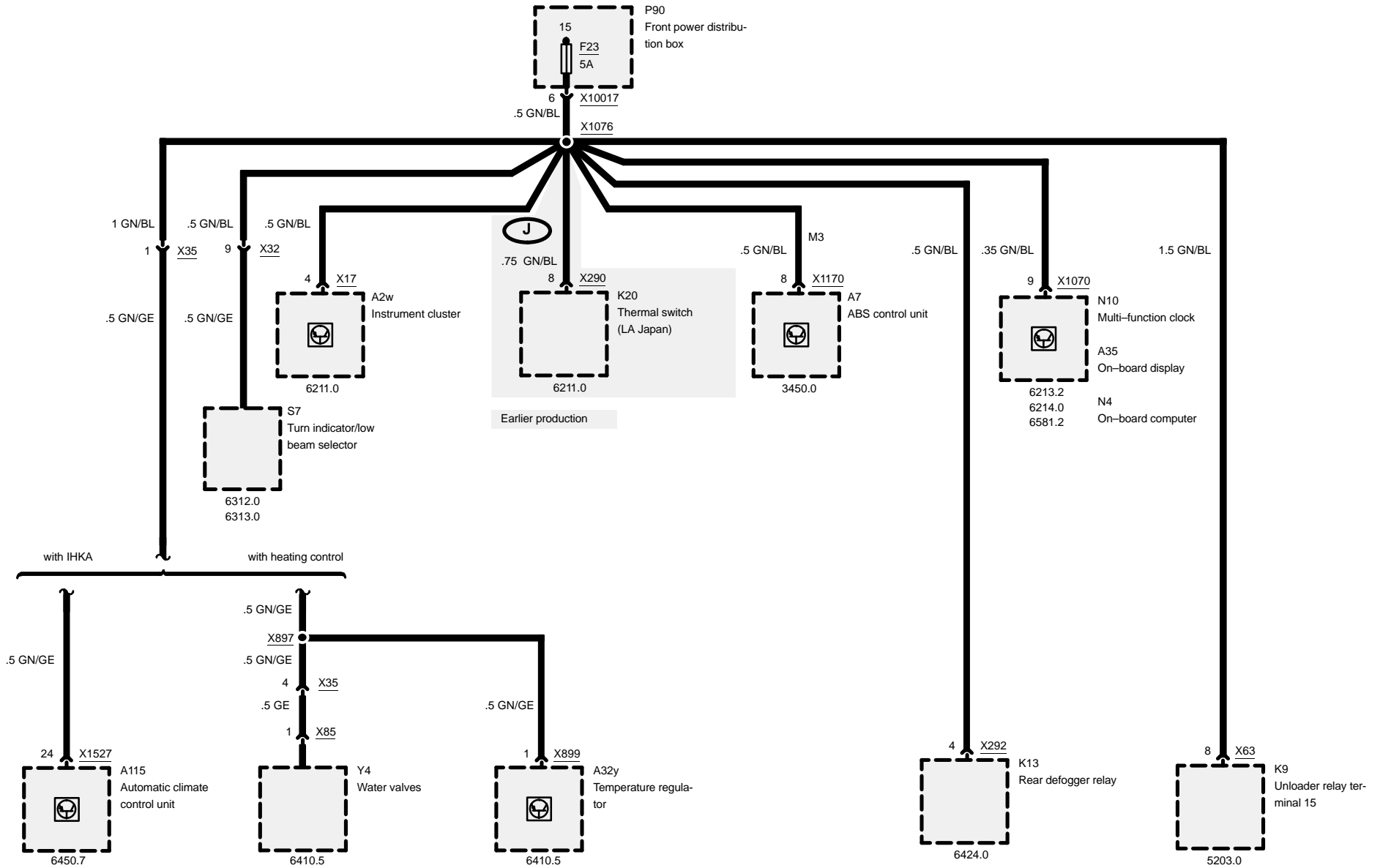
## Fuses 21 and 22





# Fuse details

## Fuse 23

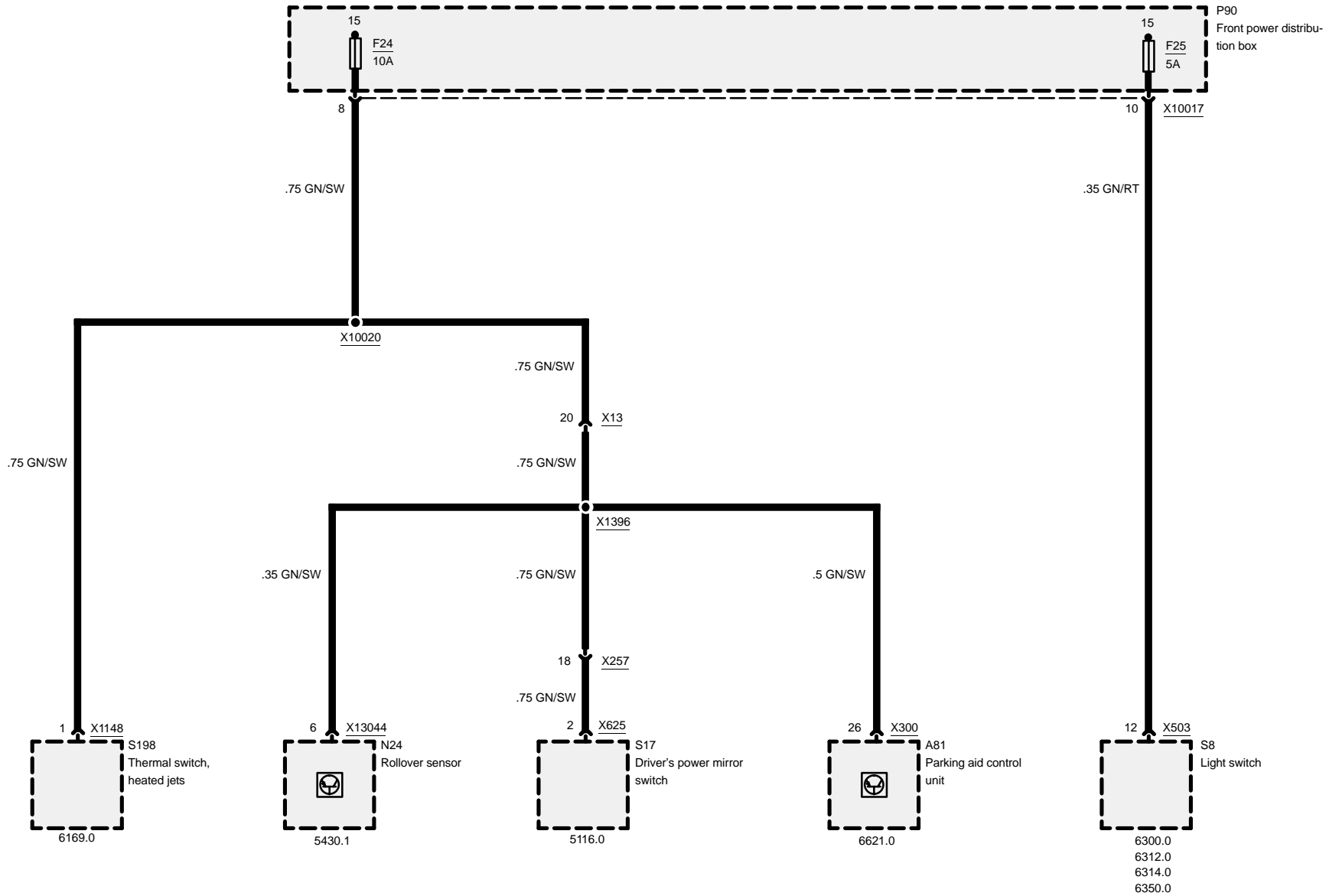






# Fuse details

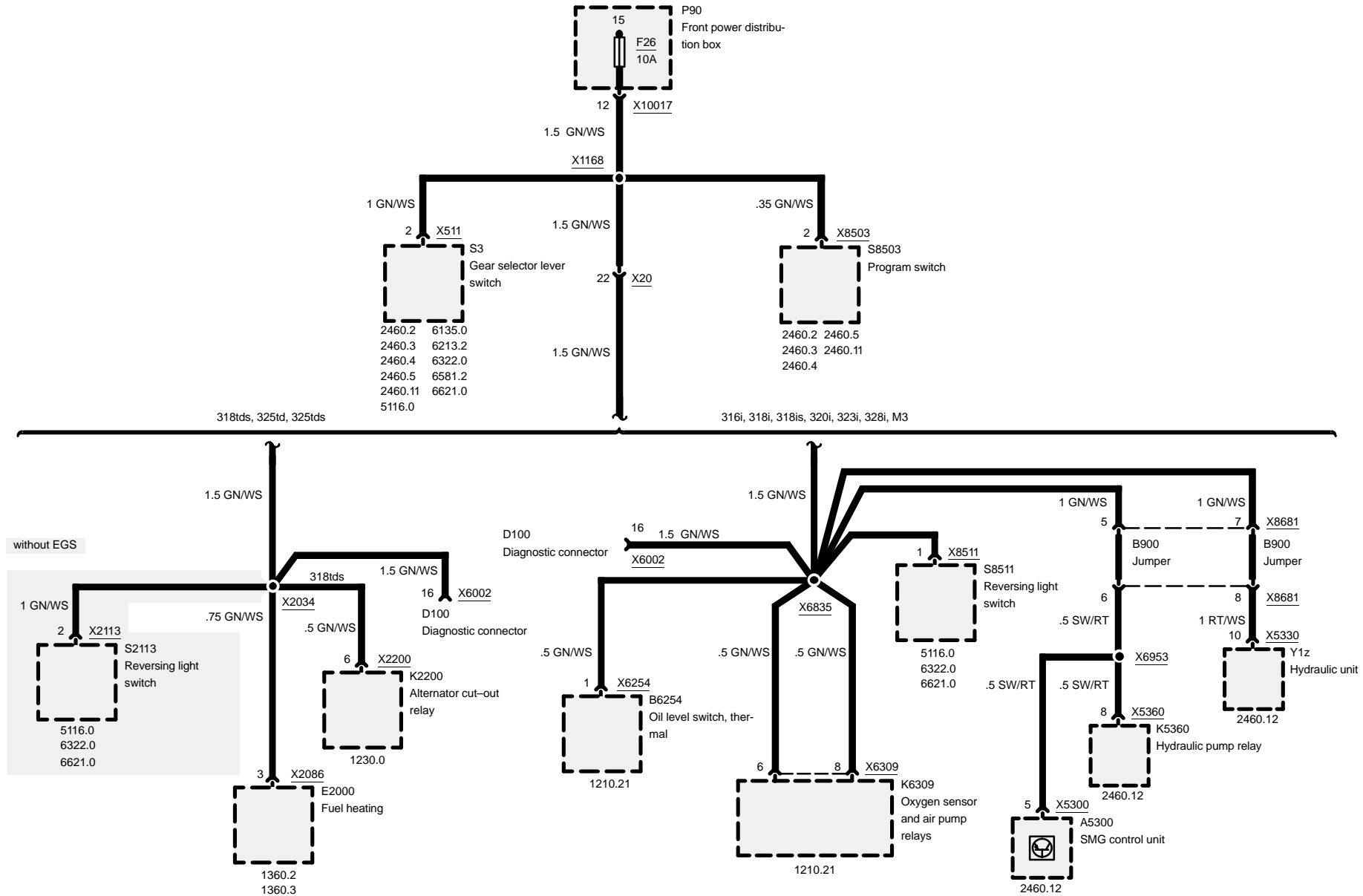
## Fuses 24 and 25





# Fuse details

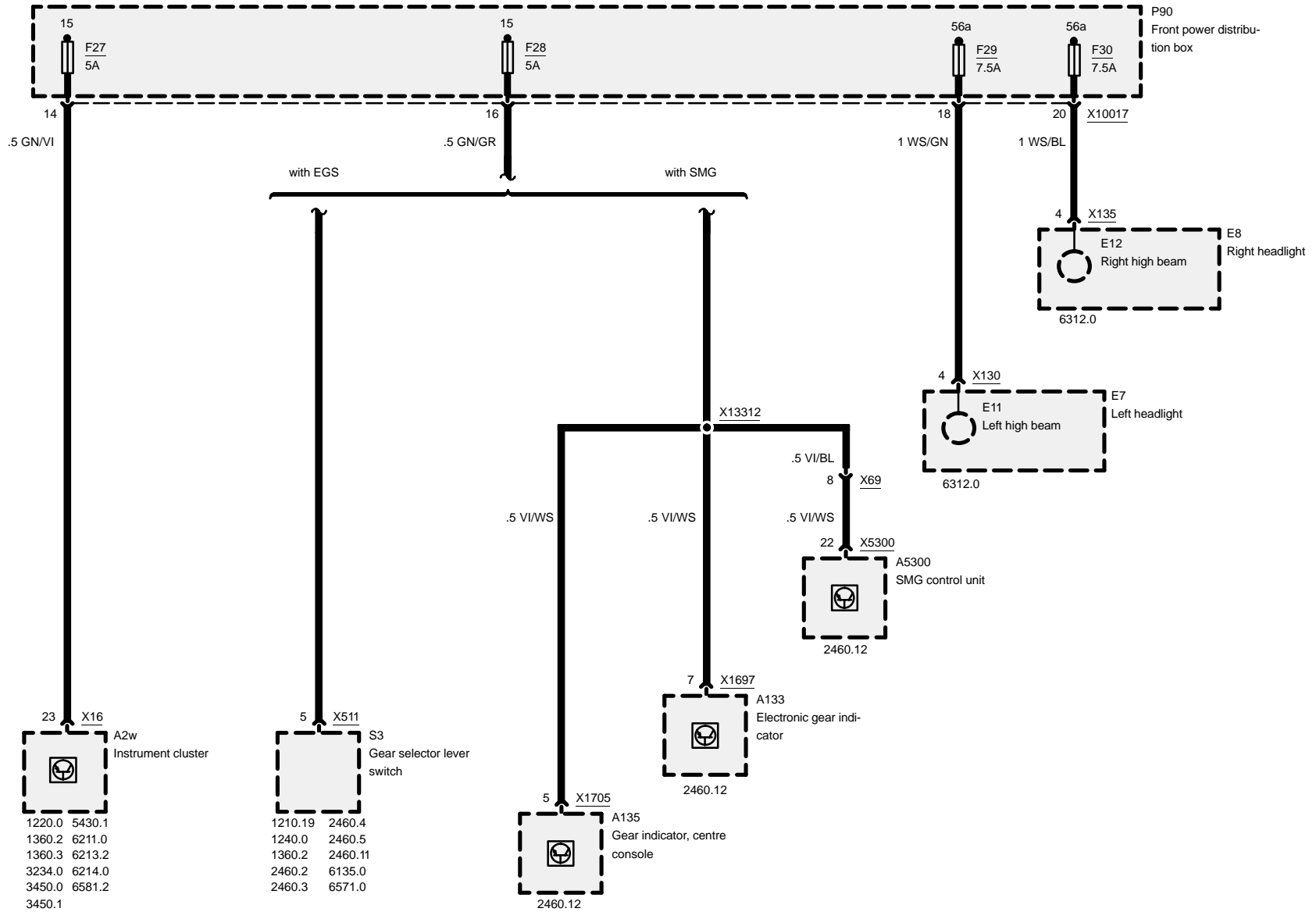
## Fuse 26





# Fuse details

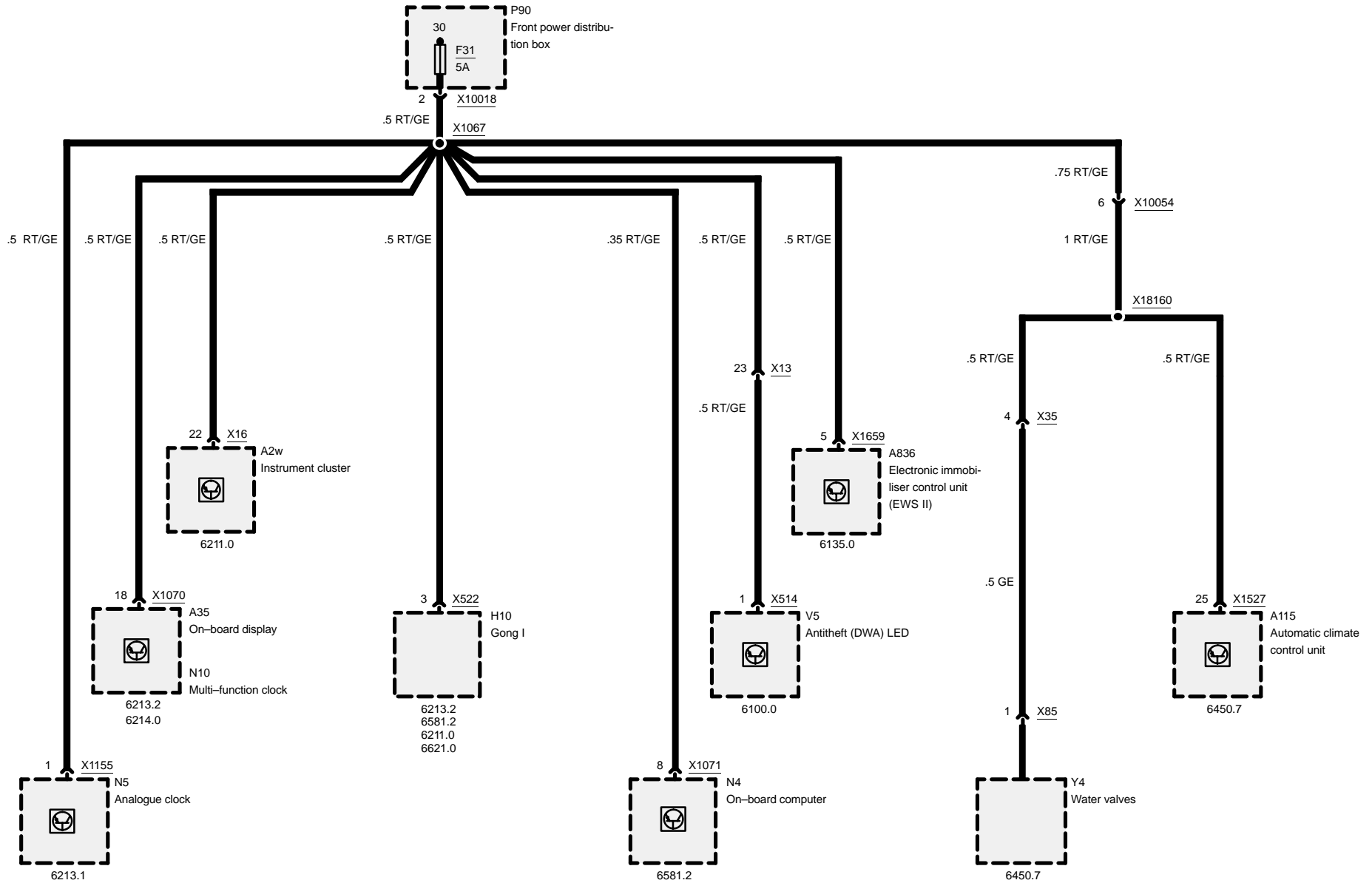
## Fuses 27, 28, 29 and 30





# Fuse details

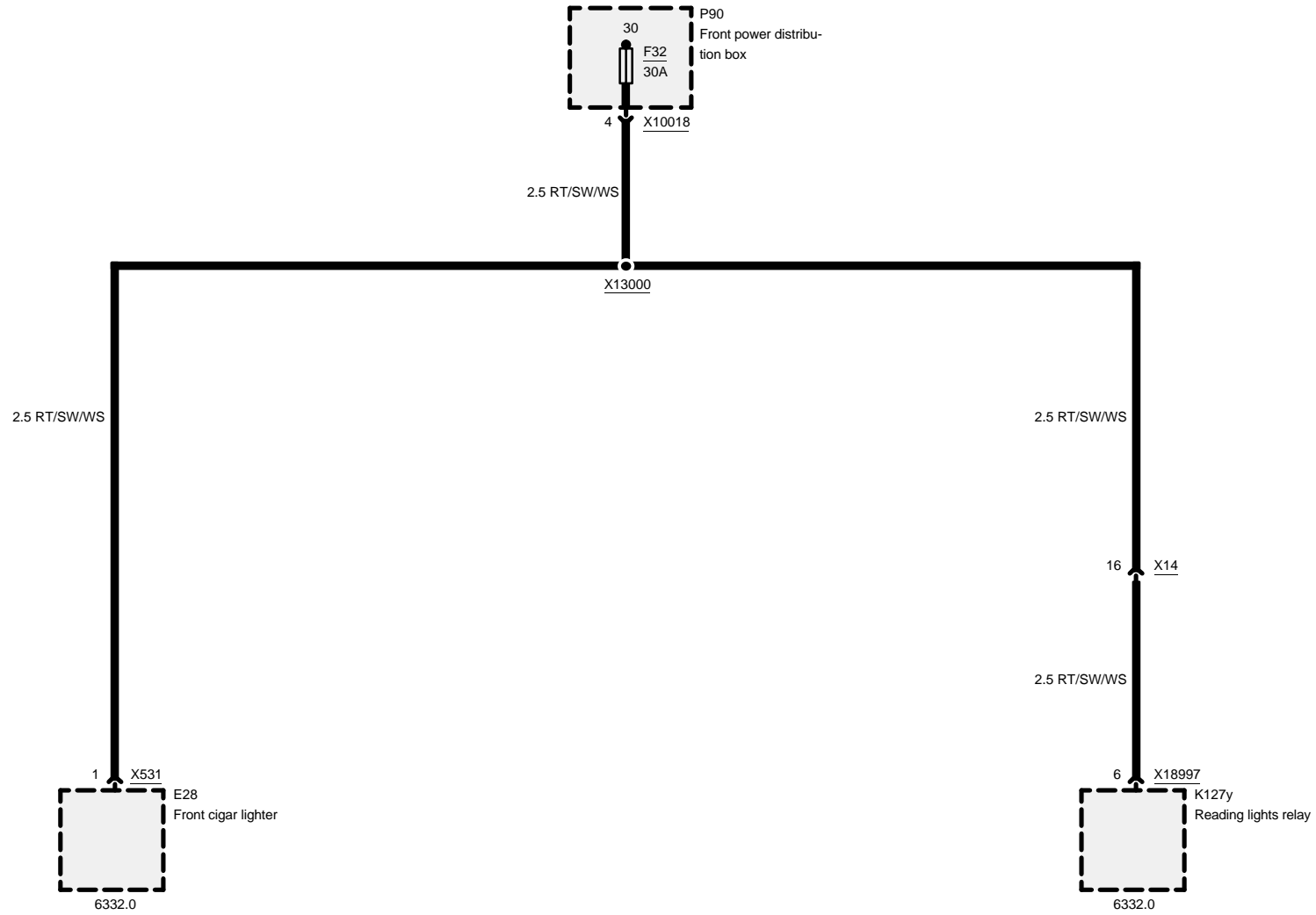
## Fuse 31





# Fuse details

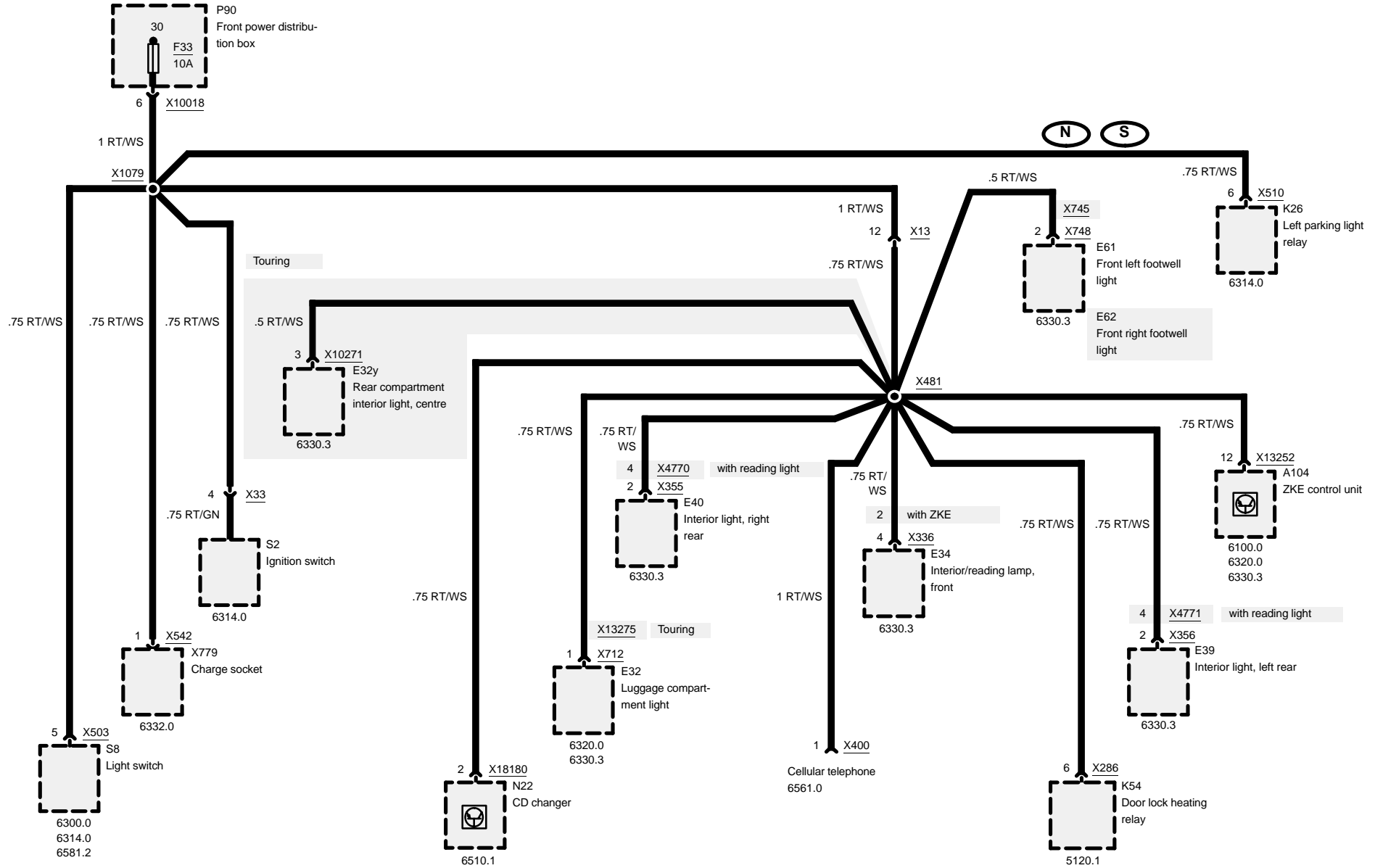
## Fuse 32





# Fuse details

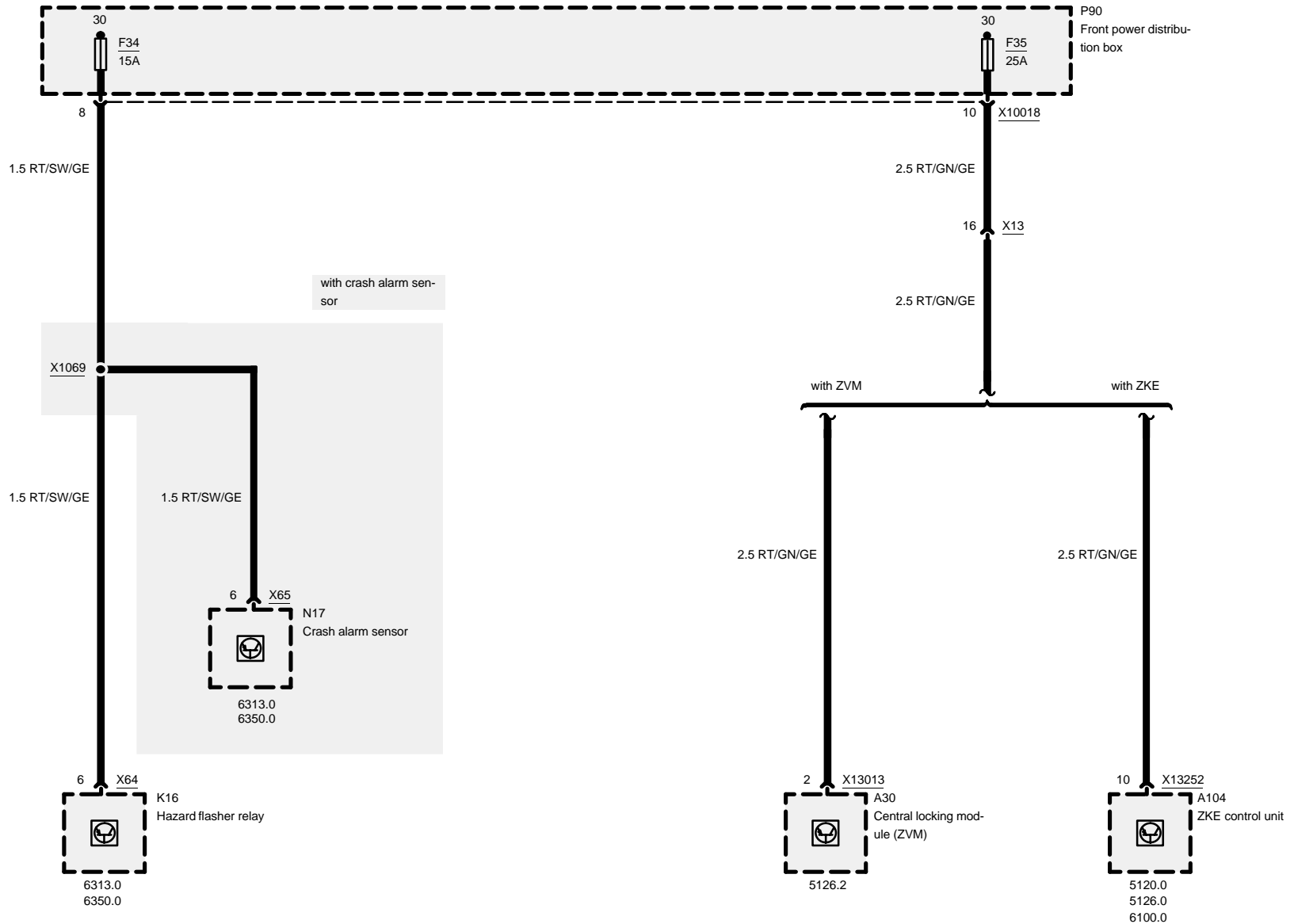
## Fuse 33





# Fuse details

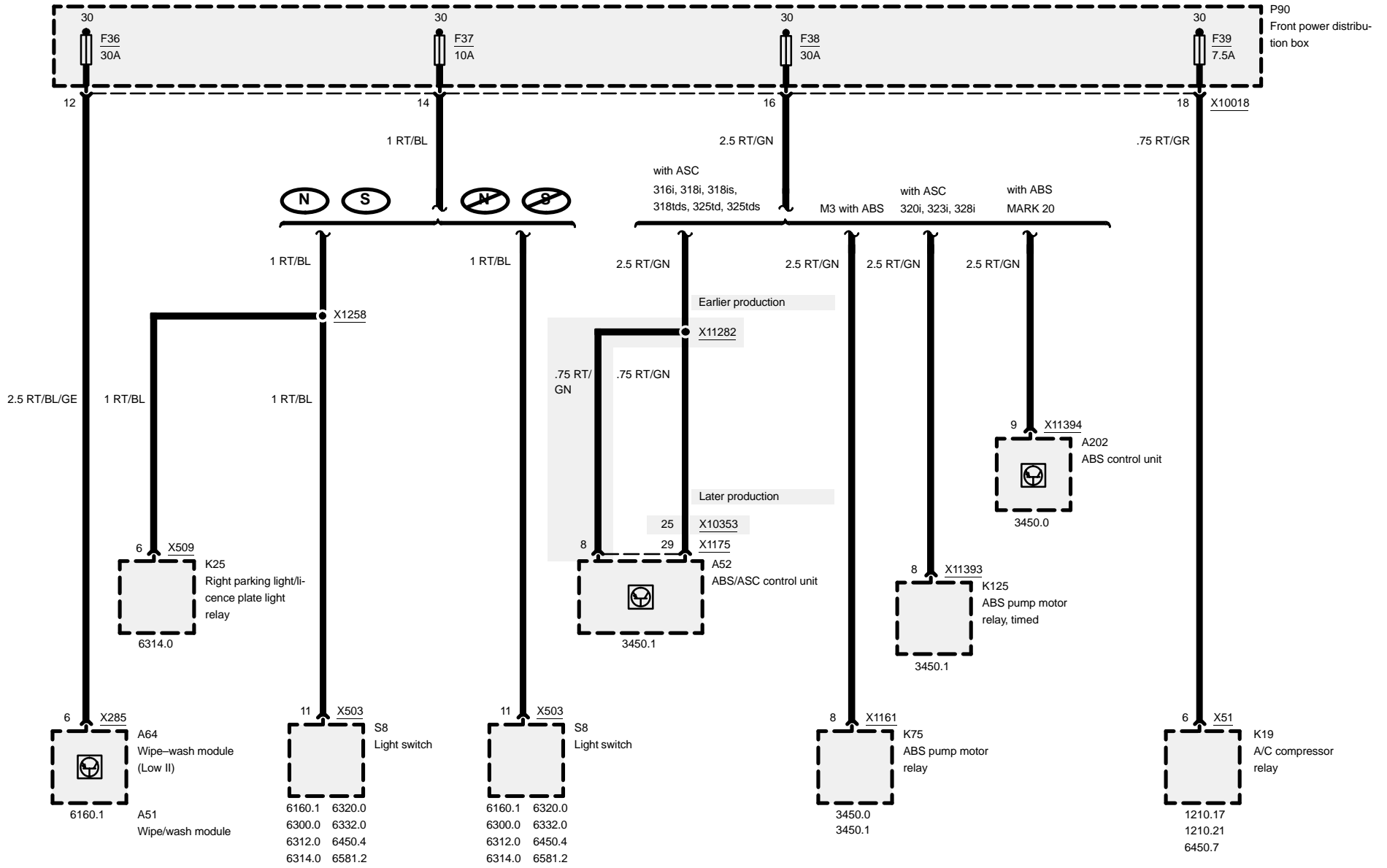
## Fuses 34 and 35





# Fuse details

## Fuses 36, 37, 38 and 39

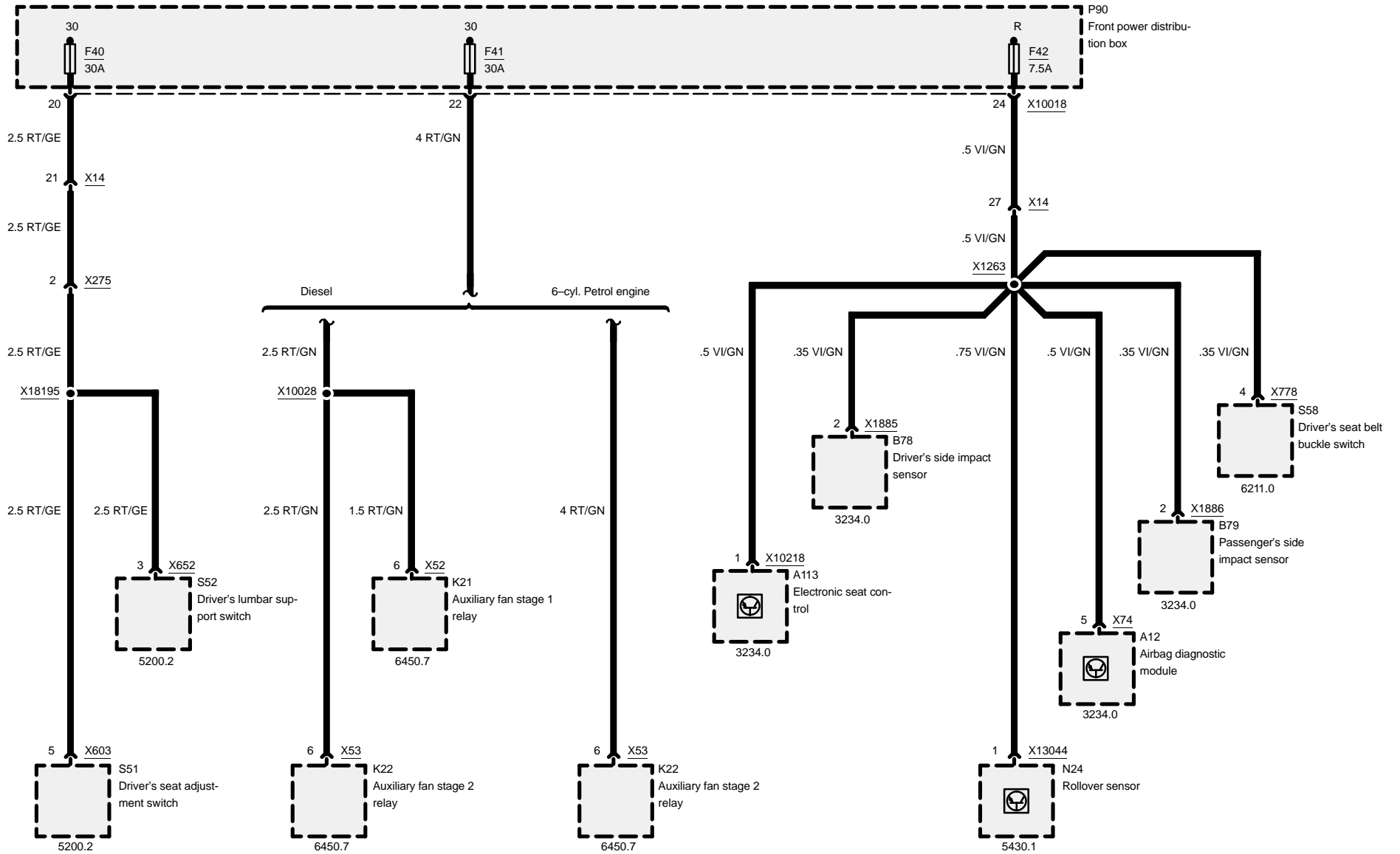






# Fuse details

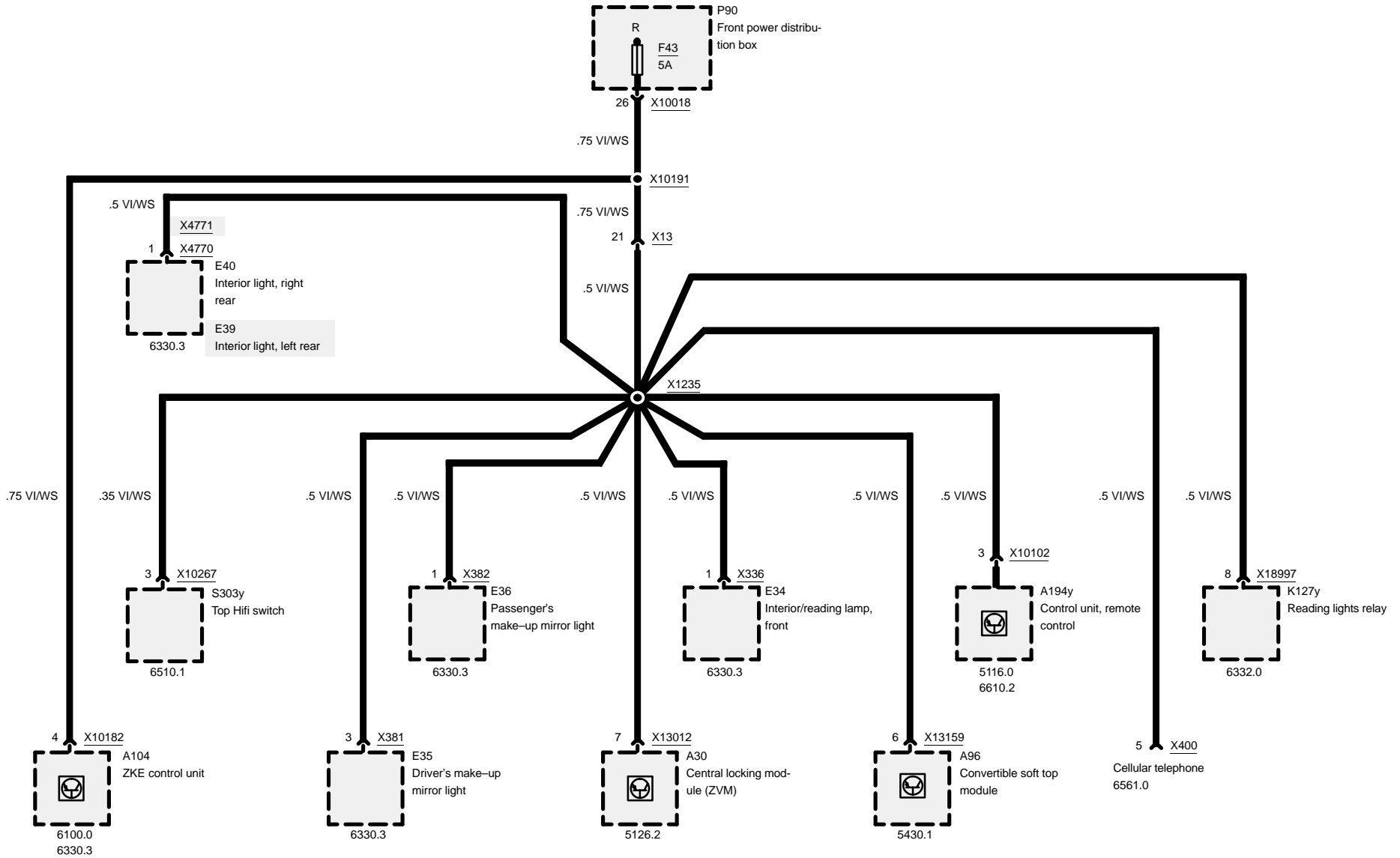
## Fuses 40, 41 and 42





# Fuse details

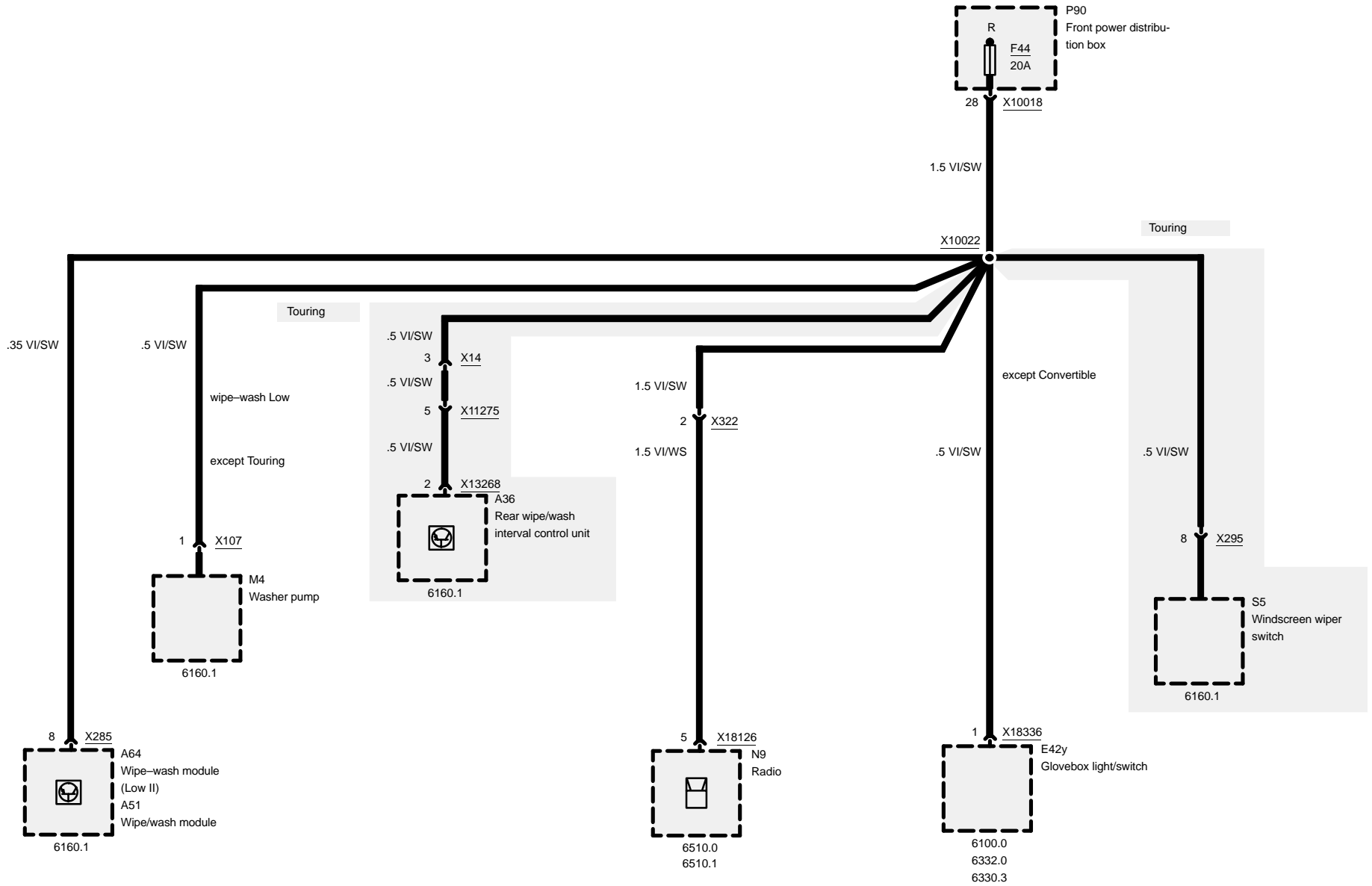
## Fuse 43





# Fuse details

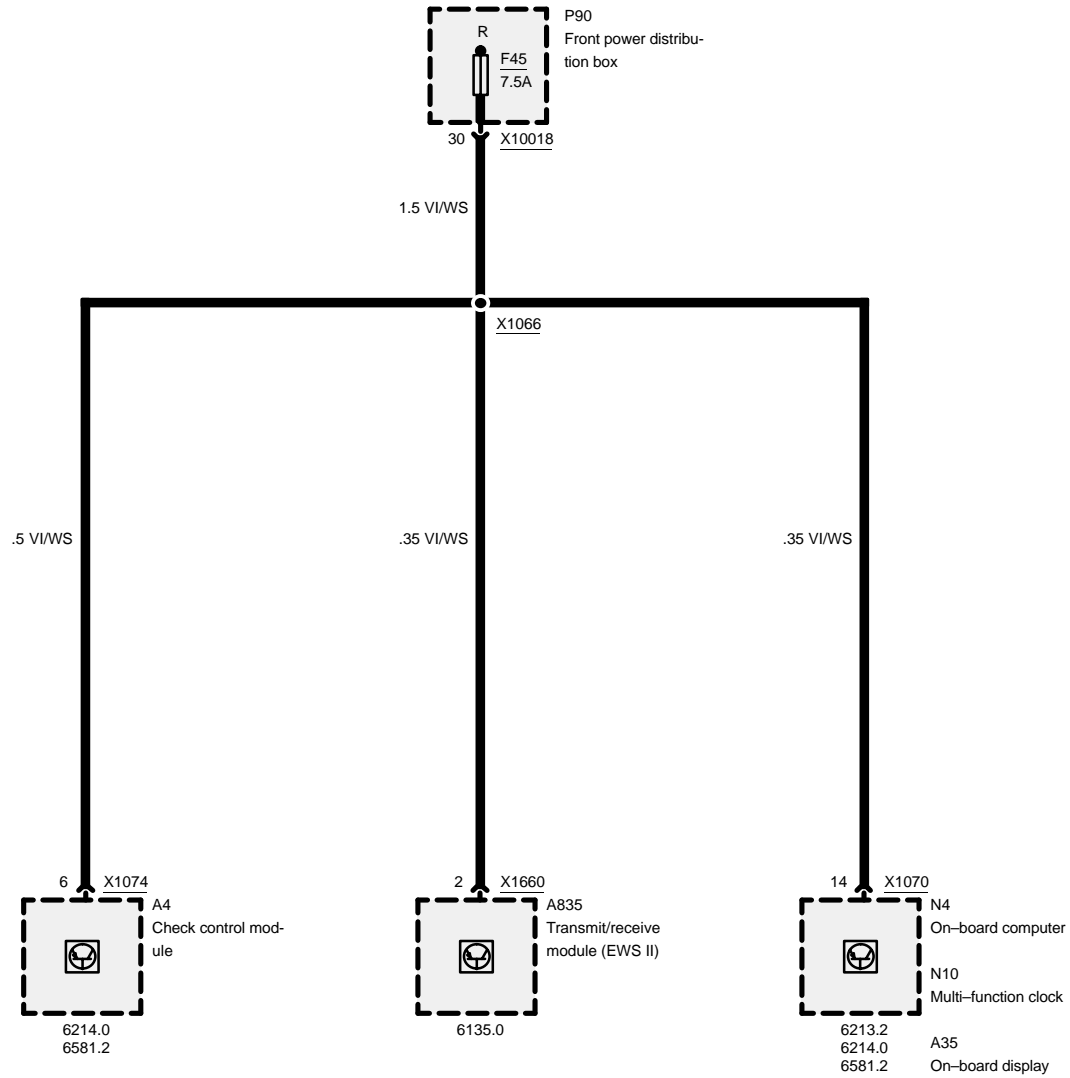
## Fuse 44





# Fuse details

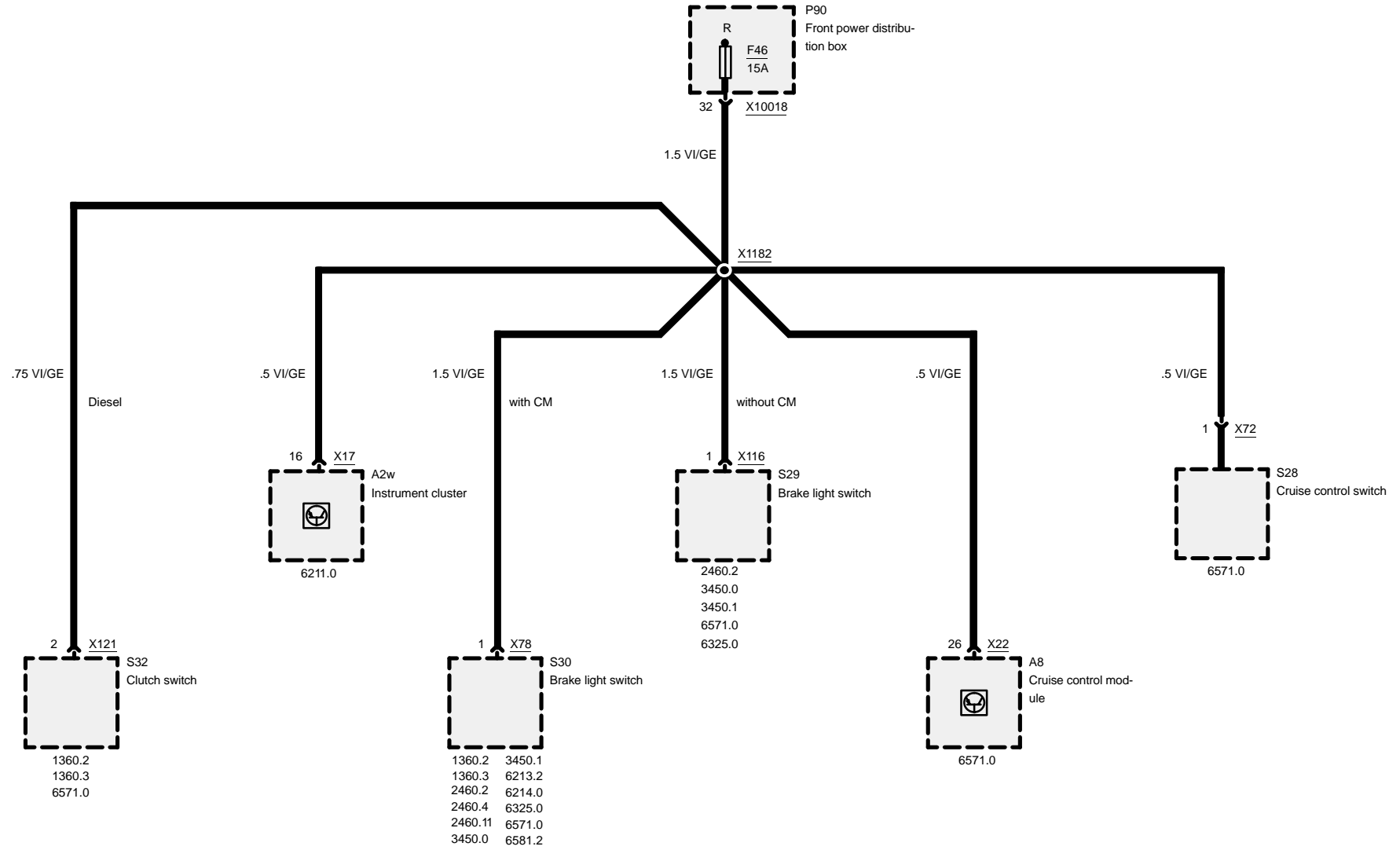
## Fuse 45





# Fuse details

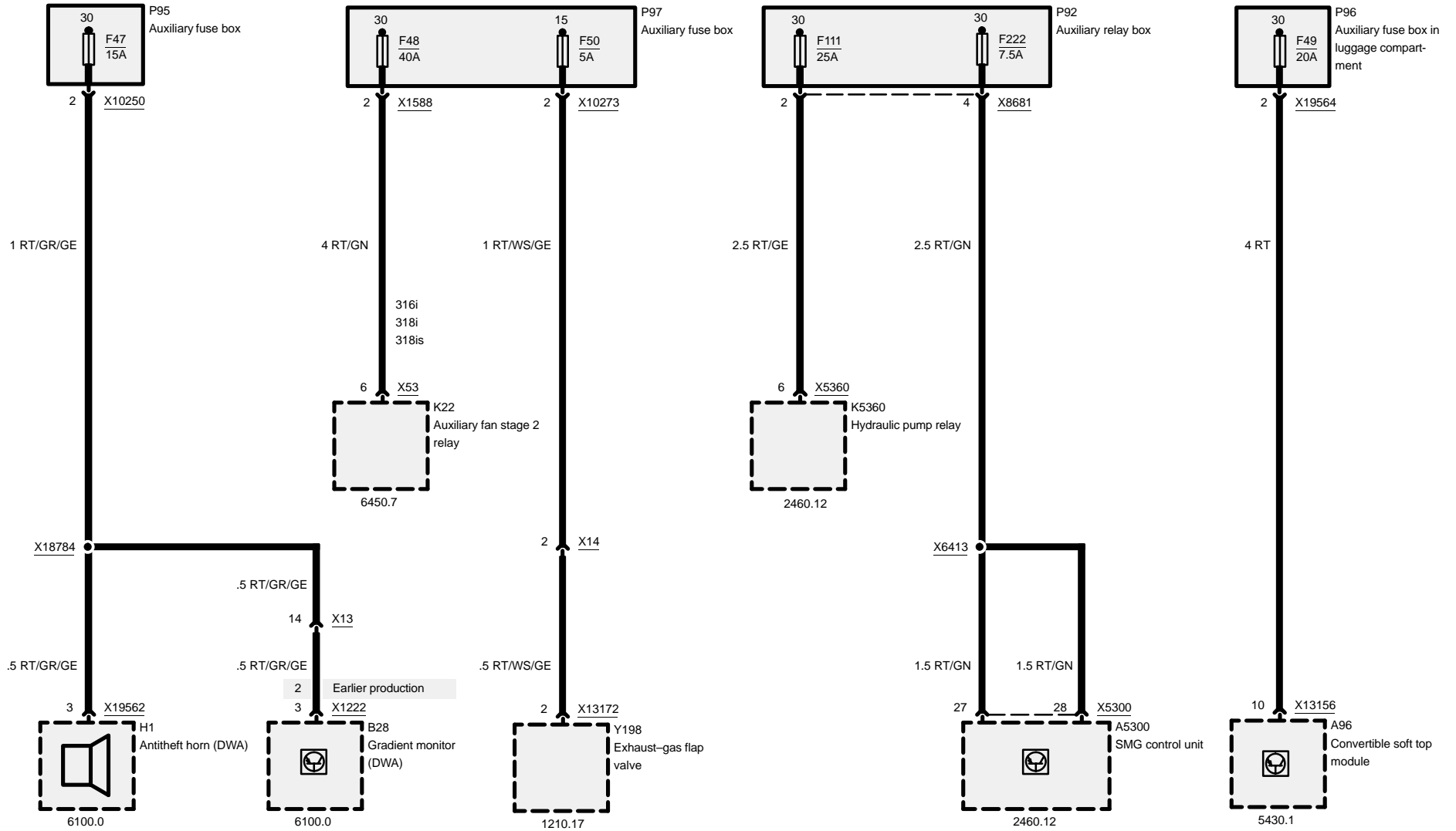
## Fuse 46





# Fuse details

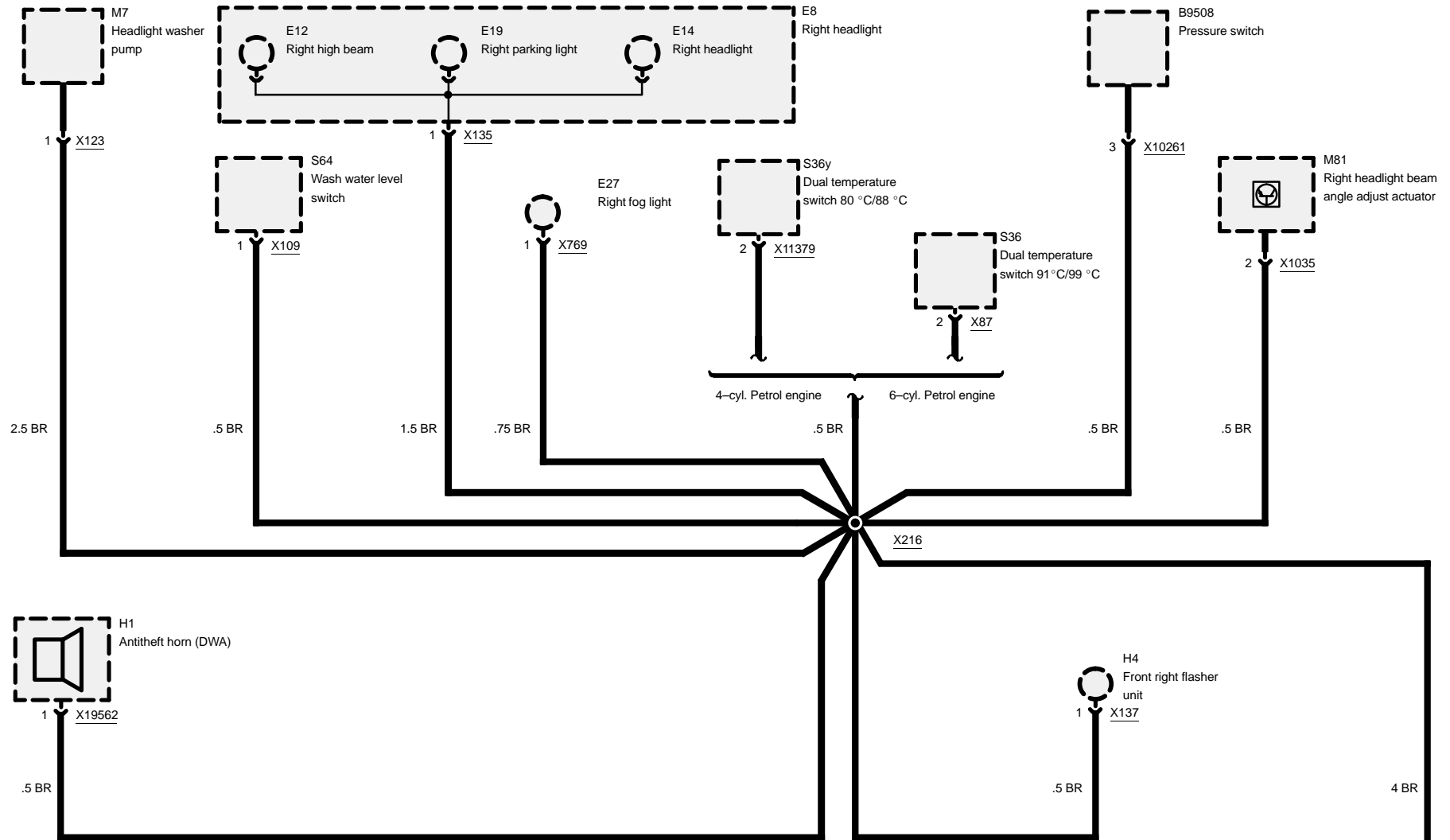
## Fuses 47, 48, 49, 50, 111 and 222

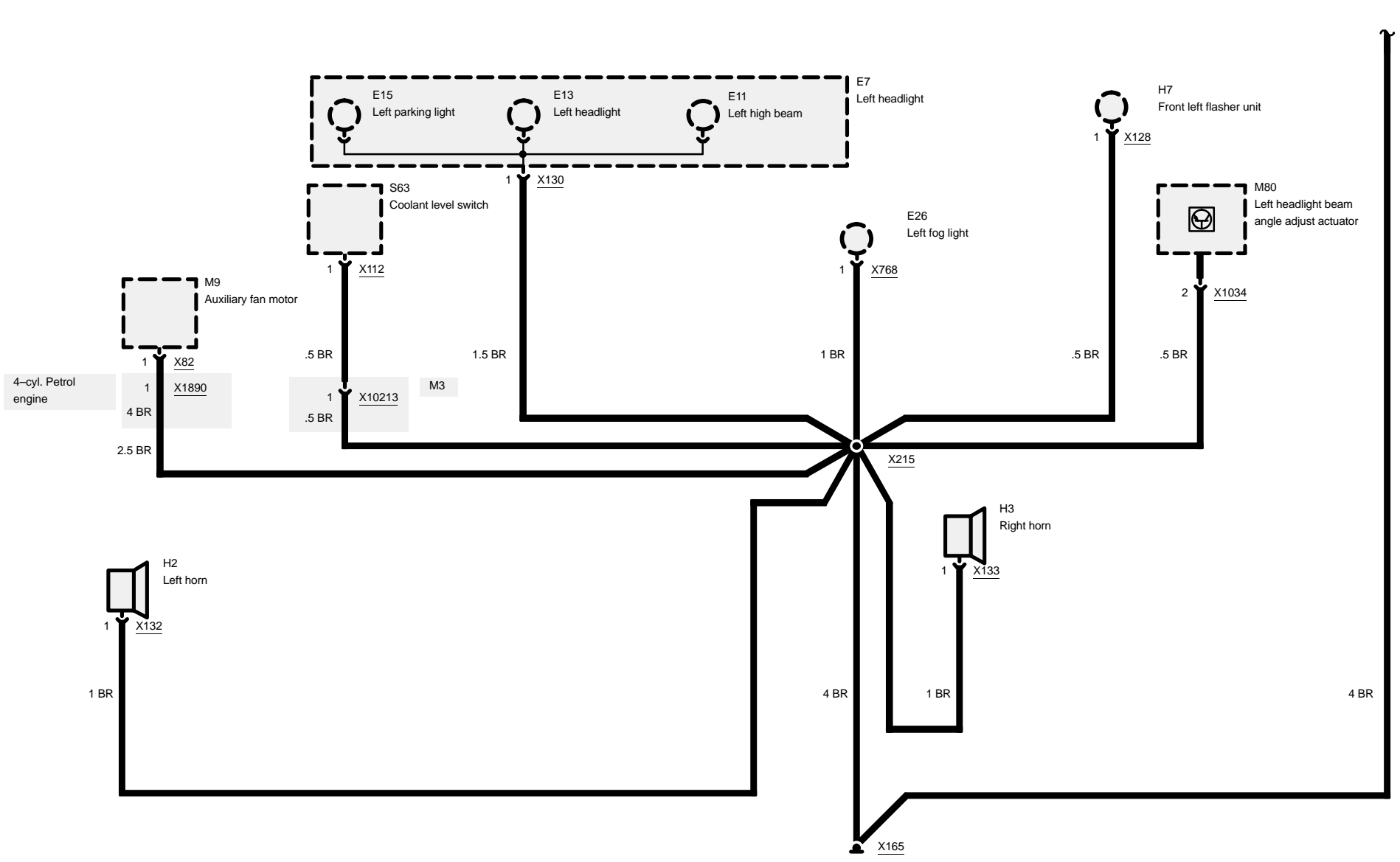




# 0670.4 Ground distribution

## Ground X165



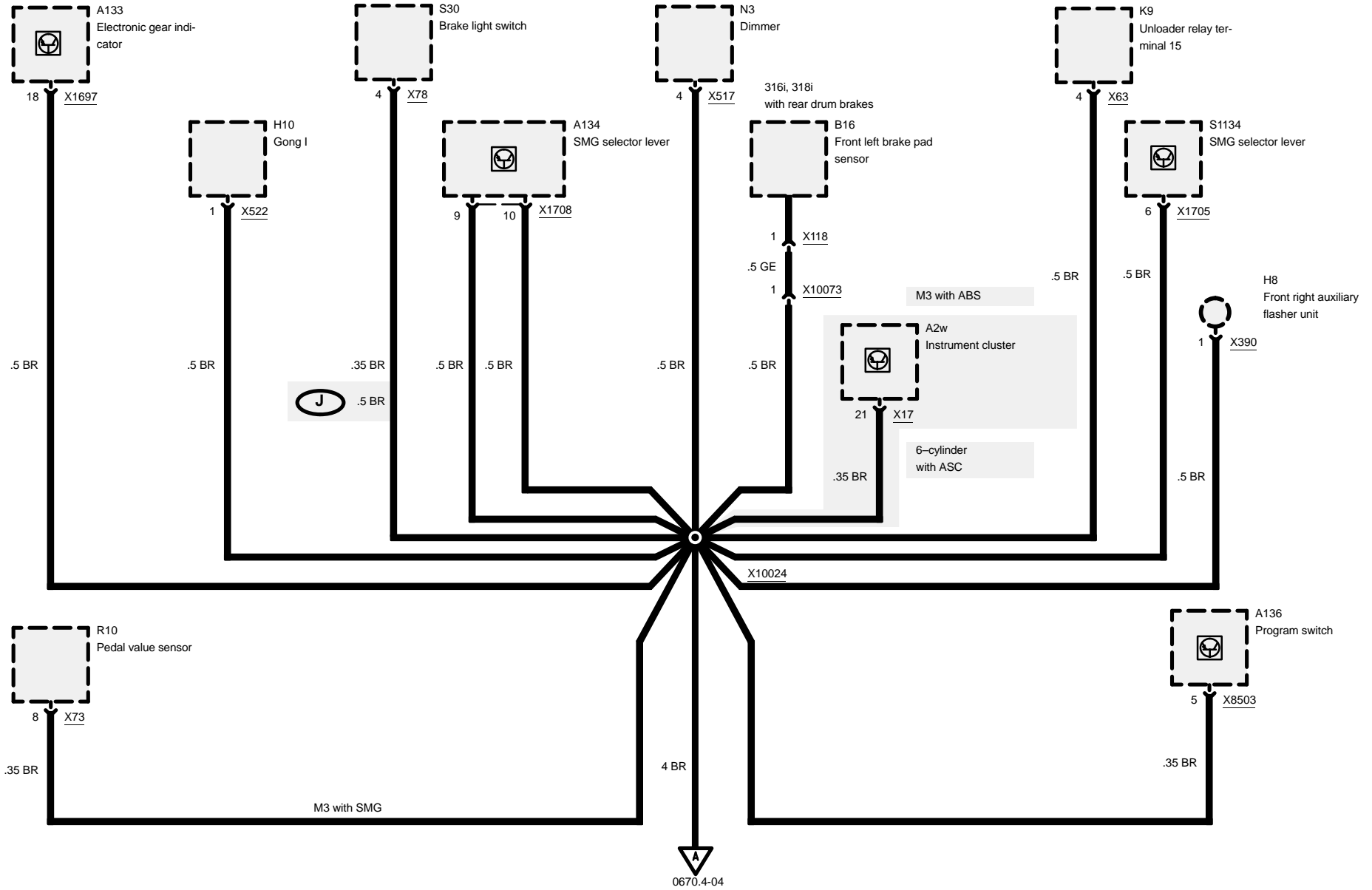






# Ground distribution

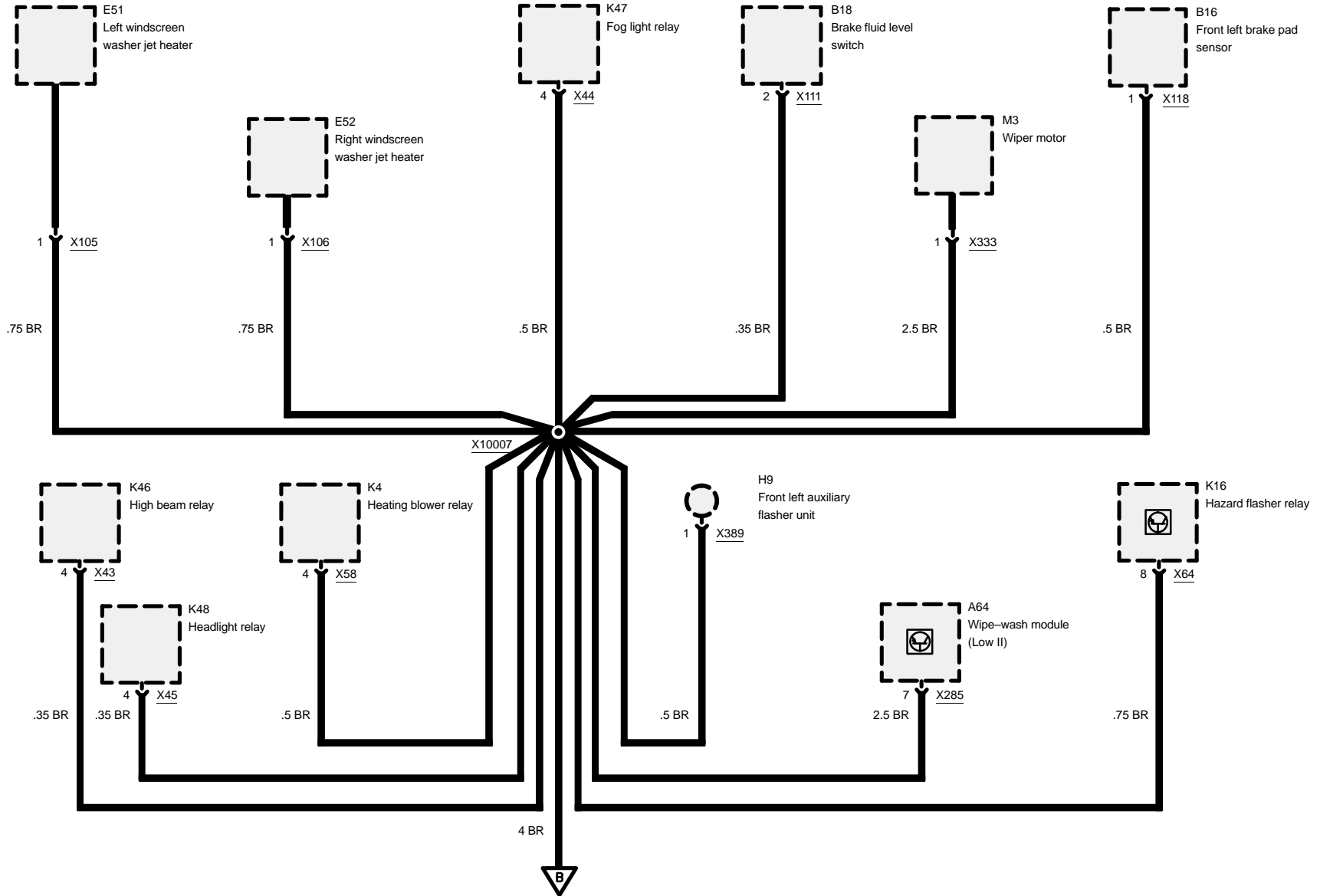
## Ground X173





# Ground distribution

## Ground X173

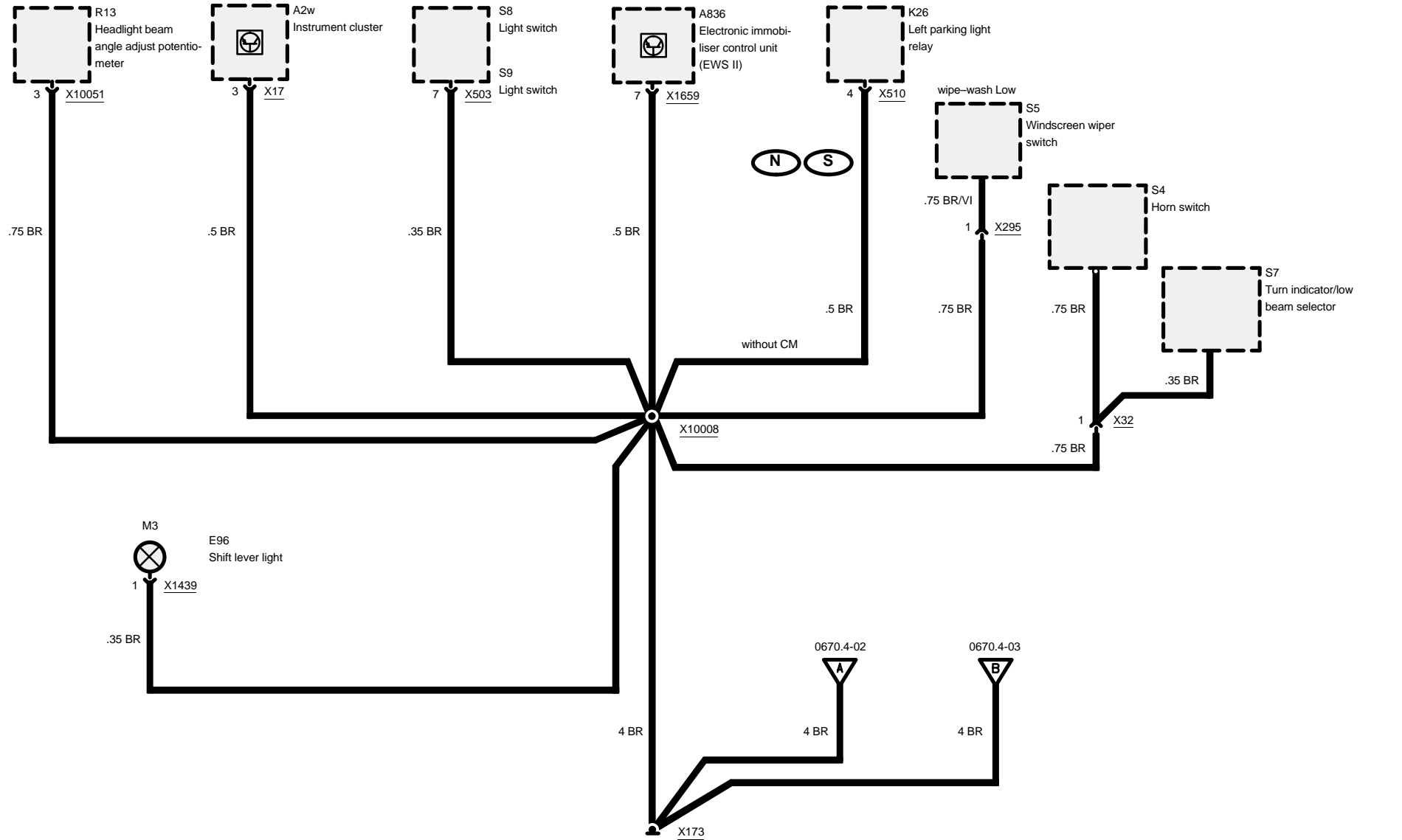


0670.4-04



# Ground distribution

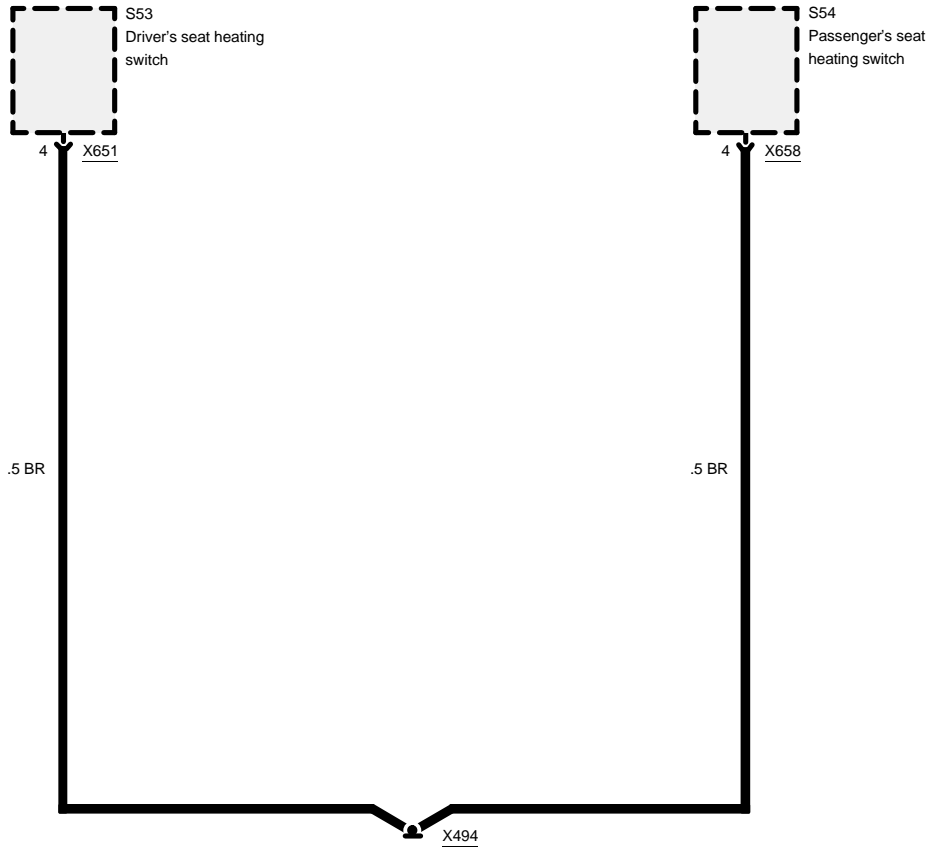
## Ground X173





# Ground distribution

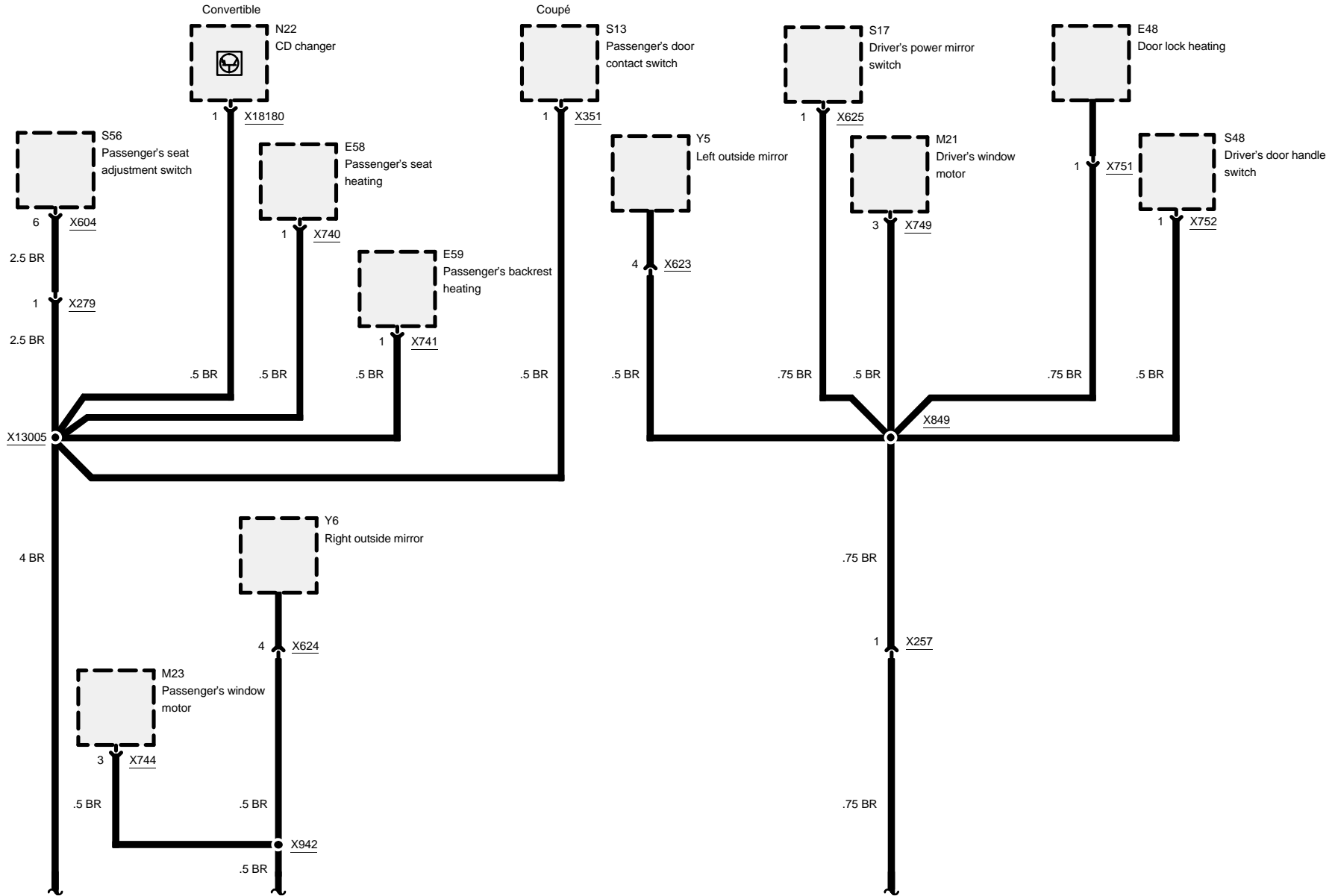
## Ground X494

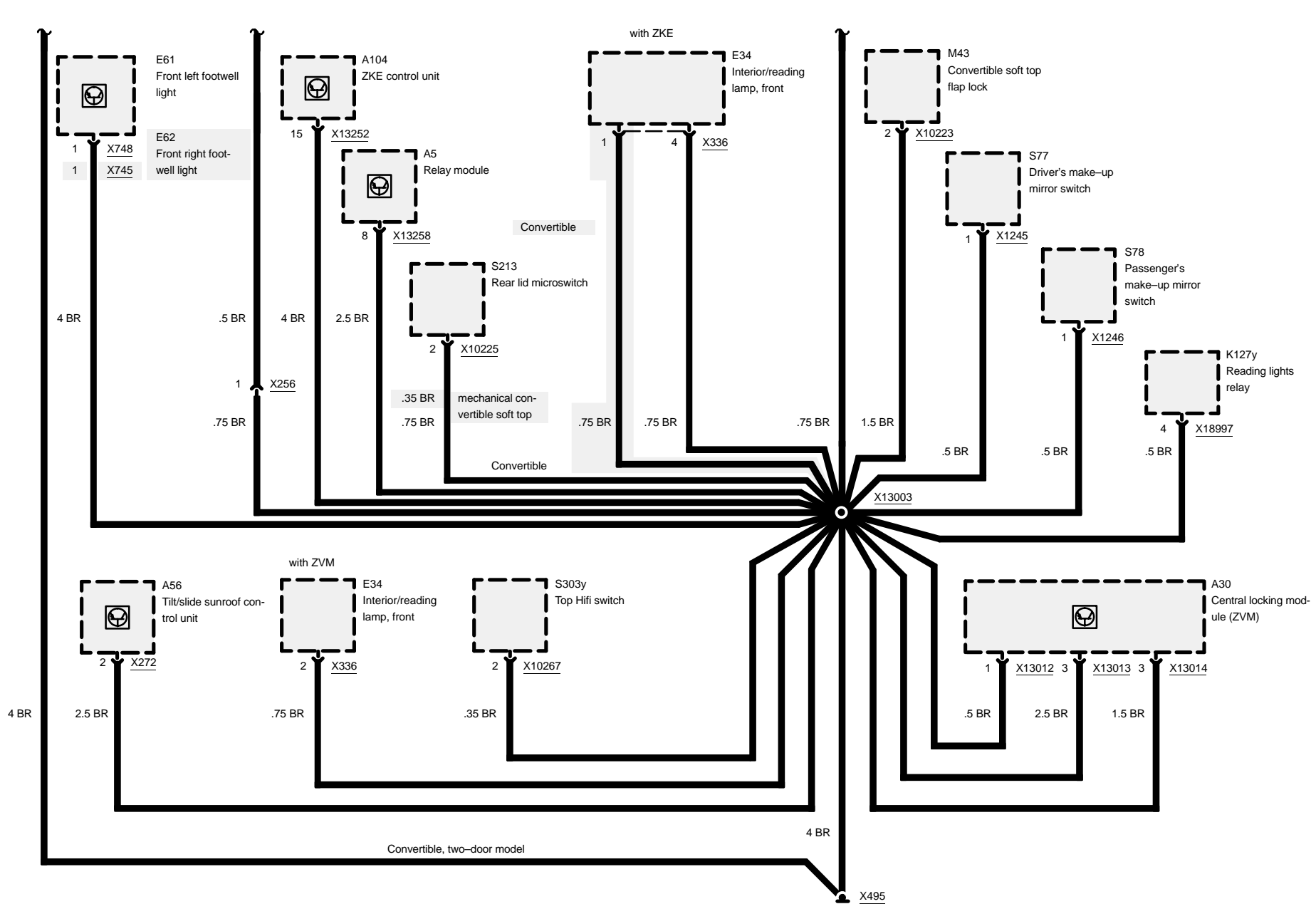




# Ground distribution

## Ground X495

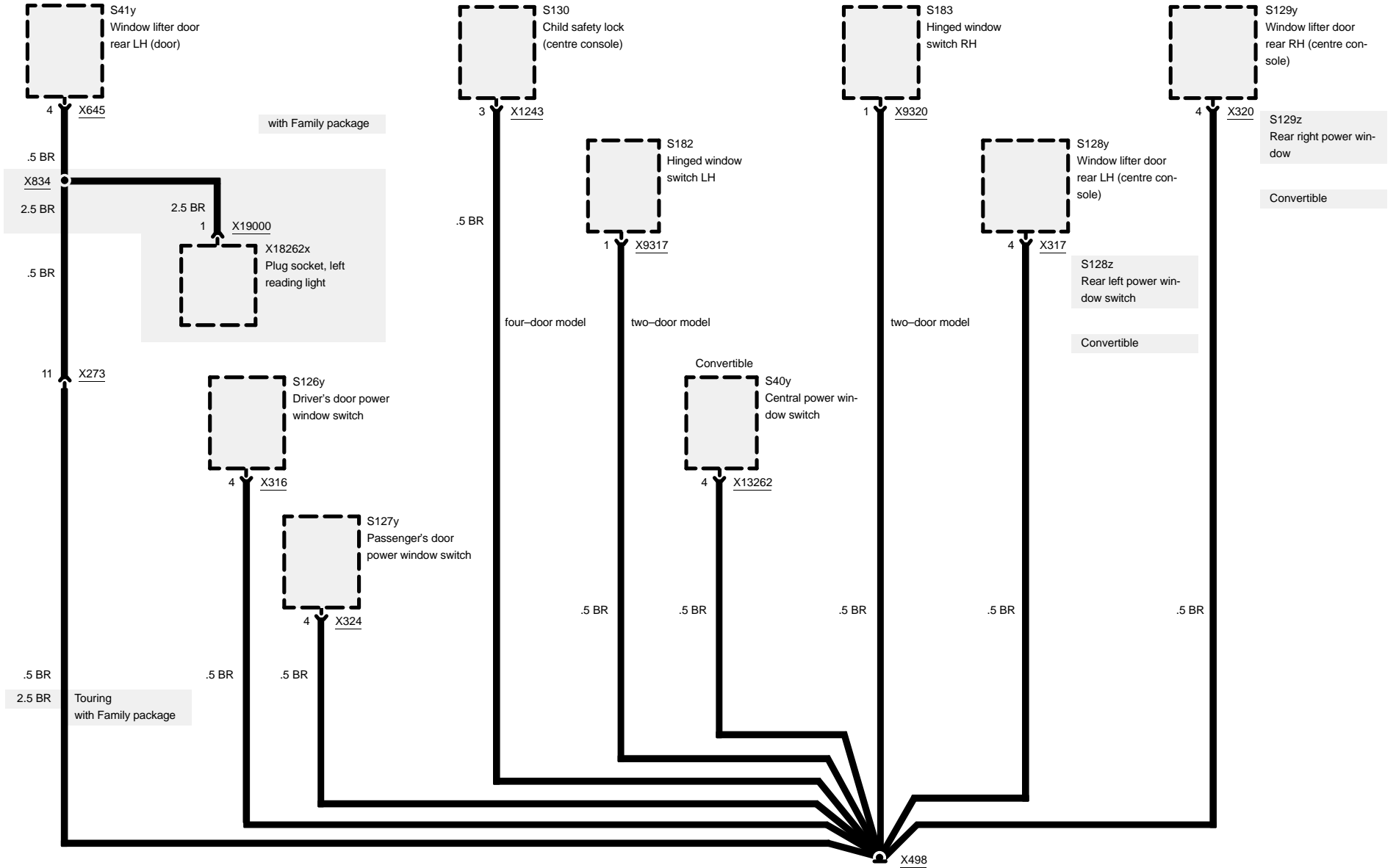






# Ground distribution

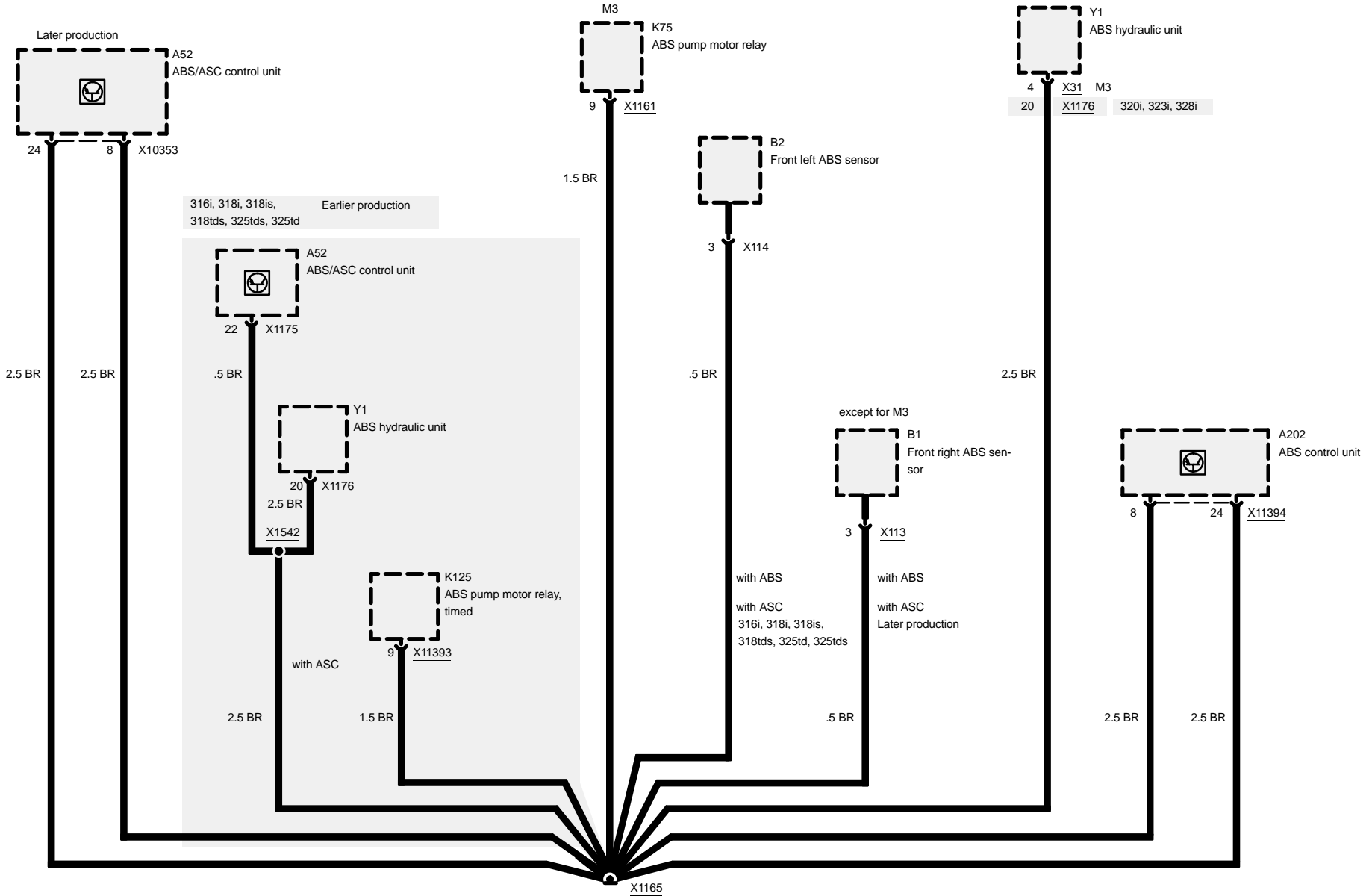
## Ground X498





# Ground distribution

## Ground X1165

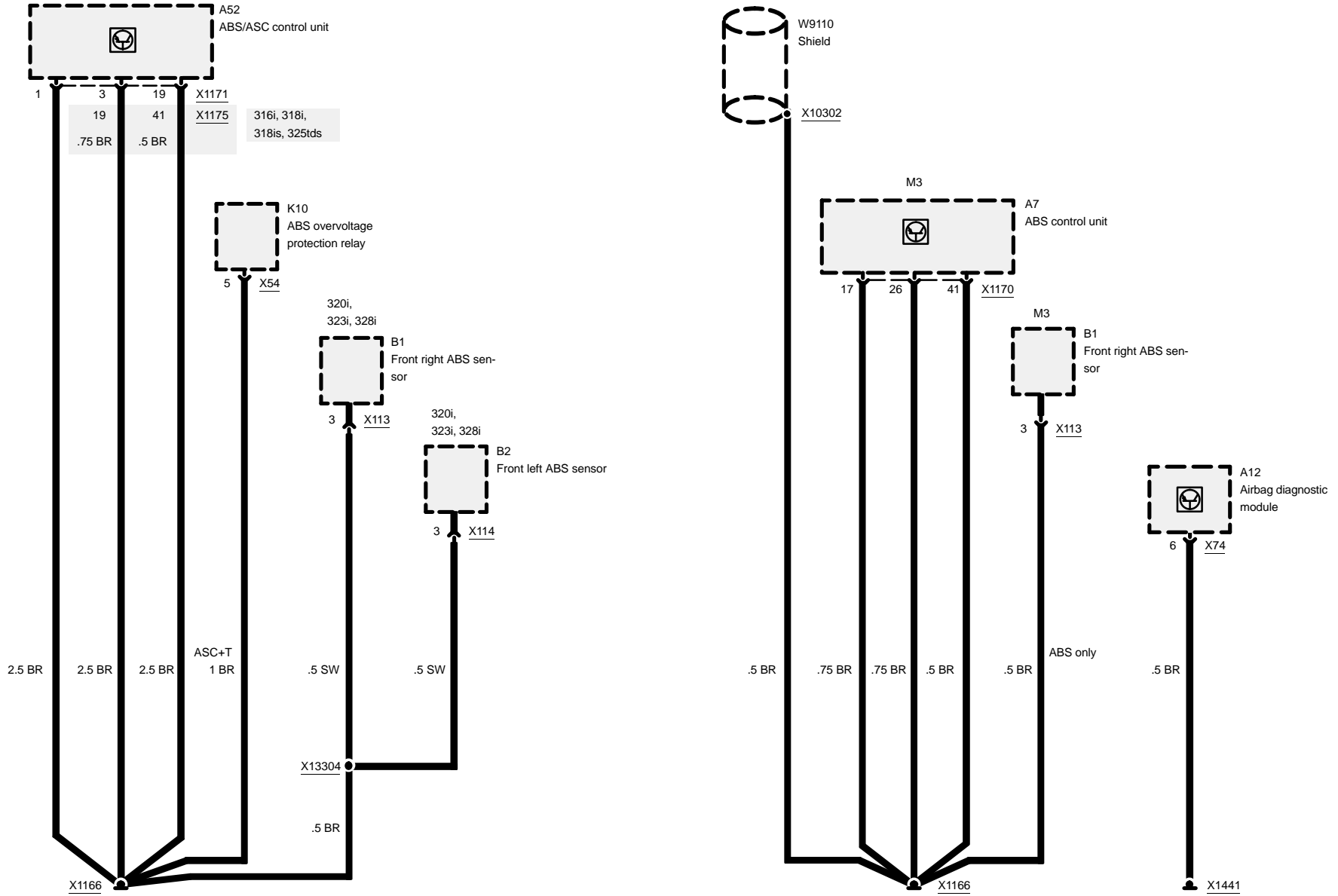






# Ground distribution

## Ground X1166 and X1441

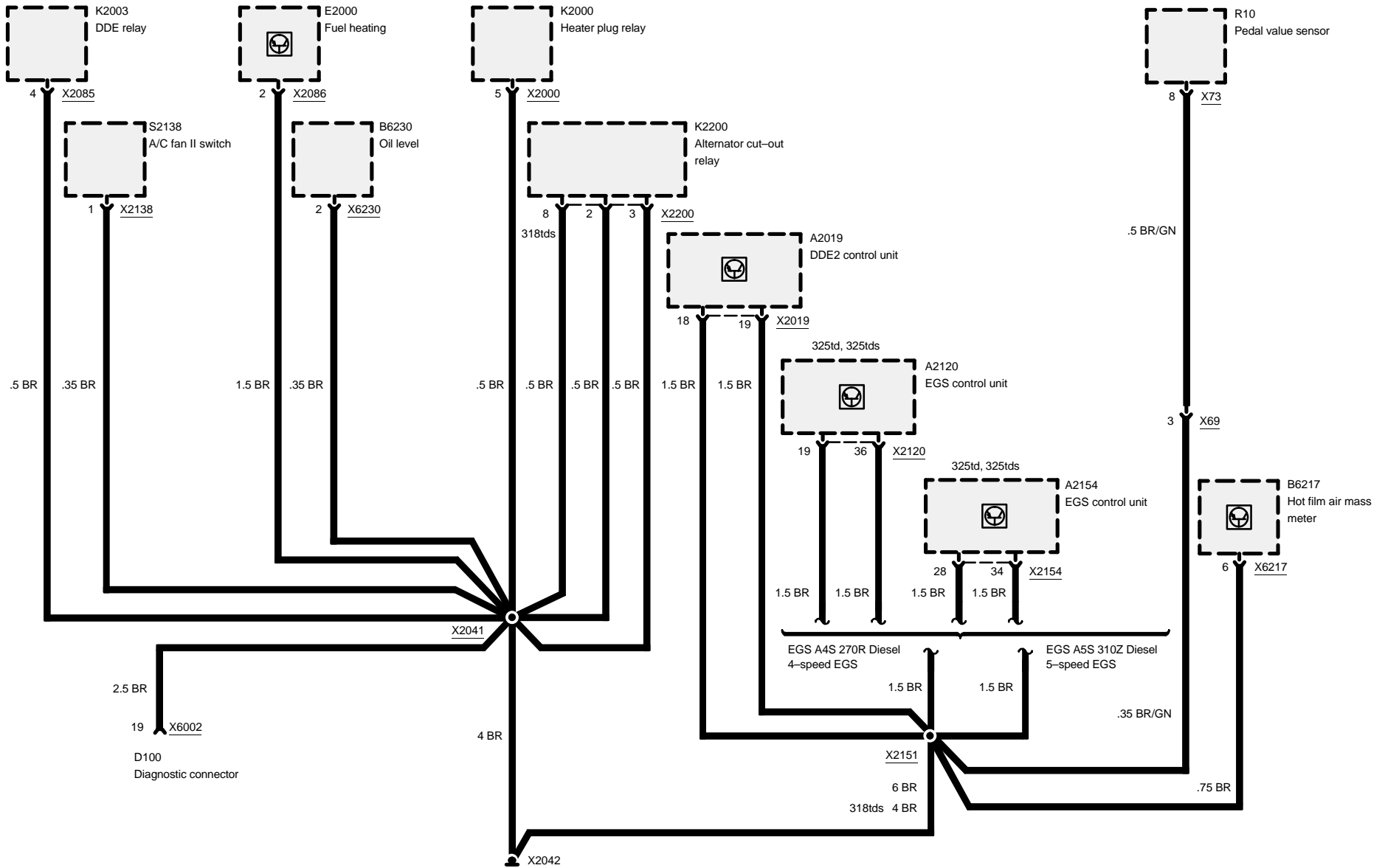




# Ground distribution

## 318tds, 325td, 325tds

### Ground X2042

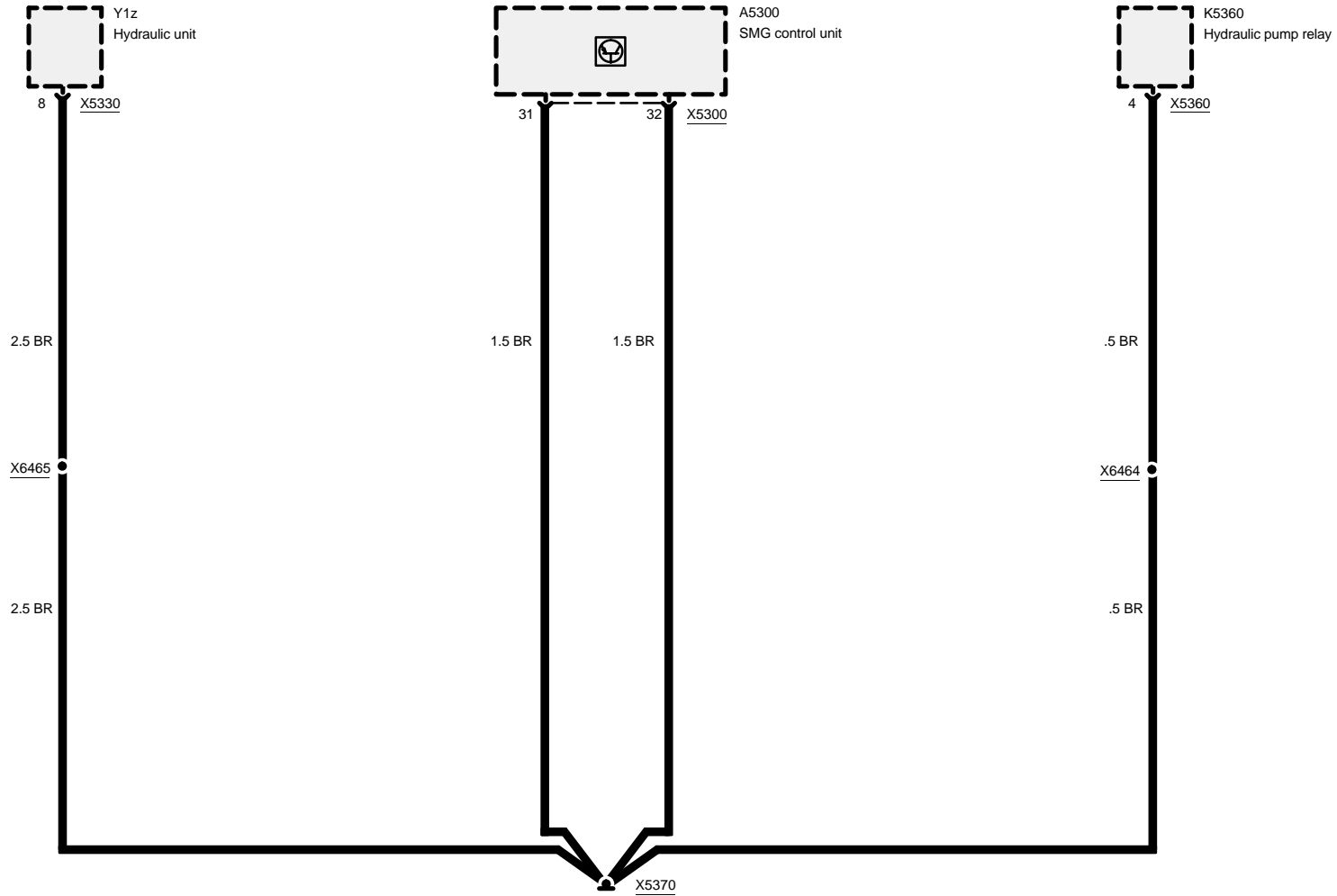




# Ground distribution

M3 with SMG

## Ground X5370

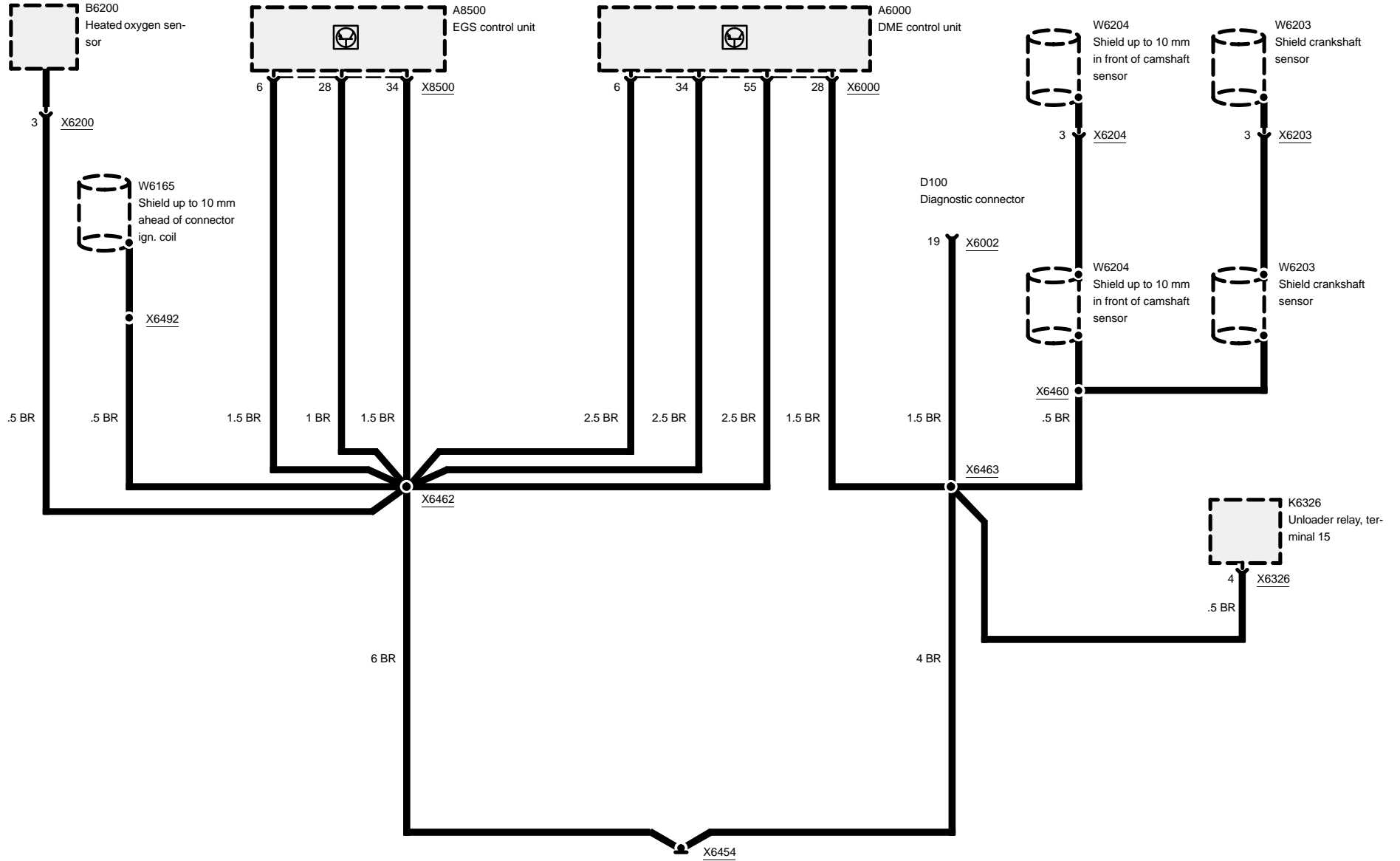




# Ground distribution

316i, 318i

## Ground X6454

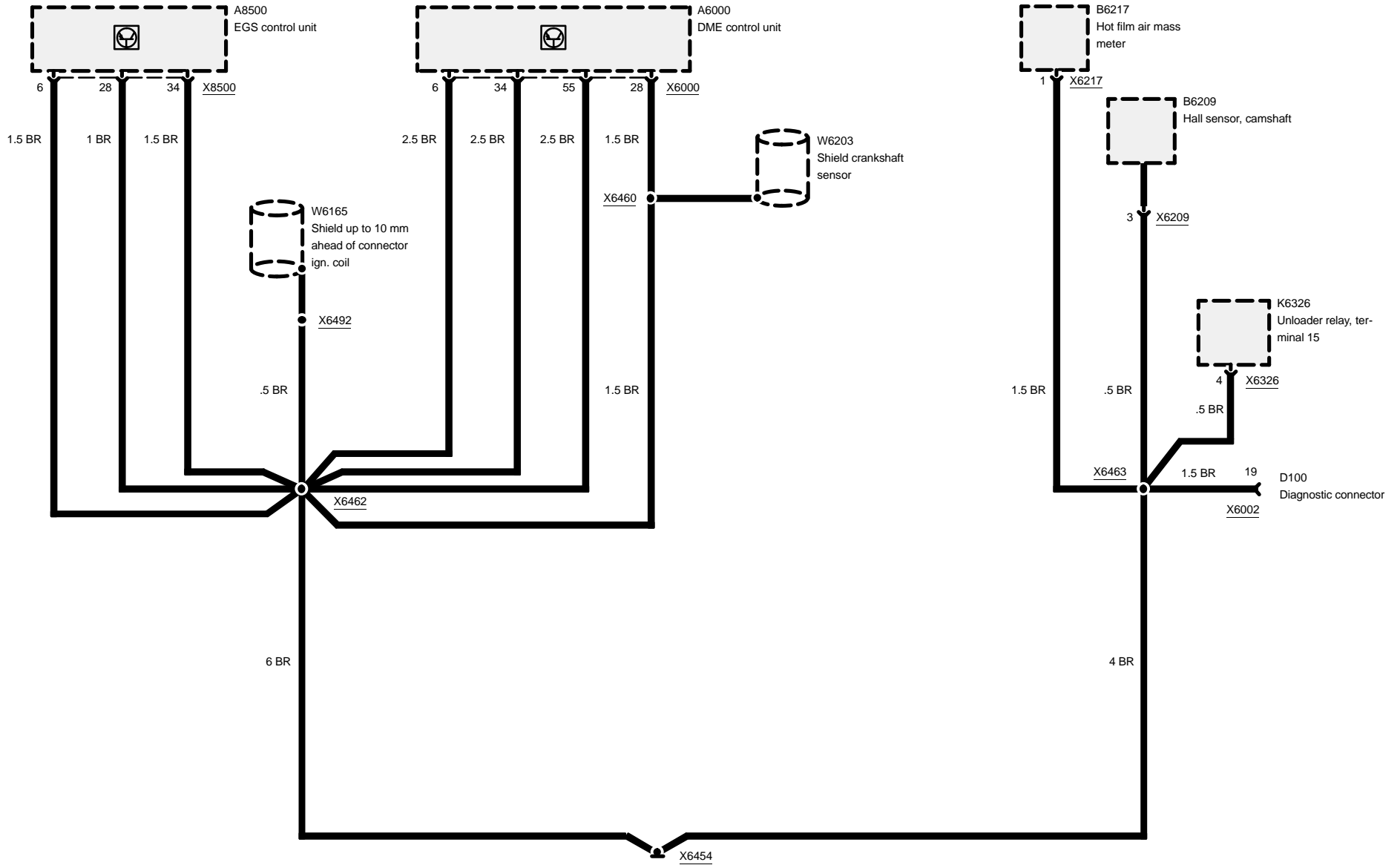




# Ground distribution

318is

## Ground X6454

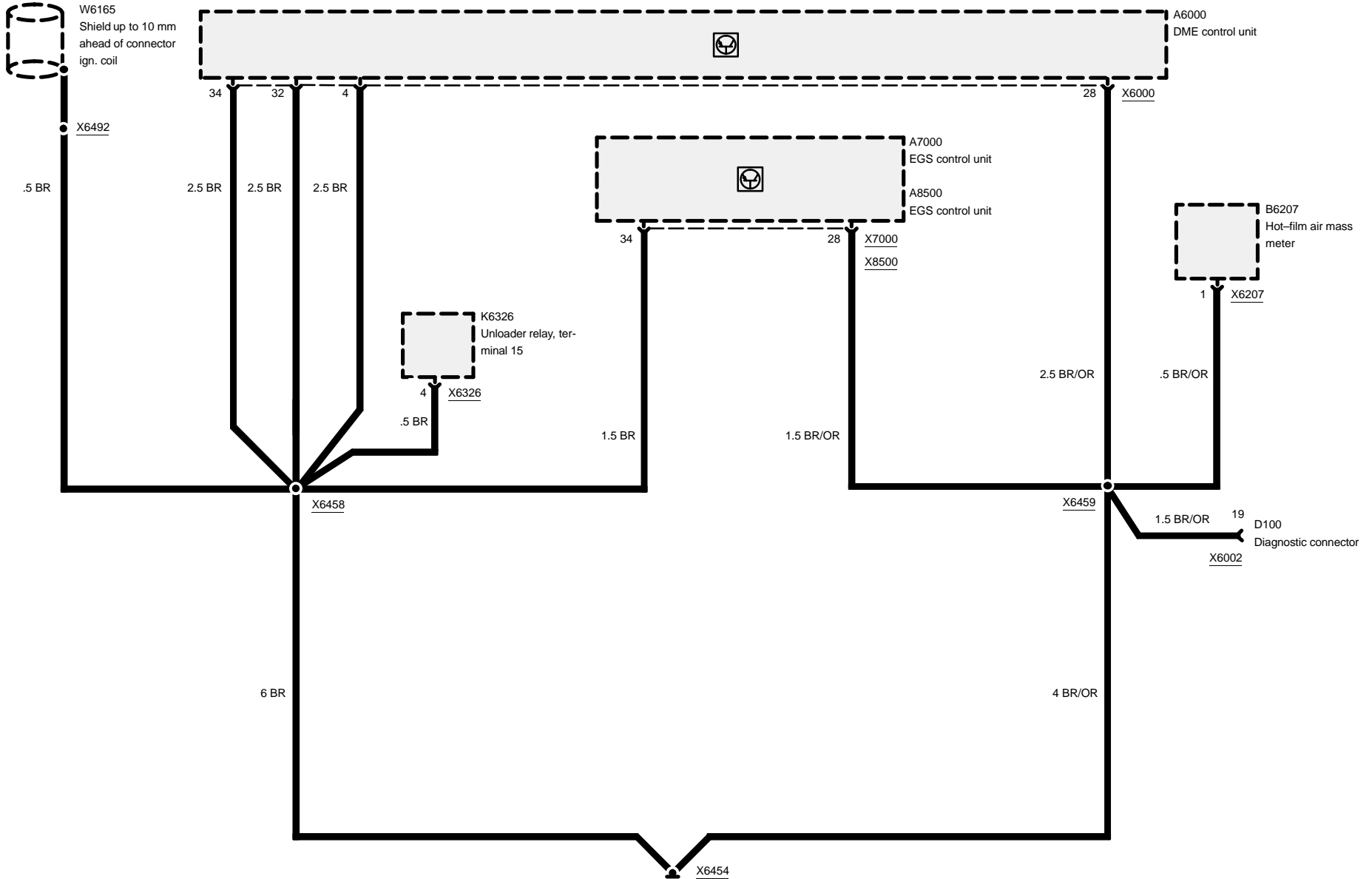




# Ground distribution

320i, 323i, 328i

## Ground X6454

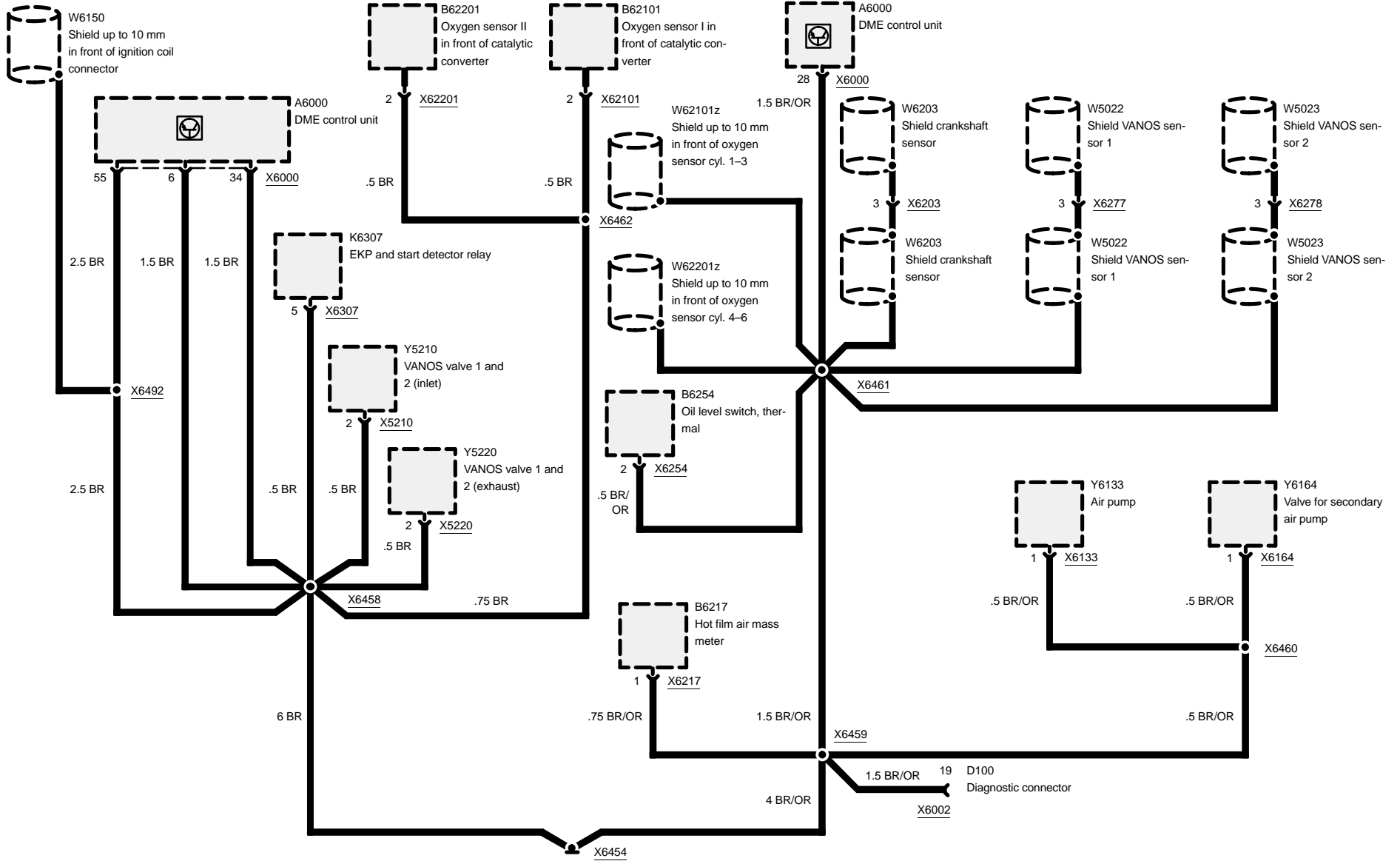




# Ground distribution

## Ground X6454

M3

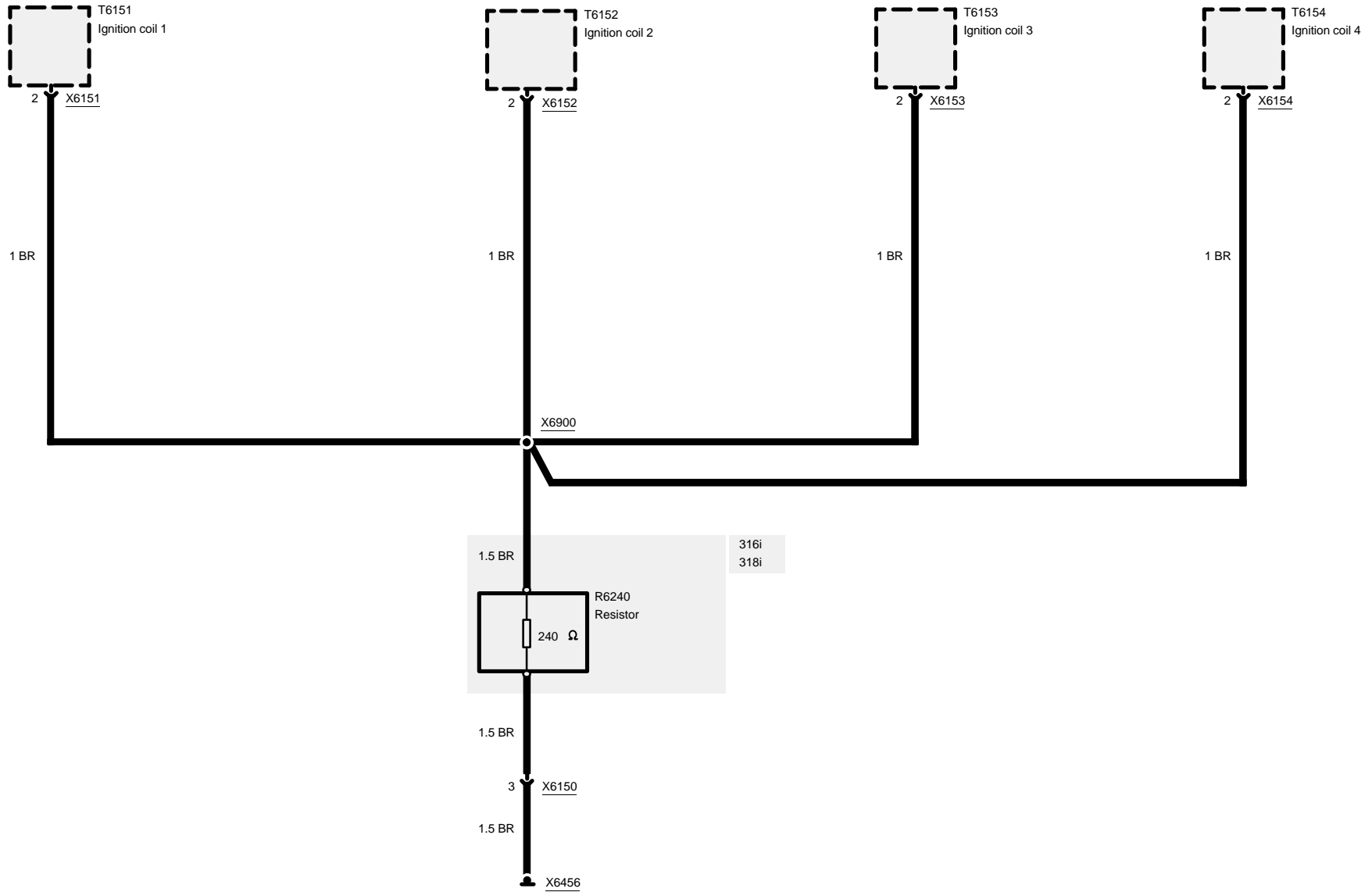




# Ground distribution

316i, 318i, 318is

## Ground X6456



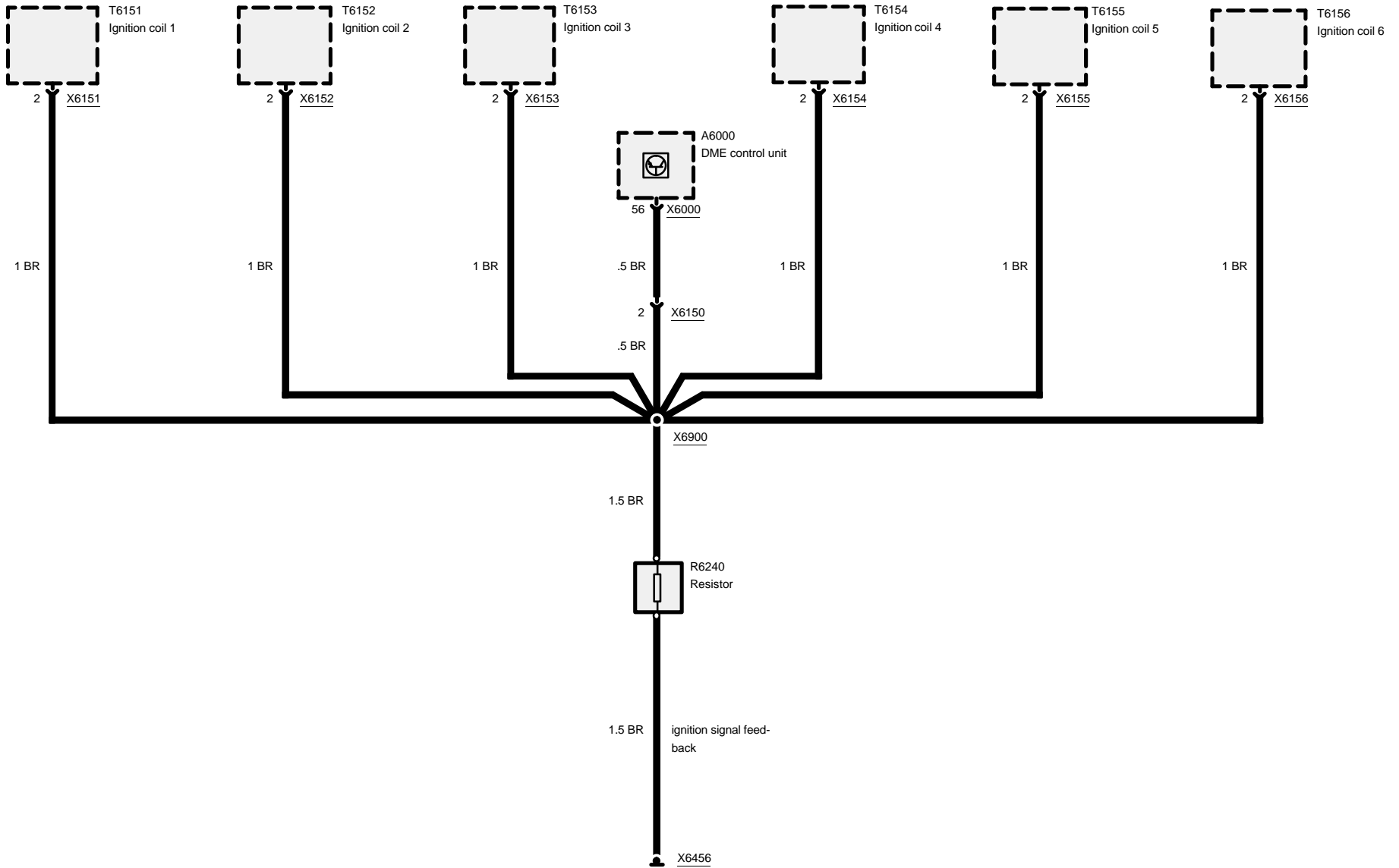




# Ground distribution

320i, 323i, 328i

## Ground X6456

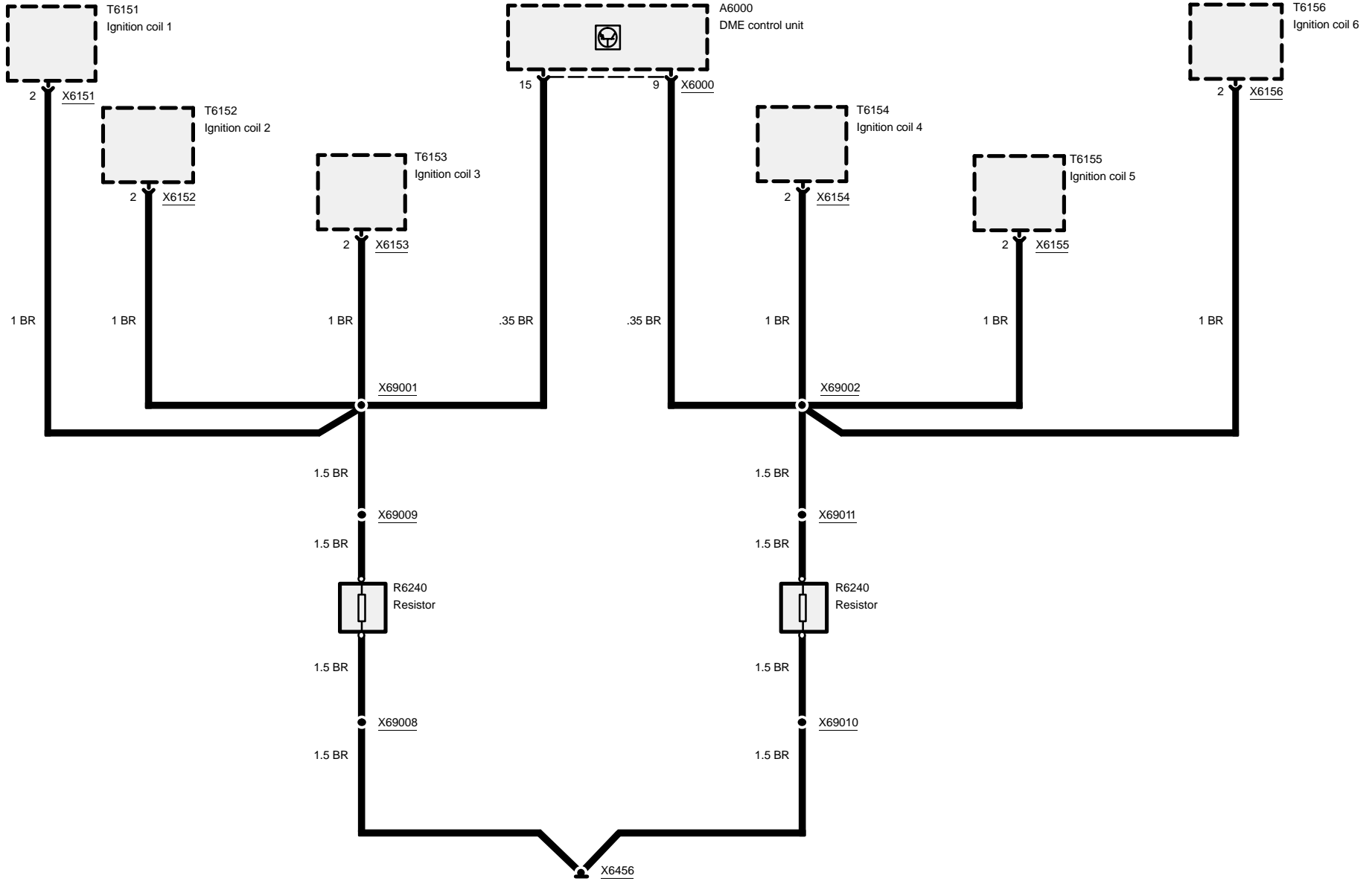




# Ground distribution

M3

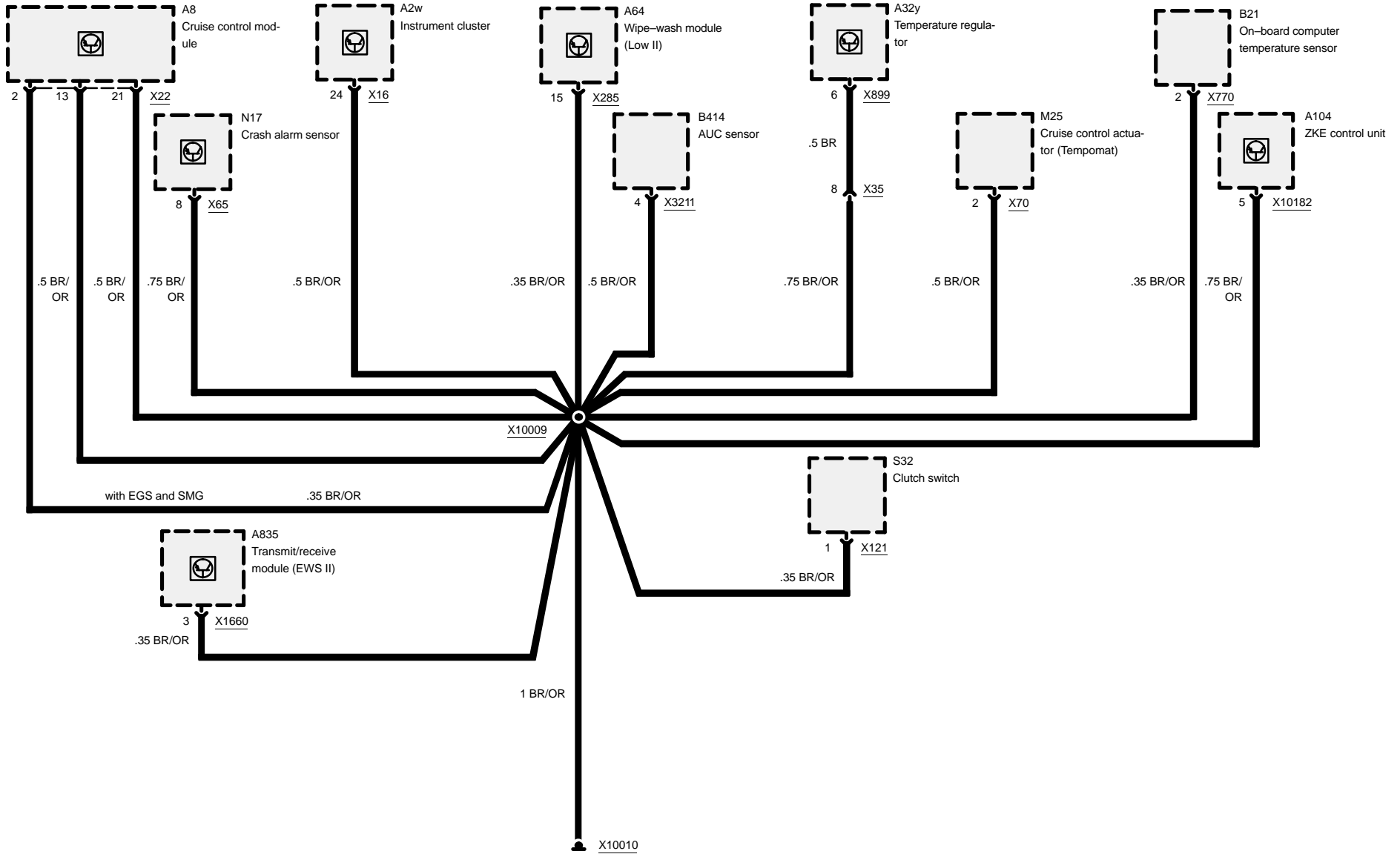
## Ground X6456





# Ground distribution

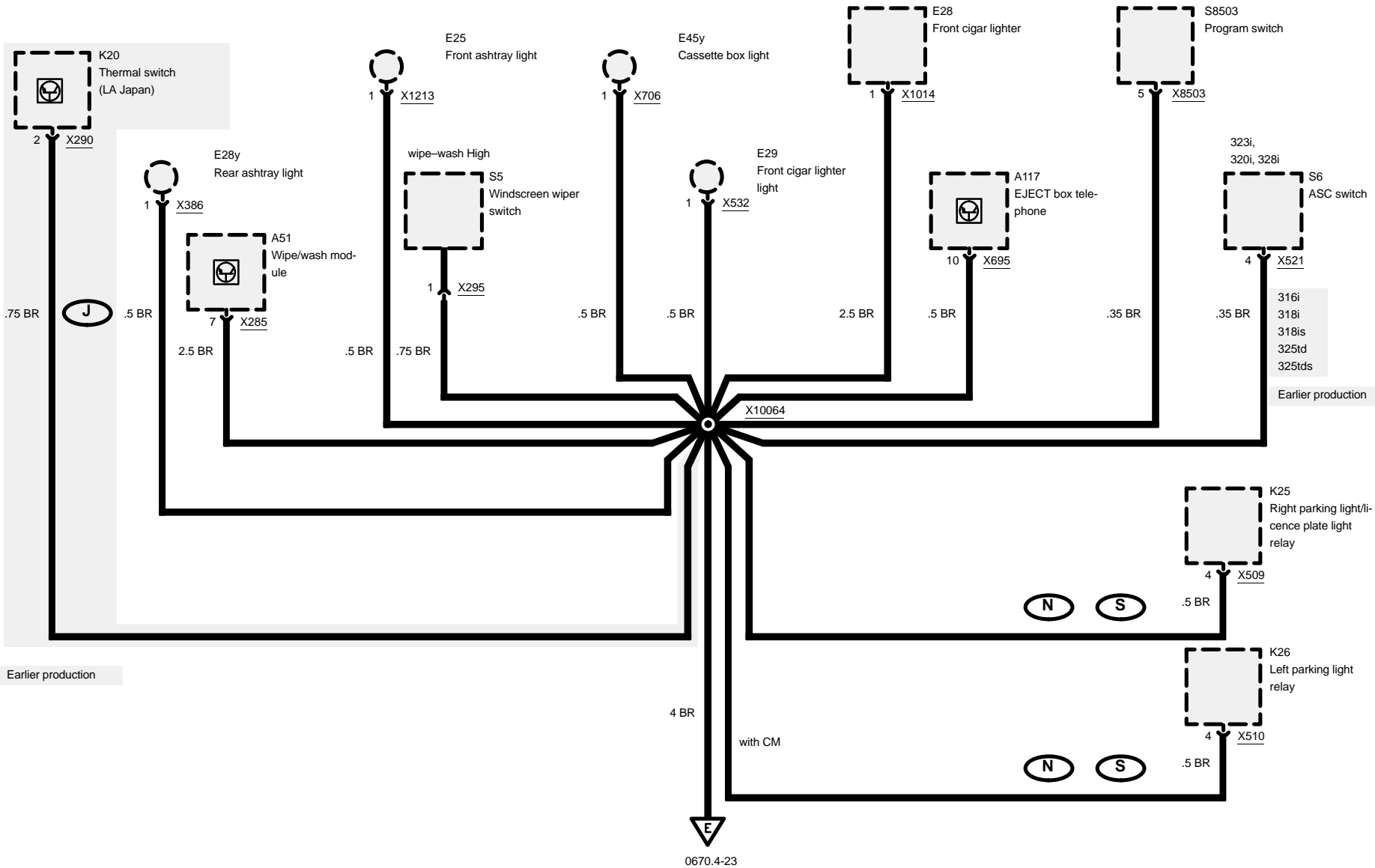
## Ground X10010





# Ground distribution

## Ground X10012

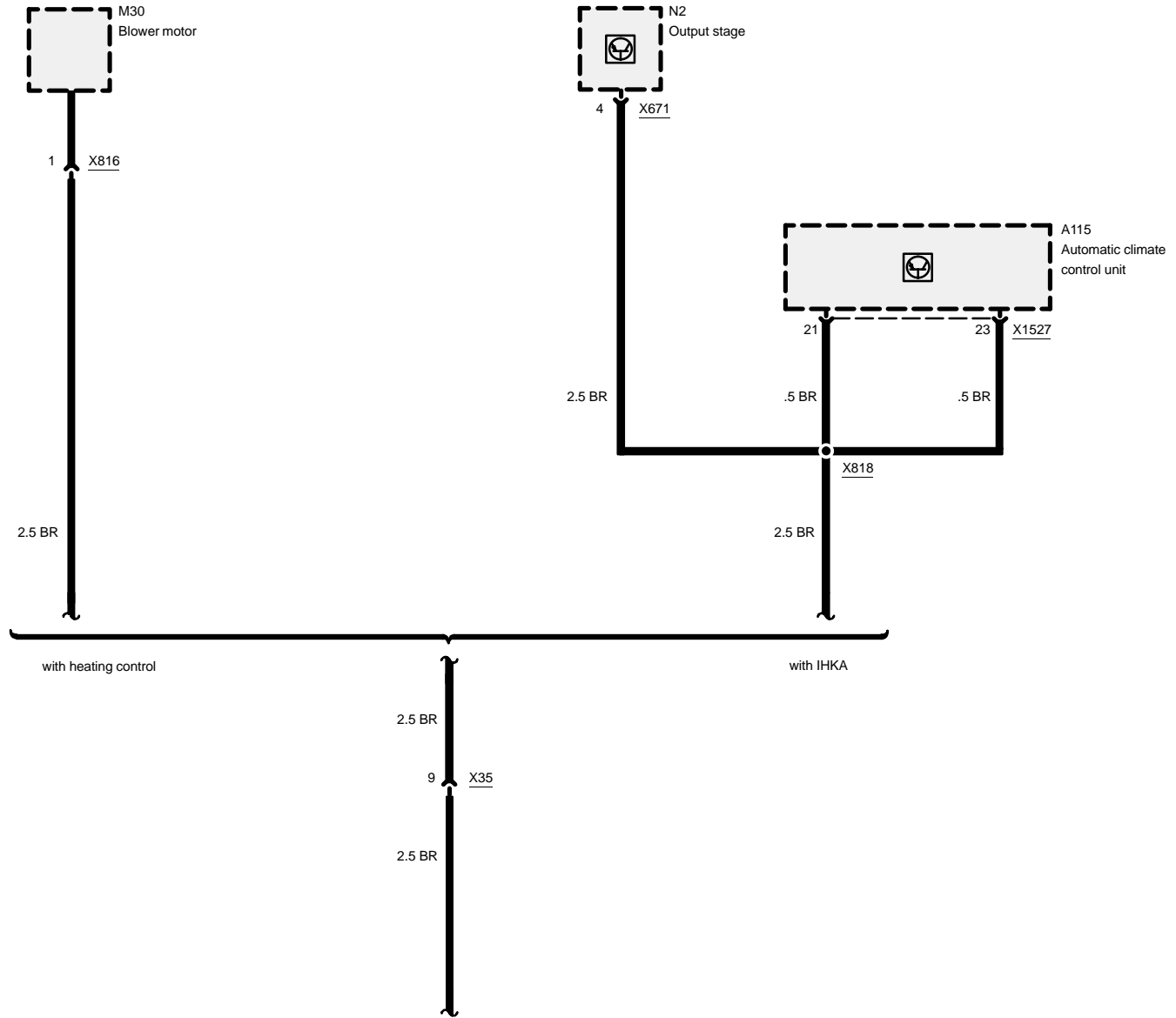


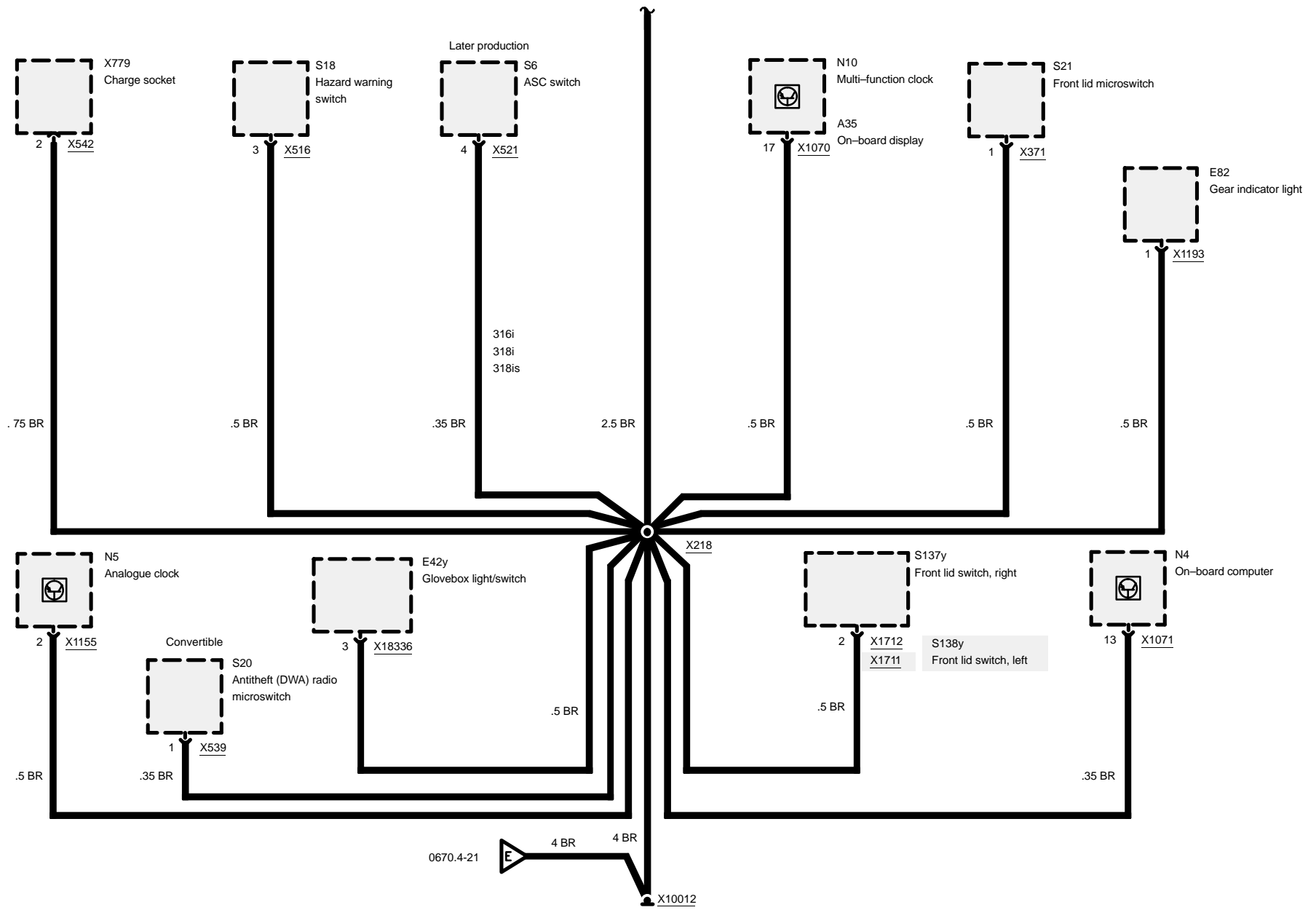
0670.4-23



# Ground distribution

## Ground X10012





0670.4-21



4 BR

4 BR

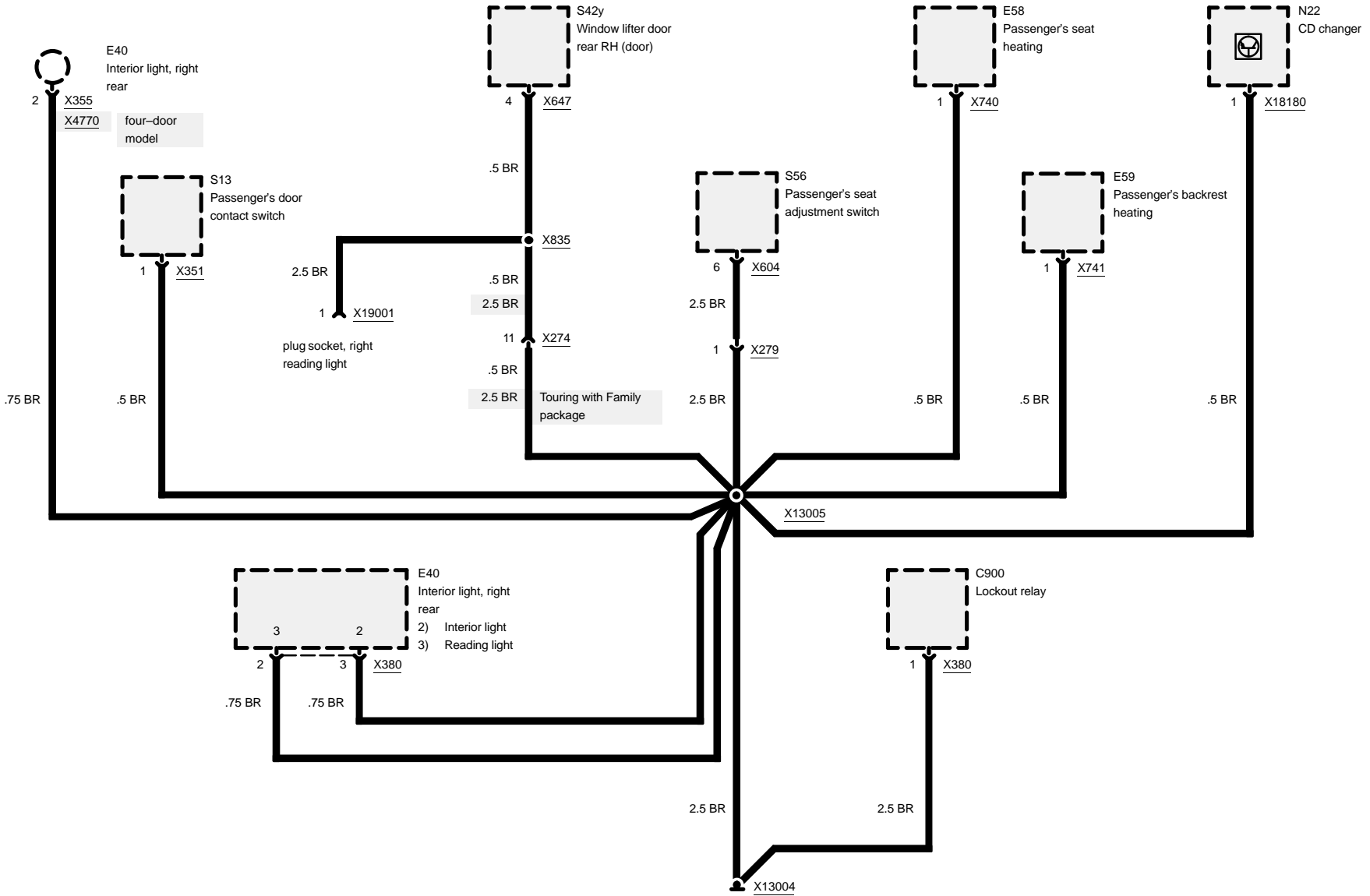
X10012



# Ground distribution

## Ground X13004

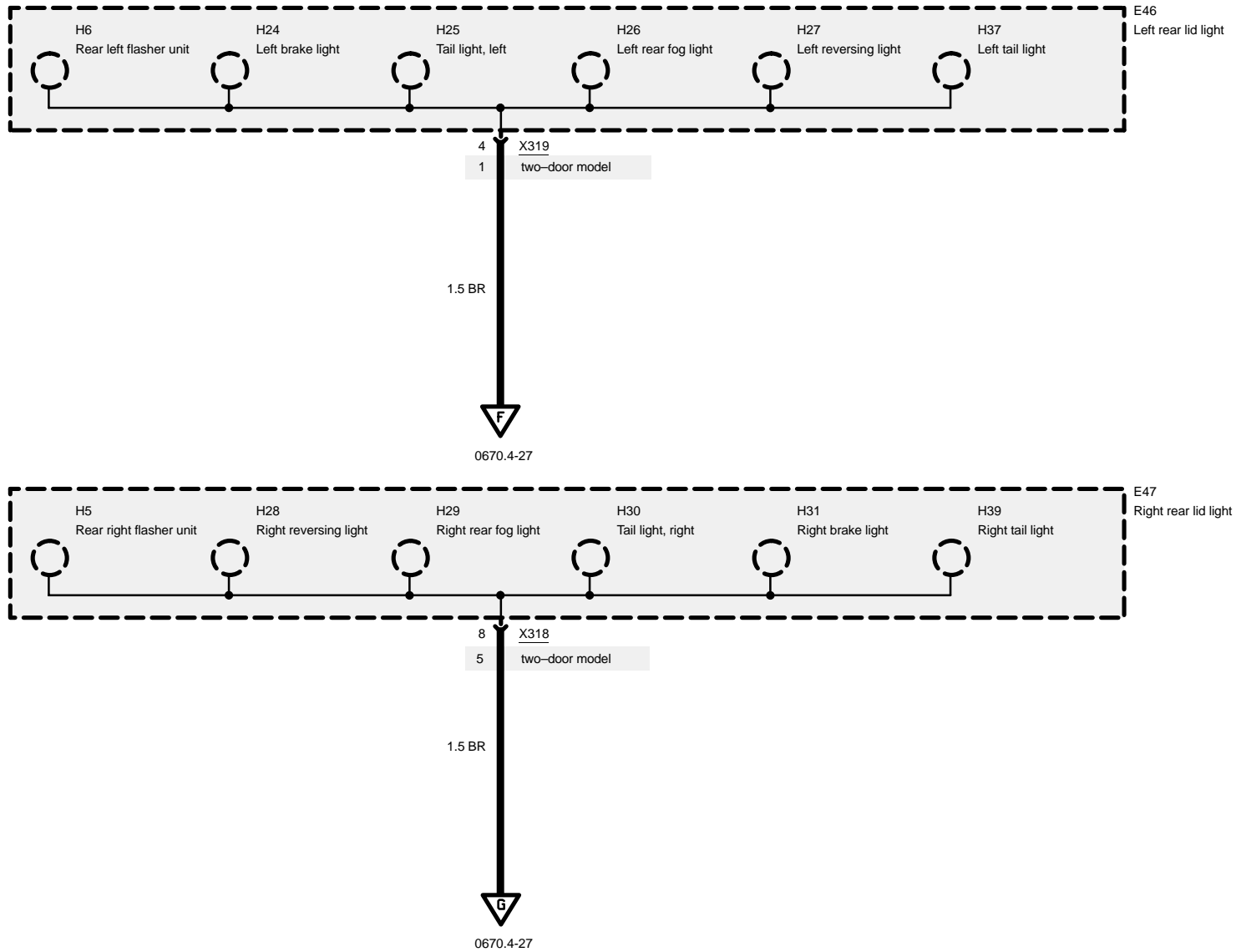
### Four-door model





# Ground distribution

## Ground X13006

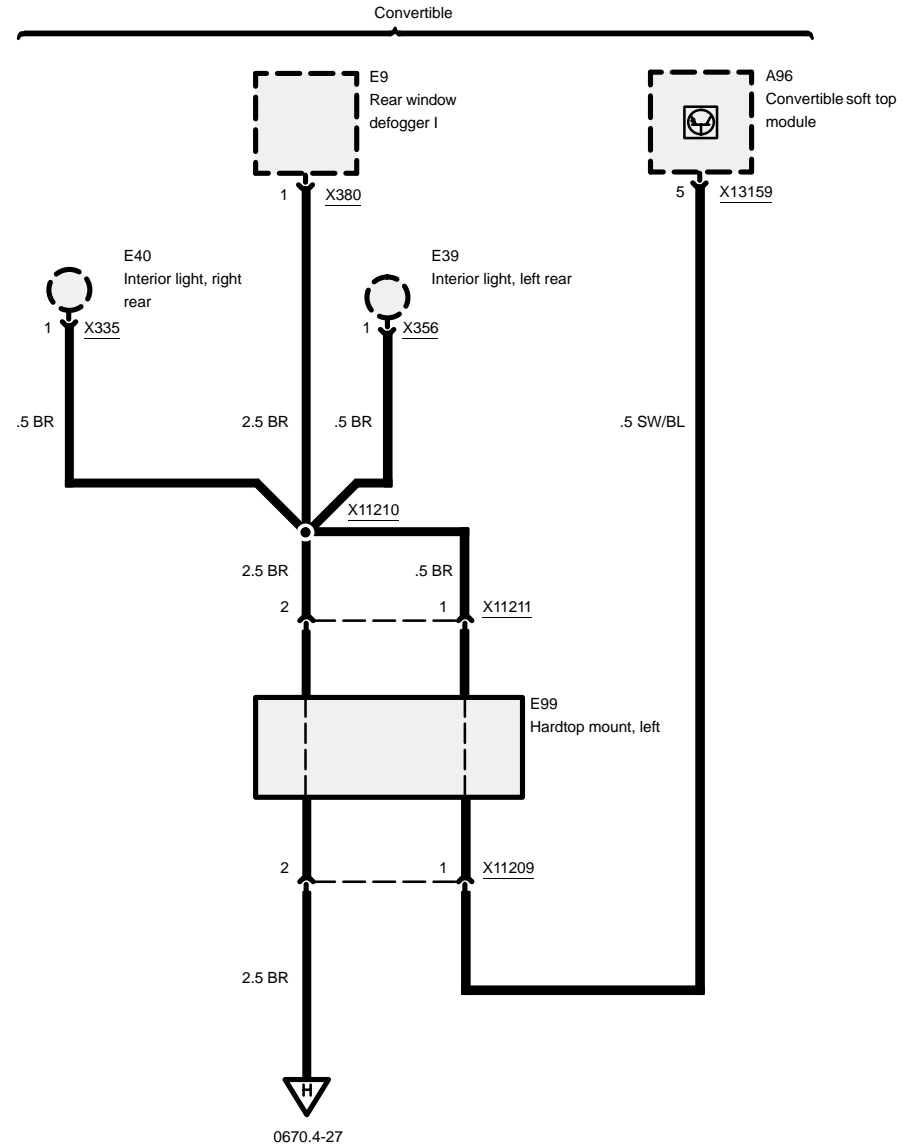
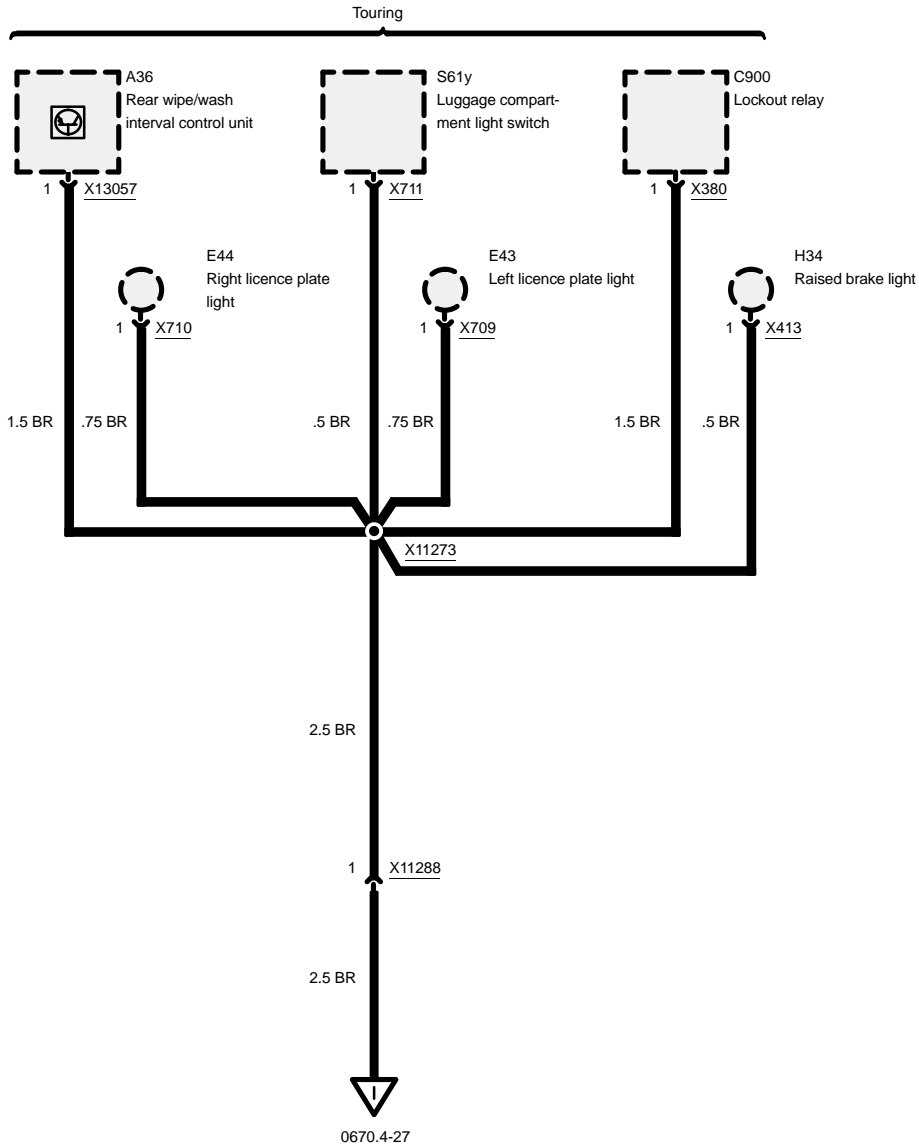






# Ground distribution

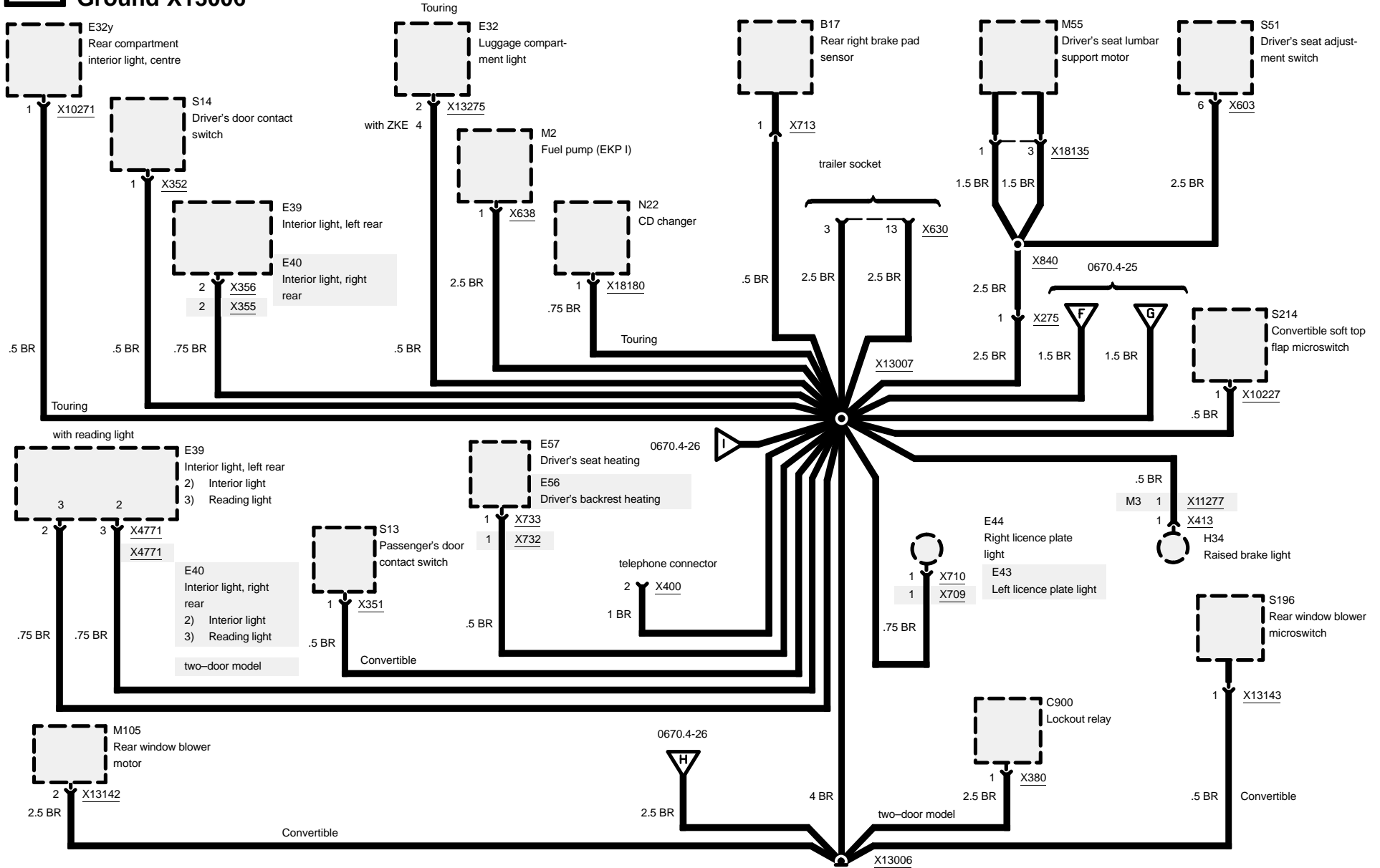
## Ground X13006





# Ground distribution

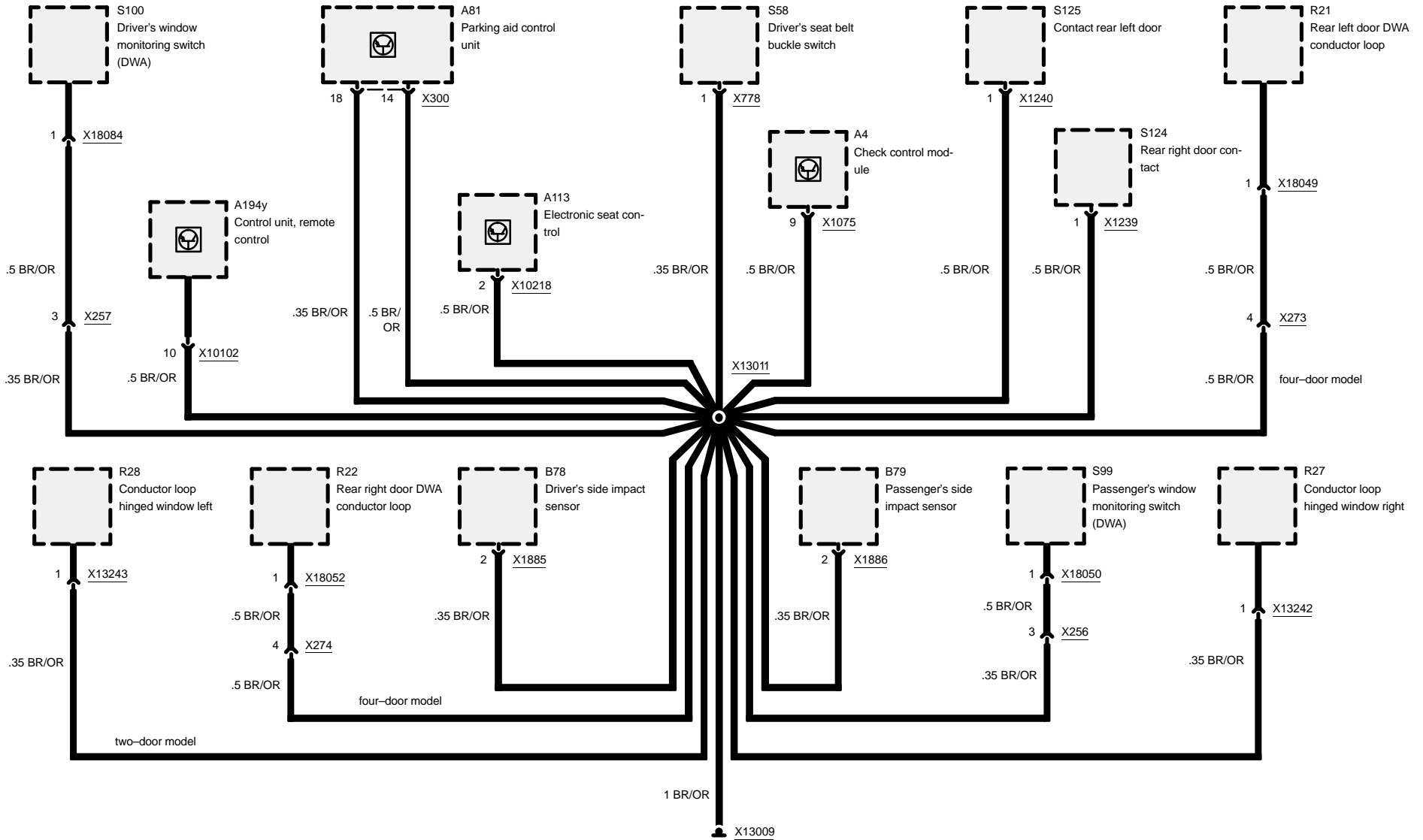
## Ground X13006





# Ground distribution

## Ground X13009

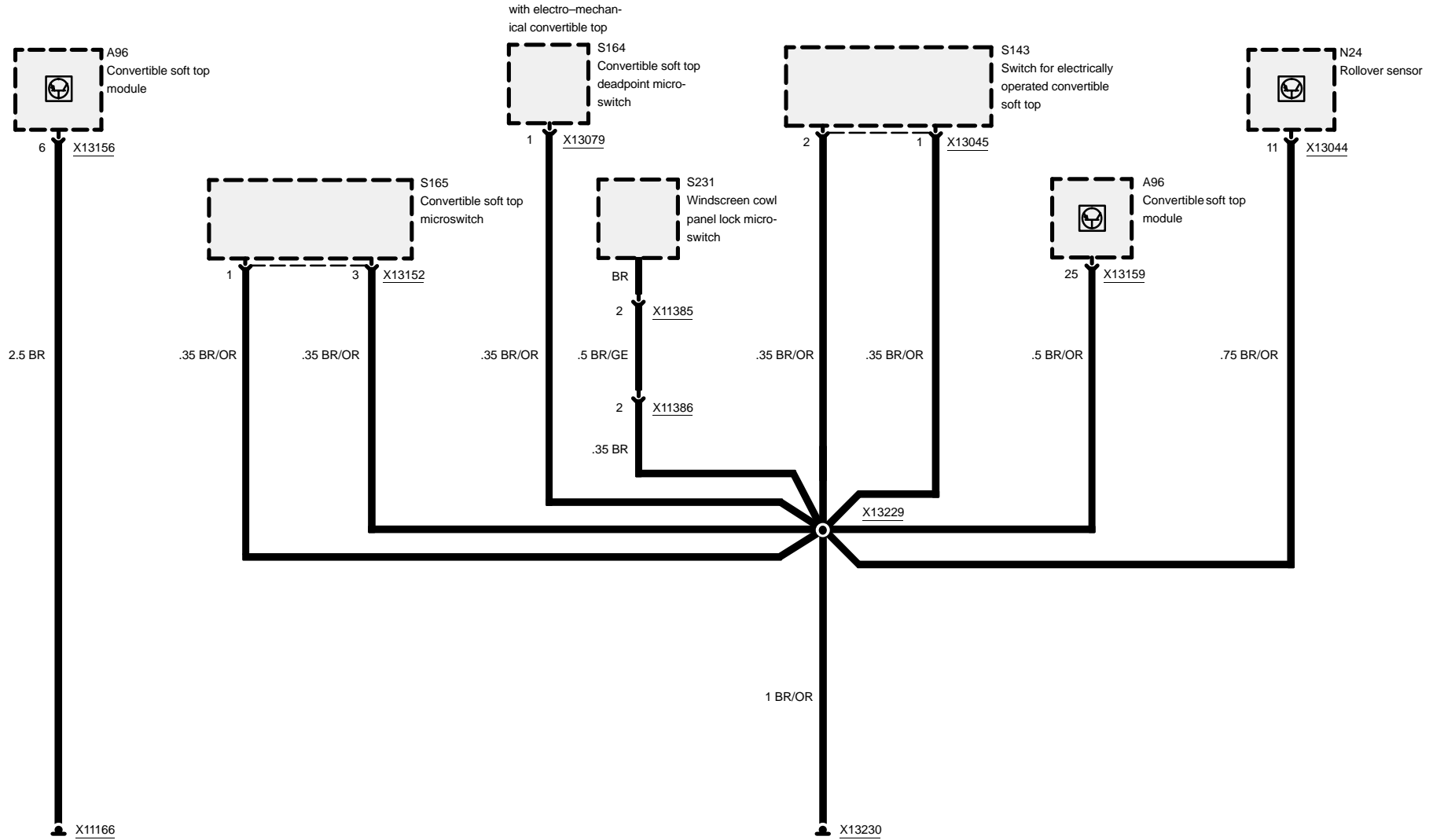




# Ground distribution

## Ground X11166 and X13230

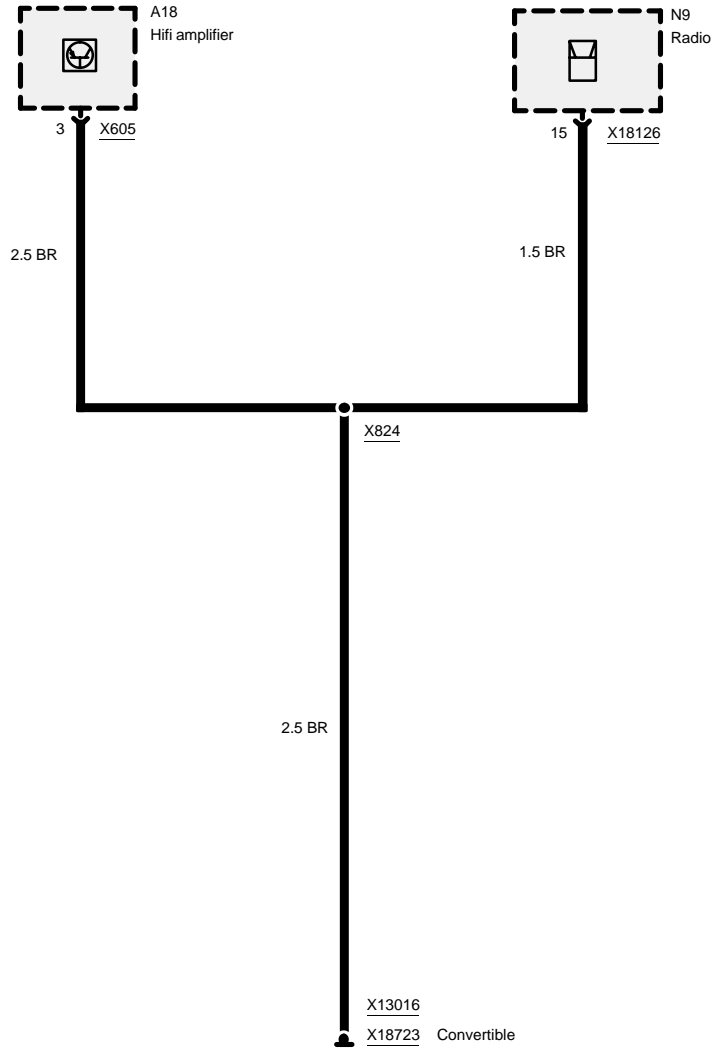
# Convertible





# Ground distribution

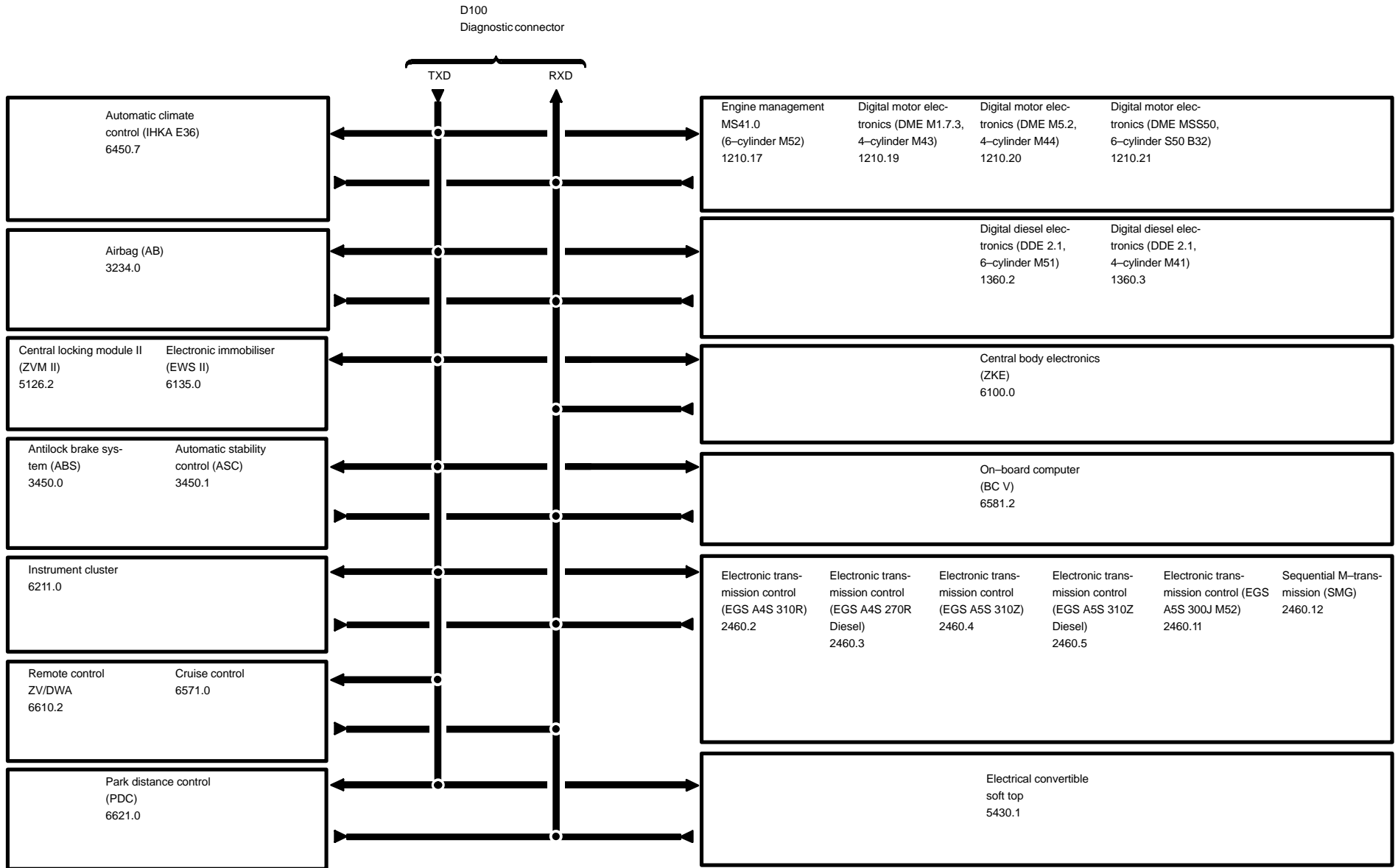
Ground X13016 and X18723





# 0670.5 Diagnostic link

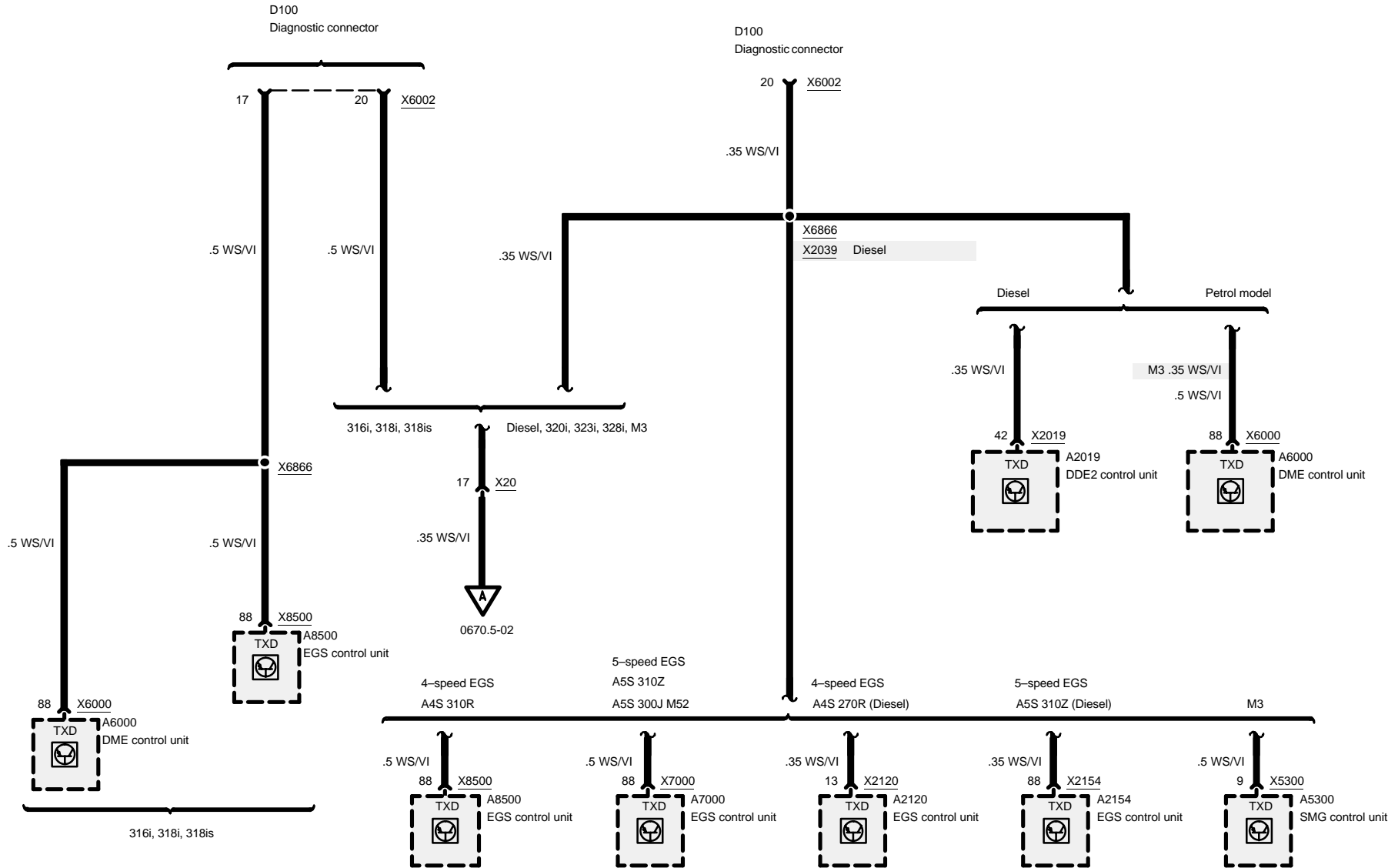
## Block diagram





# Diagnostic link

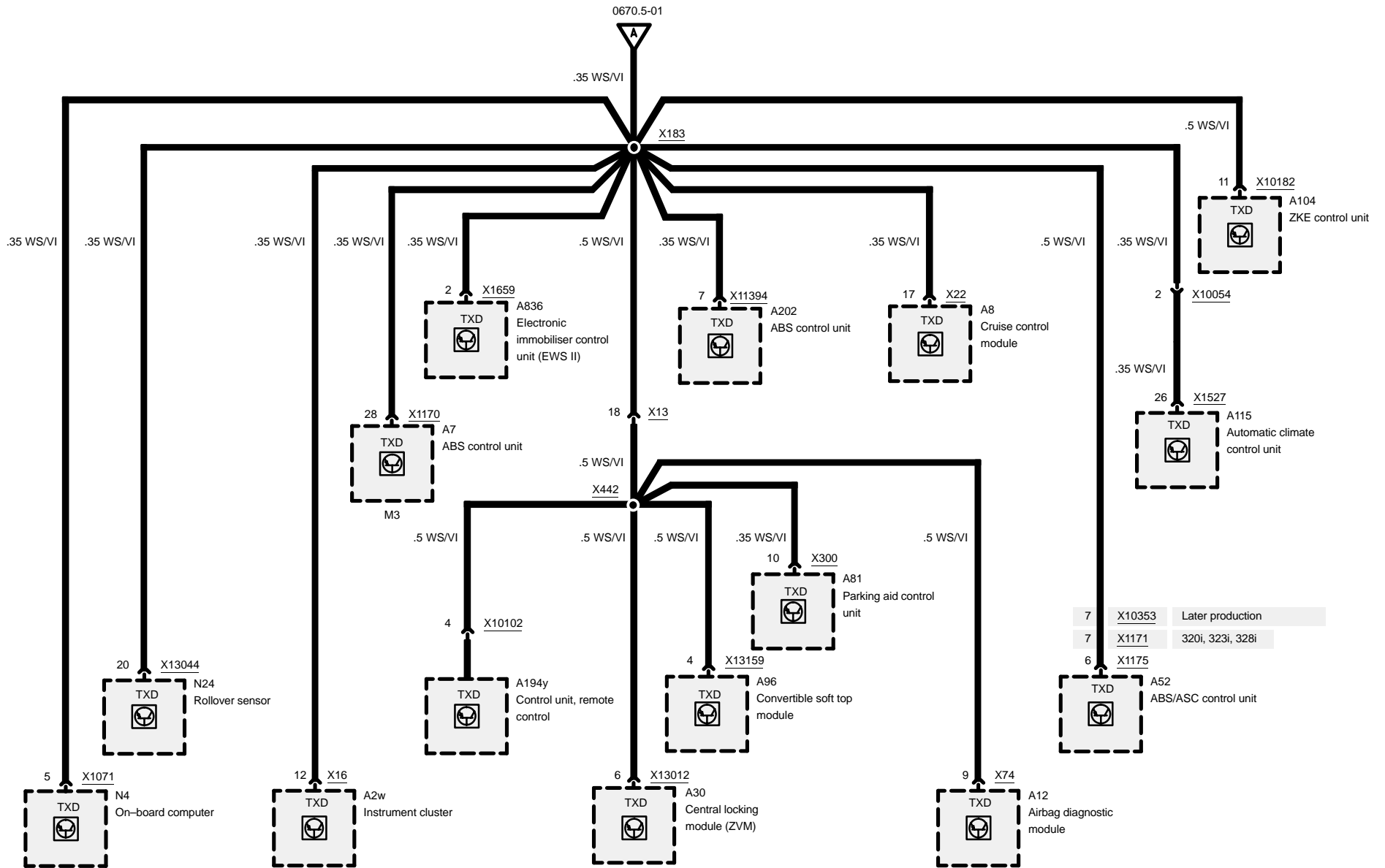
## TXD, Pins 17 and 20





# Diagnostic link

## TXD

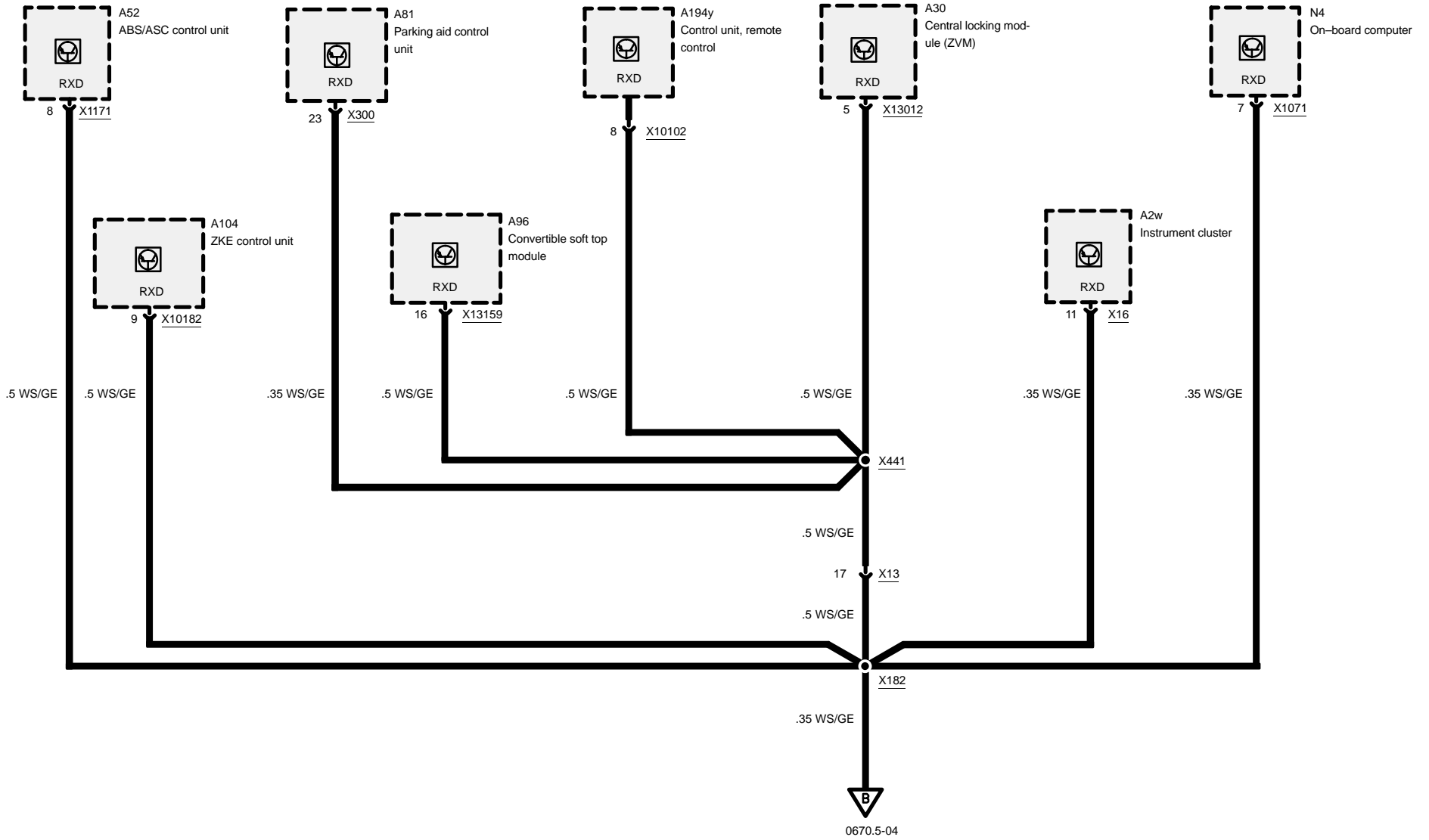






# Diagnostic link

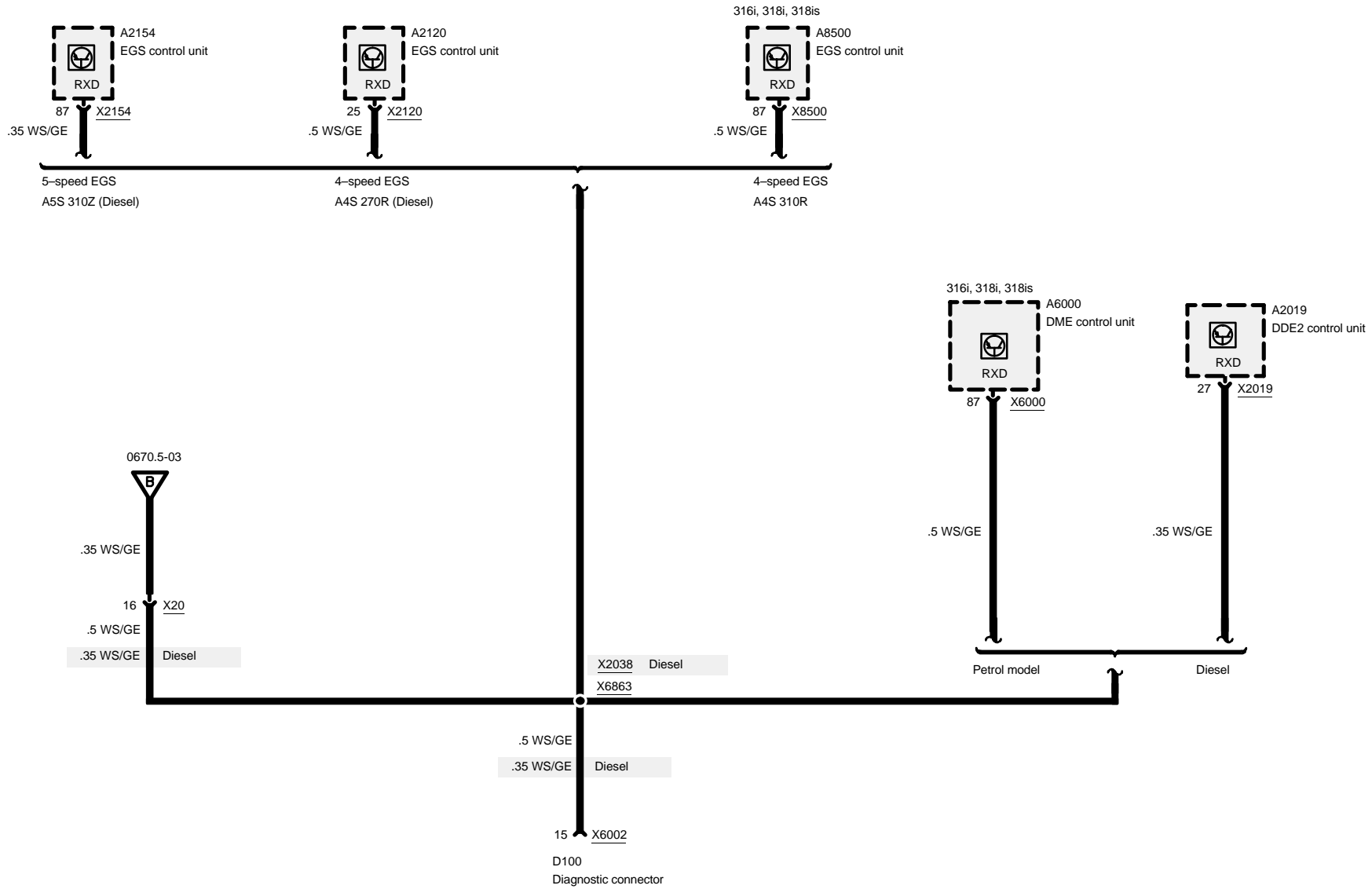
## RXD





# Diagnostic link

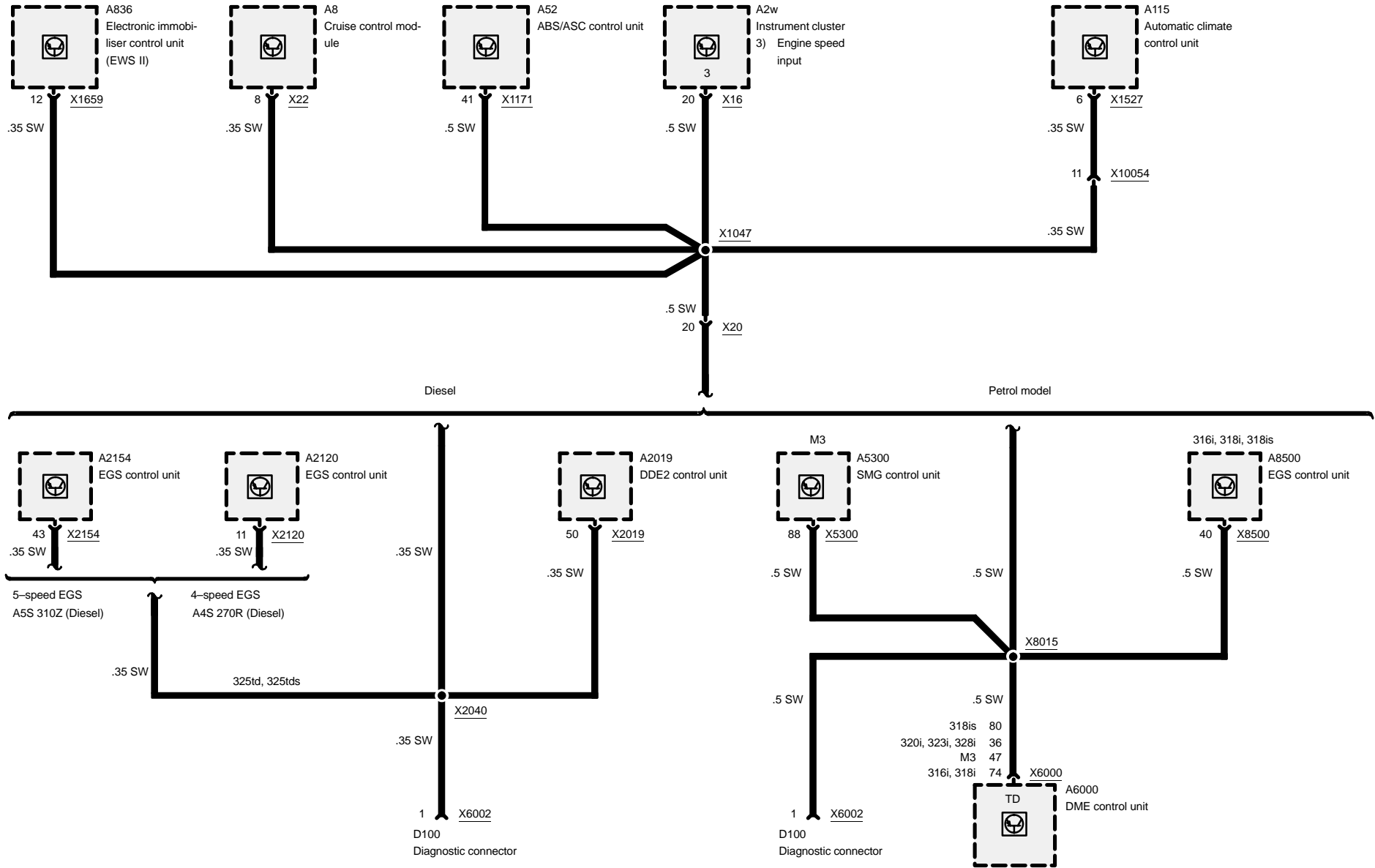
## RXD, Pin 15





# Diagnostic link

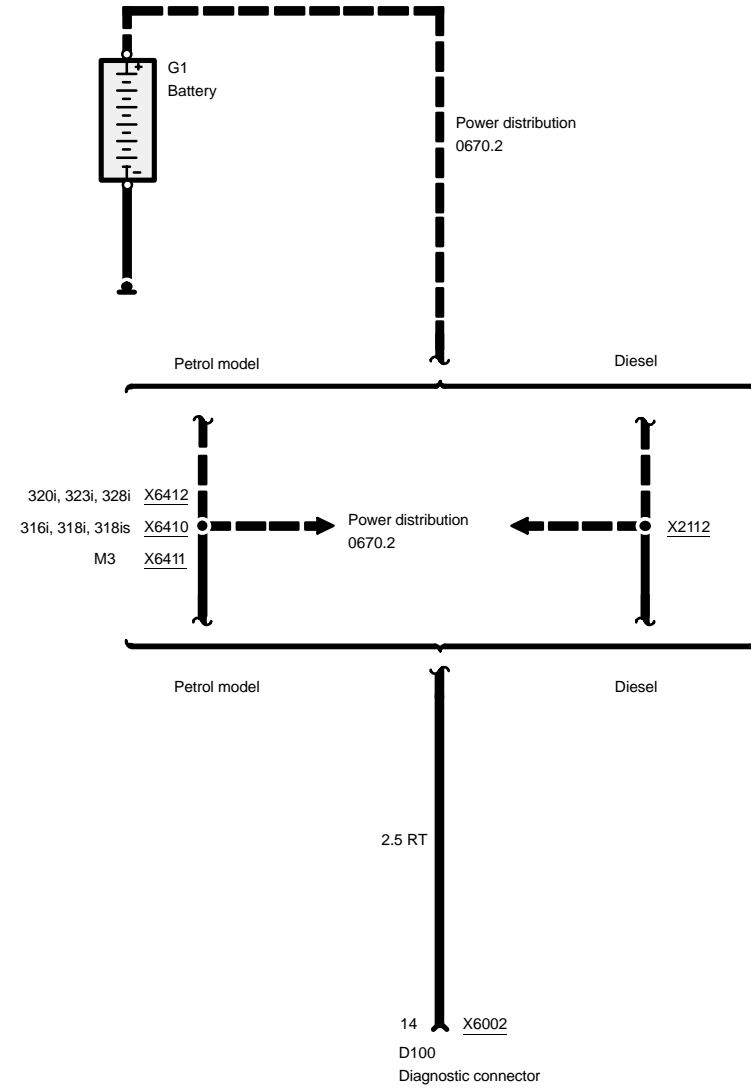
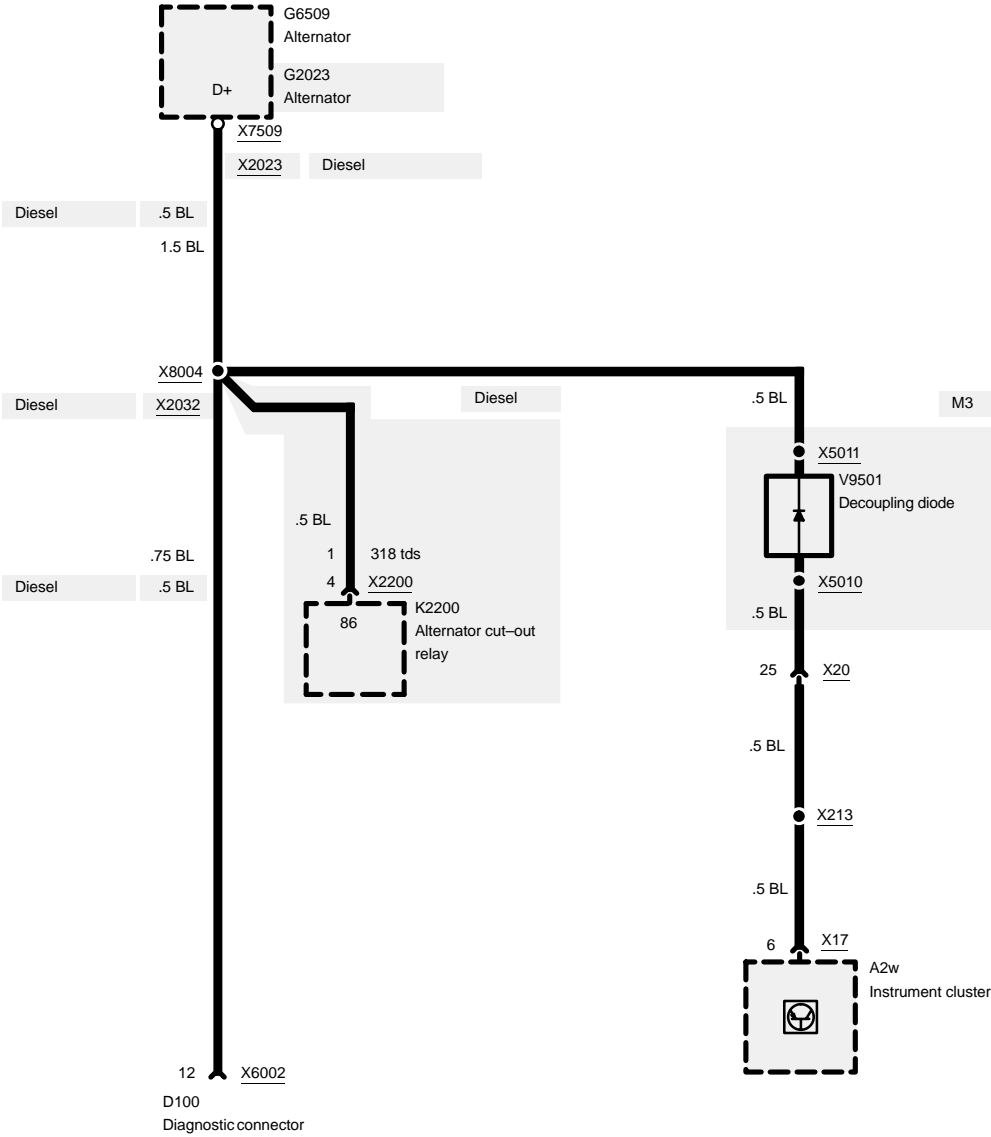
## Diagnostic connector, pin 1





# Diagnostic link

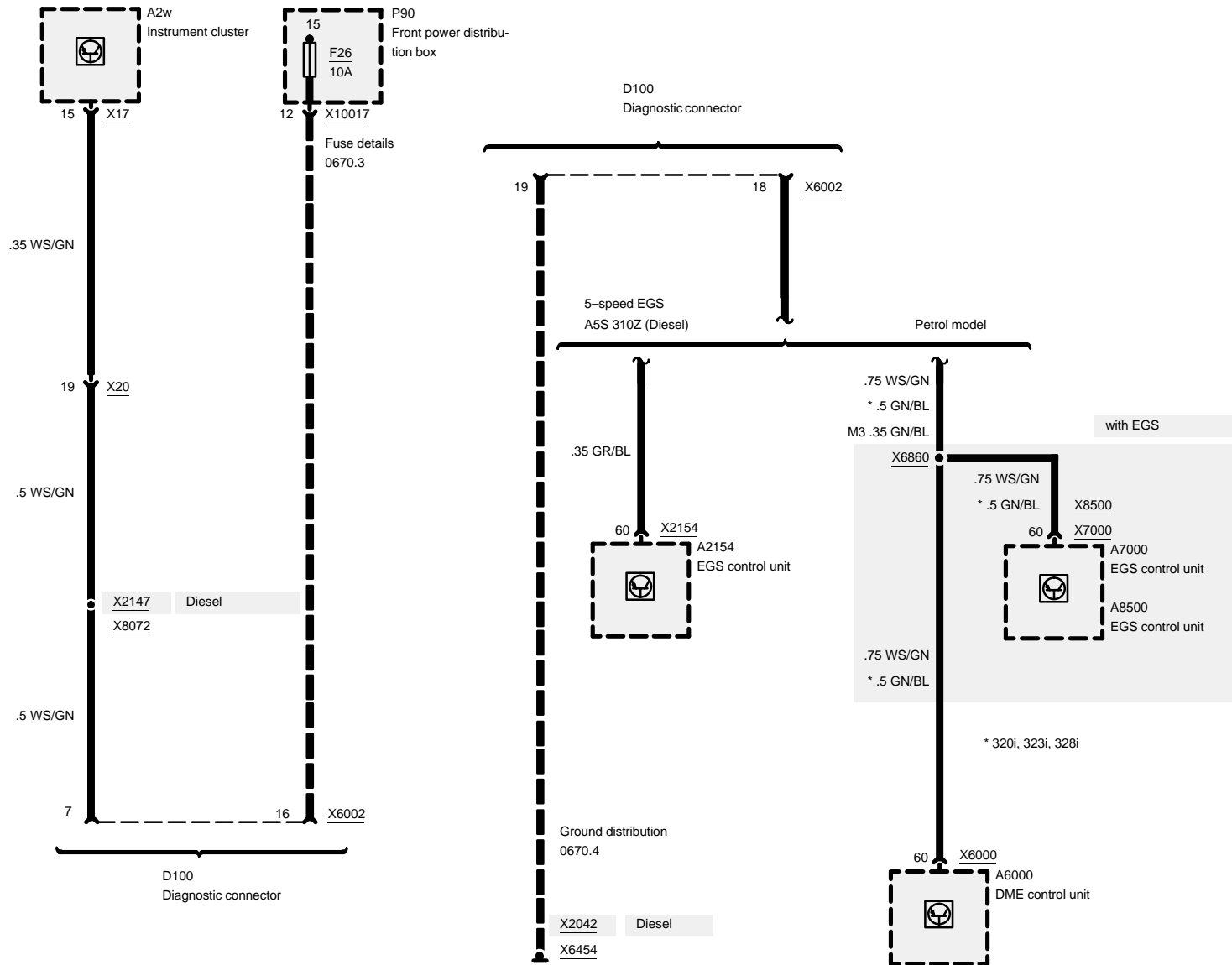
## Diagnostic connector, pins 12 and 14





# Diagnostic link

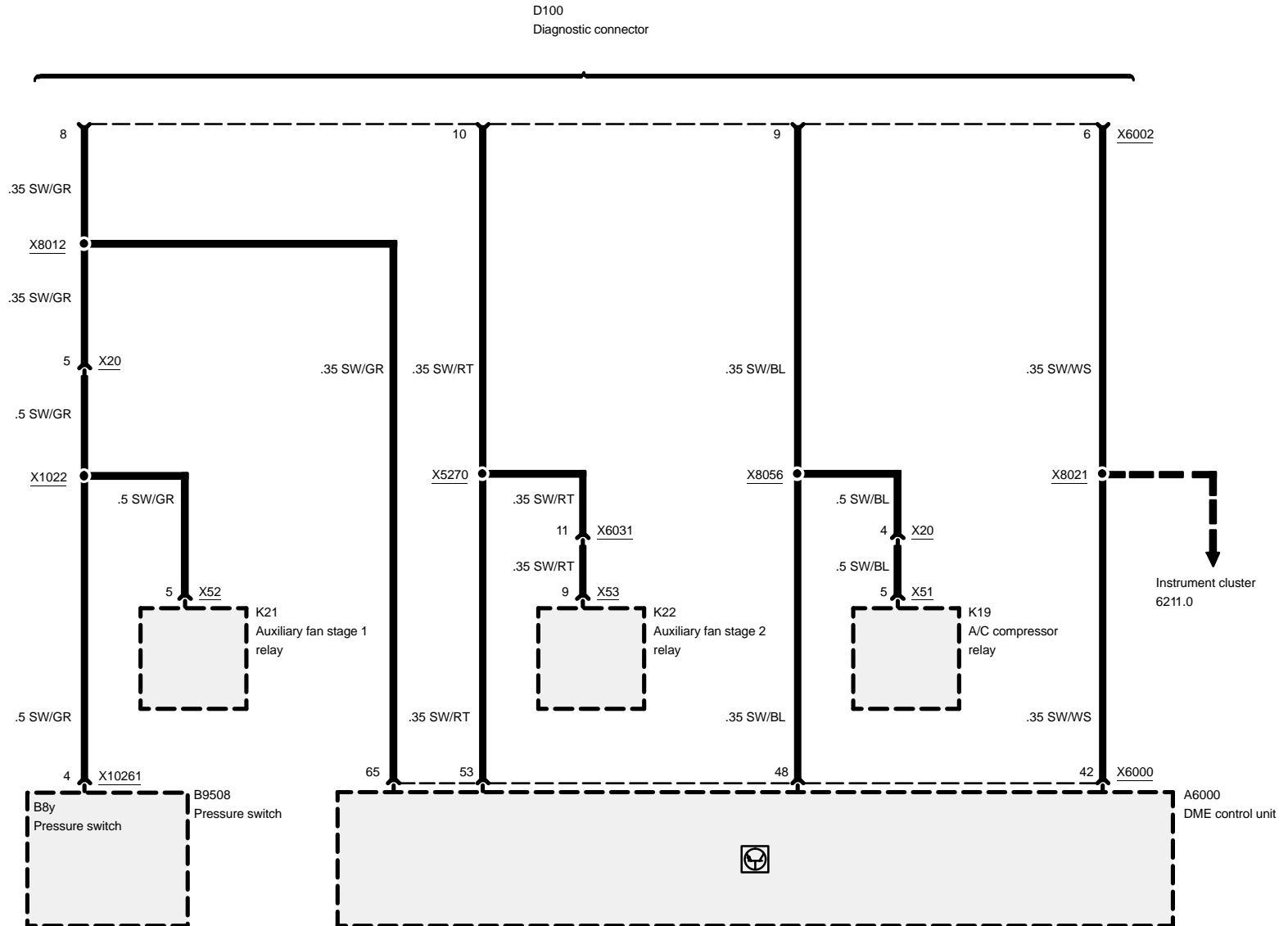
## Diagnostic connector, pins 7, 16, 18 and 19





# Diagnostic link

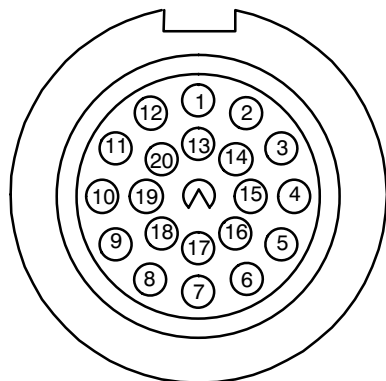
## Diagnostic connector, pins 6, 8, 9 and 10





## Diagnostic link

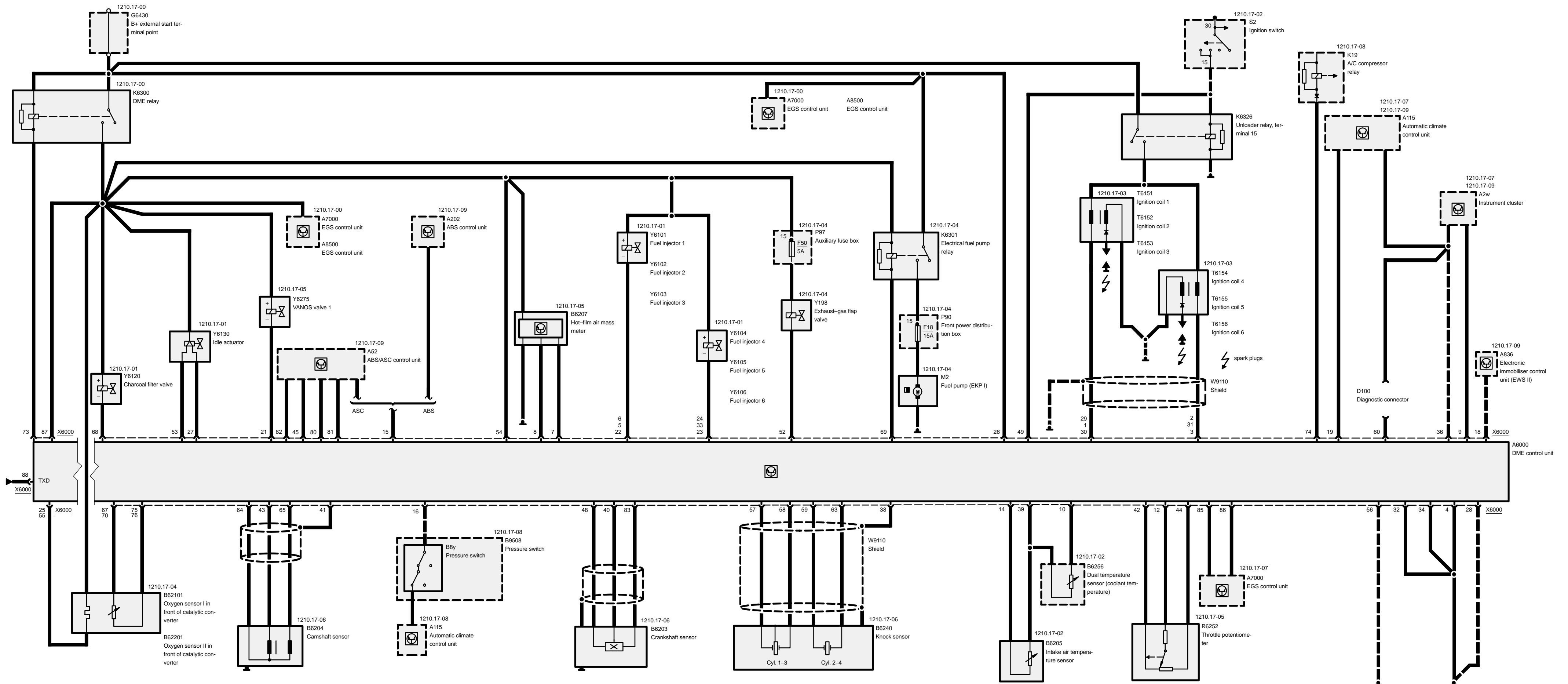
### Diagnosis connector (X6002)



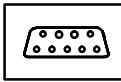
Pin number	Terminal number	Terminal description	Wire colour
1	TD	TD signal	SW
2	CANH	CANCA-High (M3)	SW
3	CANL	CANCA-Low (M3)	GE
4	Schirm	shield, CAN line (M3)	
5	–	not used	
6	TACHO A	speed signal	SW/WS
7	SI	service interval indicator	WS/GN
8	–	compressor	SW/GR
9	–	compressor delay	SW/BL
10	–	auxiliary fan	SW/RT
11	–	not used	
12	61(D+)	charge lamp	BL
13	–	not used	
14	30	battery +	RT
15	RXD	diagnosis–data line	WS/GE
16	15S	voltage at ignition ON	GN/WS
17	TXD II	diagnostic data link (4–cyl. Petrol engine)	WS/VI
18	PGSP	programming line	WS/GN (GN/BL** GR/BL*)
19	31	ground	BR (BR/OR**)
20	TXD	diagnosis–data line	WS/VI

\*Diesel

\*\*6–cyl. Petrol engine





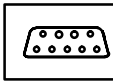


## Pin assignments

### X6000

Pin	Type	Description/Function	Connection
1	A	Ignition, terminal 1	Ignition coil, cyl. 2
2	A	Ignition, terminal 1	Ignition coil, cyl. 4
3	A	Ignition, terminal 1	Ignition coil, cyl. 6
4	M	Ground	Ground connection
5	A	Injection valve, cyl. 2	Injection valve, cyl. 2
6	A	Injection valve, cyl. 1	Injection valve, cyl. 1
7	E	Air mass meter signal	Air mass meter
8	M	Air mass meter ground	Air mass meter
9	A	TI signal	Instrument cluster
10	E	Coolant temperature signal	Coolant temperature sensor
11		not used	
12	E	Throttle (DK) signal	Throttle potentiometer
13		not used	
14	E	Intake air temperature signal	Intake air temperature sensor
15	A	ASC/ABS signal	ASC/ABS control unit
16	A	Air conditioning ON signal	Pressure switch
17		not used	
18	E	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
19	A	Auxiliary fan signal	A/C control unit
20		not used	
21	A	Camshaft timing signal	VANOS valve 1
22	A	Injection valve, cyl. 3	Injection valve
23	A	Injection valve, cyl. 6	Injection valve
24	A	Injection valve, cyl. 4	Injection valve
25	M	Oxygen sensor heating	Oxygen sensor 1
26	E	Terminal 30	Jumper cable terminal point
27	A	Idle actuator signal	Idle actuator
28	M	Ground	Ground connection
29	A	Ignition, terminal 1	Ignition coil, cyl. 1
30	A	Ignition, terminal 1	Ignition coil, cyl. 3
31	A	Ignition, terminal 1	Ignition coil, cyl. 5
32	M	Ground	Ground connection
33	A	Injection valve, cyl. 5	Injection valve

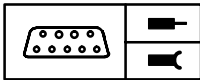
E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	M	Ground	Ground connection
35		not used	
36	A	Engine speed signal TD	Instrument cluster
37		not used	
38	M	Ground, shielding	Shield, knock sensor
39	M	Component ground	Temperature sensor
40	M	Ground	Crankshaft sensor
41	M	Ground, shielding	Shield, camshaft sensor
42	A	Signal (-)	Throttle potentiometer
43	E	Signal (-)	Camshaft sensor
44	A	Signal (+)	Throttle potentiometer
45	A	ASC signal	ASC control unit
46		not used	
47		not used	
48	A	Signal (+), 5V	Crankshaft sensor
49	E	Terminal 15	Ignition lock
50		not used	
51		not used	
52	A	Exhaust flap signal	Exhaust flap valve
53	A	Idle actuator signal	Idle actuator
54	E	>10V signal	DME main relay
55	M	Oxygen sensor heating	Oxygen sensor 2
56	M	Ignition feedback signal	Resistor
57	A	Knock sensor signal, cyl. 1-3	Knock sensor
58	E	Knock sensor signal, cyl. 1-3	Knock sensor
59	A	Knock sensor signal, cyl. 4-6	Knock sensor
60	E	Programming voltage	Diagnostic connector
61		not used	
62		not used	
63	E	Knock sensor signal, cyl. 4-6	Knock sensor
64	M	Component ground	Camshaft sensor
65	A	Signal (+)	Camshaft sensor
66		not used	
67	M	Oxygen sensor ground	Oxygen sensor 1
68	A	Fuel tank ventilation valve	Fuel tank ventilation valve

E = Input, A = Output, M = Ground



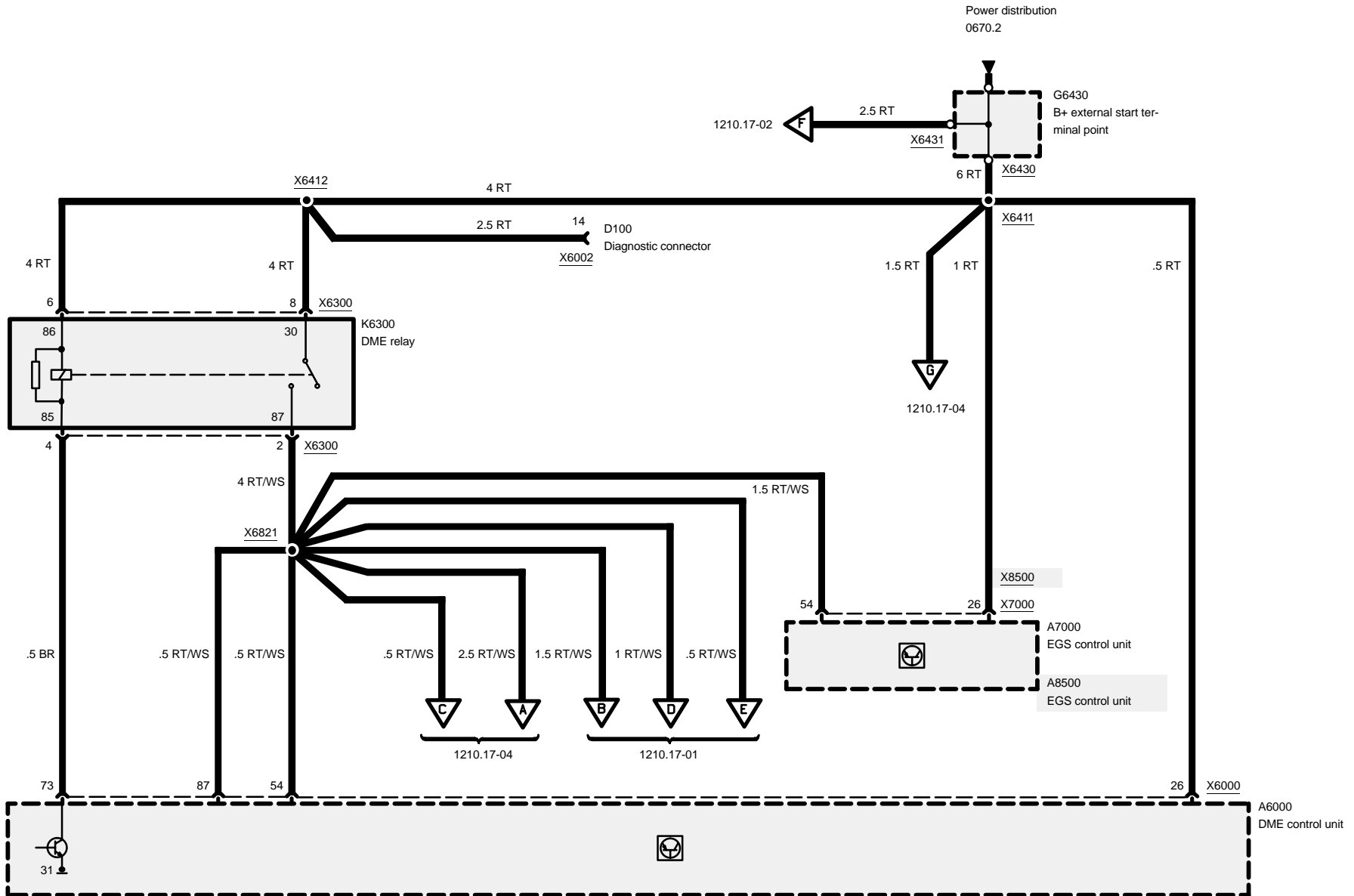
## Pin assignments

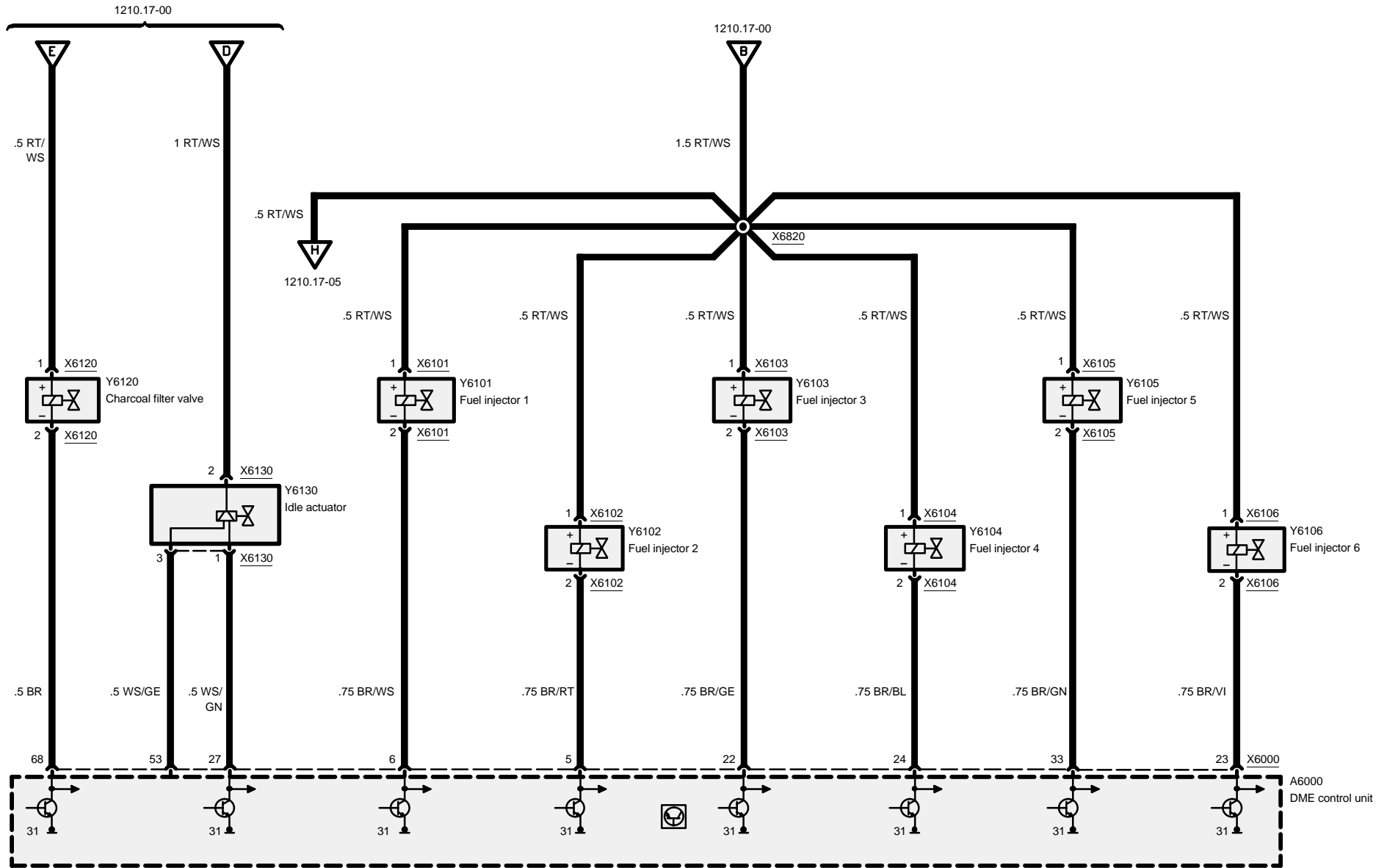
Pin	Type	Description/Function	Connection
69	A	Electric fuel pump relay and TR signal (crankshaft reference)	Fuel pump relay
70	M	Oxygen sensor ground	Oxygen sensor 2
71		not used	
72		not used	
73	A	Relay activation	DME relay
74	E	Compressor ON signal	Relay, A/C compressor
75	E	Signal, oxygen sensor	Oxygen sensor 1
76	E	Signal, oxygen sensor	Oxygen sensor 2
77		not used	
78		not used	
79		not used	
80	A	ASC signal	ASC control unit
81	A	ASC signal	ASC control unit
82	A	ASC signal	ASC control unit
83	E	Crankshaft signal	Crankshaft sensor
84		not used	
85	E/A	CANCA-L	EGS control unit
86	E/A	CANCA-H	EGS control unit
87	E	Terminal 15	DME relay
88	E/A	TxD diagnostic data link	Diagnostic connector



# Engine management MS41.0 (6-cylinder M52)

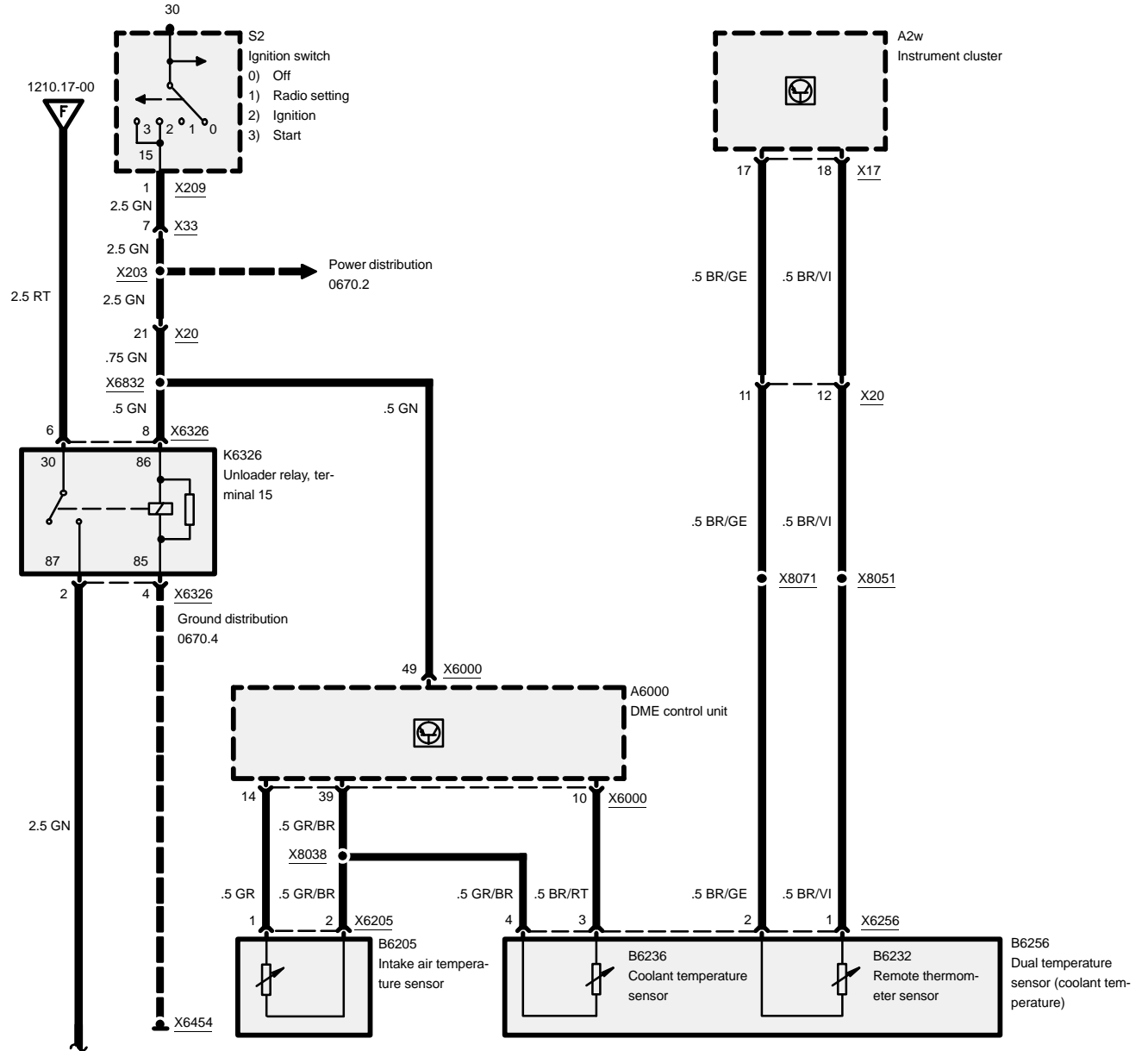
## Current

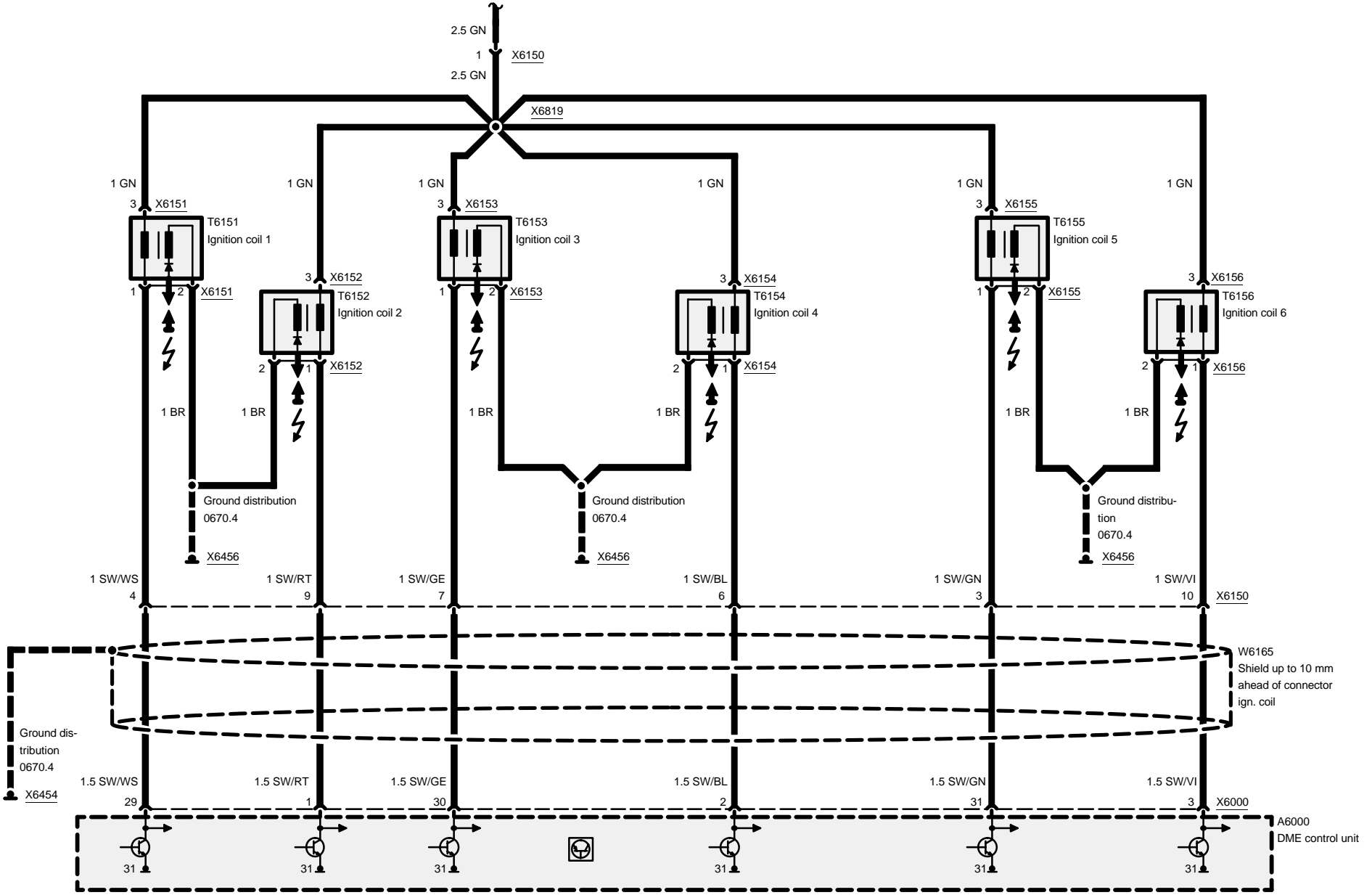






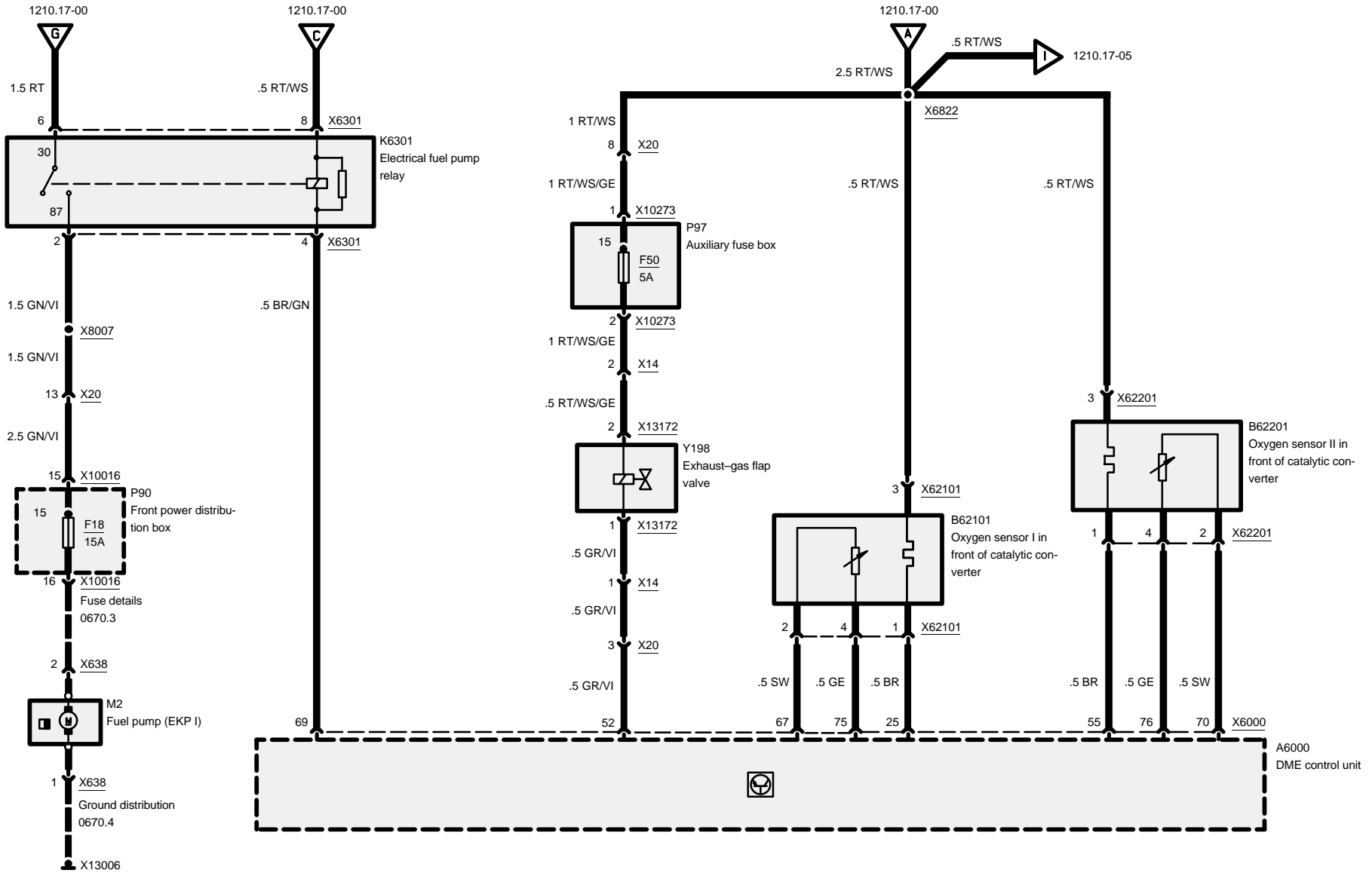
# Engine management MS41.0 (6-cylinder M52)







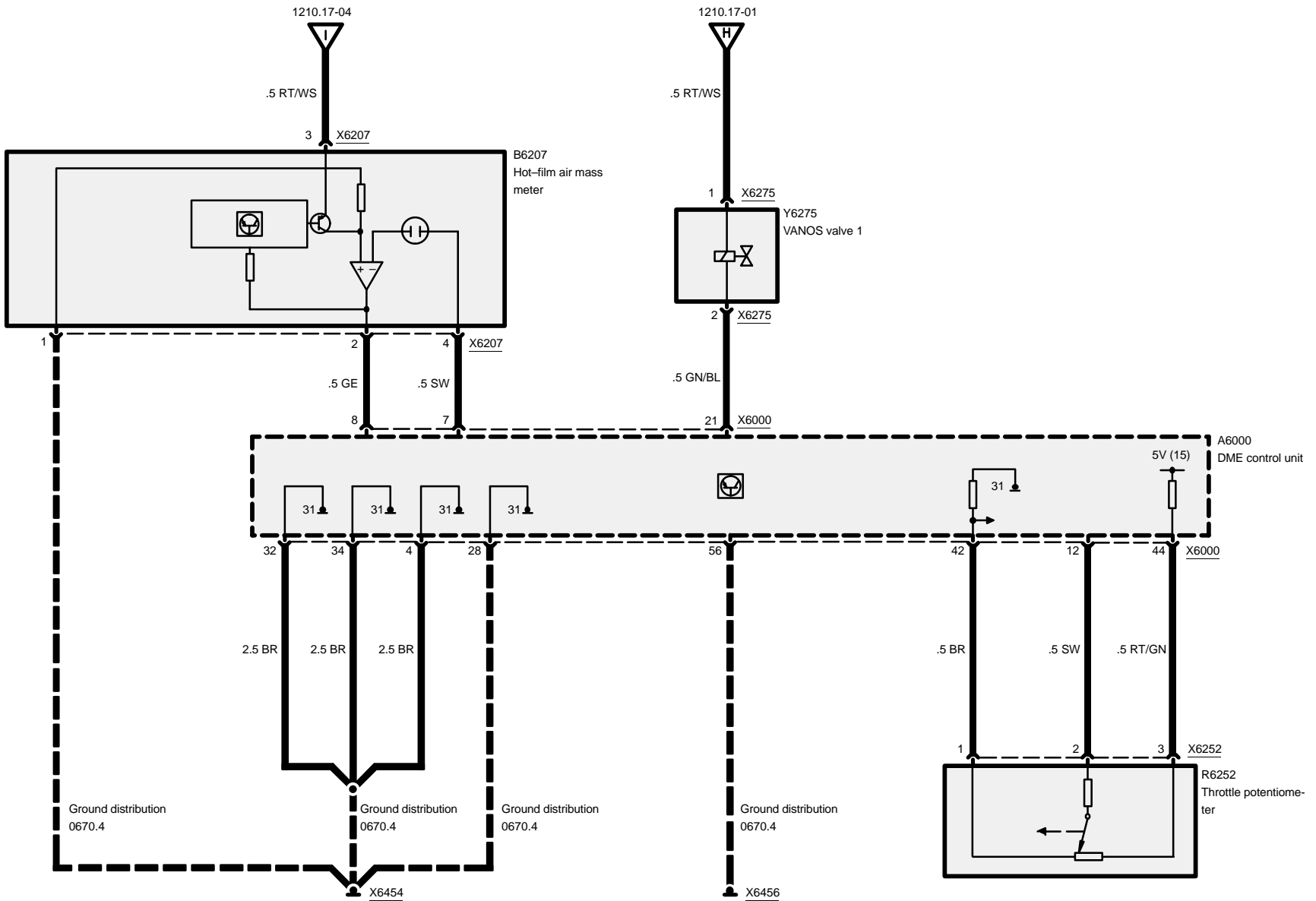
# Engine management MS41.0 (6-cylinder M52)





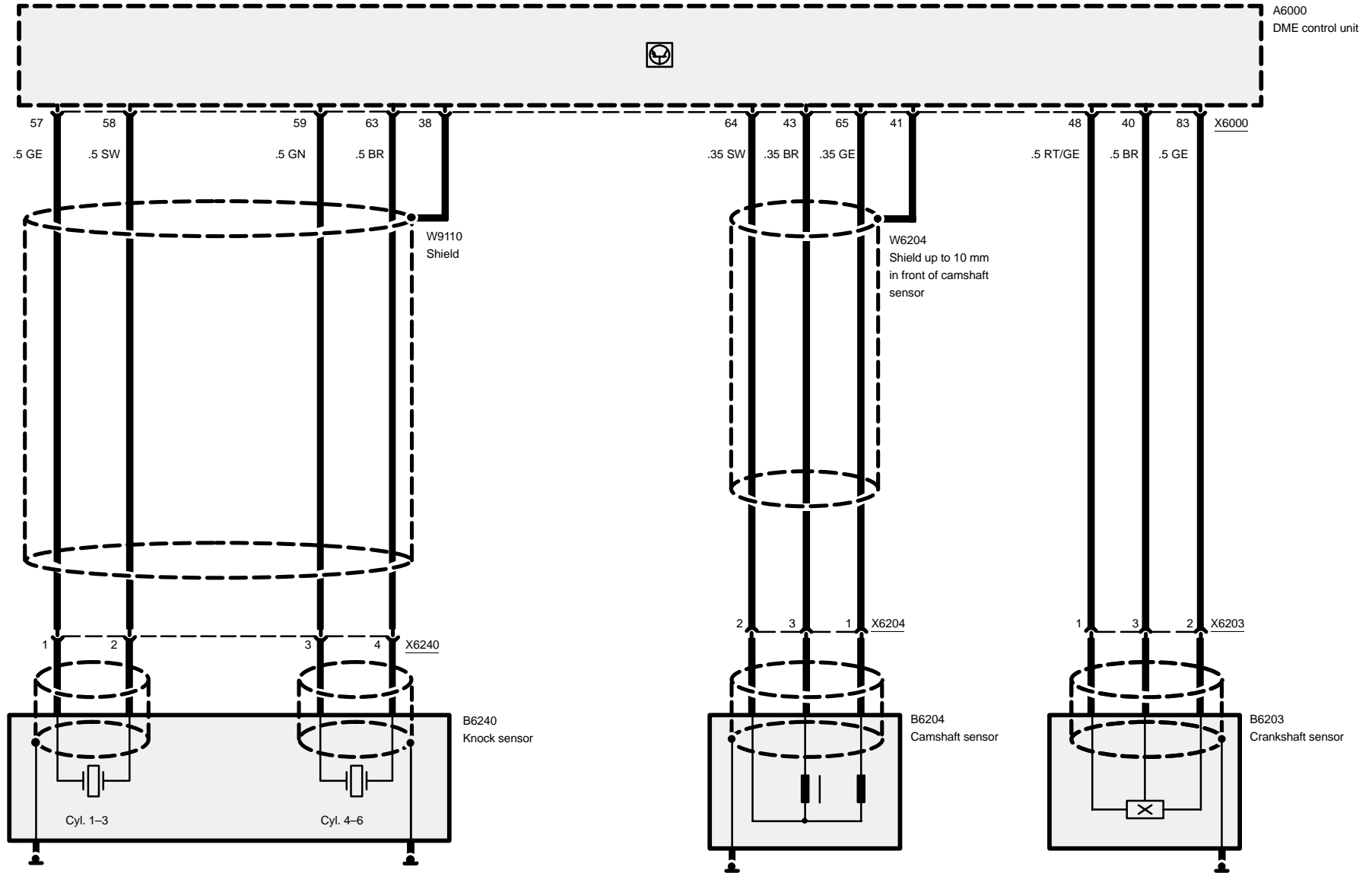


# Engine management MS41.0 (6-cylinder M52)



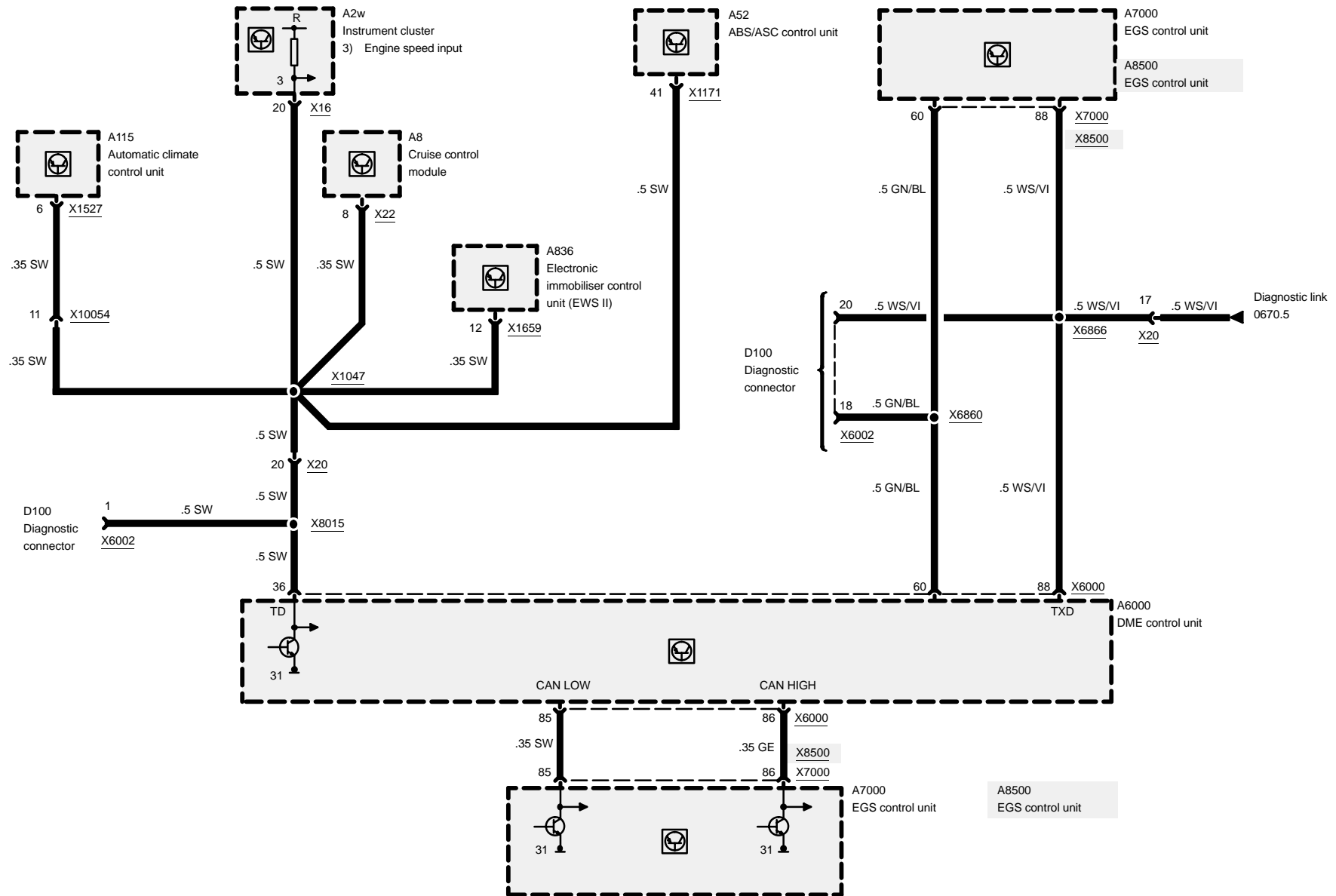


# Engine management MS41.0 (6-cylinder M52)



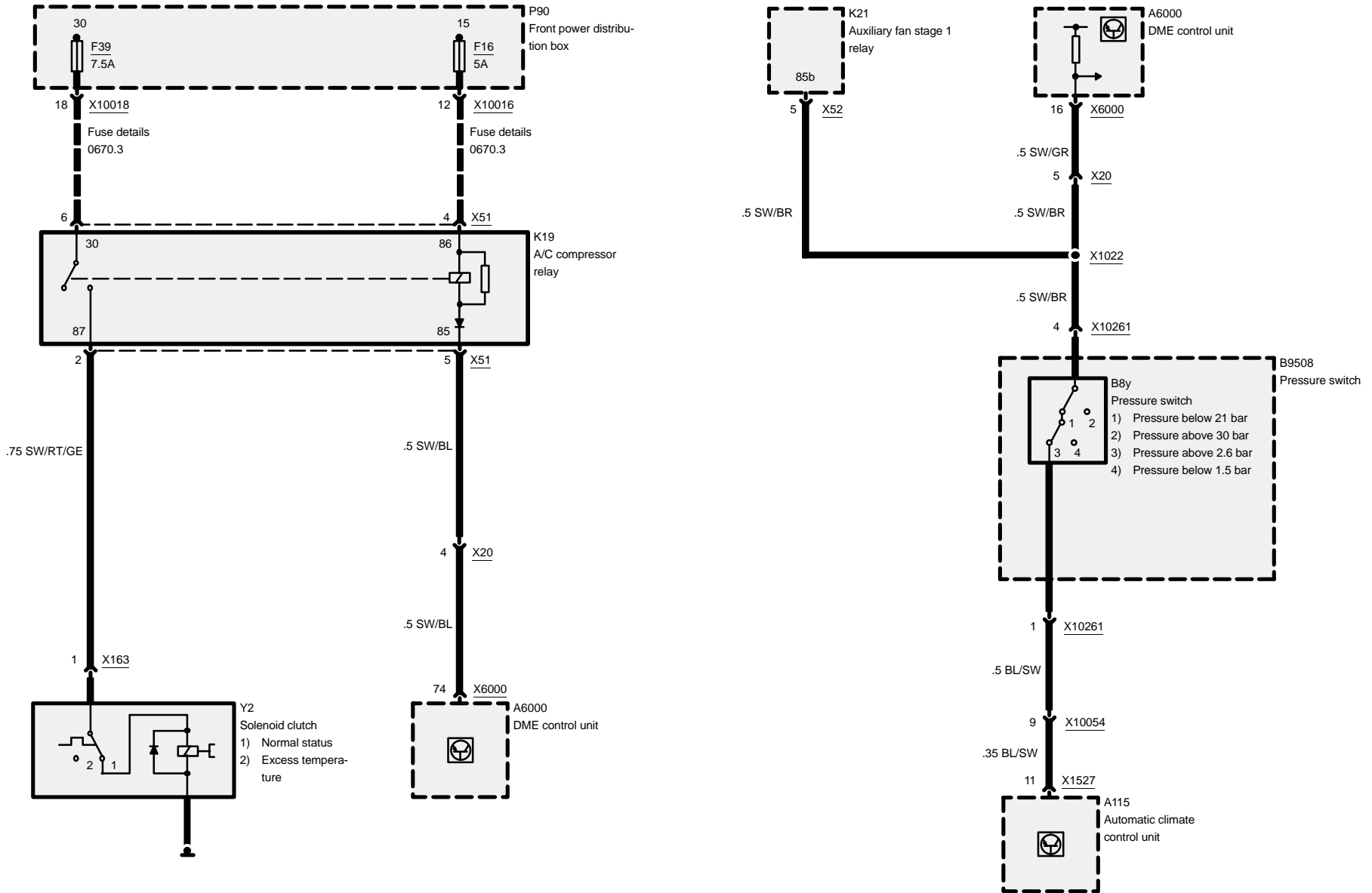


# Engine management MS41.0 (6-cylinder M52)



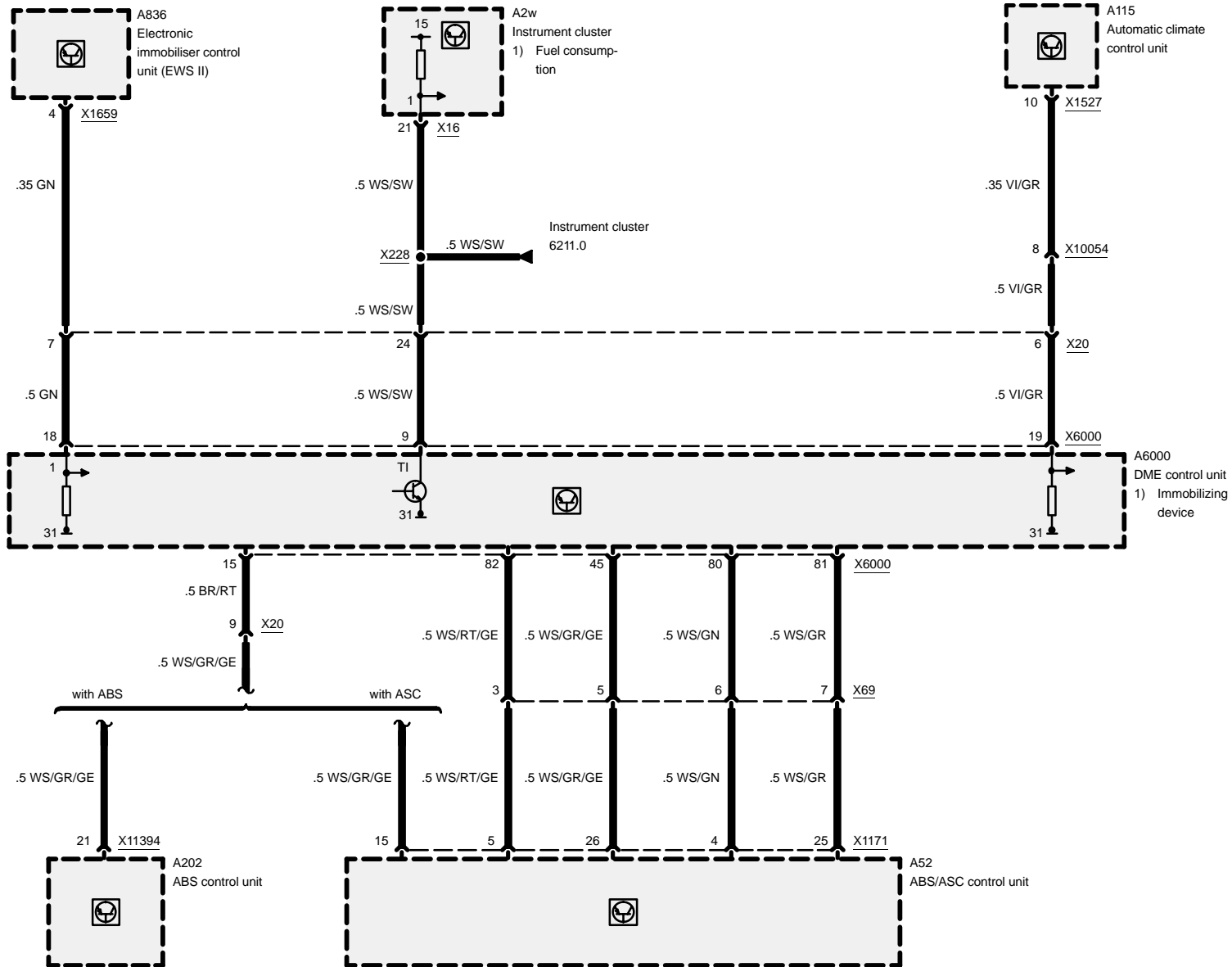


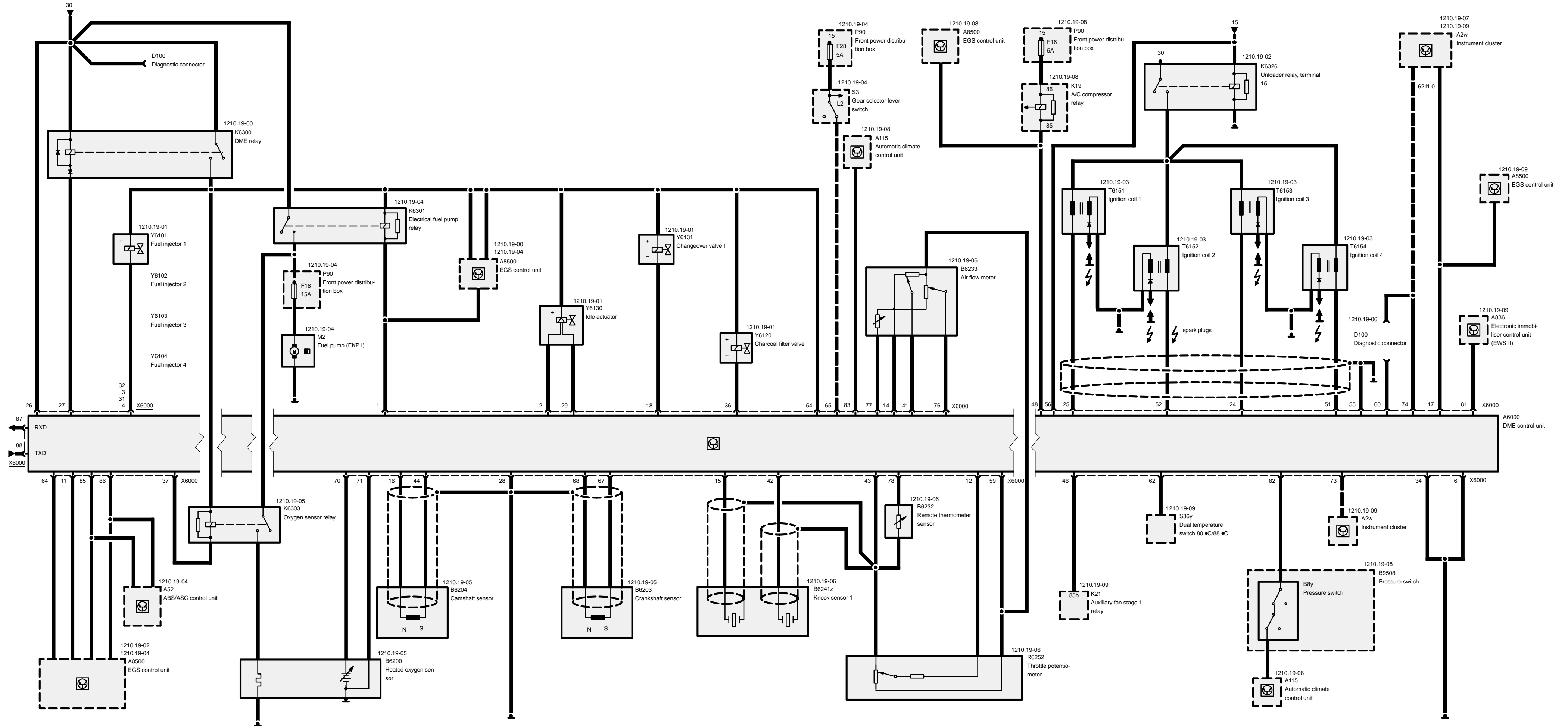
# Engine management MS41.0 (6-cylinder M52)

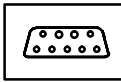




# Engine management MS41.0 (6-cylinder M52)





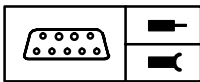


## Pin assignments

### X6000

Pin	Type	Description/Function	Connection
1	A	Electric fuel pump relay and TR signal	Electric fuel pump relay and EGS control unit
2	A	Idle actuator signal	Idle actuator
3	A	Injection signal	Injection valve, cyl. 2
4	A	Injection signal	Injection valve, cyl. 4
5		not used	
6	M	Ground, injection valve output stages	Ground connection
7		not used	
8		not used	
9		not used	
10		not used	
11	A	Throttle valve position	EGS control unit
12	E	Throttle valve position	Throttle potentiometer
13		not used	
14	M	Component ground	Air flow rate sensor
15	E	Knock sensor signal, cyl. 3 and 4	Knock sensor
16	M	Component ground	Camshaft sensor
17	A	Fuel consumption (TI signal)	Instrument cluster
18	A	Changeover valve 1	Changeover valve
19		not used	
20		not used	
21		not used	
22		not used	
23		not used	
24	A	Ignition signal cyl. 3, terminal 1	Ignition coil 3
25	A	Ignition signal cyl. 1, terminal 1	Ignition coil 1
26	E	Permanent positive, terminal 30	B+ terminal point
27	A	Activation, DME main relay	Terminal 85, DME main relay
28	M	Ground for electronics and sensor shielding	Ground connection
29	A	Idle actuator signal	Idle actuator
30		not used	
31	A	Injection signal	Injection valve, cyl. 3
32	A	Injection signal	Injection valve, cyl. 1

E = Input, A = Output, M = Ground

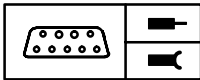


## Pin assignments

Pin	Type	Description/Function	Connection
33		not used	
34	M	Ground for remaining output stages (except ignition and injection valves)	Ground connection
35		not used	
36	A	Fuel tank ventilation valve	Fuel tank ventilation valve
37	A	Activation, oxygen sensor relay	Oxygen sensor relay
38		not used	
39		not used	
40		not used	
41	E	Signal, air flow rate sensor	Air flow rate sensor
42	E	Knock sensor signal, cyl. 1 and 2	Knock sensor
43	M	Sensor ground	Water-temperature sensor, throttle potentiometer and shielding for knock sensors
44	E	Camshaft signal	Camshaft sensor
45		not used	
46	A	Relay activation	Auxiliary fan relay, stage 1
47		not used	
48	A	A/C compressor shutdown	Air conditioner compressor relay
49		not used	
50		not used	
51	A	Ignition signal cyl. 4, terminal 1	Ignition coil 4
52	A	Ignition signal cyl. 2, terminal 1	Ignition coil 2
53		not used	
54	E	B+ voltage	DME main relay
55	M	Ground, ignition	Ground connection
56	E	Ignition, terminal 15	Ignition lock
57		not used	
58		not used	
59	A	5V component supply	Throttle potentiometer
60	E	Programming voltage	Diagnostic connector
61		not used	
62	E	Signal, water temperature above 80°C	Dual temperature switch
63		not used	
64	E	Ignition timing intervention	EGS control unit
65	E	Drive range P/N	Selector lever

E = Input, A = Output, M = Ground





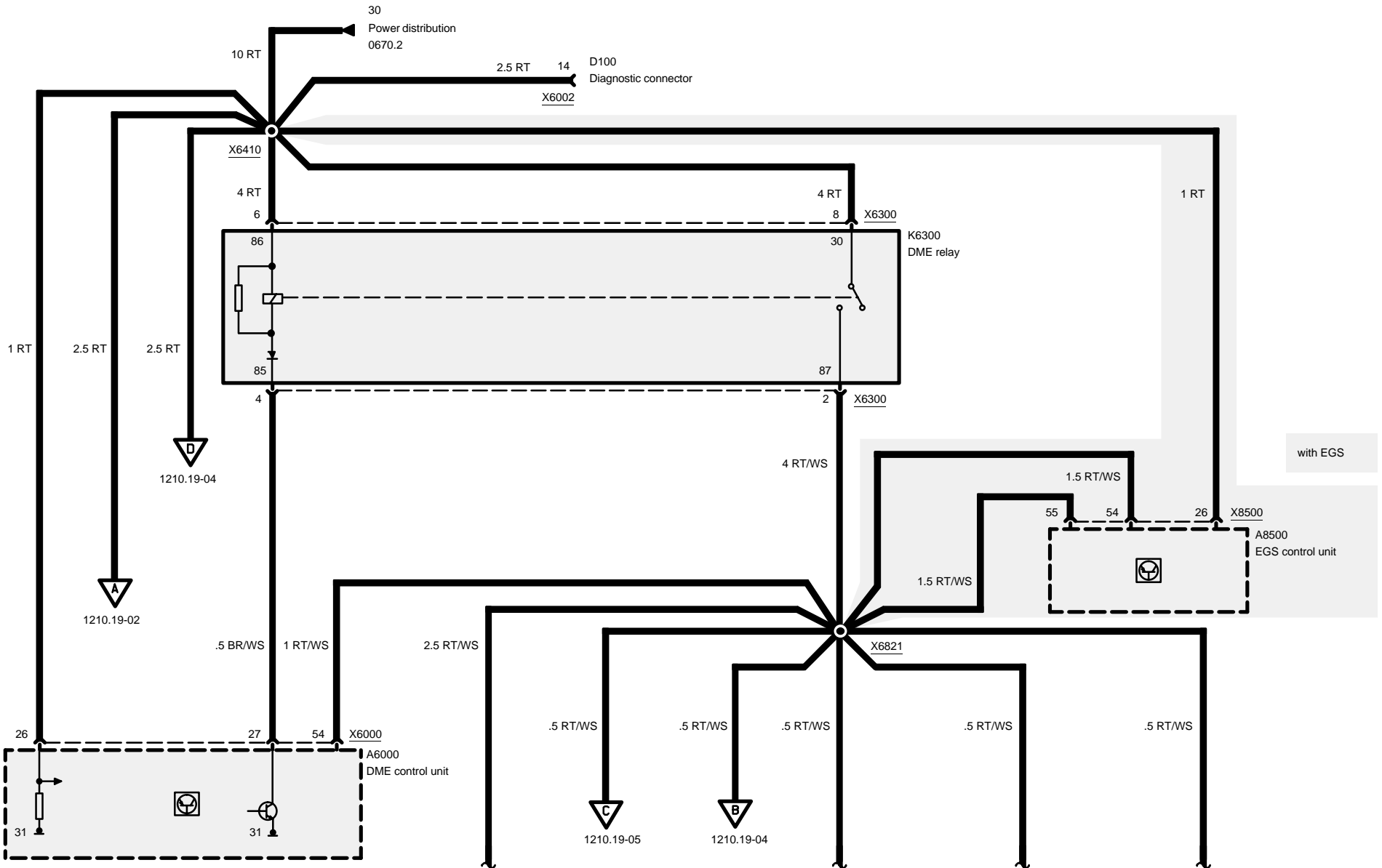
## Pin assignments

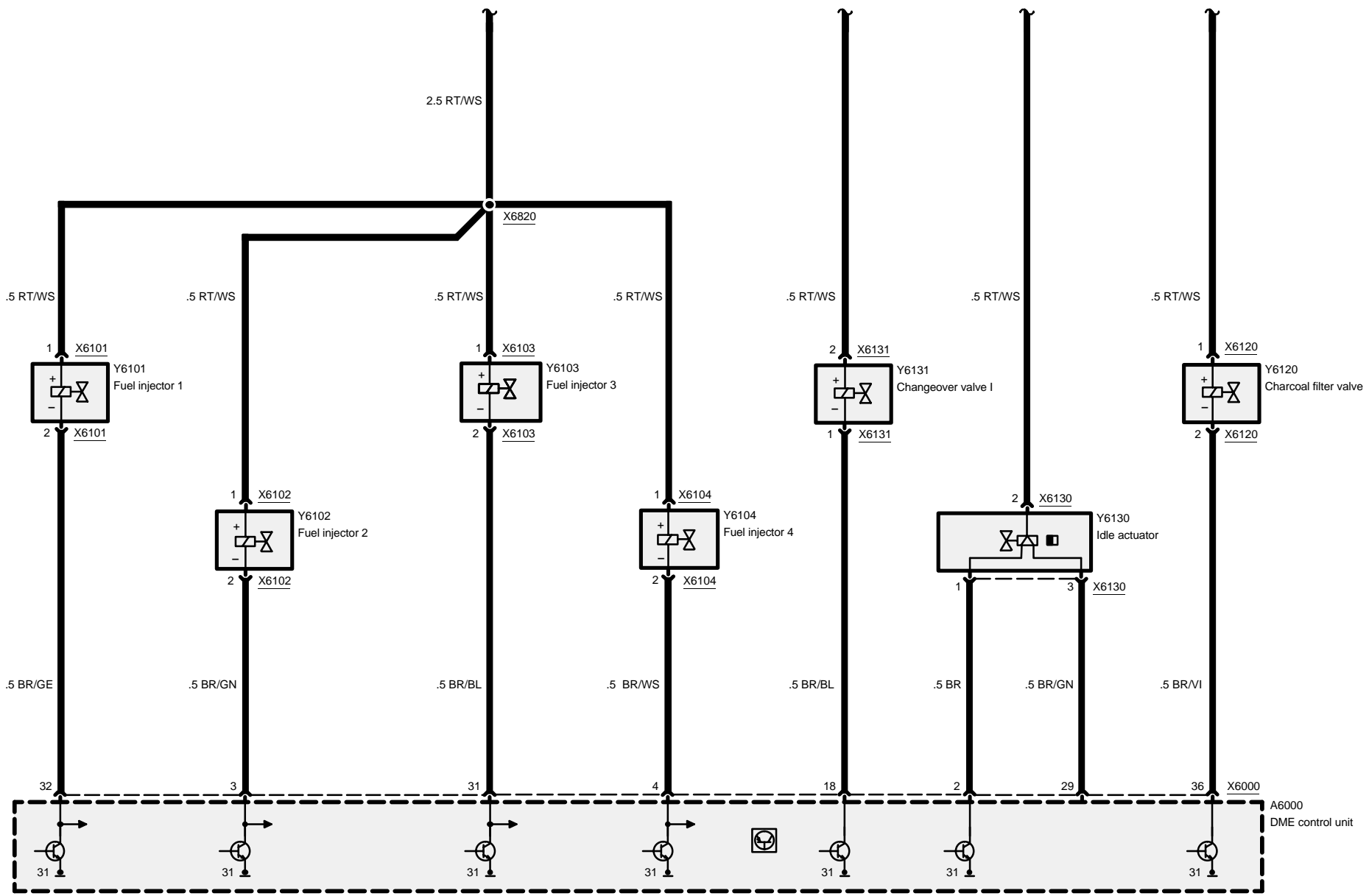
Pin	Type	Description/Function	Connection
66		not used	
67	E	Crankshaft signal	Crankshaft sensor
68	M	Component ground	Crankshaft sensor
69		not used	
70	E	Oxygen sensor signal	Oxygen sensor
71	M	Component ground	Oxygen sensor
72		not used	
73	E	Vehicle speed signal	Instrument cluster
74	A	TD signal	Instrument cluster
75		not used	
76	E	Idle CO potentiometer	Air flow rate sensor
77	E	Intake air temperature sensor	Air flow rate sensor
78	E	Engine temperature sensor	Water temperature sensor
79		not used	
80		not used	
81	E	Vehicle immobilization	Control unit, electronic immobilizing device (EWS II)
82	E	Switch for A/C compressor	Pressure switch
83	E	Air conditioning ON signal	A/C control unit
84		not used	
85	E/A	CAN-LOW	EGS/ASC control unit
86	E/A	CAN-HIGH	EGS/ASC control unit
87	A	RxD diagnostic link	Diagnostic connector
88	E/A	TxD diagnostic link	Diagnostic connector



# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

## Current, injector valves

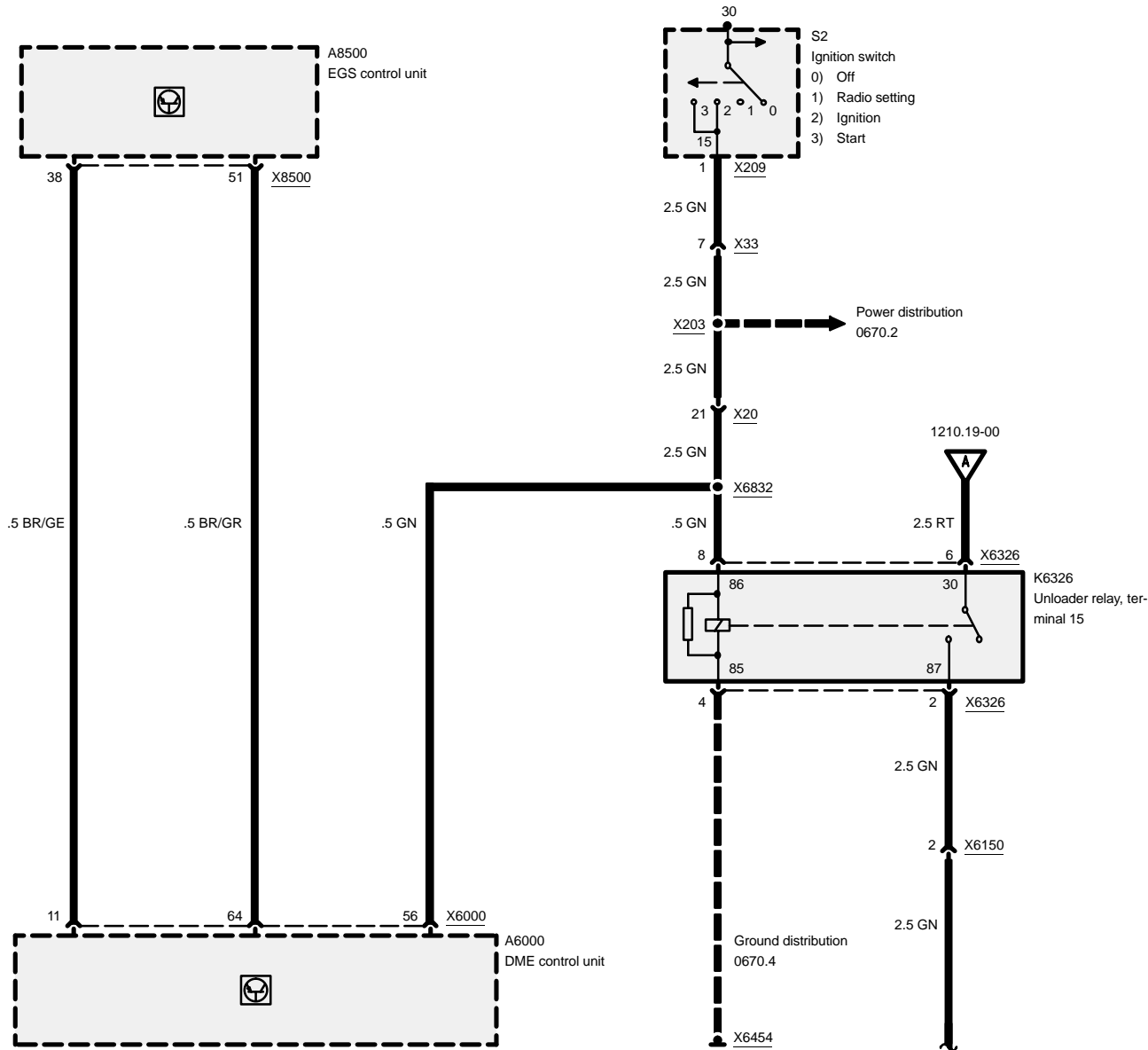


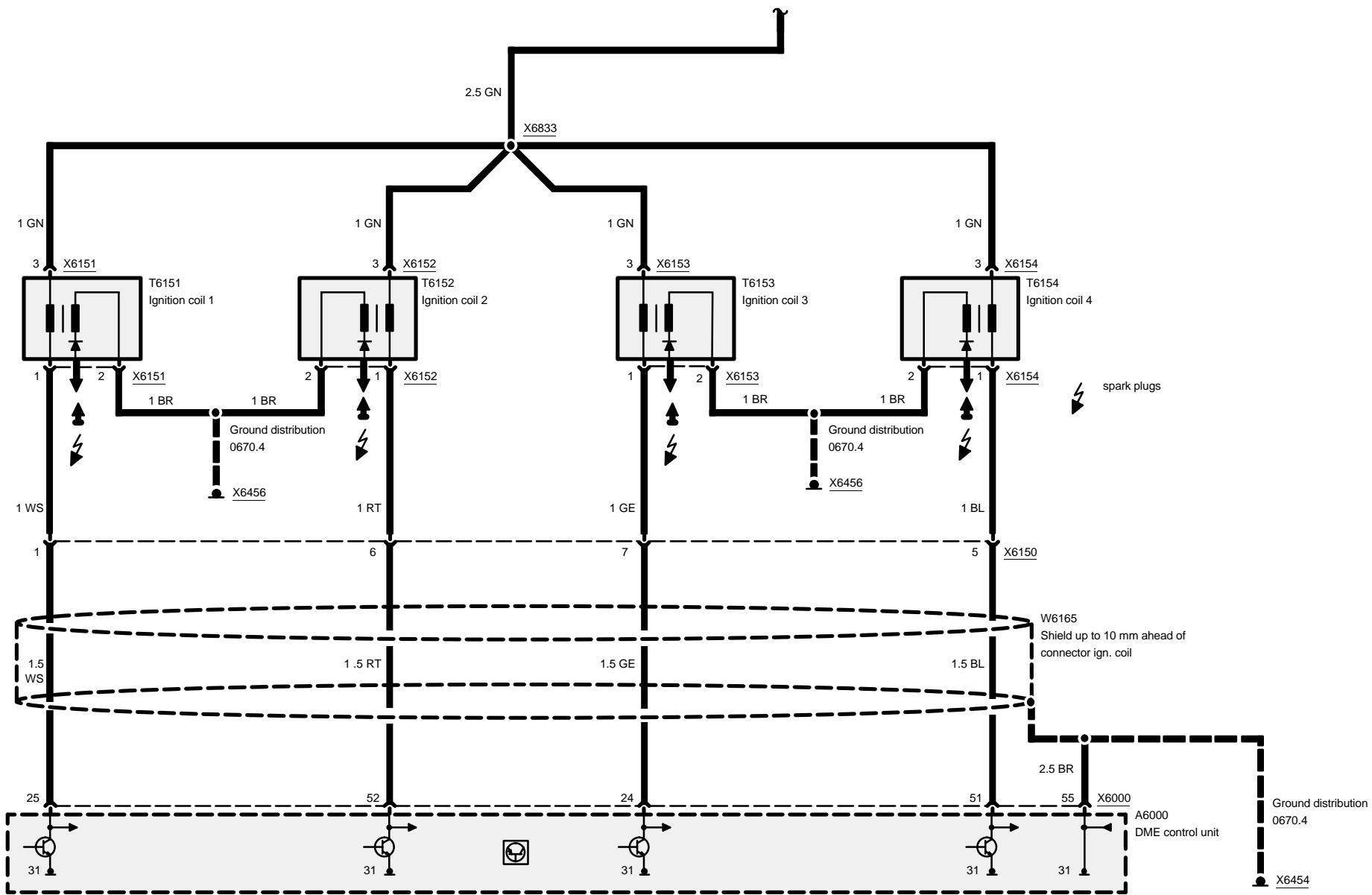




# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

## Ignition coils



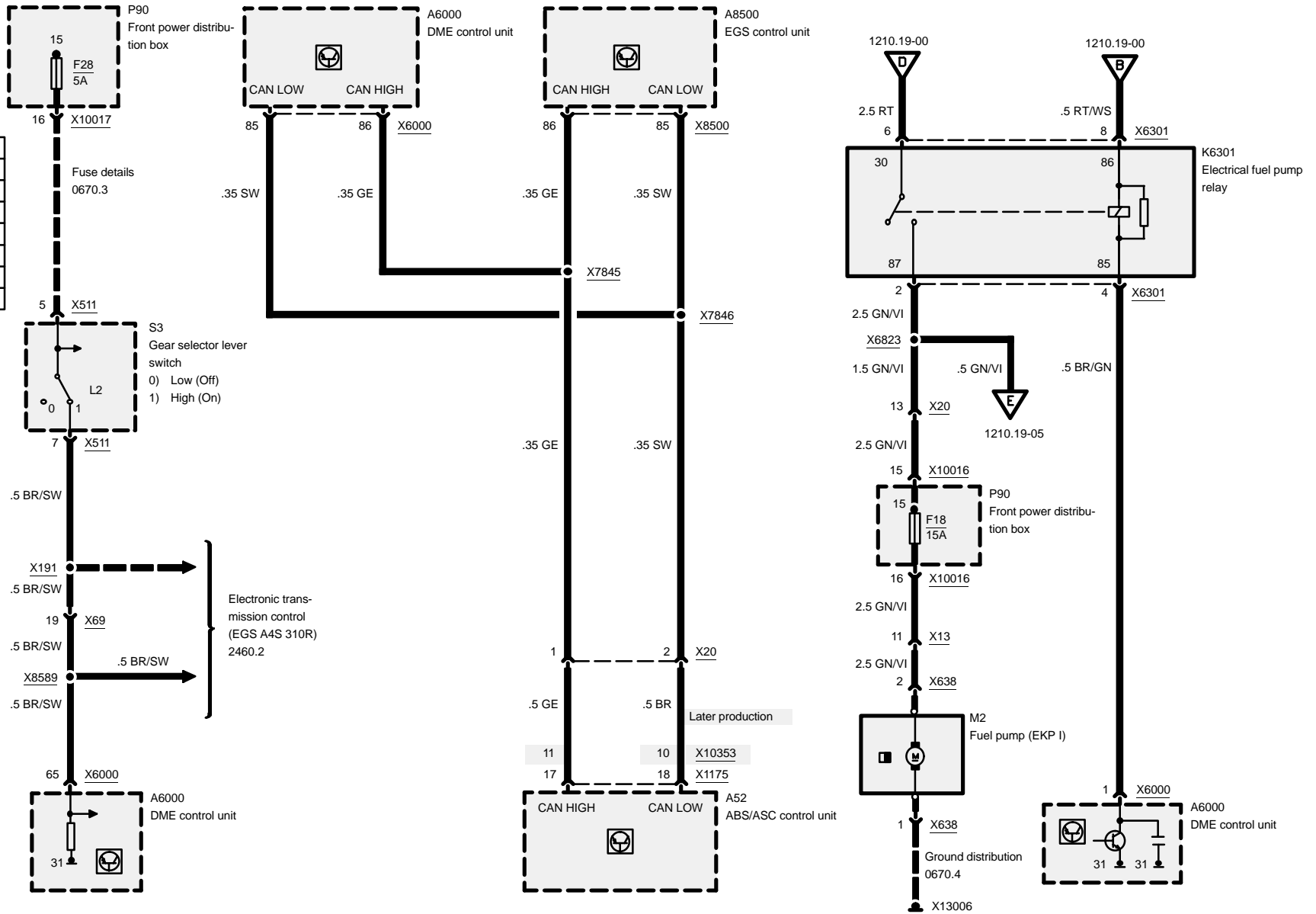




# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

## Fuel pump

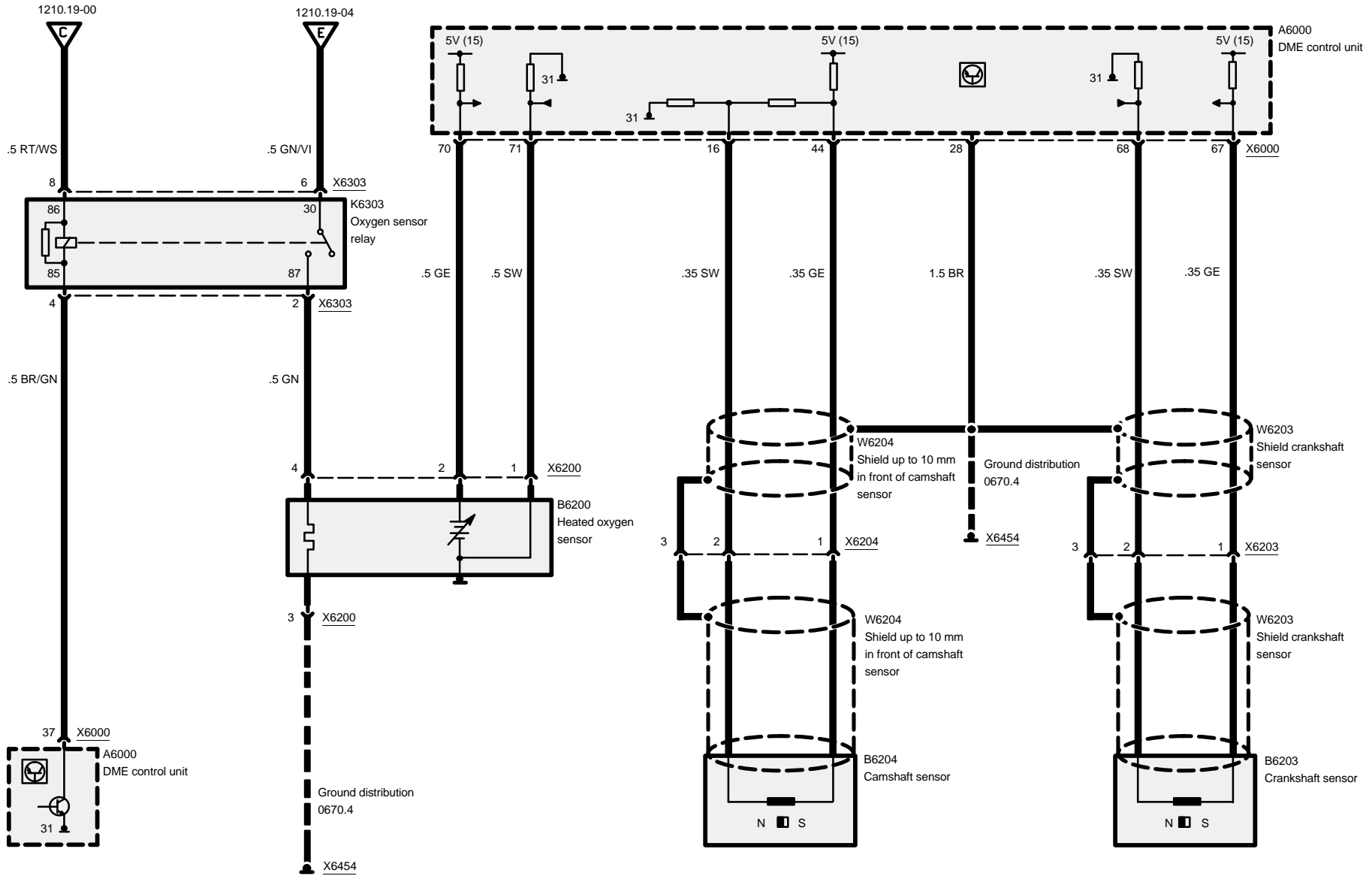
	L1	L2	L3	L4
P	1	1	0	1
R	1	0	0	0
N	1	1	1	0
D	0	0	0	1
3	0	0	1	1
2	1	0	1	1
1	0	0	1	0





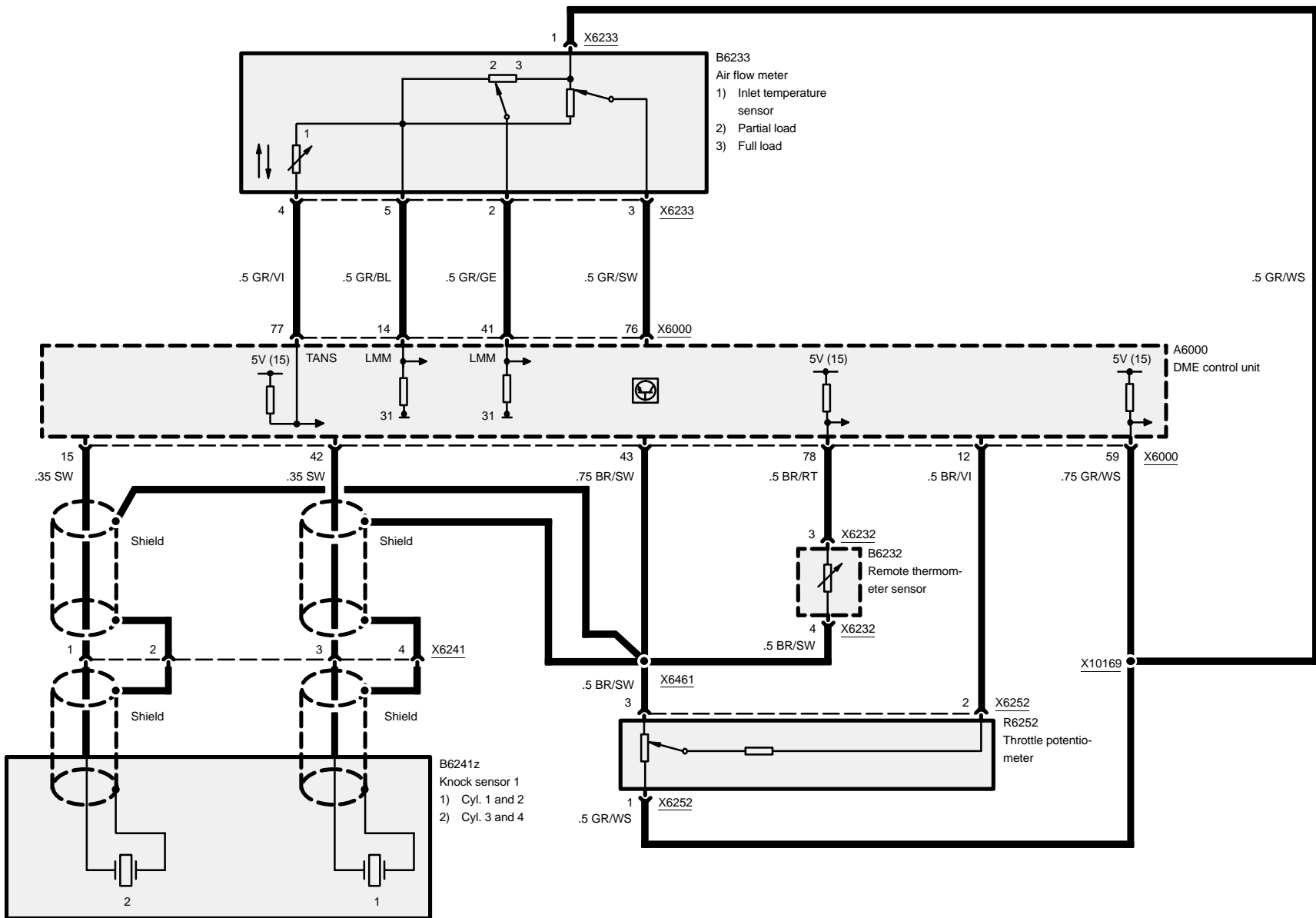
# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

## Oxygen sensor, shaft sensor





# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

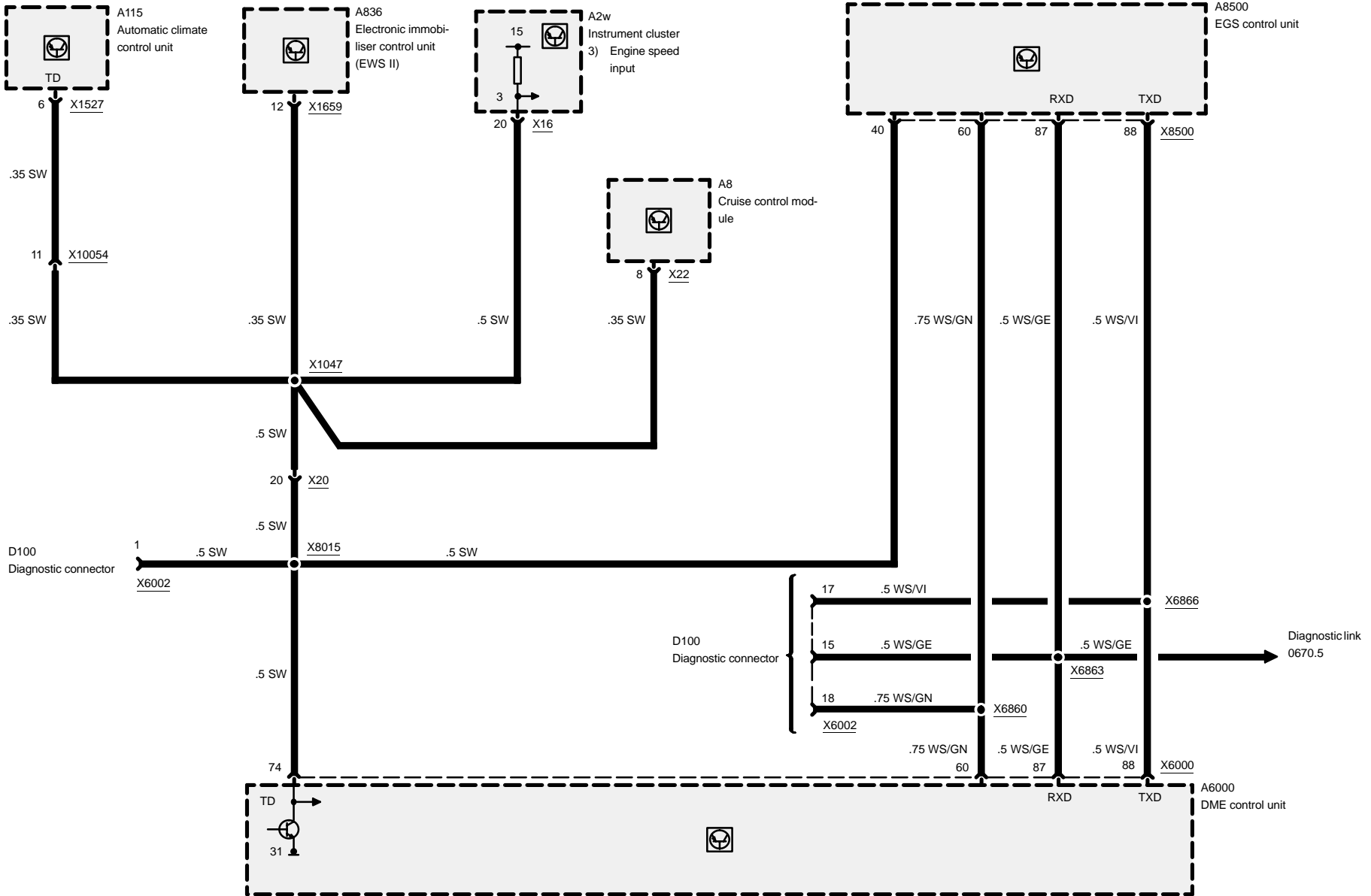






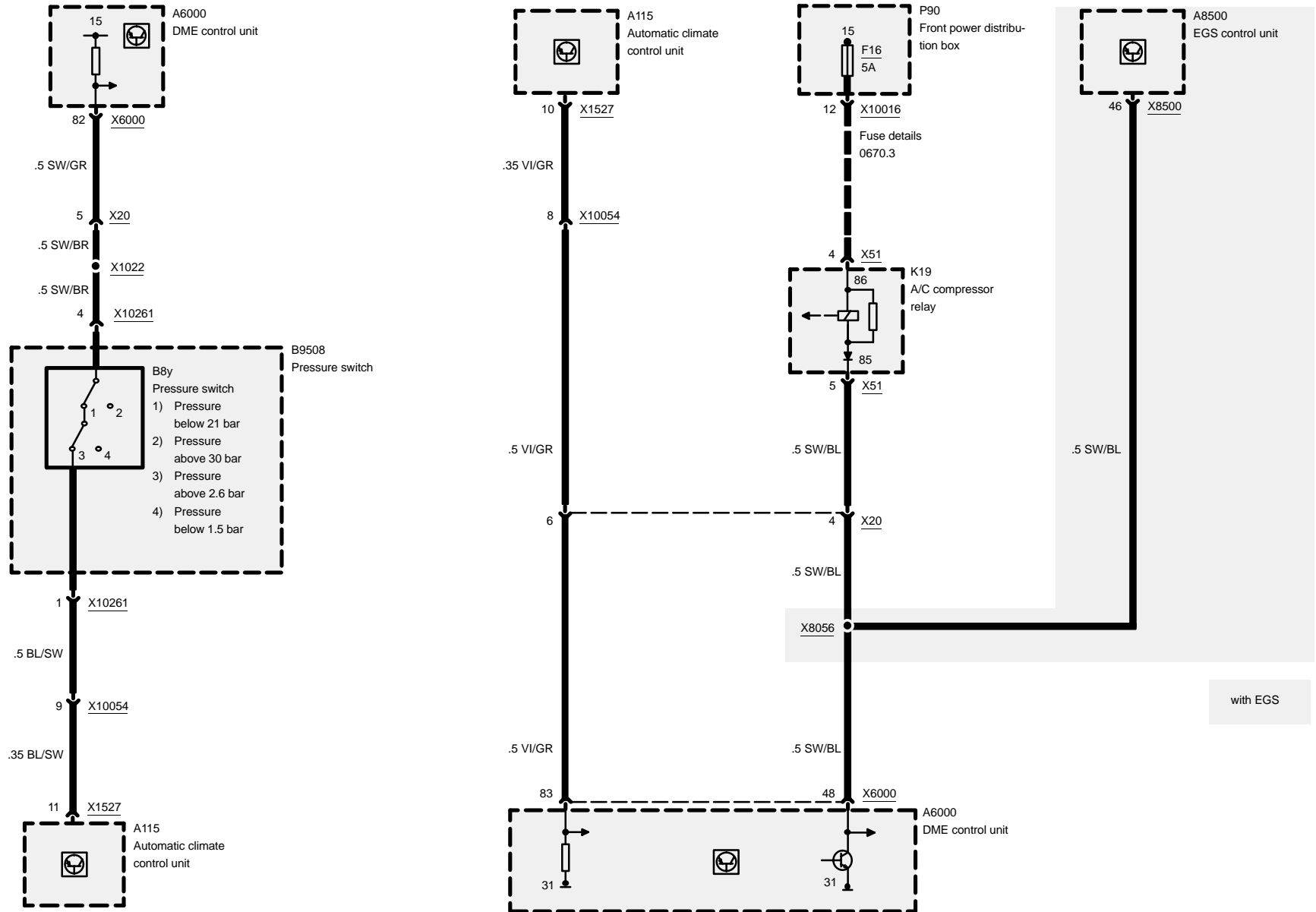
# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

## Diagnostic link



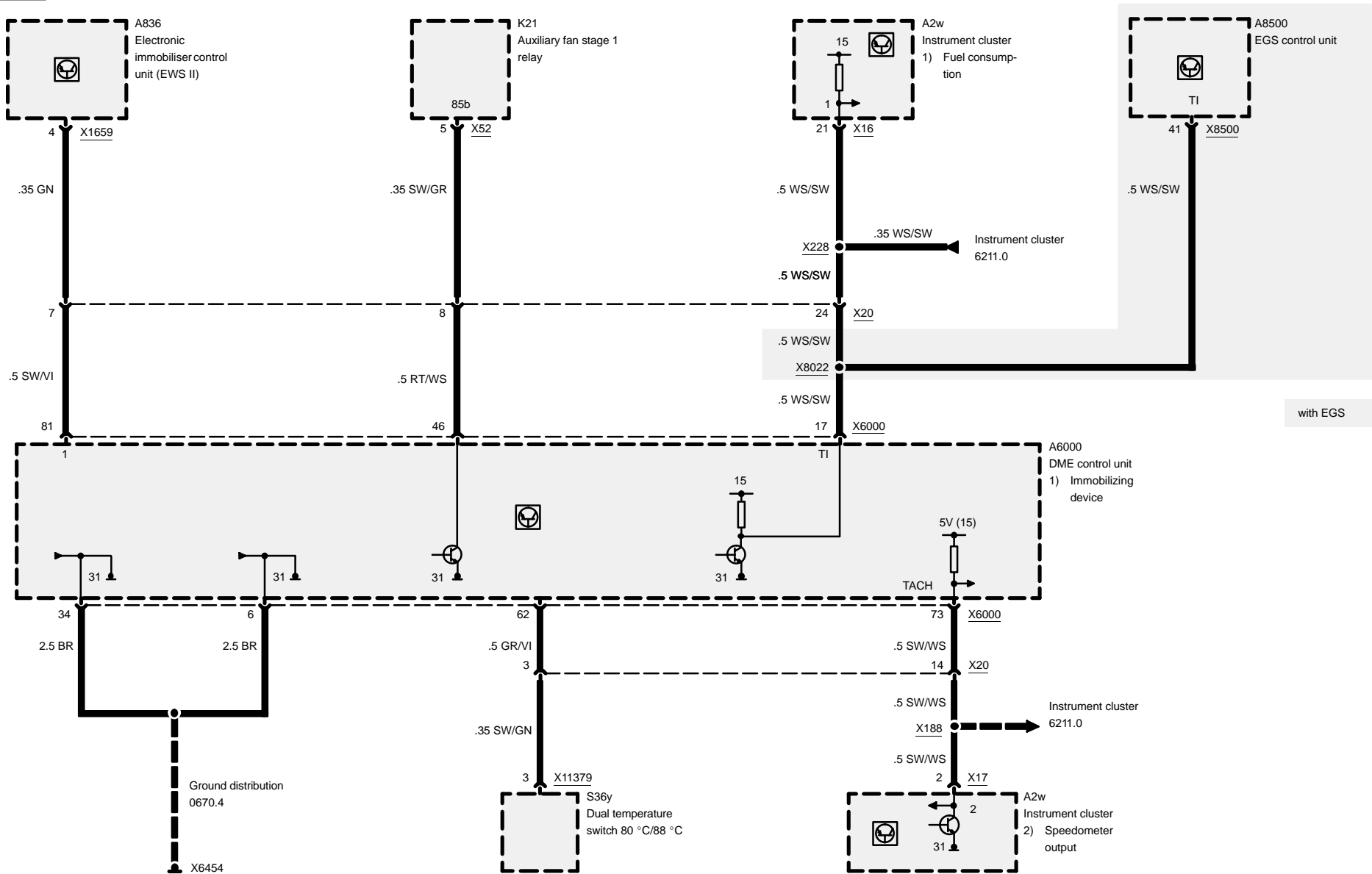


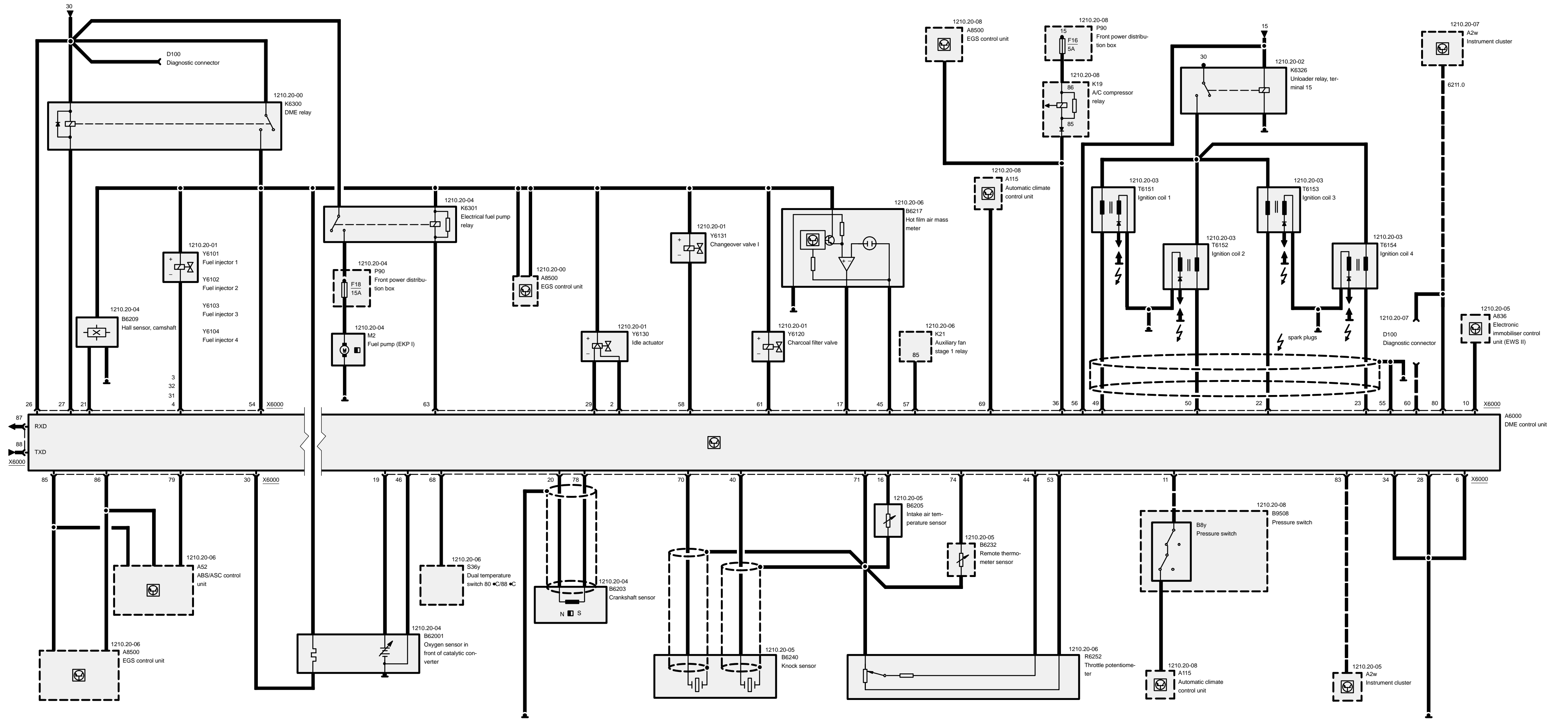
# Digital motor electronics (DME M1.7.3, 4-cylinder M43)

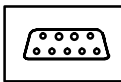




# Digital motor electronics (DME M1.7.3, 4-cylinder M43)





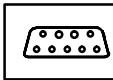


## Pin assignments

### X6000

Pin	Type	Description/Function	Connection
1		not used	
2	A	Idle actuator signal	Idle actuator
3	A	Injection signal	Injection valve, cyl. 1
4	A	Injection signal	Injection valve, cyl. 4
5		not used	
6	M	Ground, injection valve output stages	Ground connection
7		not used	
8		not used	
9		not used	
10	E	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
11	E	Air conditioning signal	Pressure switch
12		not used	
13		not used	
14		not used	
15		not used	
16	E	Temperature signal	Intake air temperature sensor
17	E	Signal input	Hot-film air mass meter
18		not used	
19	E	Oxygen sensor signal	Oxygen sensor
20	M	Component ground	Crankshaft sensor
21	E	Camshaft signal	Camshaft hall generator
22	A	Ignition signal, terminal 1	Ignition coil 3
23	A	Ignition signal, terminal 1	Ignition coil 4
24		not used	
25		not used	
26	E	Permanent positive, terminal 30	B+ terminal point
27	A	Activation, DME main relay	Terminal 85, DME main relay
28	M	Ground for electronics and sensor shielding	Ground connection
29	A	Idle actuator signal	Idle actuator
30	M	Component ground	Oxygen sensor heating
31	A	Injection signal	Injection valve, cyl. 3
32	A	Injection signal	Injection valve, cyl. 2
33		not used	

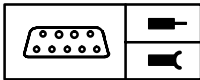
E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	M	Ground for remaining output stages (except ignition and injection valves)	Ground connection
35		not used	
36	A	Air conditioning ON signal	Relay, A/C compressor
37		not used	
38		not used	
39		not used	
40	E	Knock sensor signal, cyl. 3 and 4	Knock sensor
41		not used	
42		not used	
43		not used	
44	E	Throttle valve position	Throttle potentiometer
45	M	Component ground	Hot-film air mass meter
46	E	Oxygen sensor signal (-)	Oxygen sensor
47		not used	
48		not used	
49	A	Ignition signal, terminal 1	Ignition coil 1
50	A	Ignition signal, terminal 1	Ignition coil 2
51		not used	
52		not used	
53	A	5V component supply	Throttle potentiometer
54	E	B+ voltage	DME main relay
55	M	Ground, ignition	Ground connection
56	E	Ignition, terminal 15	Ignition lock
57	A	Auxiliary fan ON activation	Auxiliary fan relay, stage 1
58	A	Changeover valve signal	Changeover valve 1
59		not used	
60	E	Programming voltage	Diagnostic connector
61	A	Signal, fuel tank ventilation	Fuel tank ventilation valve
62		not used	
63	A	Relay activation, terminal 85	Electric fuel pump relay
64		not used	
65		not used	
66		not used	
67		not used	

E = Input, A = Output, M = Ground



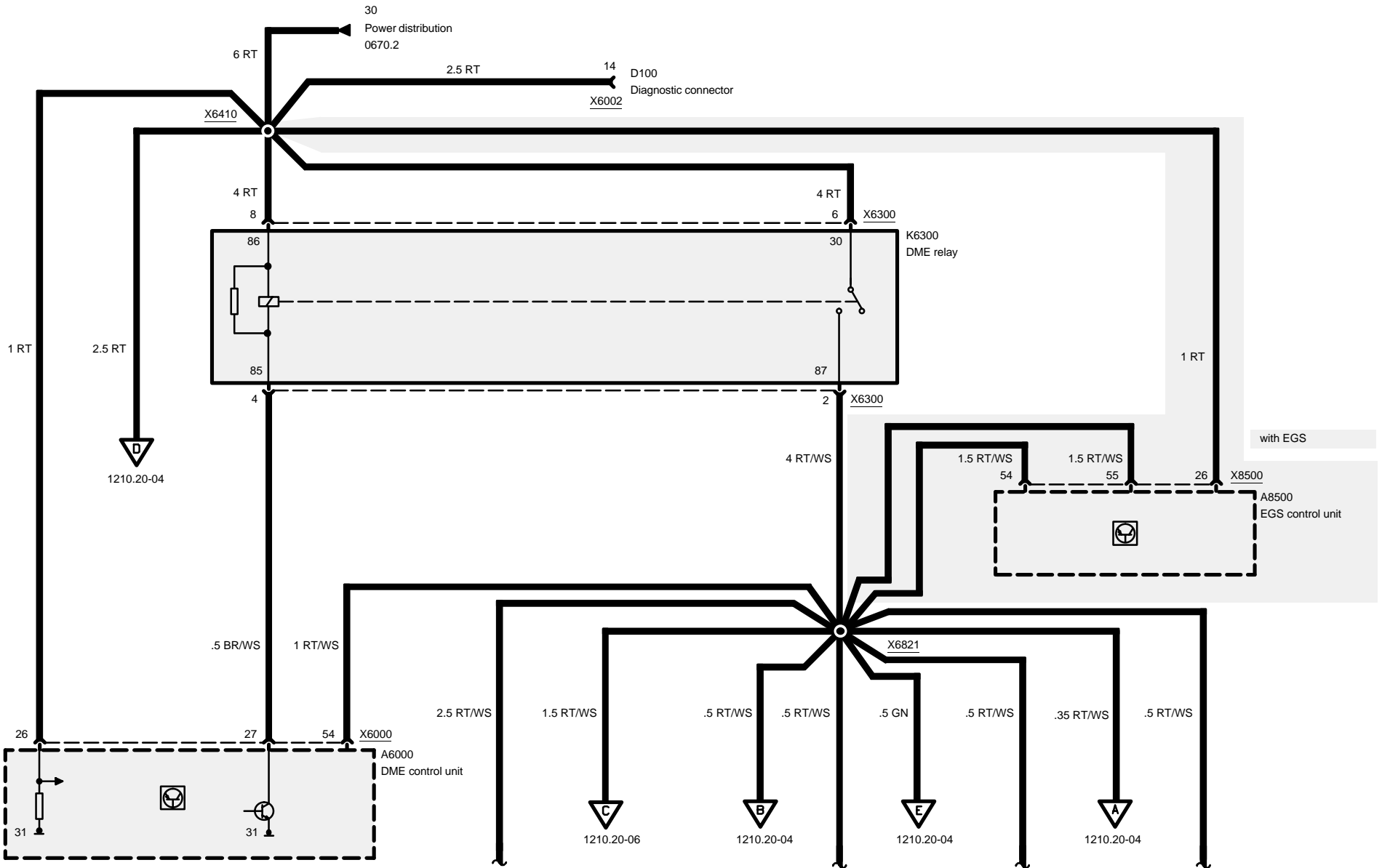
## Pin assignments

Pin	Type	Description/Function	Connection
68	E	Signal, water temperature above 80°C	Dual temperature switch
69	E	Air conditioning ON signal	A/C control unit
70	E	Knock sensor signal, cyl. 1 and 2	Knock sensor
71	M	Sensor ground	Water/intake-air temperature sensor, throttle potentiometer and knock sensors
72		not used	
73		not used	
74	E	Coolant temperature signal	Remote thermometer sensor
75		not used	
76		not used	
77		not used	
78	E	Crankshaft signal	Crankshaft sensor
79	E	Wheel speed signal, rear right	ASC control unit
80	A	TD signal	Instrument cluster
81		not used	
82		not used	
83	E	Vehicle speed signal	Instrument cluster
84		not used	
85	E/A	CAN-LOW	EGS/ASC control unit
86	E/A	CAN-HIGH	EGS/ASC control unit
87	A	RxD diagnostic link	Diagnostic connector
88	E/A	TxD diagnostic link	Diagnostic connector

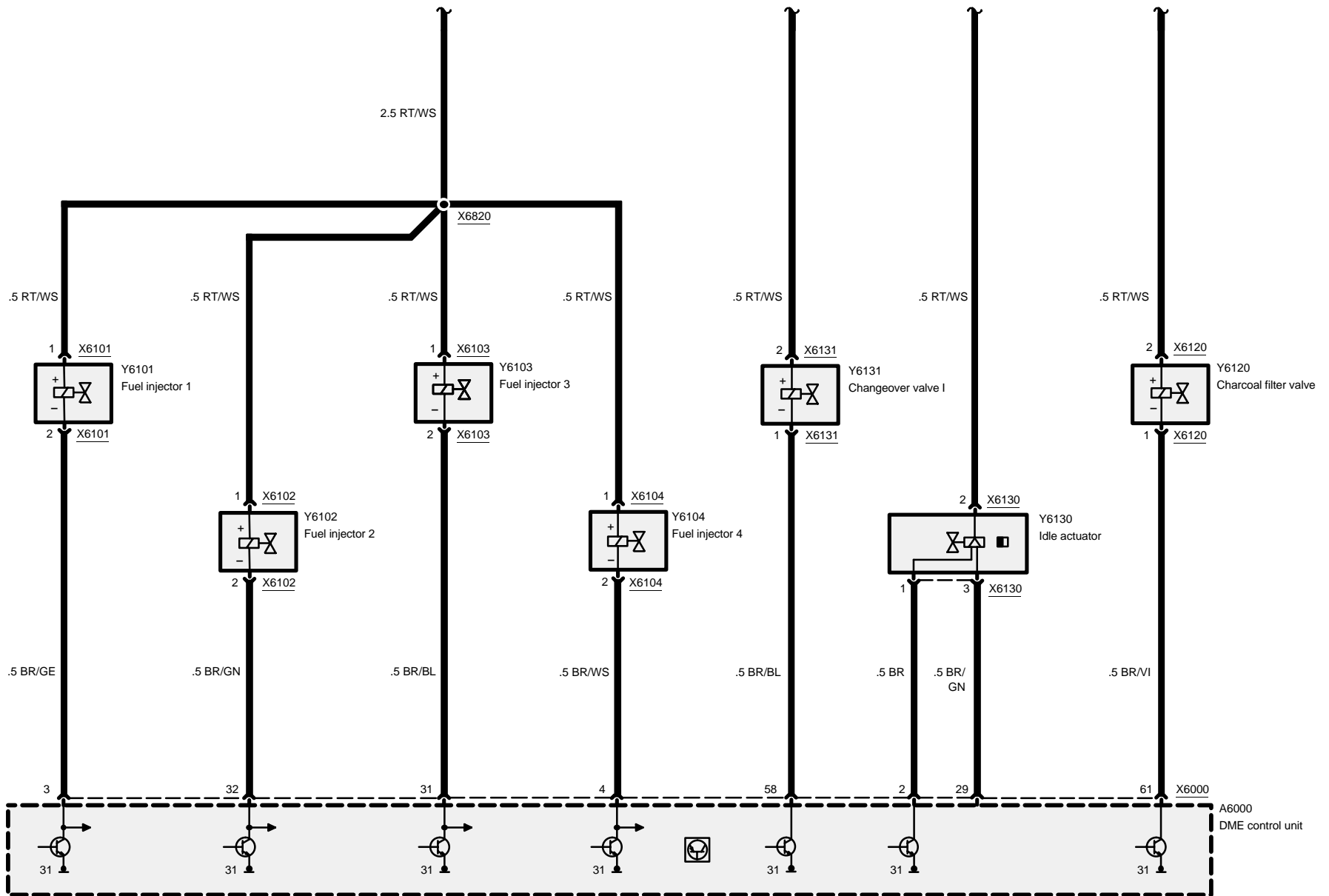


# Digital motor electronics (DME M5.2, 4-cylinder M44)

## Current, injector valves



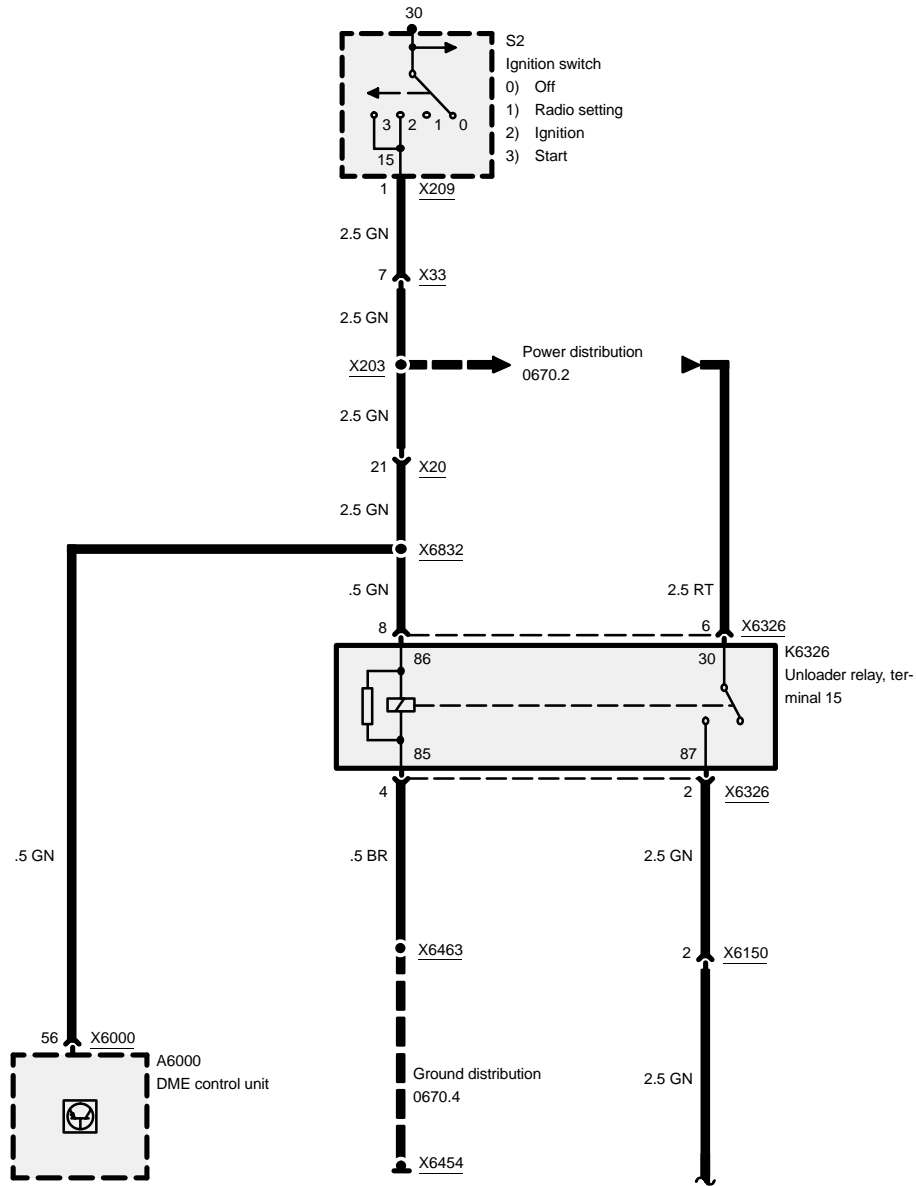


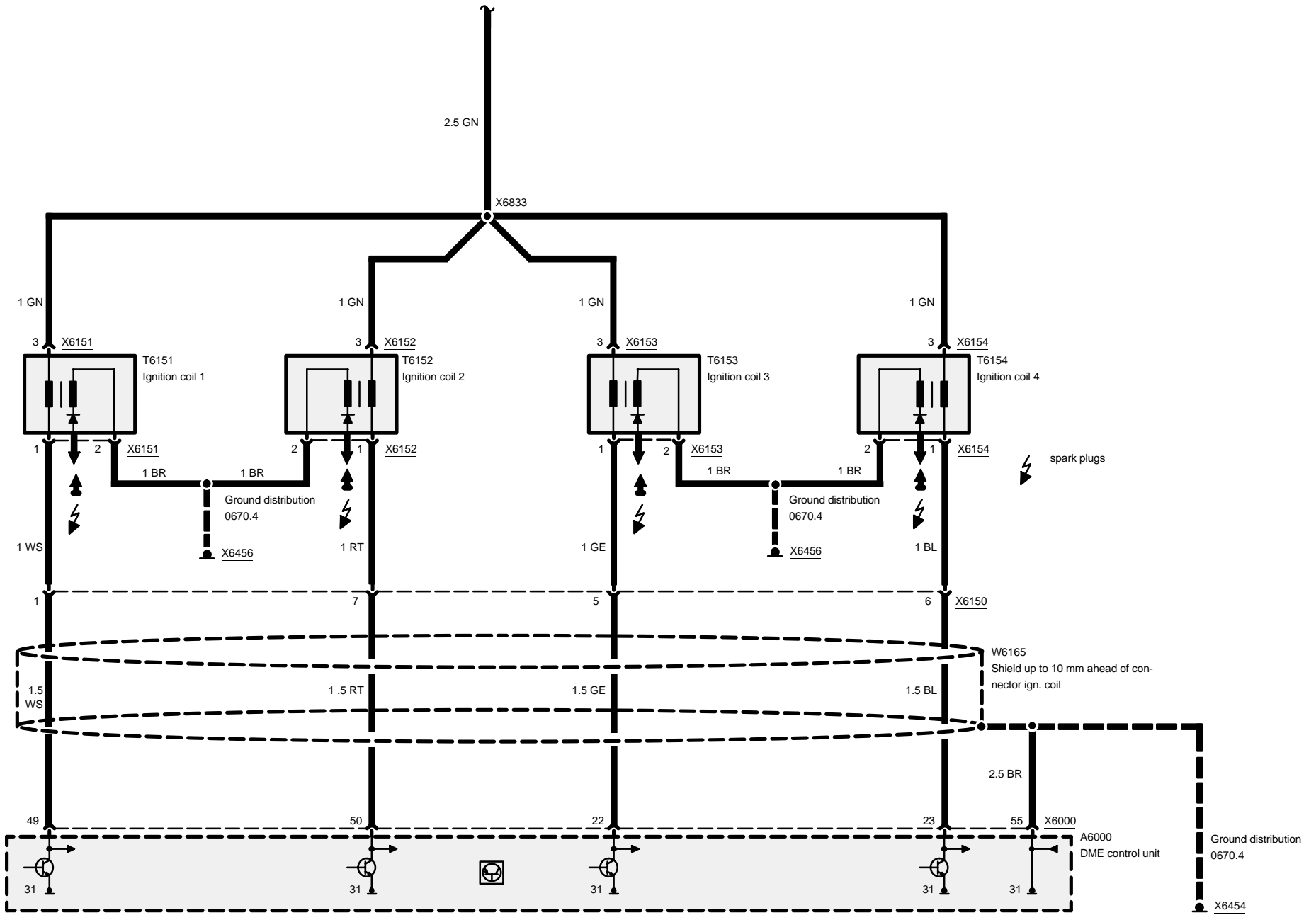




# Digital motor electronics (DME M5.2, 4-cylinder M44)

## Ignition coils

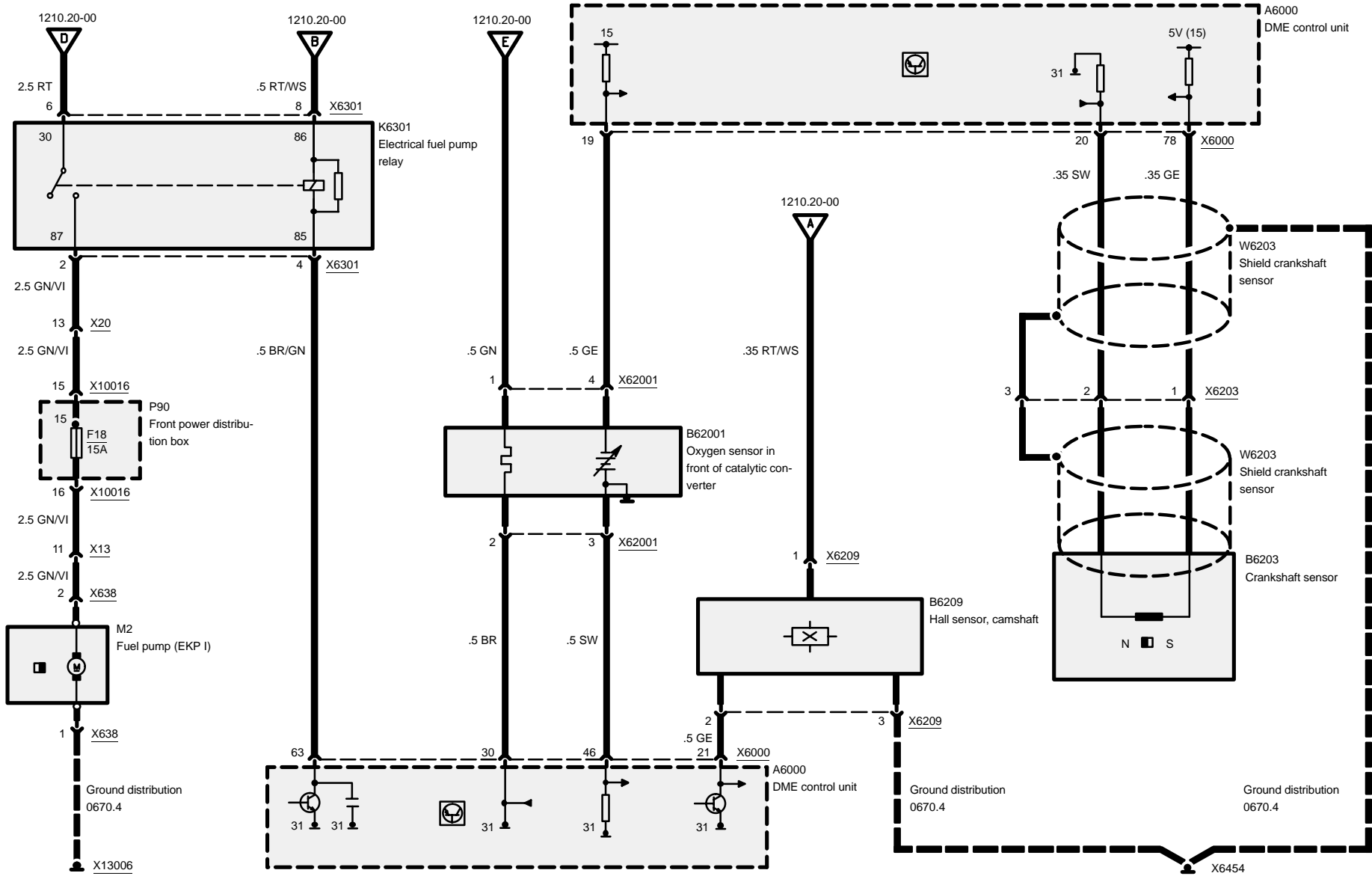






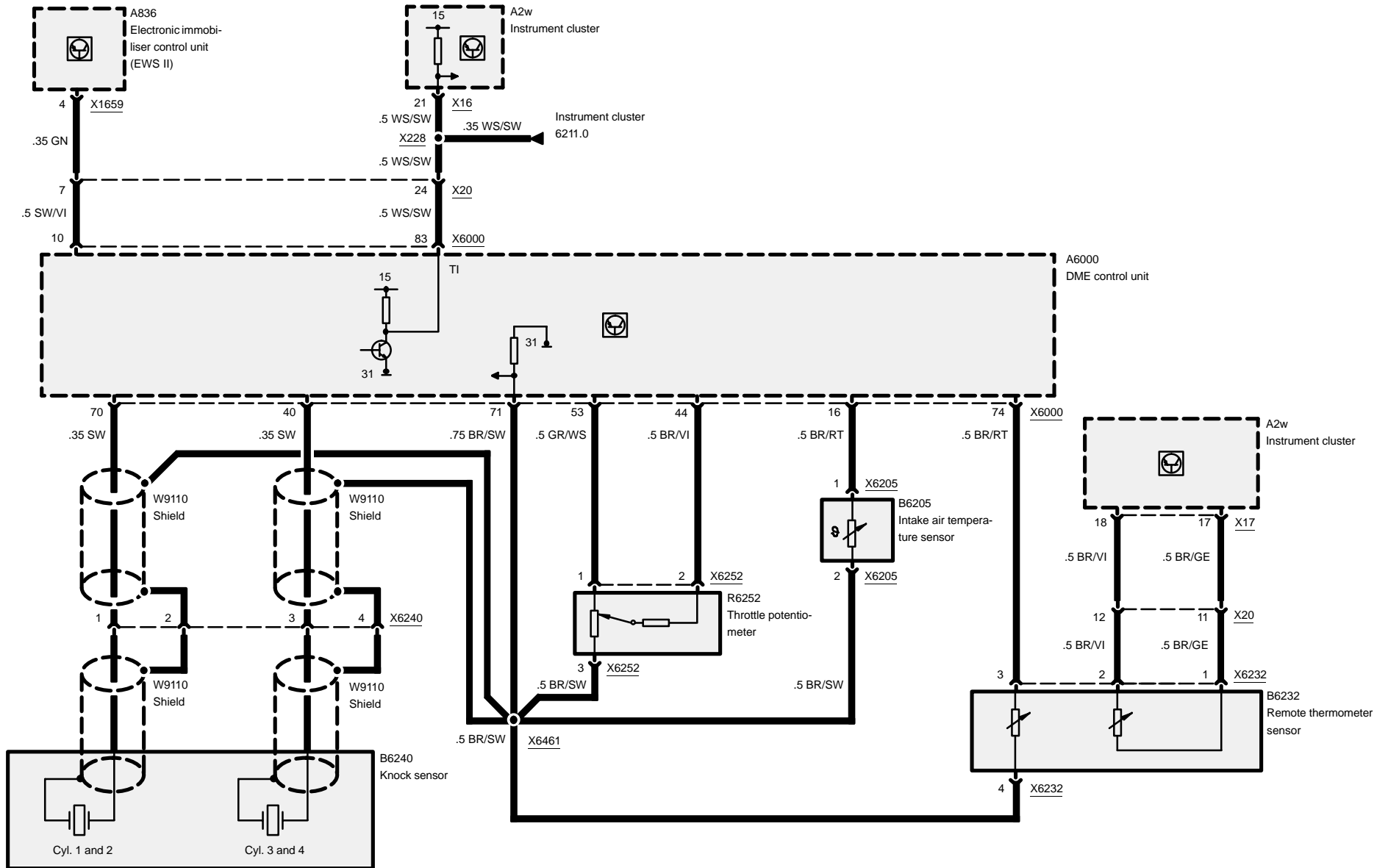
# Digital motor electronics (DME M5.2, 4-cylinder M44)

## Fuel pump, Oxygen sensor, shaft sensor



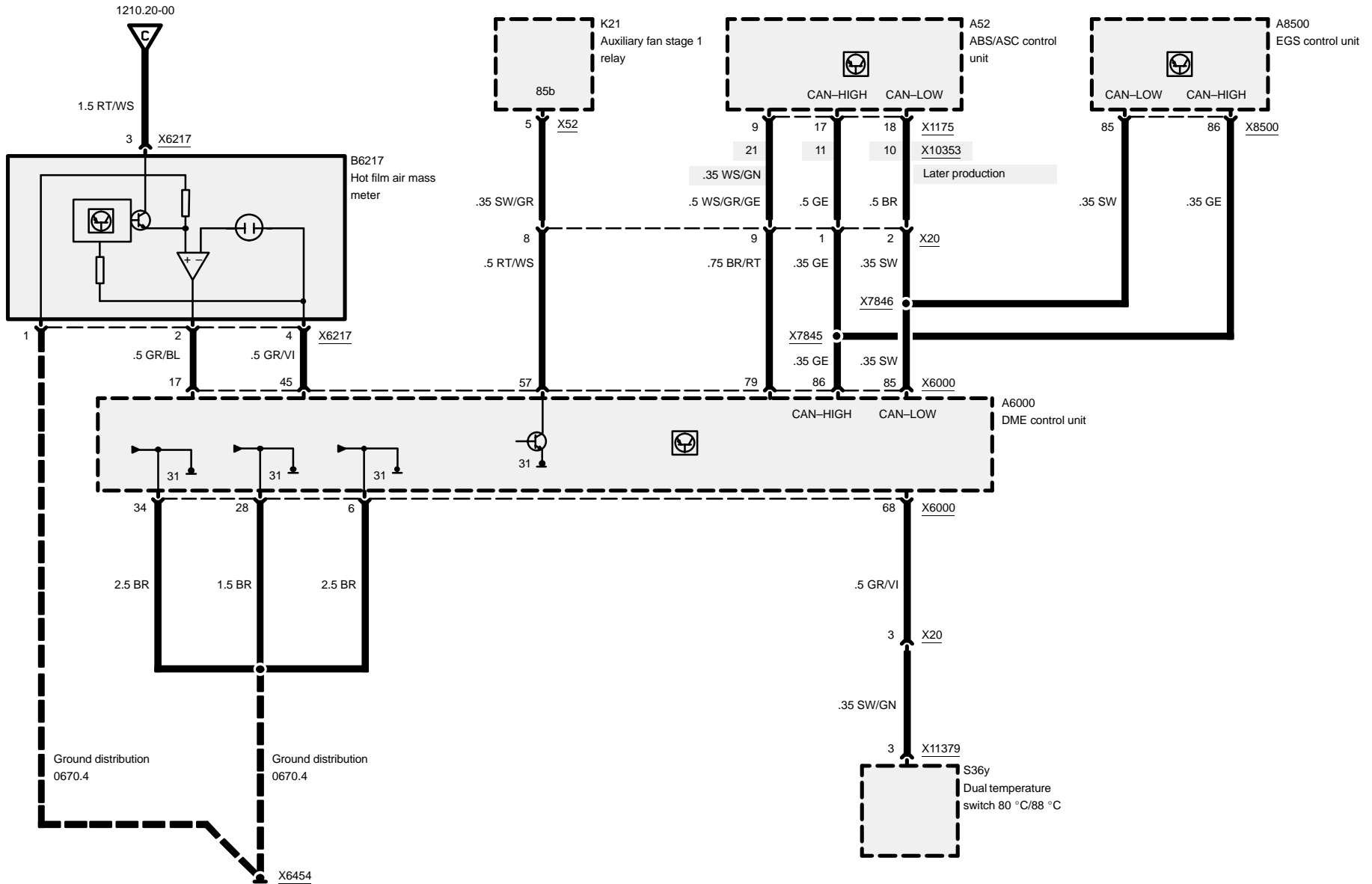


# Digital motor electronics (DME M5.2, 4-cylinder M44)





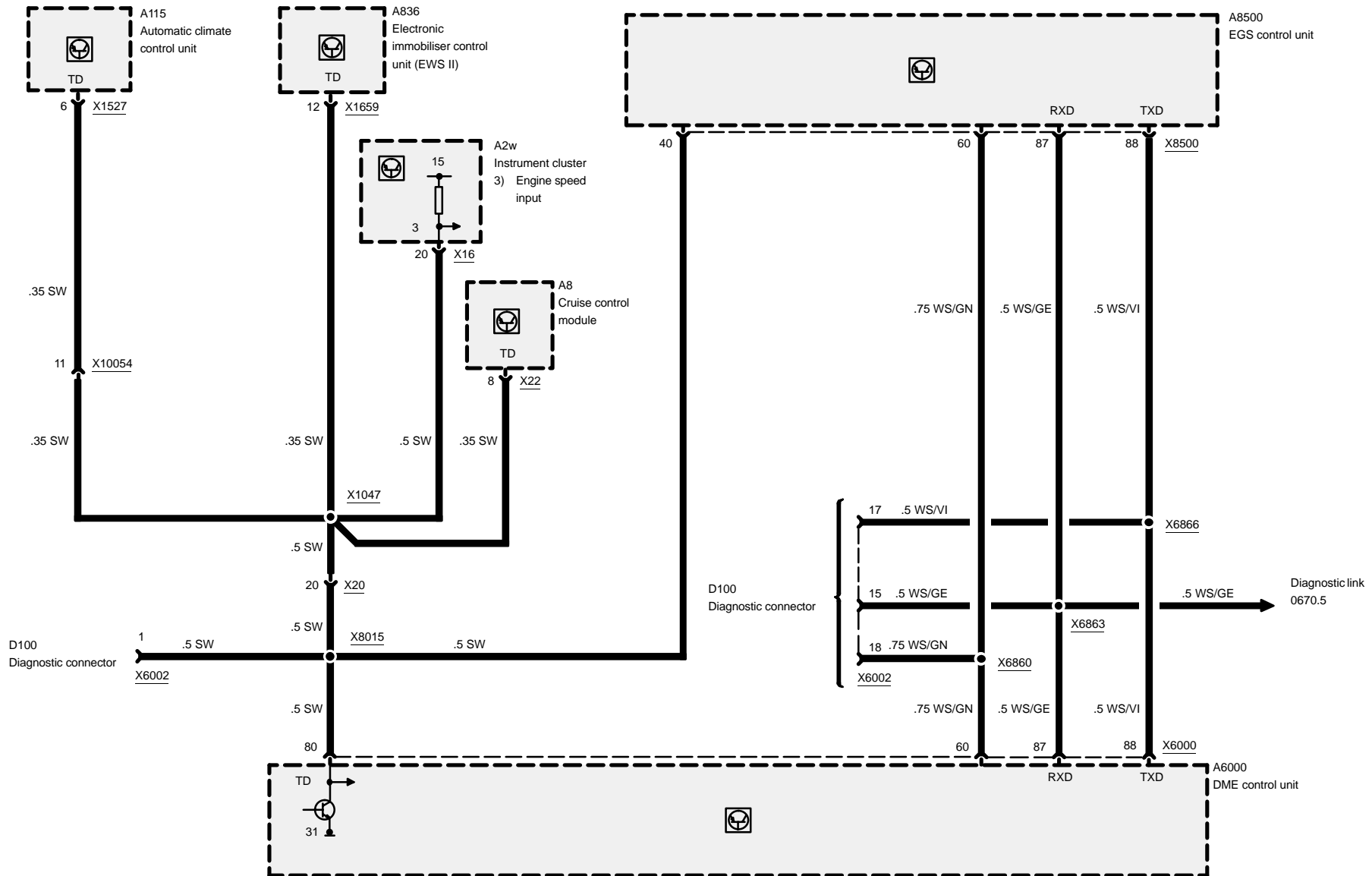
# Digital motor electronics (DME M5.2, 4-cylinder M44)





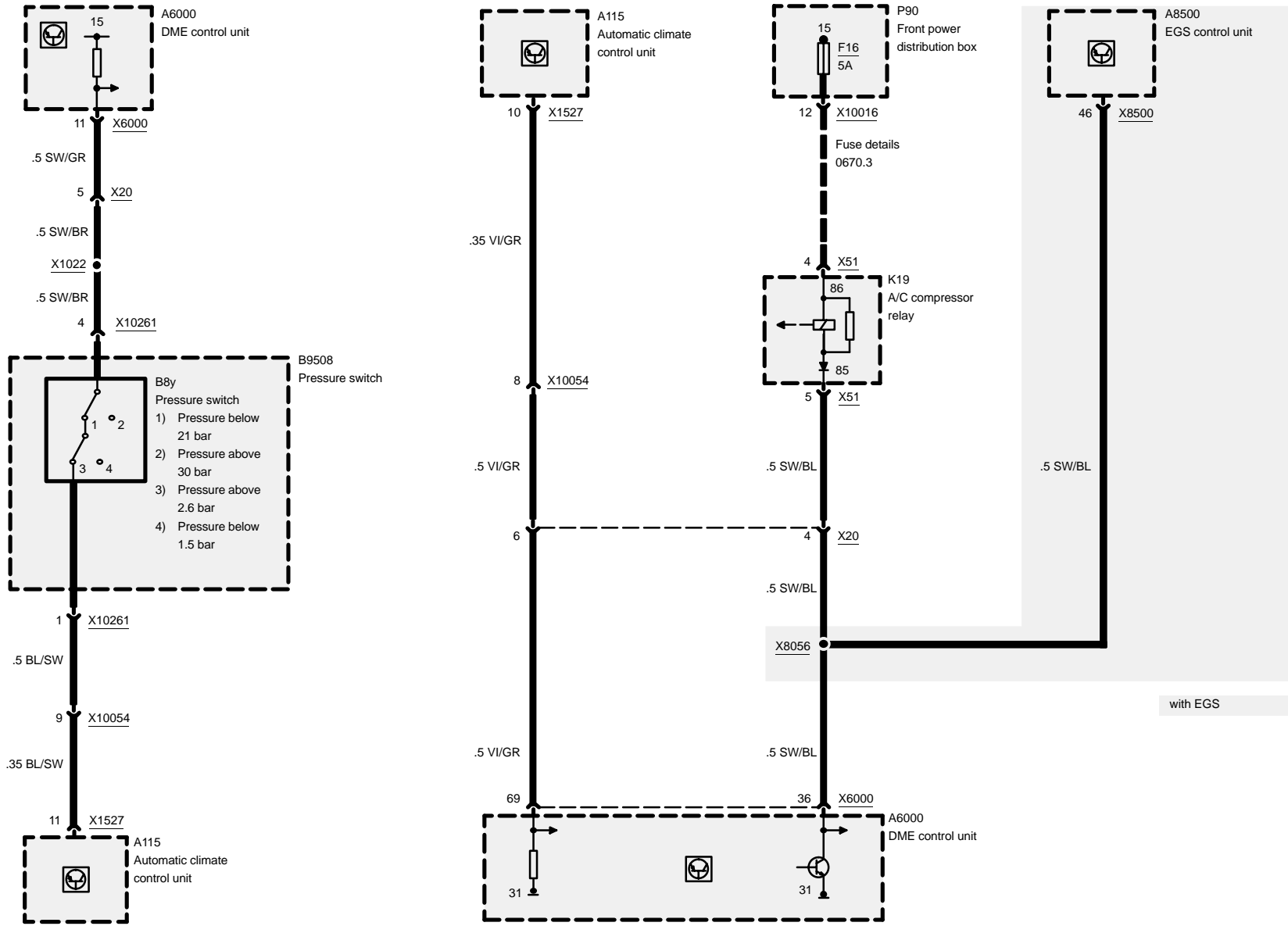
# Digital motor electronics (DME M5.2, 4-cylinder M44)

## Diagnostic link

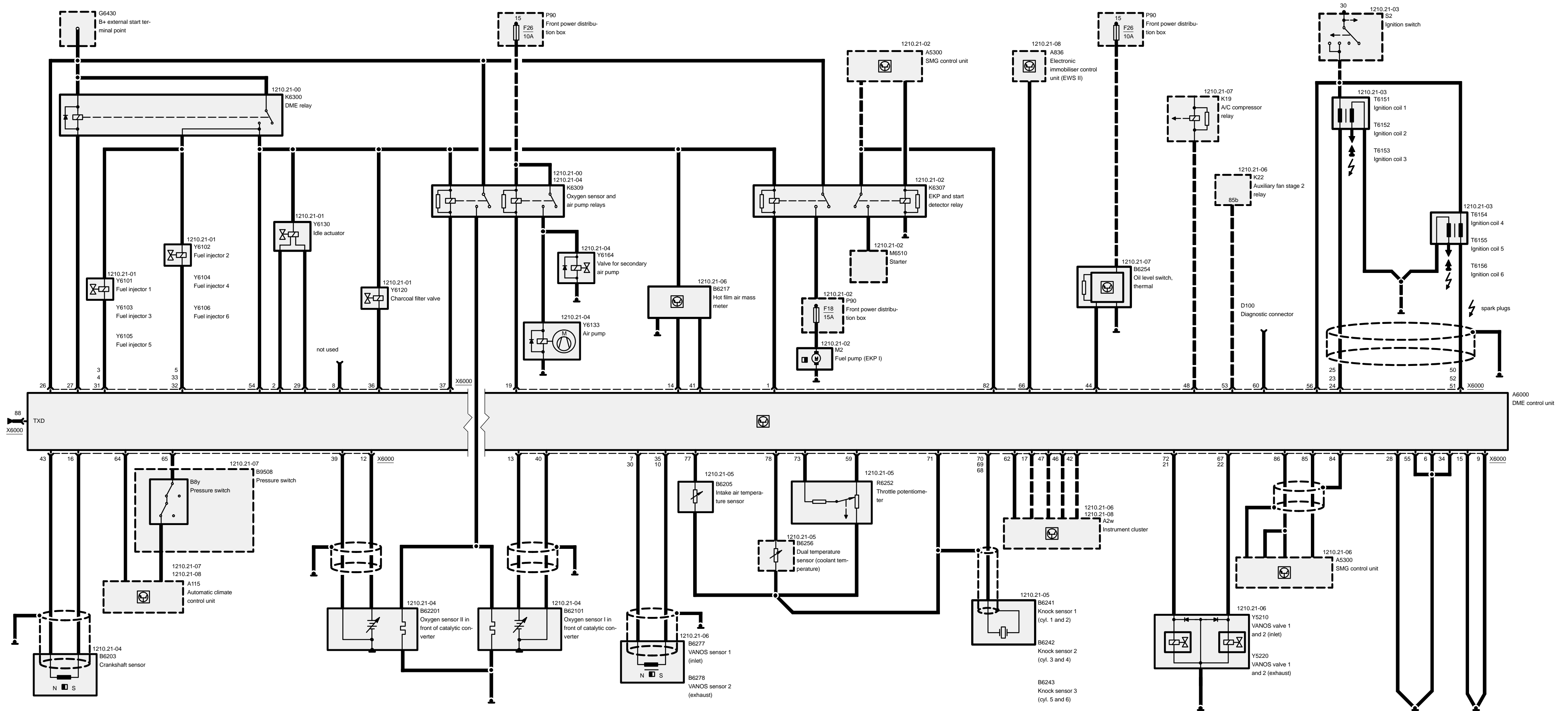


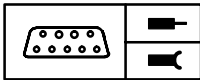


# Digital motor electronics (DME M5.2, 4-cylinder M44)







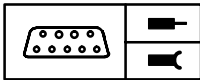


## Pin assignments

### X6000

Pin	Type	Description/Function	Connection
1	A	Electric fuel pump relay	Electric fuel pump relay
2	A	Close two-winding rotary actuator	Idle actuator
3	A	Injection valve 1	Injection valve
4	A	Injection valve 3	Injection valve
5	A	Injection valve 2	Injection valve
6	M	Ground for injection valves	Ground connection
7	E	VANOS signal (-)	VANOS sensor (intake)
8	A	Fault lamp	not used
9	M	Ground	Ground connection
10	E	VANOS signal (+)	VANOS sensor (exhaust)
11		not used	
12	E	Signal, oxygen sensor 2	Oxygen sensor 2
13	E	Signal, oxygen sensor 1	Oxygen sensor 1
14	M	Ground HLM (HFM)	Air mass meter
15	M	Signal, ignition monitor	Ground connection
16	E	Signal, crankshaft sensor	Crankshaft sensor
17	A	Oil level	Instrument cluster
18		not used	
19	A	Secondary air pump	Double relay
20		not used	
21	A	Retard adjustment	VANOS Valve 1 (exhaust)
22	A	Advance adjustment	VANOS Valve 2 (exhaust)
23	A	Ignition 2	Ignition coil
24	A	Ignition 3	Ignition coil
25	A	Ignition 1	Ignition coil
26	E	Permanent positive	B+ terminal point
27	A	Activation, main relay	Main relay
28	M	Ground, electronics/shield/sensors	Ground connection
29	A	Open two-winding rotary actuator	Idle actuator
30	E	VANOS signal (-)	VANOS sensor (exhaust)
31	A	Injection valve 5	Injection valve
32	A	Injection valve 6	Injection valve
33	A	Injection valve 4	Injection valve

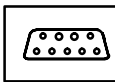
E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	M	Ground, remaining output stages	Ground connection
35	E	VANOS signal (+)	VANOS sensor (intake)
36	A	Fuel tank ventilation	Fuel tank ventilation valve
37	A	Oxygen sensor heating	Double relay
38		not used	
39	M	Ground, oxygen sensor 2	Oxygen sensor 2
40	M	Ground, oxygen sensor 1	Oxygen sensor 1
41	E	Signal, HLM (HFM)	Air mass meter
42	E	Vehicle speed signal	Instrument cluster
43	M	Ground, crankshaft sensor	Crankshaft sensor
44	E	Oil level	Thermal oil level switch
45		not used	
46	A	TI signal	Instrument cluster
47	A	TD signal	Instrument cluster
48	E	Signal, A/C compressor	Relay, A/C compressor
49		not used	
50	A	Ignition 4	Ignition coil
51	A	Ignition 6	Ignition coil
52	A	Ignition 5	Ignition coil
53	E	Fan signal	Relay, auxiliary fan 2
54	E	Battery voltage	DME relay
55	M	Ground, ignition	Ground point
56	E	Terminal 15	Ignition switch
57		not used	
58		not used	
59	A	+5V supply	Throttle potentiometer
60	E	Programming voltage input	Diagnostic connector
61		not used	
62	A	Signal, upshift	Indicator, upshift
63		not used	
64	E	Signal, air conditioning ready	A/C control unit
65	E	Signal, A/C compressor	Pressure switch
66	E	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
67	A	Advance adjustment	VANOS valve 2
68	E	Signal (+)	Knock sensor 3

E = Input, A = Output, M = Ground



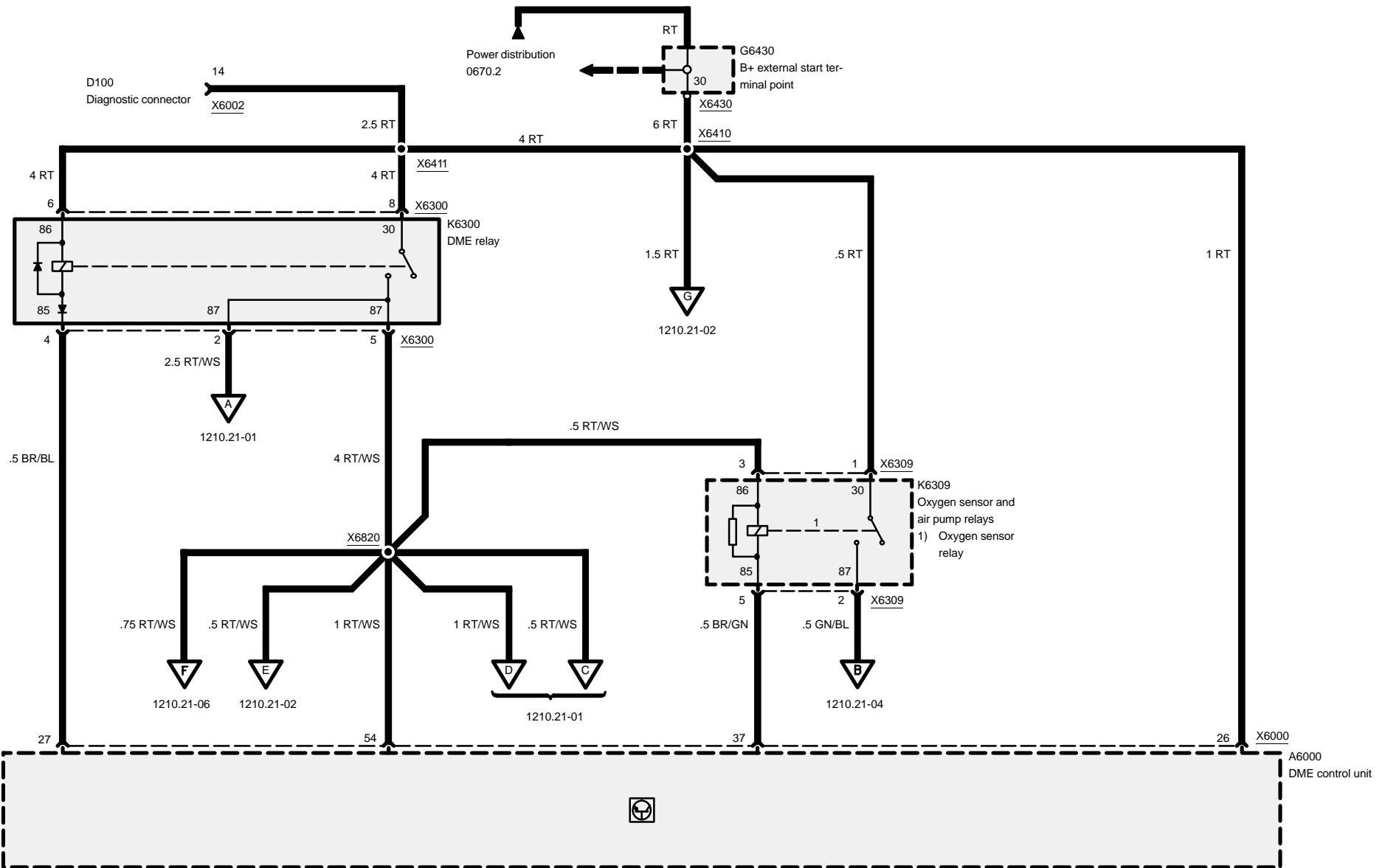
## Pin assignments

Pin	Type	Description/Function	Connection
69	E	Signal (+)	Knock sensor 2
70	E	Signal (+)	Knock sensor 1
71	M	Ground, analog signals and knock sensors	Sensors
72	A	Retard adjustment	VANOS valve 1 (intake)
73	E	Signal, throttle (DK) sensor	Throttle potentiometer
74		not used	
75		not used	
76		not used	
77	E	Intake air temperature	Intake air temperature sensor
78	E	Coolant temperature	Coolant temperature sensor
79		not used	
80	E	Signal, gear recognition	Clutch switch
81		not used	
82	E	Start speed recognition	Start detection relay
83		not used	
84	M	CAN shield	Diagnostic connector
85	E/A	CAN-L	Diagnostic connector
86	E/A	CAN-H	Diagnostic connector
87		not used	
88	E/A	TxD diagnostic link	Diagnostic connector



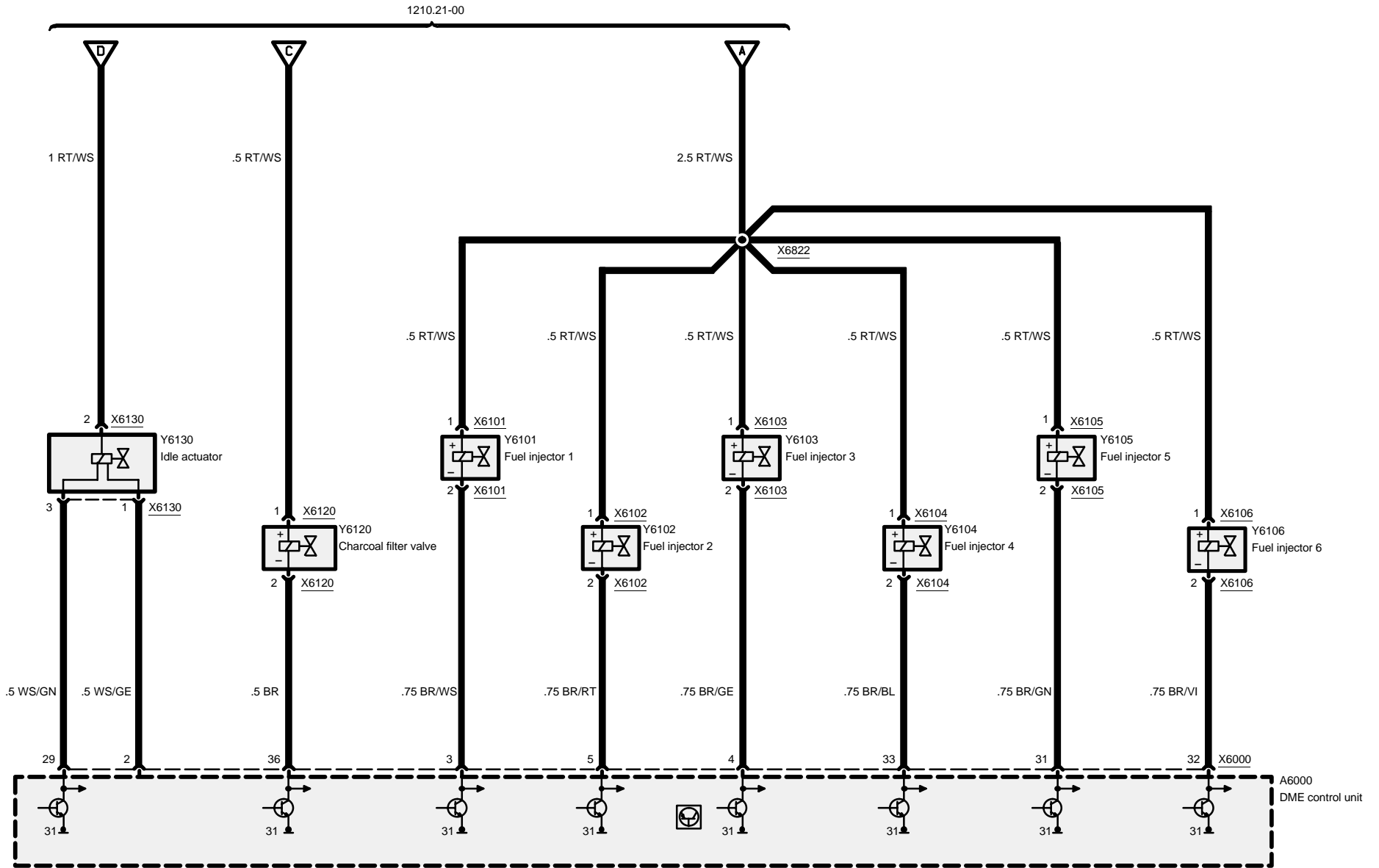
# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)

## Current





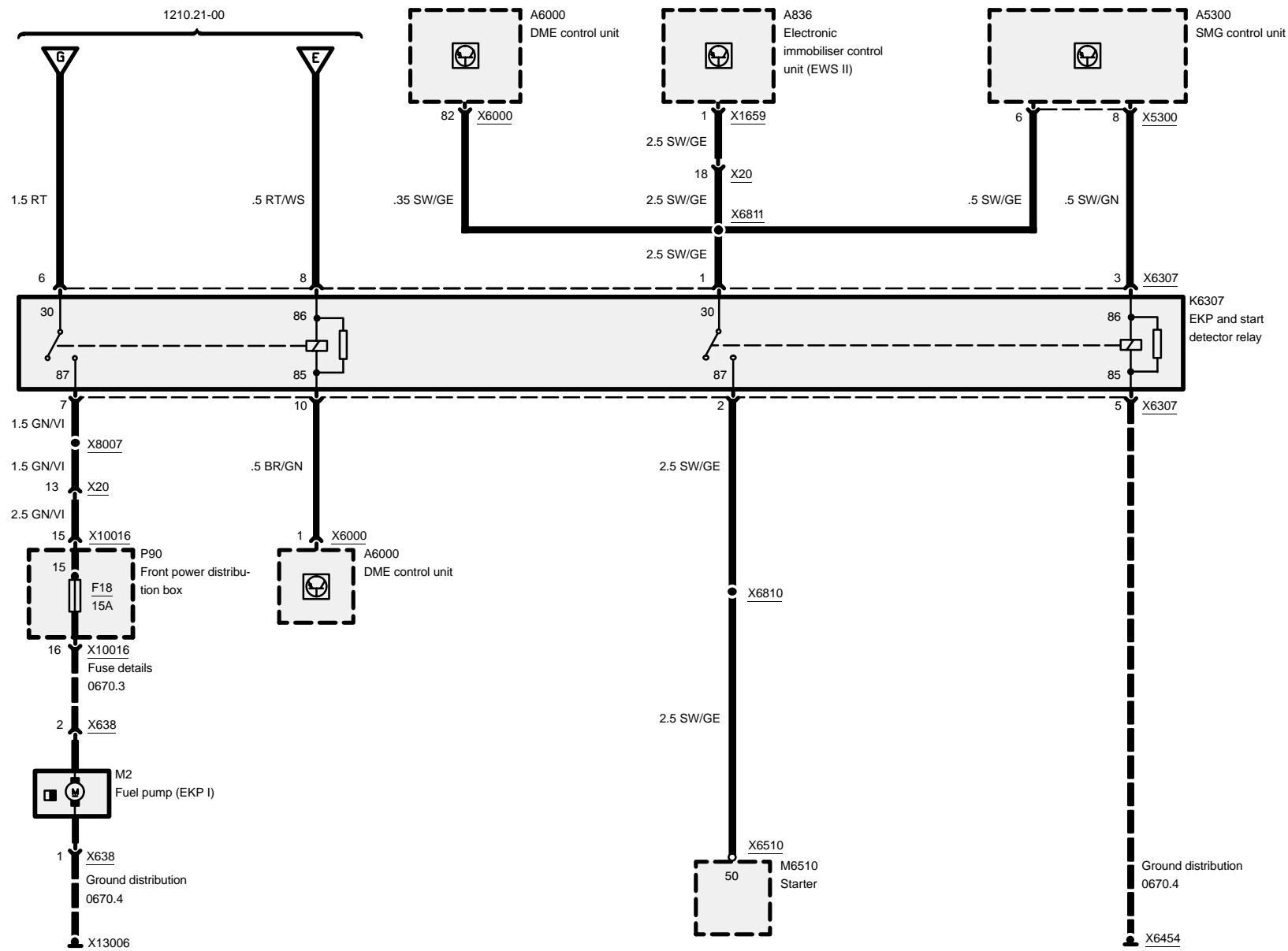
# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)





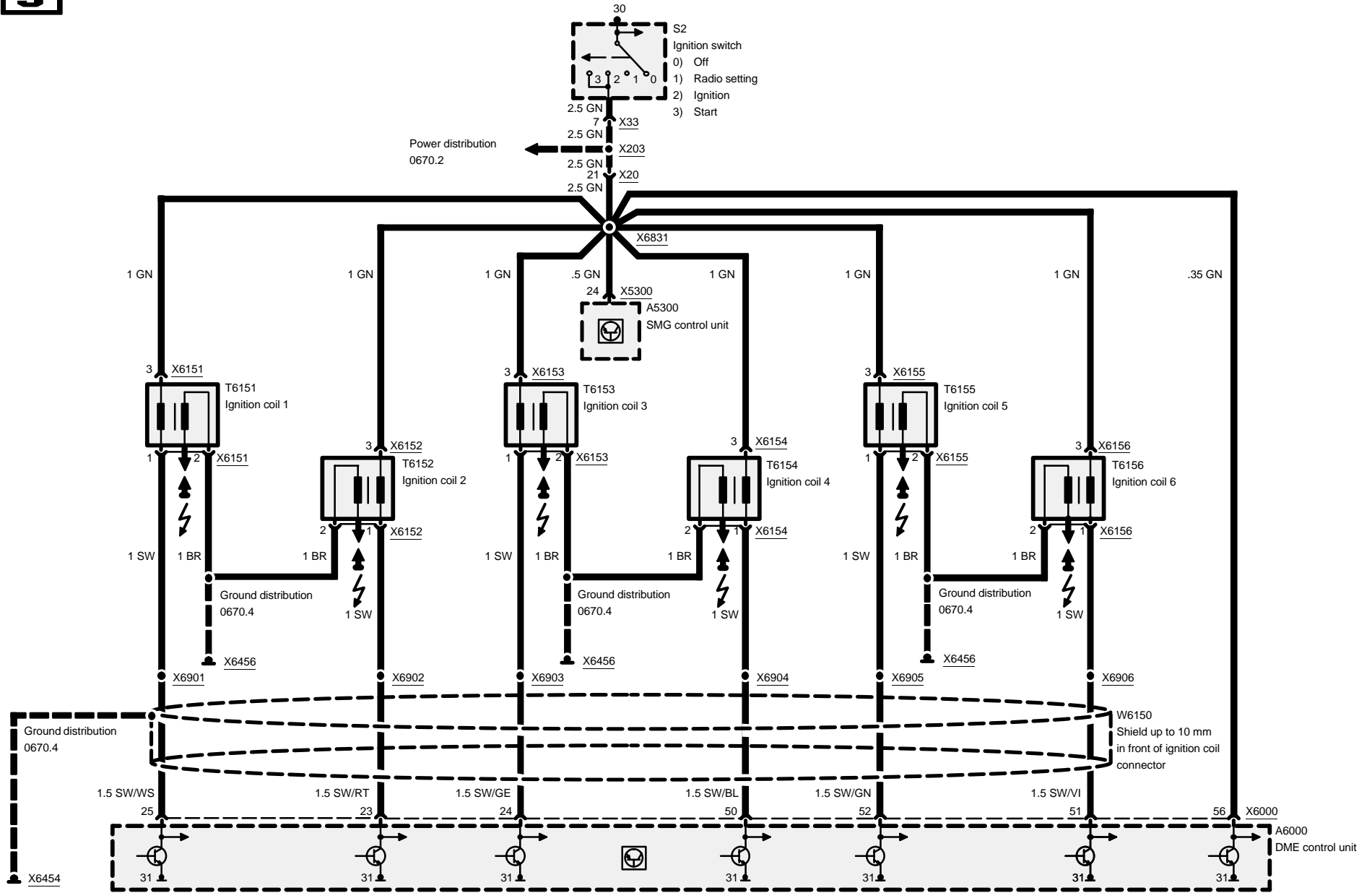
# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)

## Current





# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)

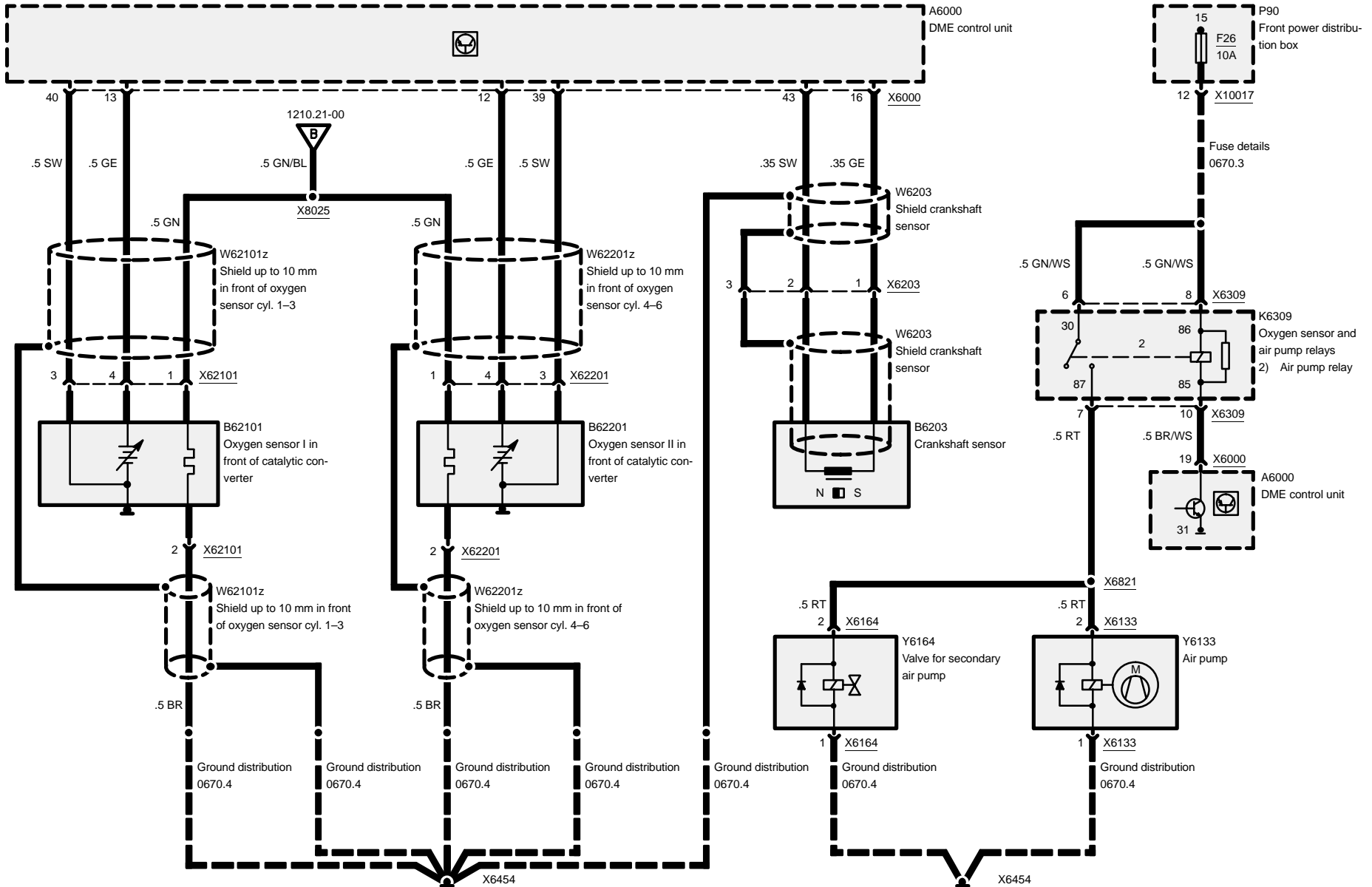






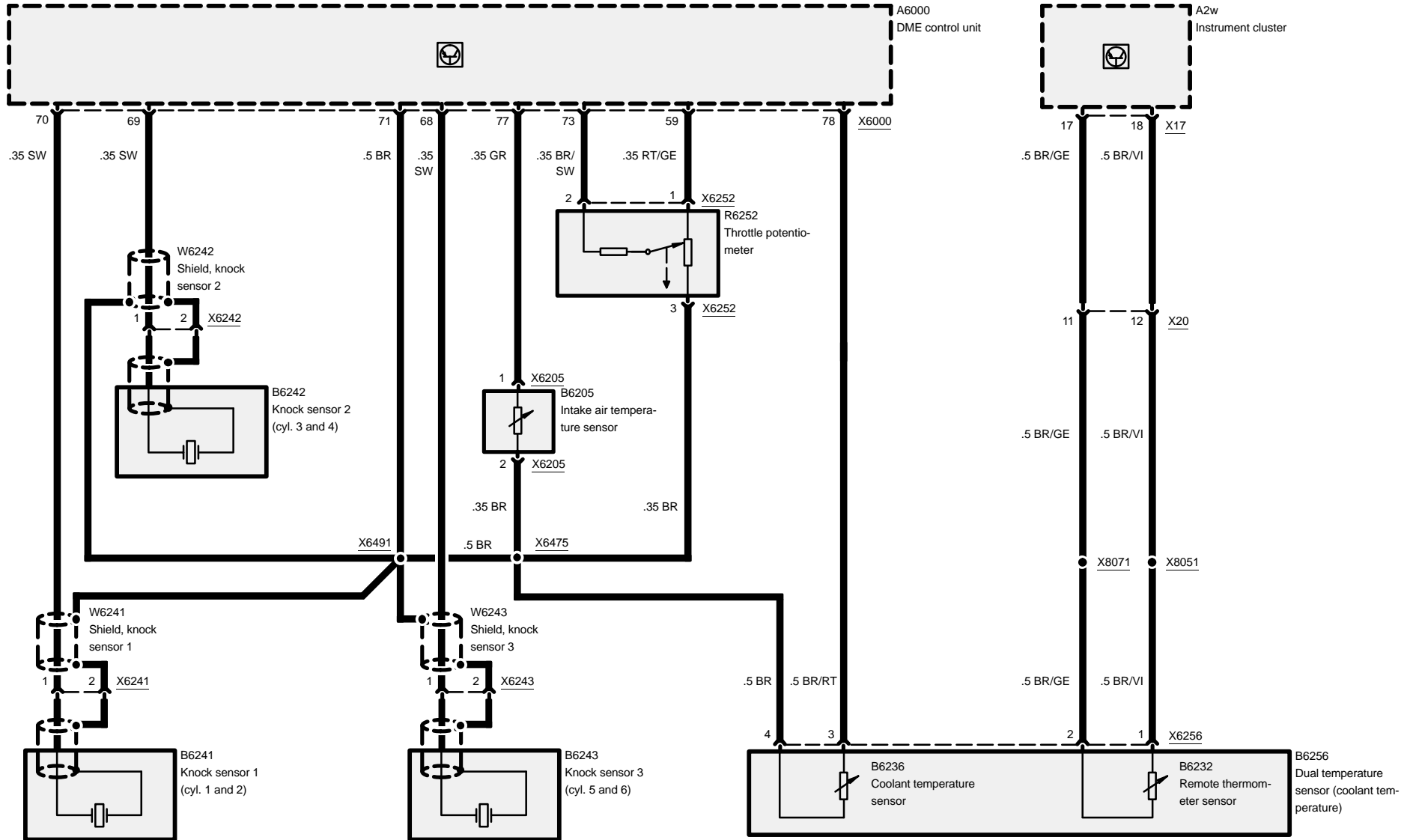
# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)

## Oxygen sensors, crankshaft sensor, air pump





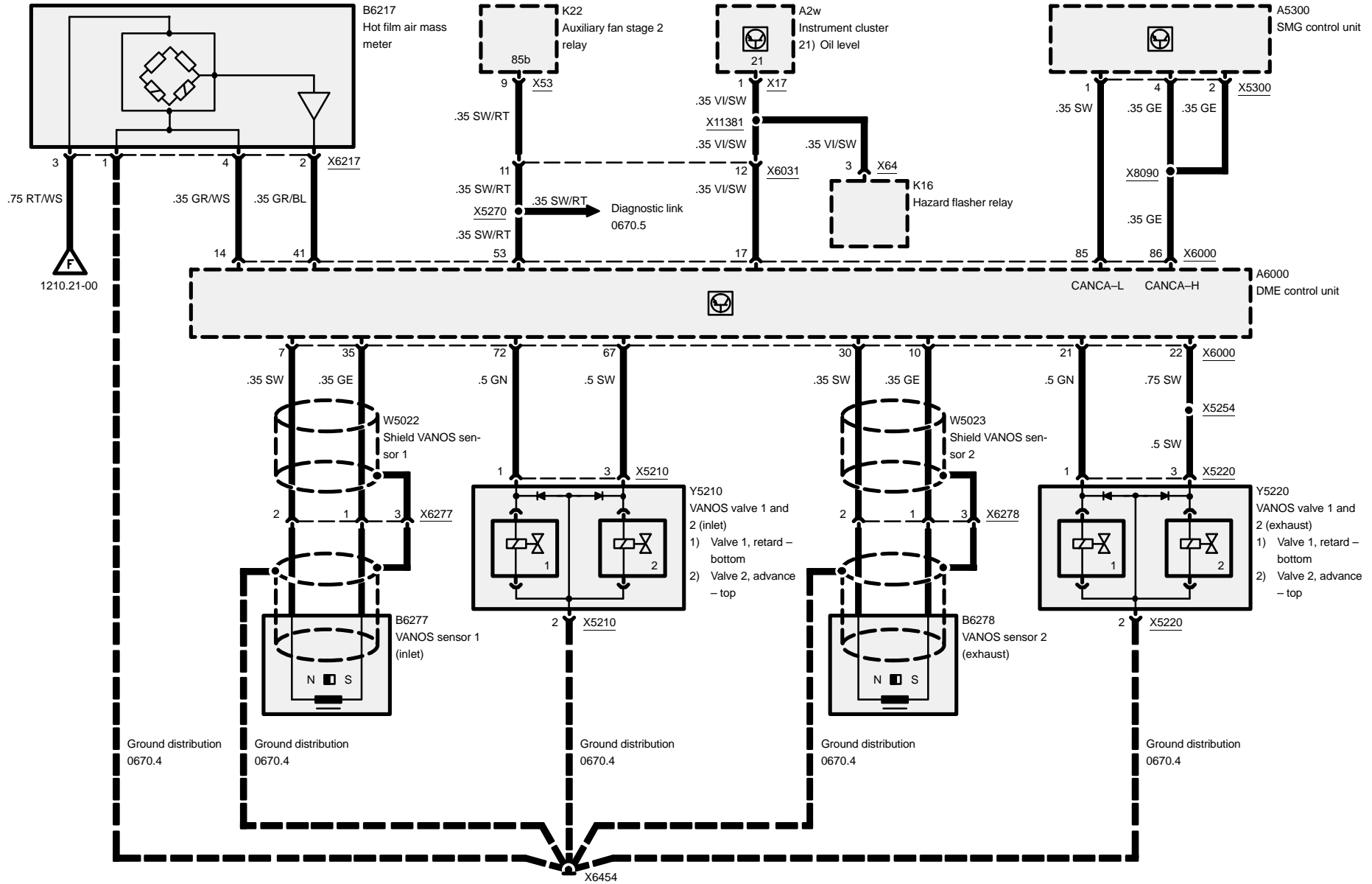
# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)





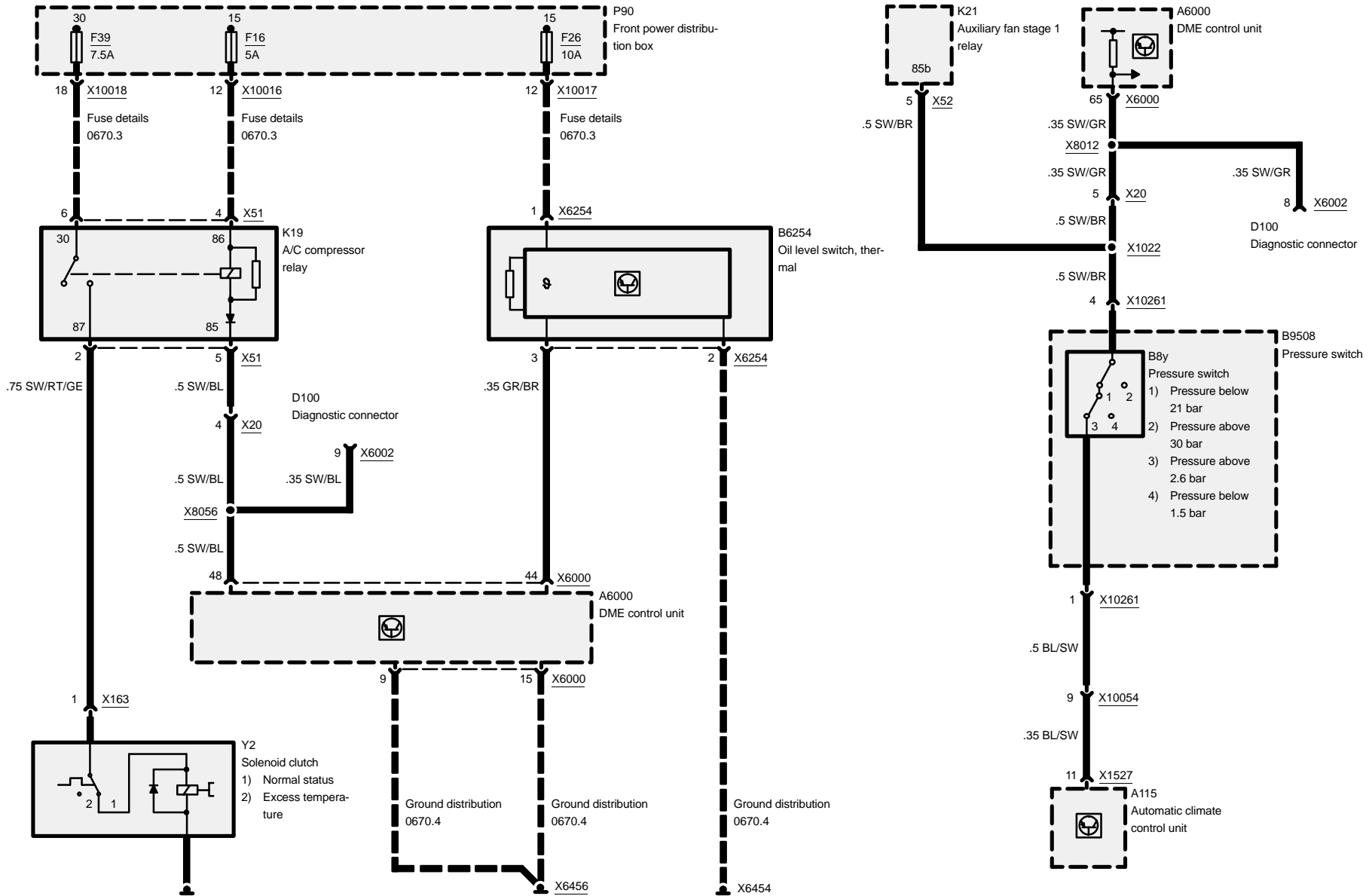
# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)

## VANOS, air mass meter



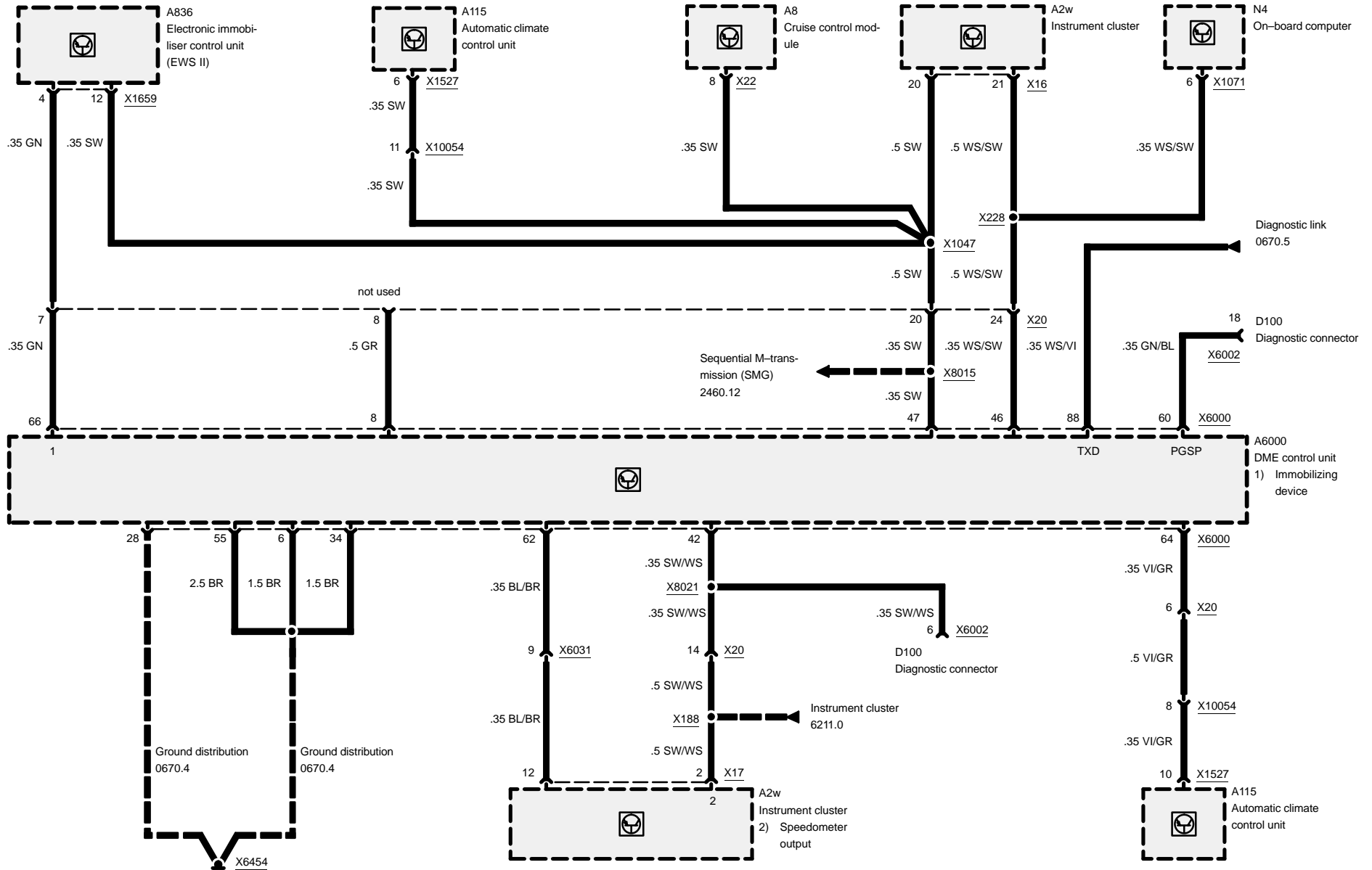


# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)



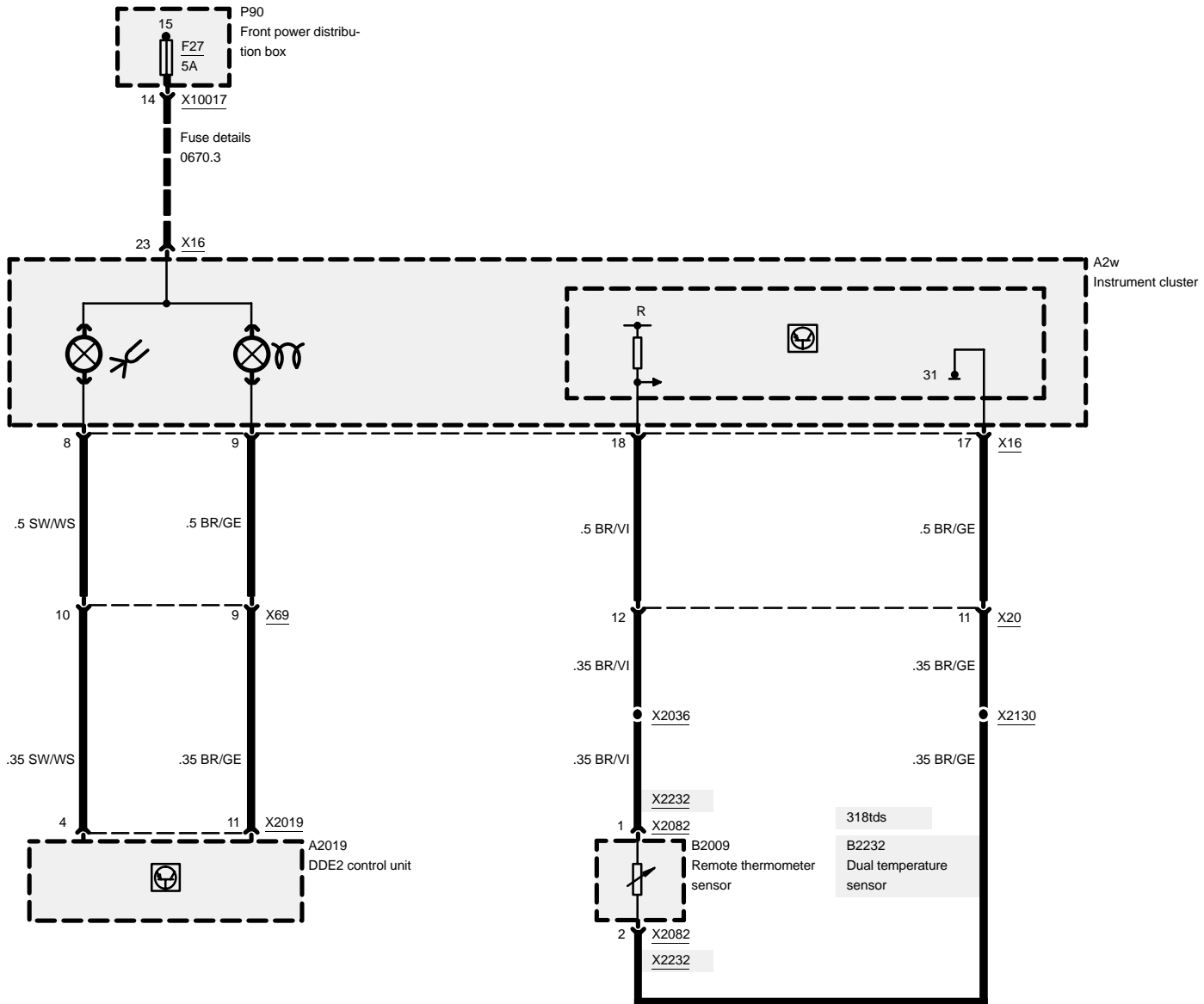


# Digital motor electronics (DME MSS50, 6-cylinder S50 B32)





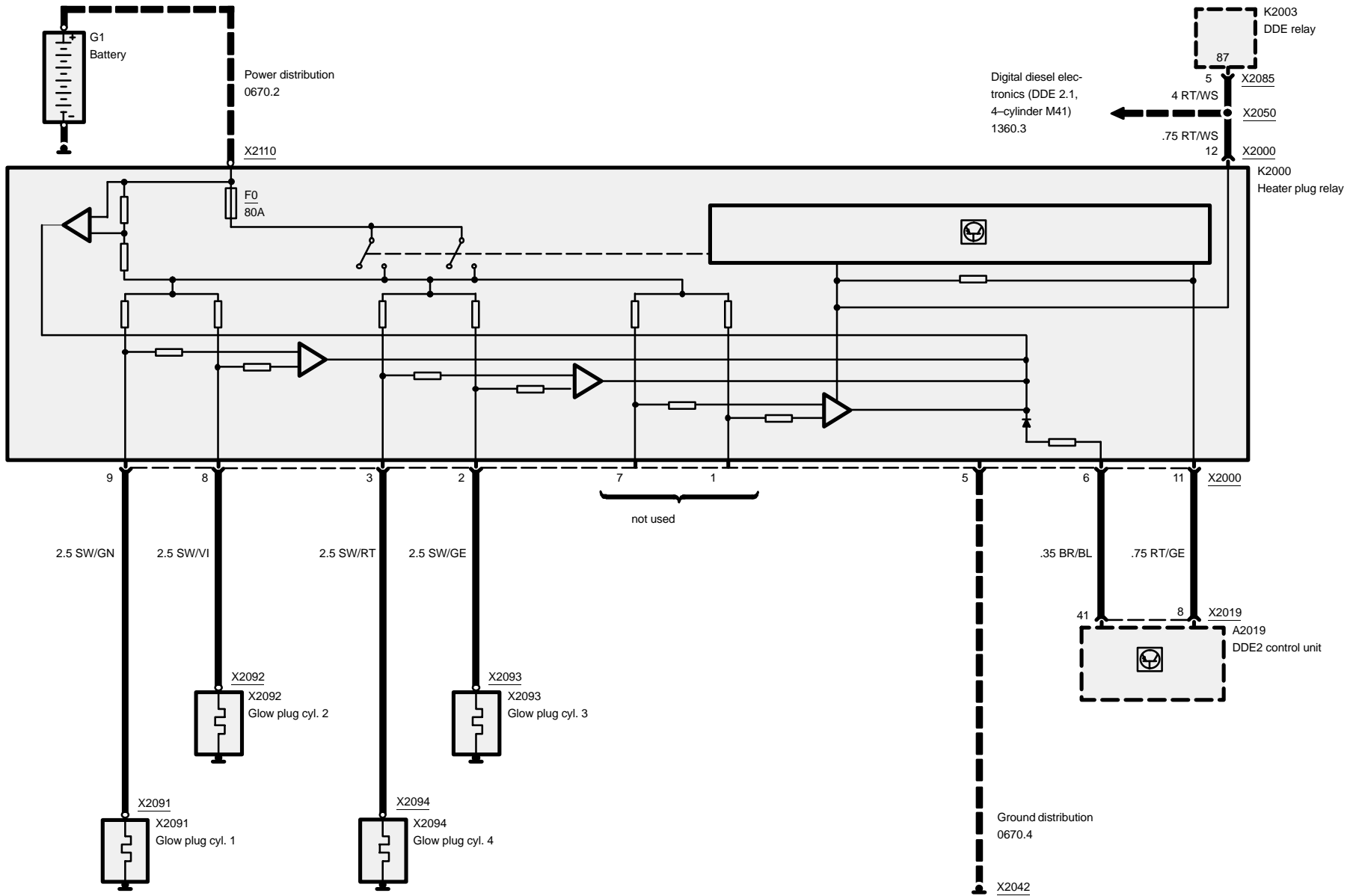
# 1220.0 Preheating system





# Preheating system

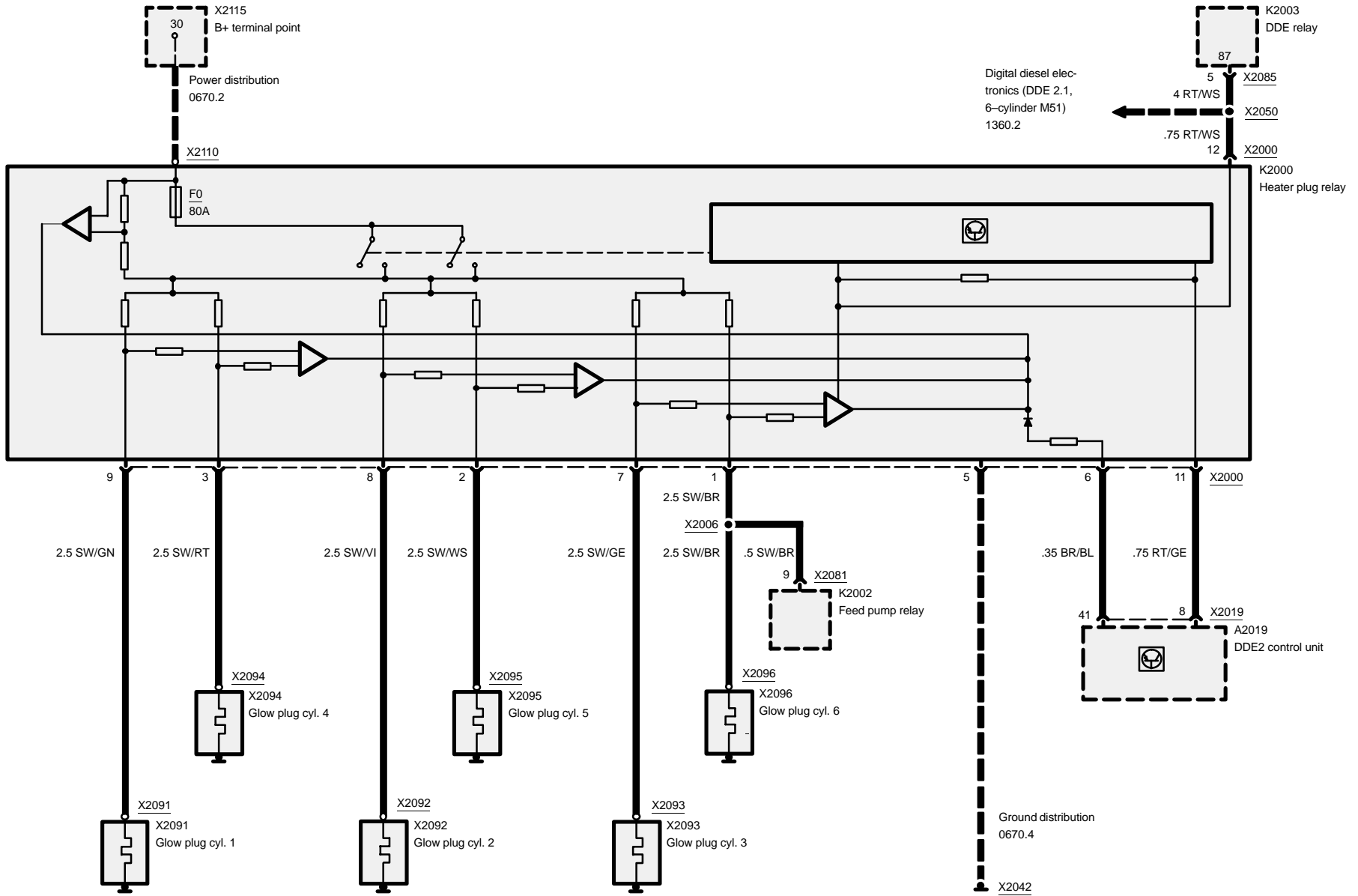
318tds





# Preheating system

## 325td, 325tds

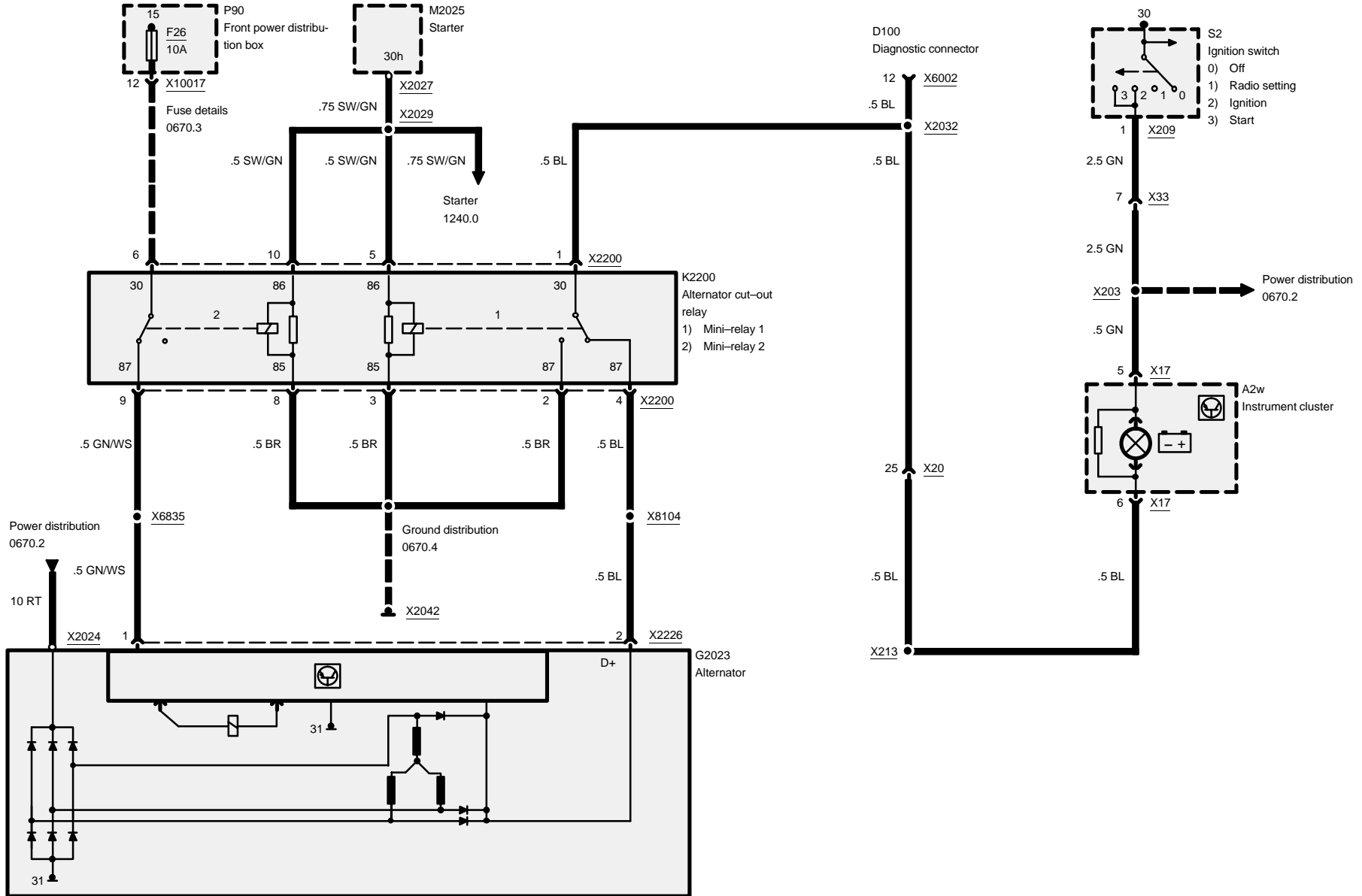






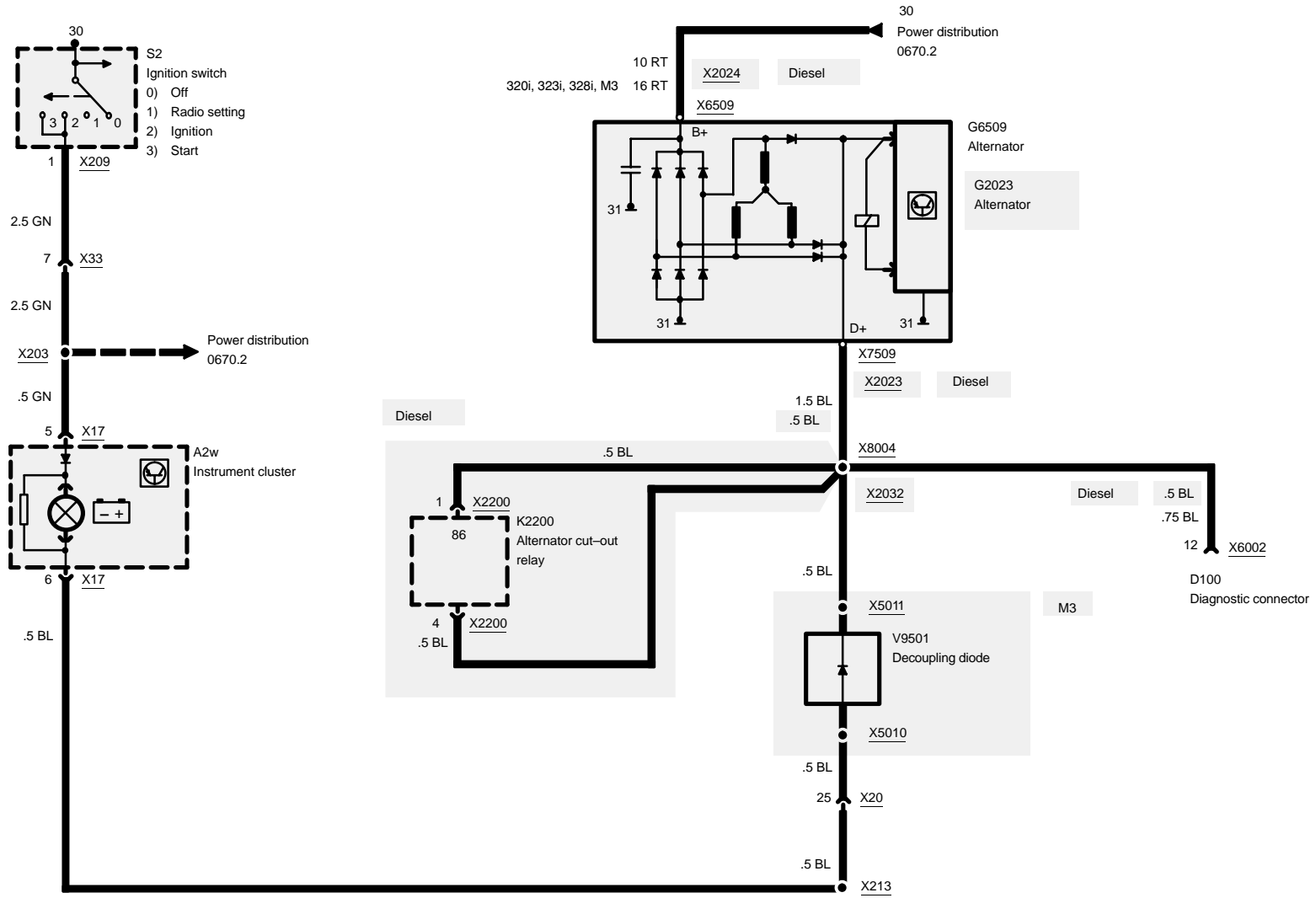
# 1230.0 Alternator

318tds

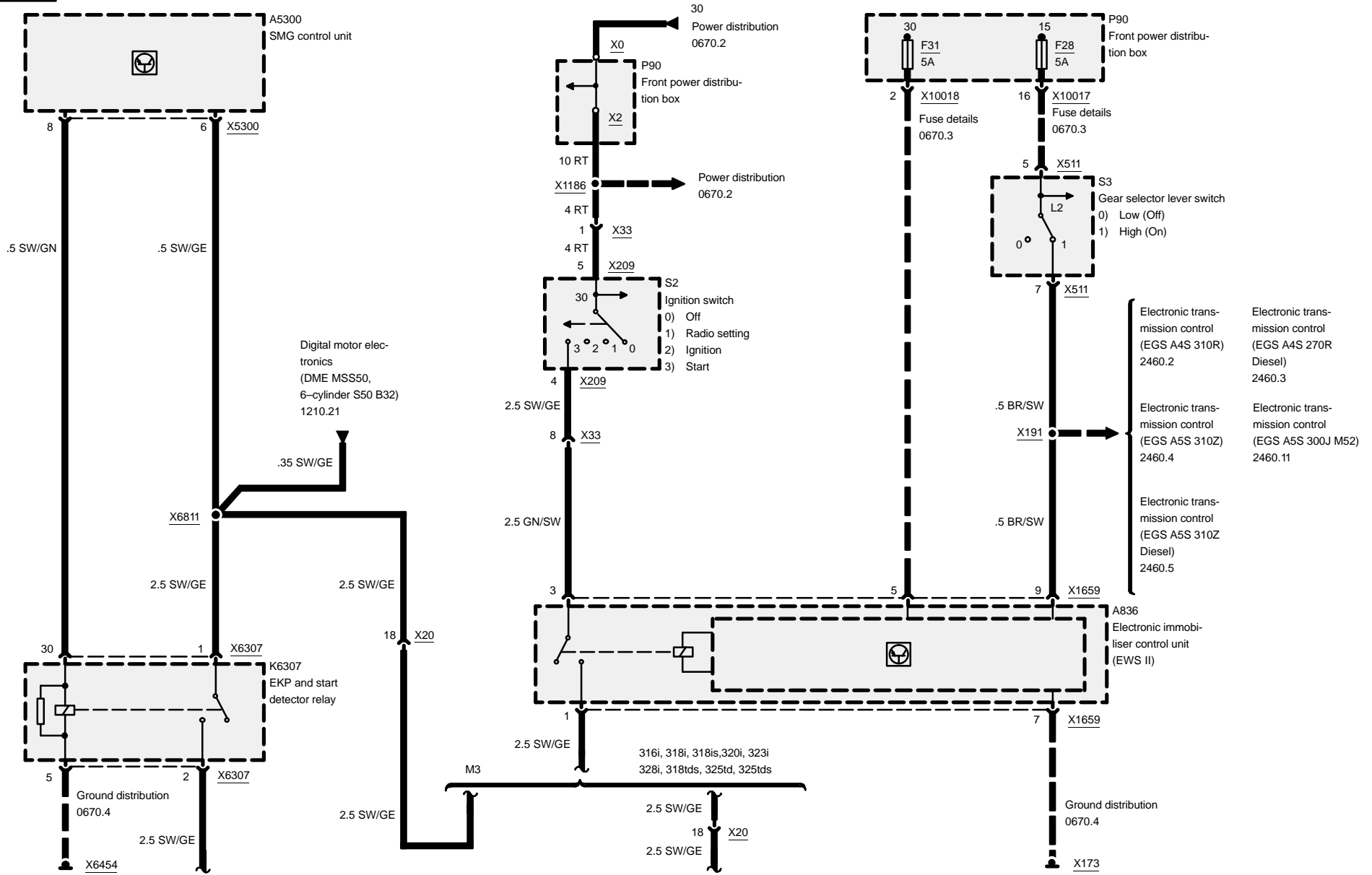


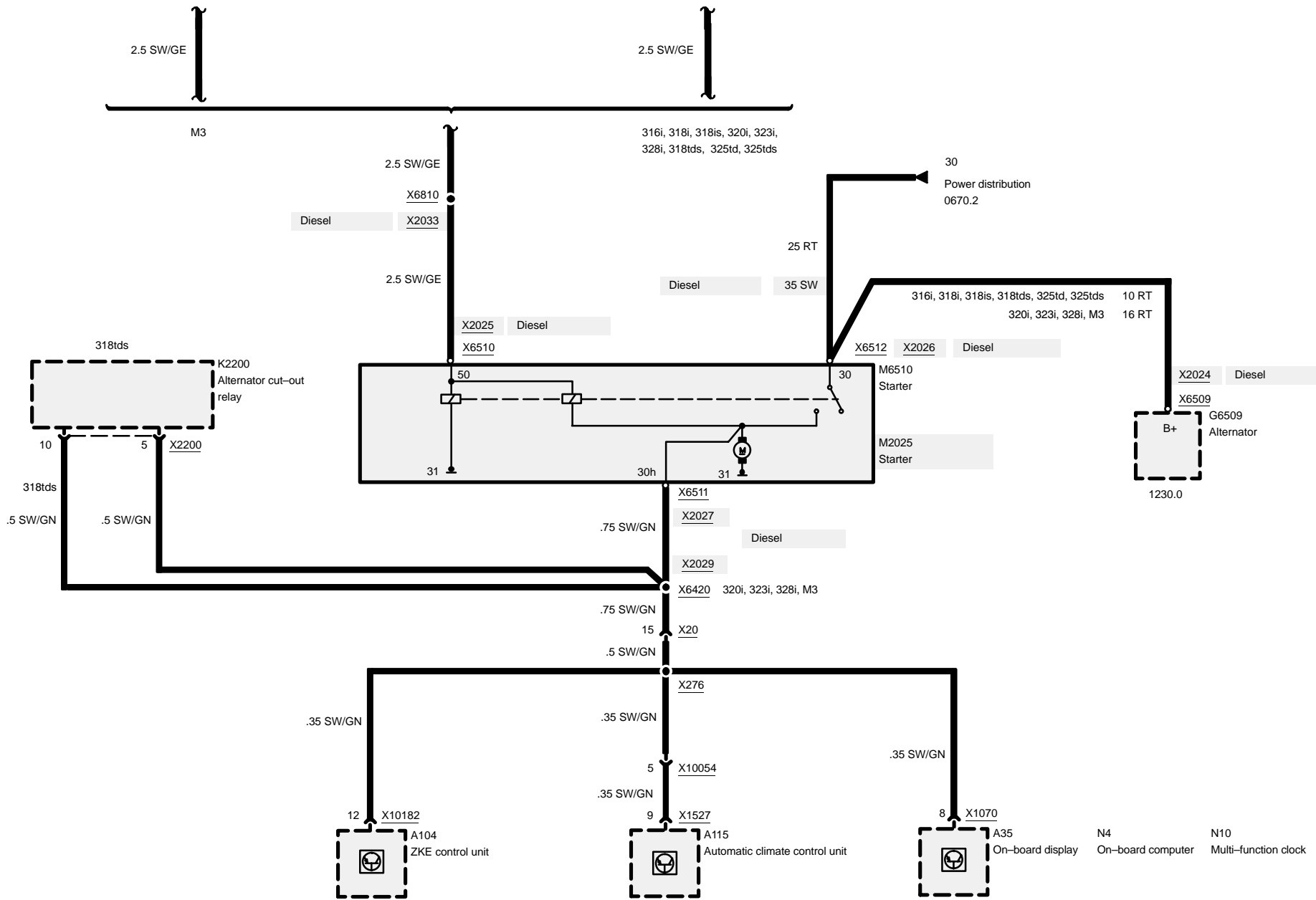


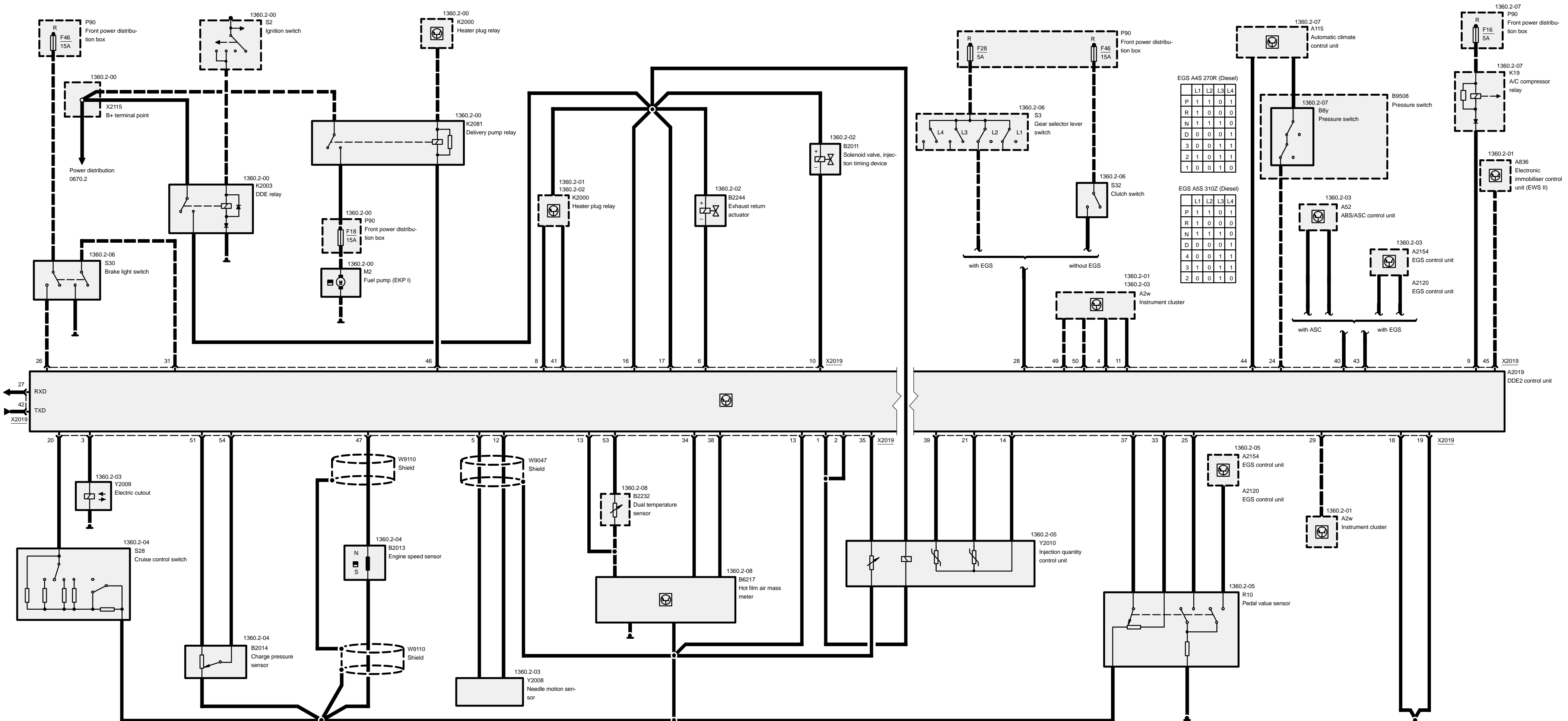
# Alternator

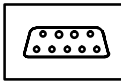


# 1240.0 Starter







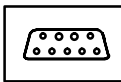


## Pin assignments

### X2019

Pin	Type	Description/Function	Connection
1	M	Component ground	Injection delivery controller
2	M	Component ground	Injection delivery controller
3	A	Electric shutoff device	Electric shutoff device
4	A	DDE lamp	Instrument cluster
5	A	Pointer movement sensor	Pointer movement sensor
6	E	Changeover valve	Exhaust gas recirculation
7		not used	
8	E	Glow-duration control	Glow plug relay
9	A	A/C compressor ON signal	Relay, A/C compressor
10	E	Solenoid valve, injection timing device	Solenoid valve, injection timing device
11	A	Indicator lamp, preheating	Instrument cluster
12	M	Ground, pointer movement sensor	Pointer movement sensor
13	M	Ground for shield and sensor	Shield and sensor
14	M	Ground for actuator and pedal position sensor	Actuators and pedal position sensor
15		not used	
16	E	B+ voltage	DDE relay
17	E	B+ voltage	DDE relay
18	M	Ground	Ground connection
19	M	Ground	Ground connection
20	A	Cruise control (Tempomat)	Switch, automatic cruise control
21	E	Analog input, slide travel sensor	Injection delivery controller
22		not used	
23		not used	
24	E	A/C compressor signal	Pressure switch
25	E	Idle speed switch	Pedal travel sensor
26	E	Brake light signal	Brake light switch
27	A	RxD diagnostic link	Diagnostic connector
28	E	Clutch signal or P/N signal	Clutch switch, selector lever switch
29	A	Road speed signal (speedometer-A)	Instrument cluster
30		not used	
31	E	Brake light test signal	Brake light switch

E = Input, A = Output, M = Ground

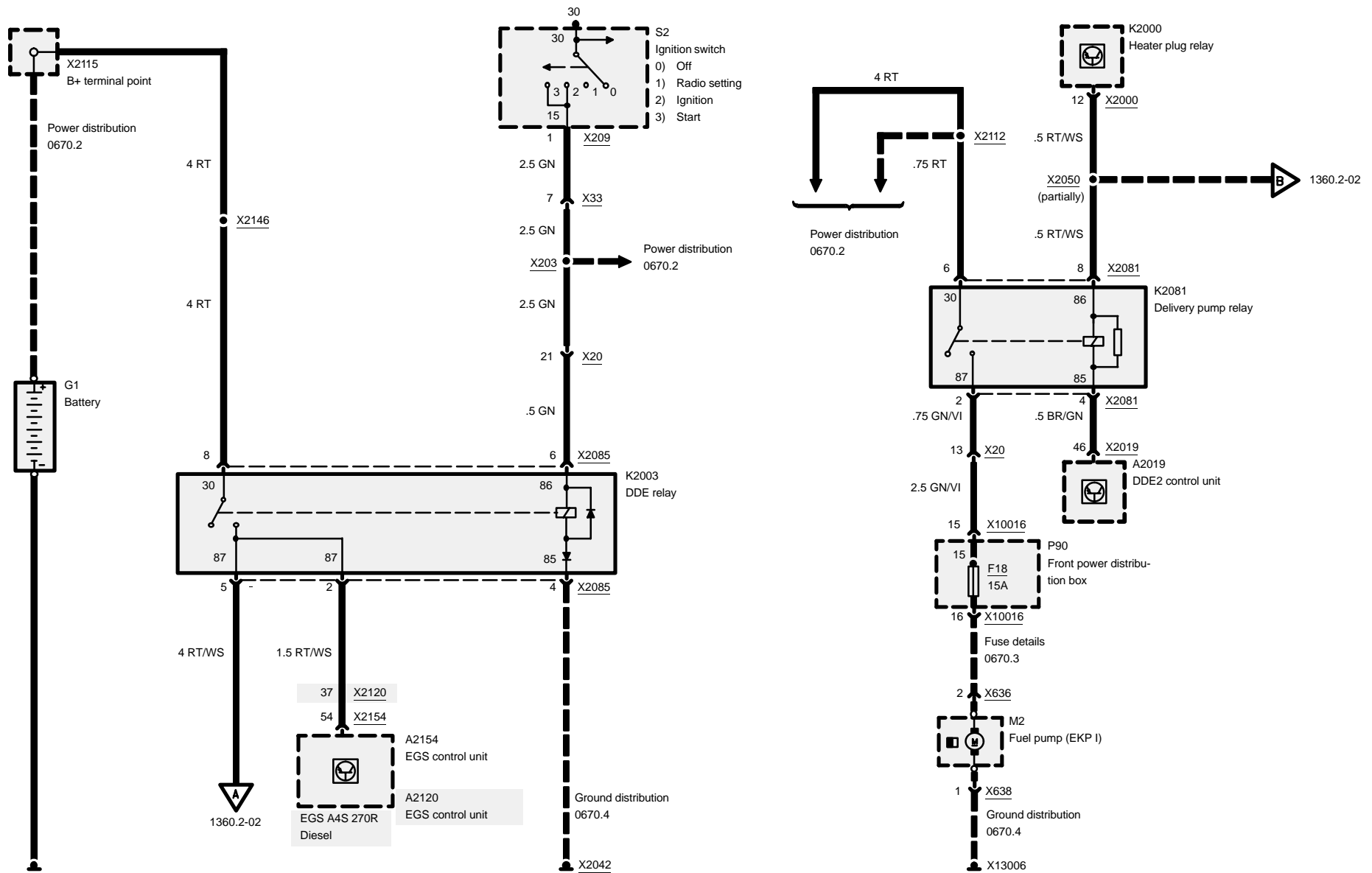


## Pin assignments

Pin	Type	Description/Function	Connection
32		not used	
33	A	Power supply, pedal travel sensor	Pedal travel sensor
34	E	Air mass meter 2	Hot-film air mass meter
35	E	Fuel temperature sensor	Injection delivery controller
36		not used	
37	E	Analog input, pedal position sensor	Pedal travel sensor
38	E	Air mass meter 1	Hot-film air mass meter
39	A	Sensor supply, slide travel sensor	Injection delivery controller
40	E/A	CAN-LOW	ASC/EGS control unit
41	E	Error message	Glow plug relay
42	E/A	TxD diagnostic link	Diagnostic connector
43	E/A	CAN-HIGH	ASC/EGS control unit
44	E	Air conditioning ON signal	A/C control unit
45	E	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
46	A	Electrical fuel pump	Relay, presupply pump
47	E	Speed sensor	Speed sensor
48		not used	
49	E	Consumption signal TQ	Instrument cluster
50	E	Engine speed signal TD	Instrument cluster
51	A	Power supply	Boost pressure sensor
52		not used	
53	E	Water temperature signal	Water temperature sensor
54	E	Boost pressure sensor signal	Boost pressure sensor
55		not used	



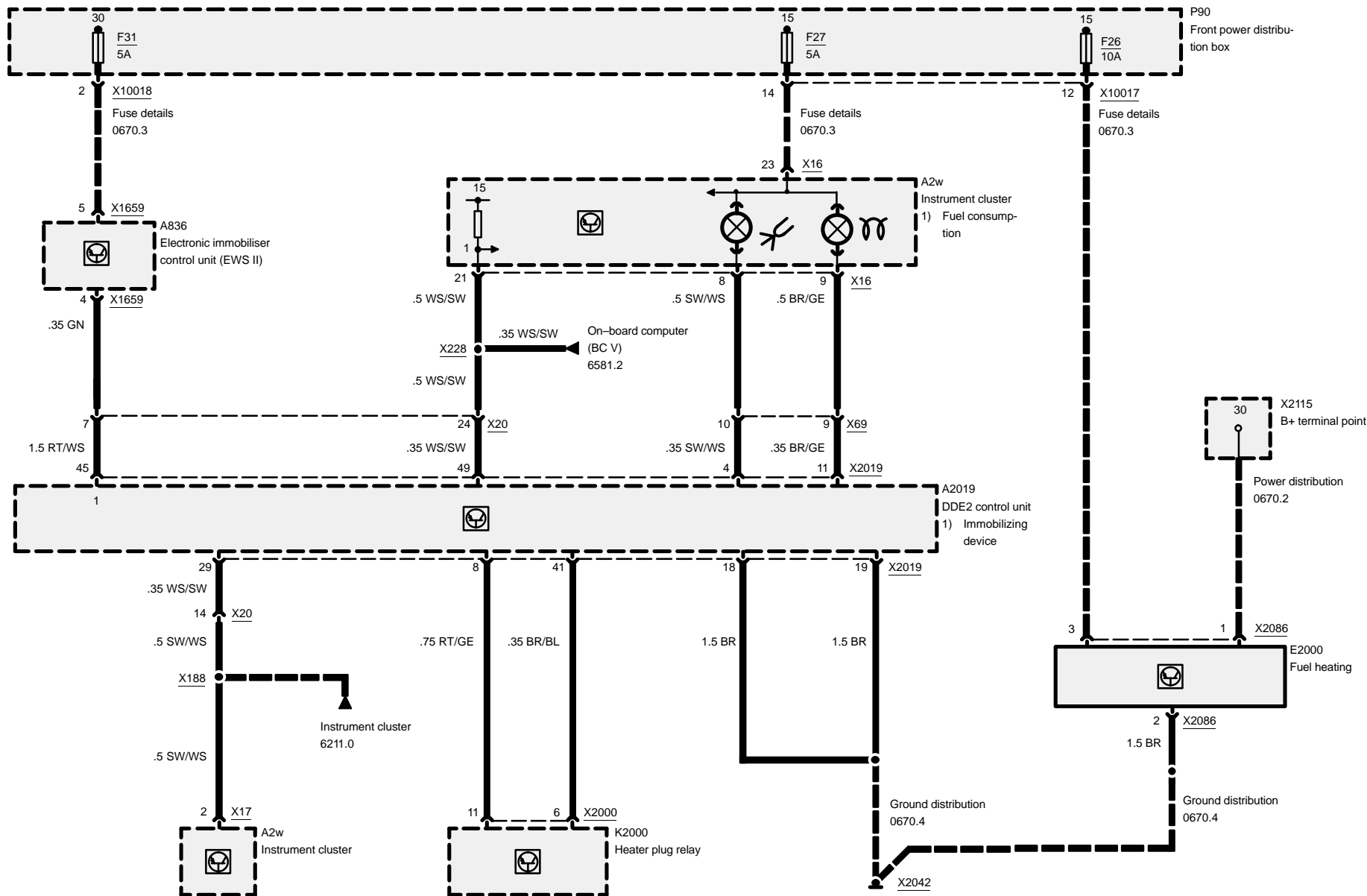
# Digital diesel electronics (DDE 2.1, 6-cylinder M51)





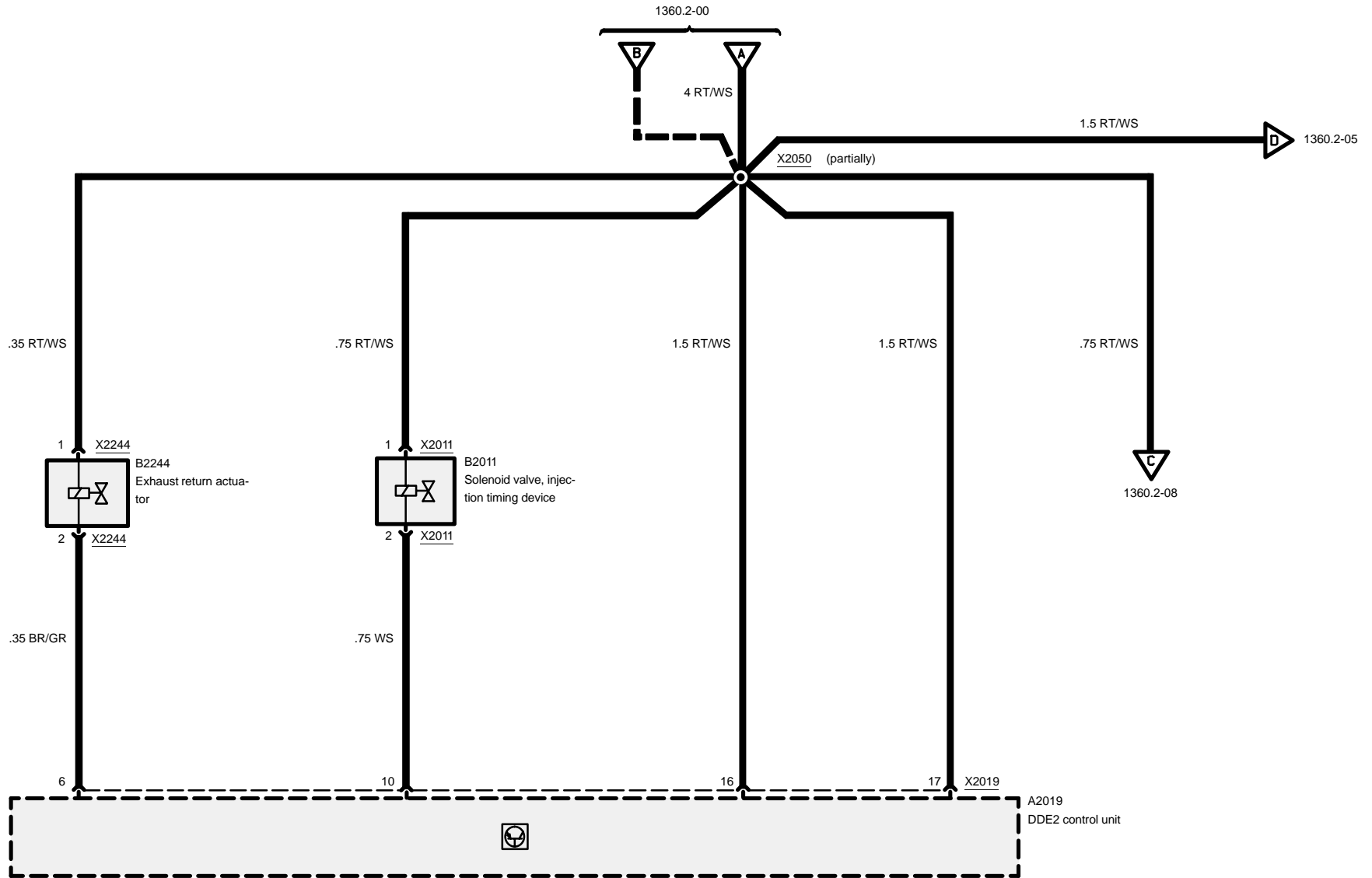


# Digital diesel electronics (DDE 2.1, 6-cylinder M51)



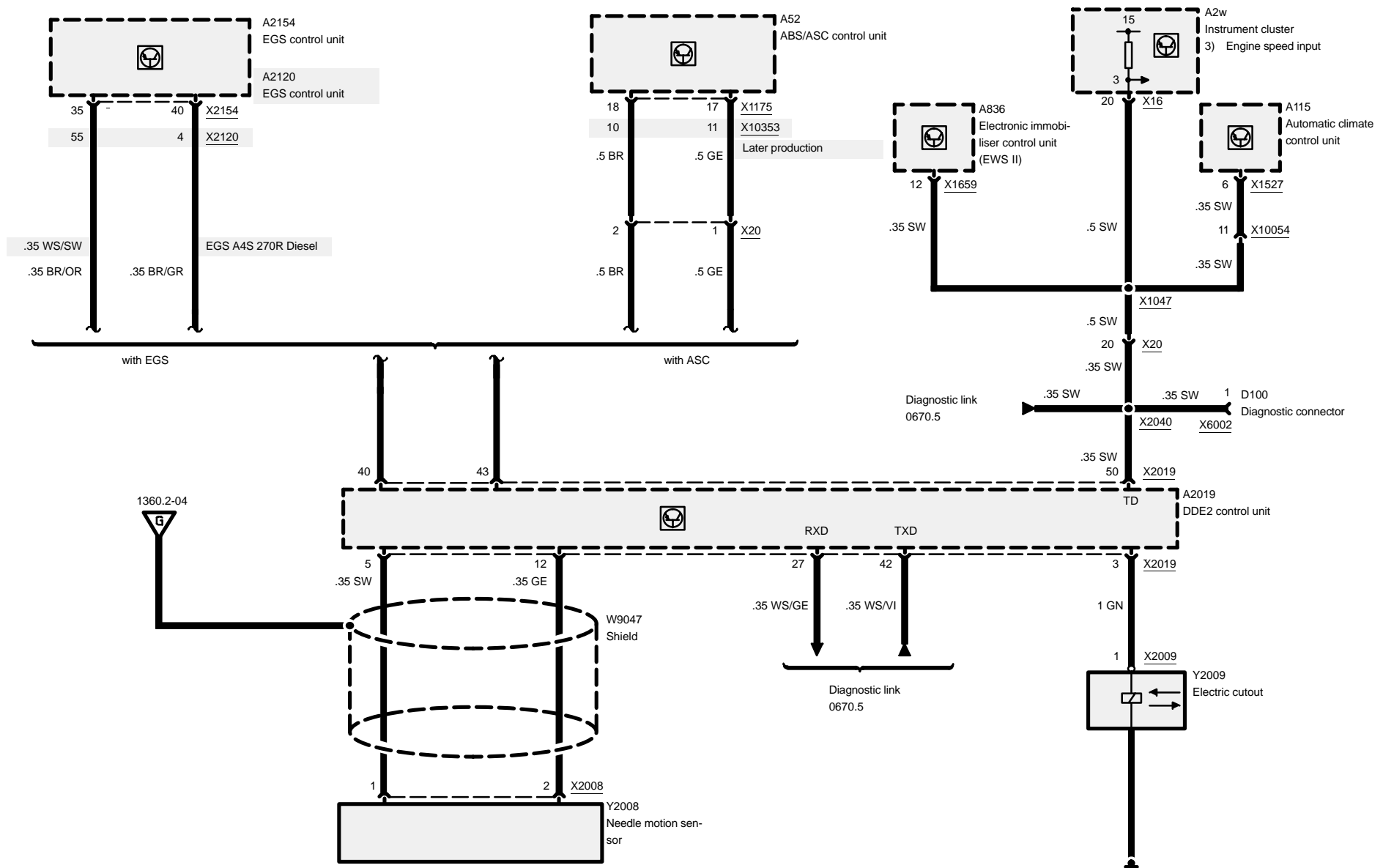


# Digital diesel electronics (DDE 2.1, 6-cylinder M51)



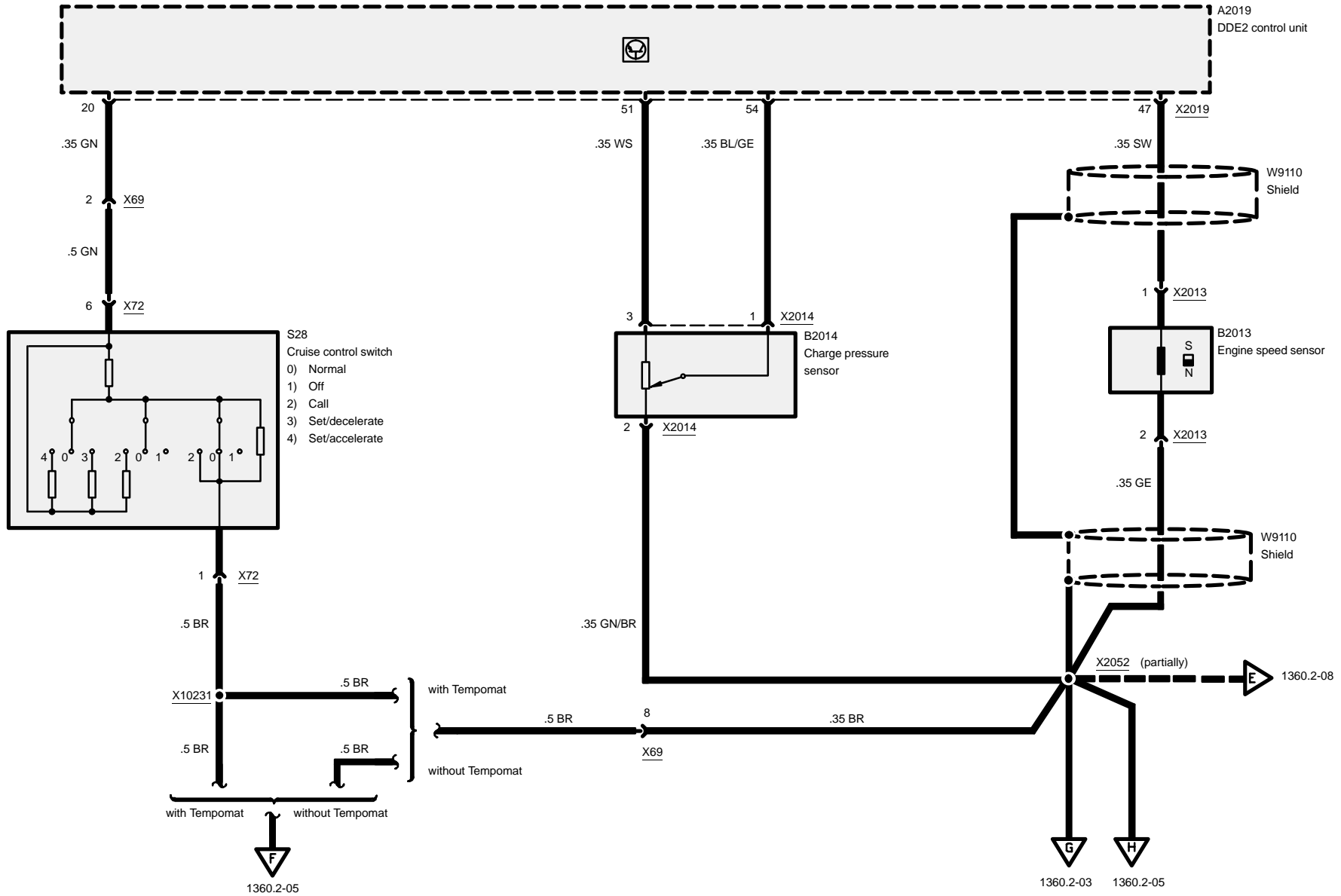


# Digital diesel electronics (DDE 2.1, 6-cylinder M51)



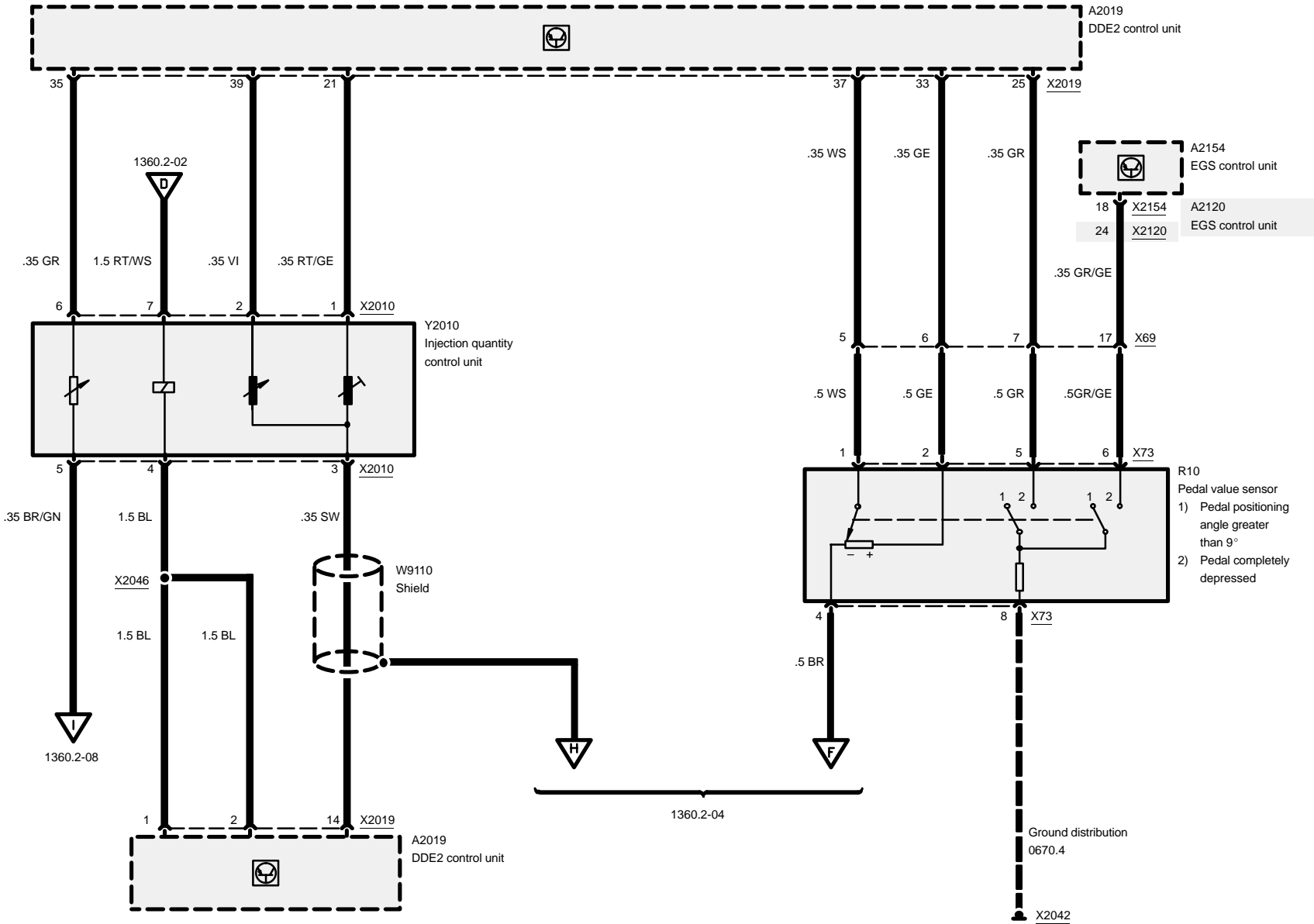


# Digital diesel electronics (DDE 2.1, 6-cylinder M51)





# Digital diesel electronics (DDE 2.1, 6-cylinder M51)





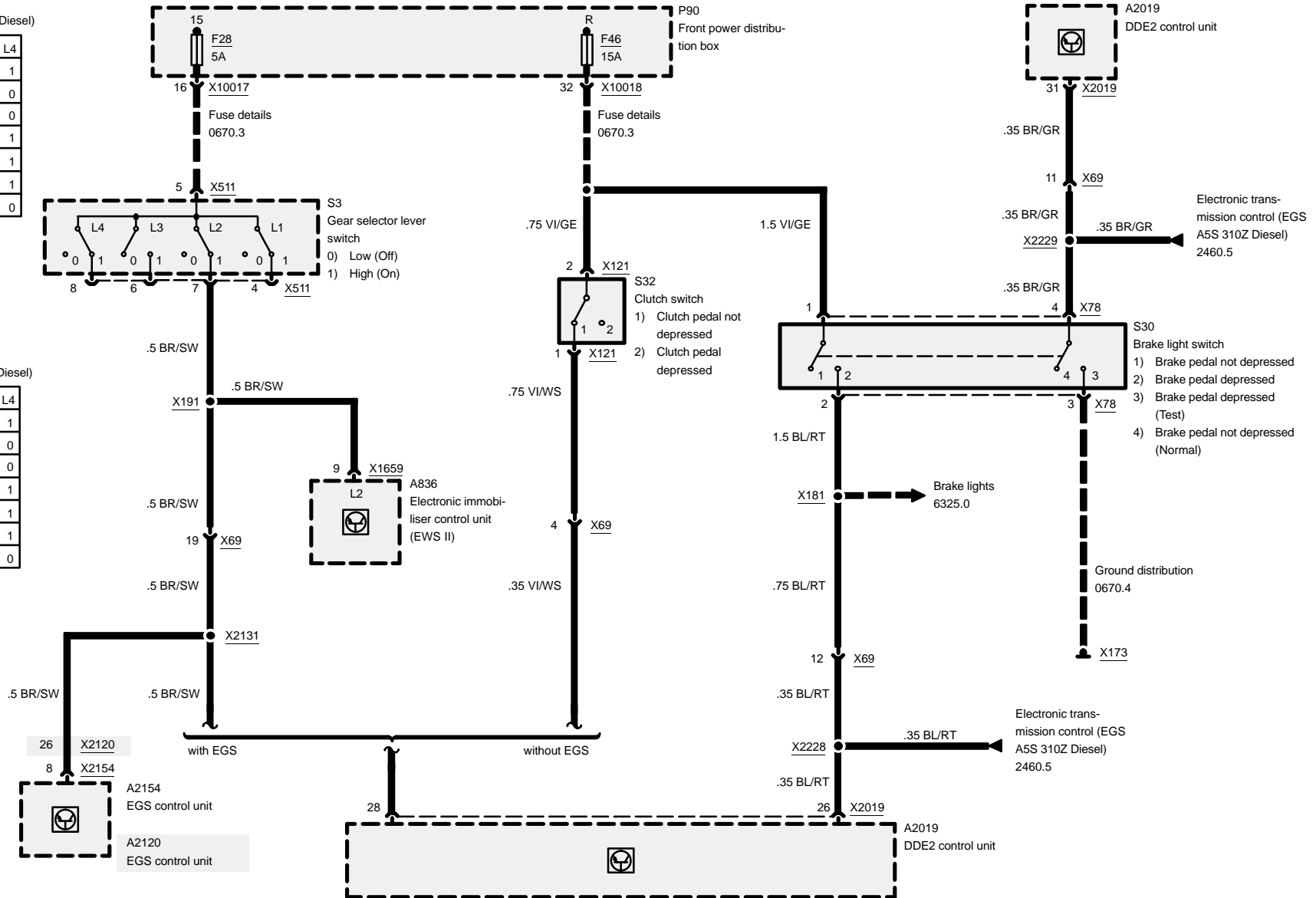
# Digital diesel electronics (DDE 2.1, 6-cylinder M51)

EGS A4S 270R (Diesel)

	L1	L2	L3	L4
P	1	1	0	1
R	1	0	0	0
N	1	1	1	0
D	0	0	0	1
3	0	0	1	1
2	1	0	1	1
1	0	0	1	0

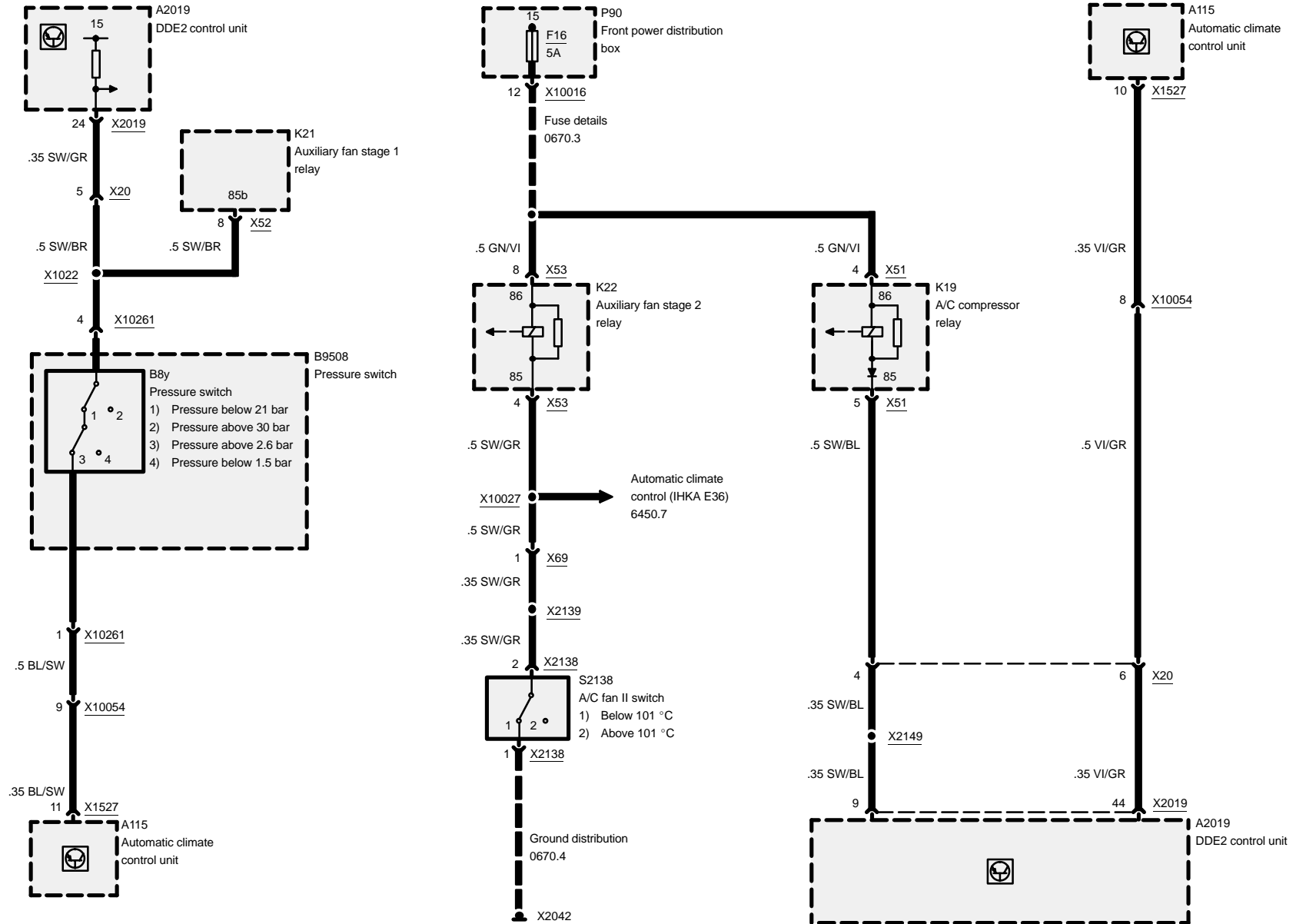
EGS A5S 310Z (Diesel)

	L1	L2	L3	L4
P	1	1	0	1
R	1	0	0	0
N	1	1	1	0
D	0	0	0	1
4	0	0	1	1
2	1	0	1	1
1	0	0	1	0





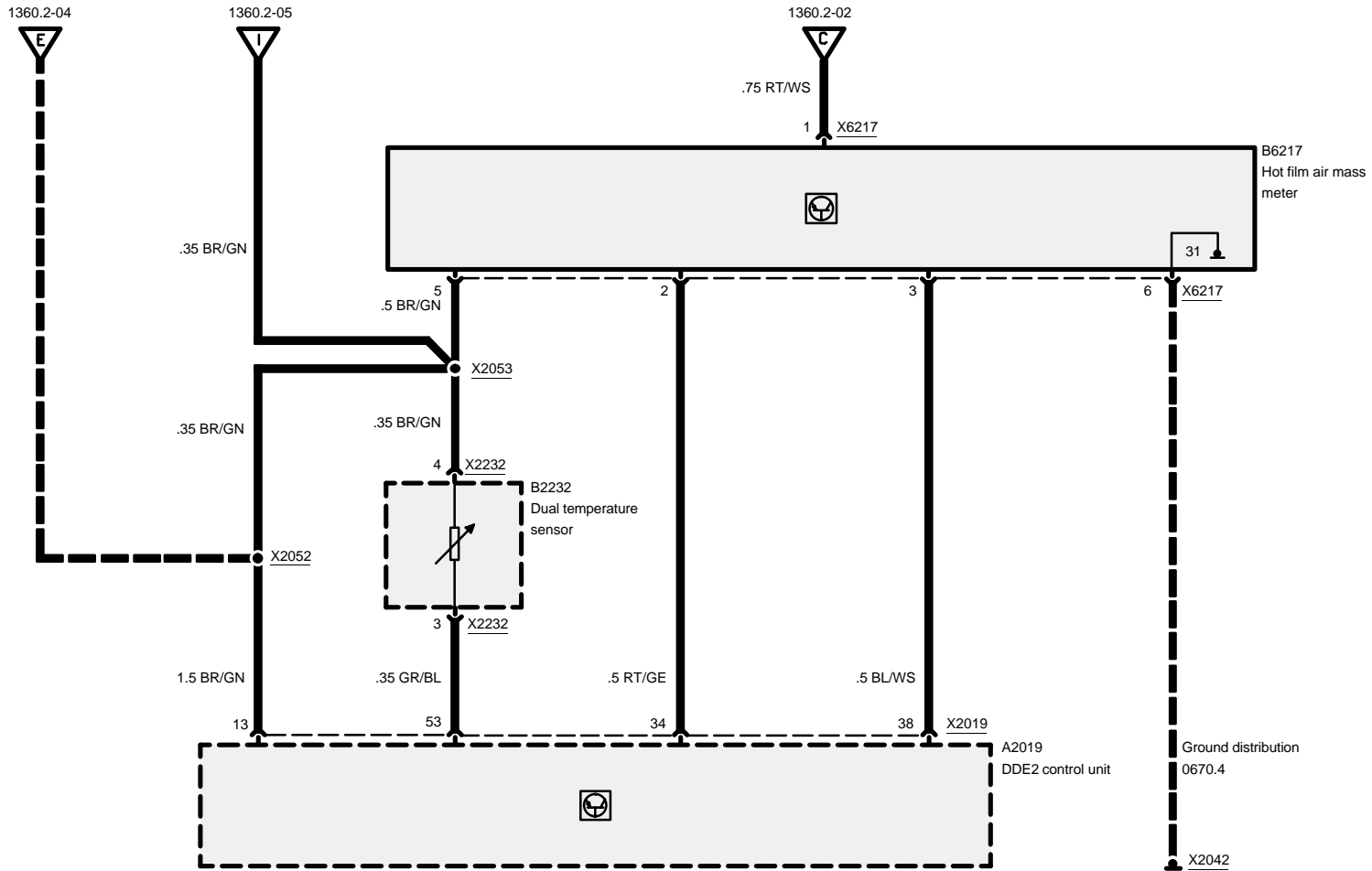
# Digital diesel electronics (DDE 2.1, 6-cylinder M51)



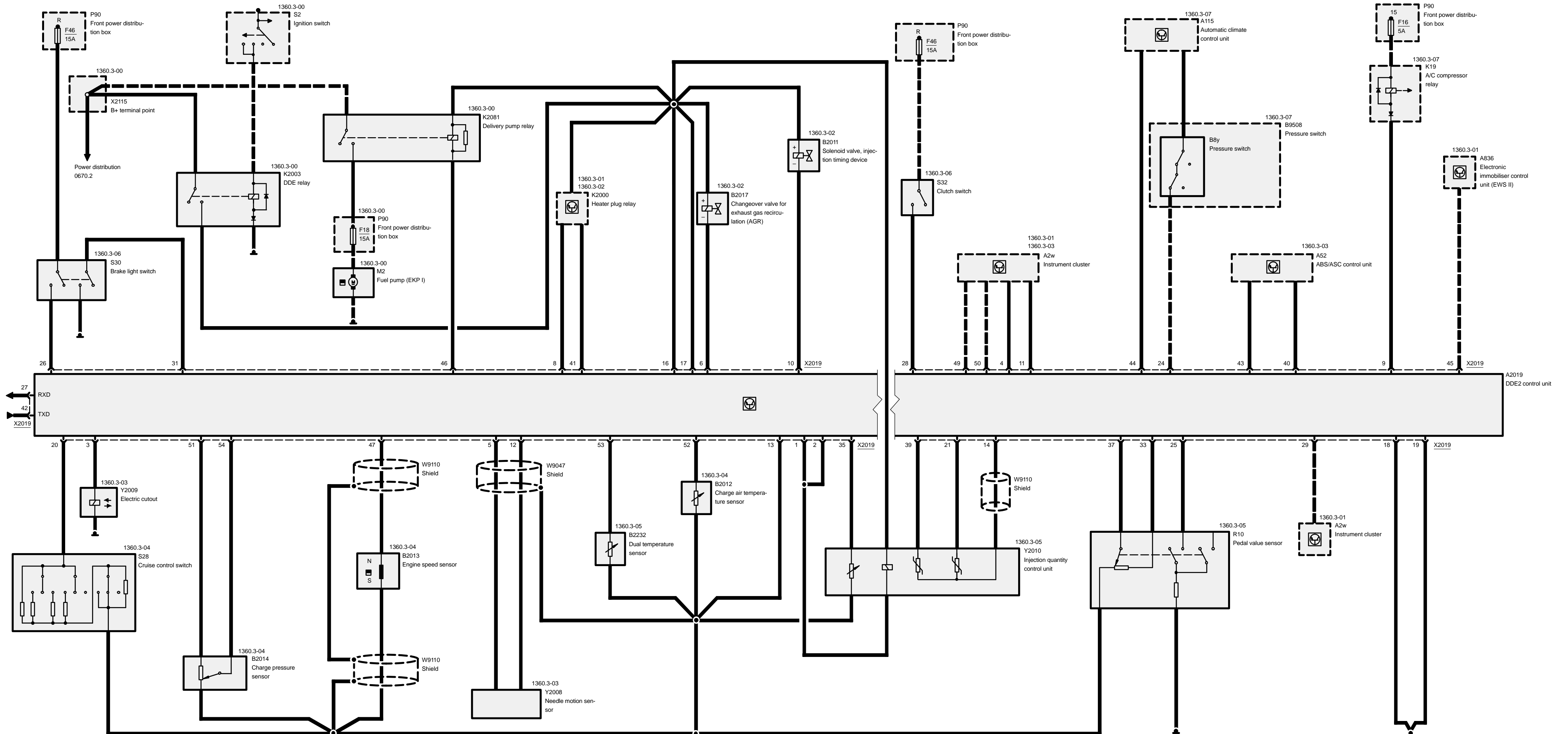


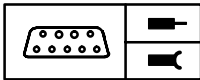
# Digital diesel electronics (DDE 2.1, 6-cylinder M51)

## Hot film air mass meter







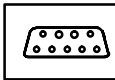


## Pin assignments

### X2019

Pin	Type	Description/Function	Connection
1	M	Component ground	Injection delivery controller
2	M	Component ground	Injection delivery controller
3	A	Electric shutoff device	Electric shutoff device
4	A	DDE lamp	Instrument cluster
5	A	Pointer movement sensor	Pointer movement sensor
6	E	Changeover valve	Exhaust gas recirculation
7		not used	
8	E	Glow-duration control	Glow plug relay
9	E	A/C compressor ON signal	Relay, A/C compressor
10	E	Solenoid valve, injection timing device	Solenoid valve, injection timing device
11	A	Indicator lamp, preheating	Instrument cluster
12	M	Ground, pointer movement sensor	Pointer movement sensor
13	M	Ground for shield and sensor	Shield and sensor
14	M	Ground for actuator and pedal travel sensor	Injection delivery controller
15		not used	
16	E	B+ voltage	DDE relay
17	E	B+ voltage	DDE relay
18	M	Ground	Ground connection
19	M	Ground	Ground connection
20	A	Cruise control (Tempomat)	Switch, automatic cruise control
21	E	Analog input, slide travel sensor	Injection delivery controller
22		not used	
23		not used	
24	E	A/C compressor signal	Pressure switch
25	E	Idle speed switch	Pedal travel sensor
26	E	Brake light signal	Brake light switch
27	A	RxD diagnostic link	Diagnostic connector
28	E	Clutch signal	Clutch switch
29	A	Road speed signal (speedometer-A)	Instrument cluster
30		not used	
31	E	Brake light test signal	Brake light switch
32		not used	

E = Input, A = Output, M = Ground

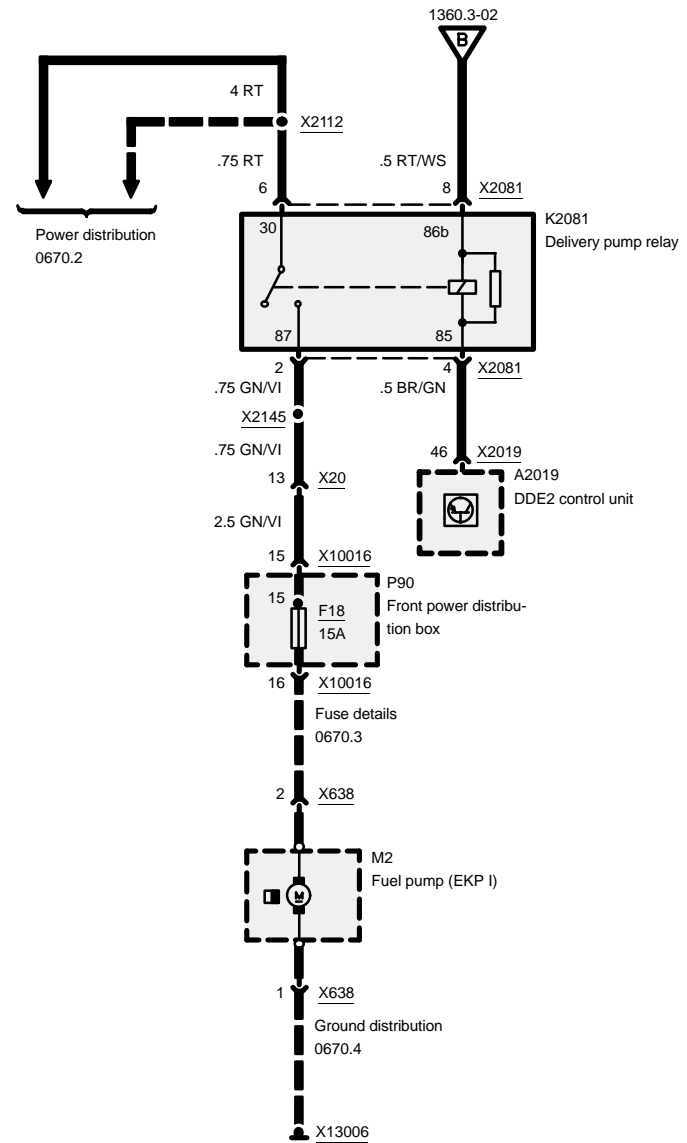
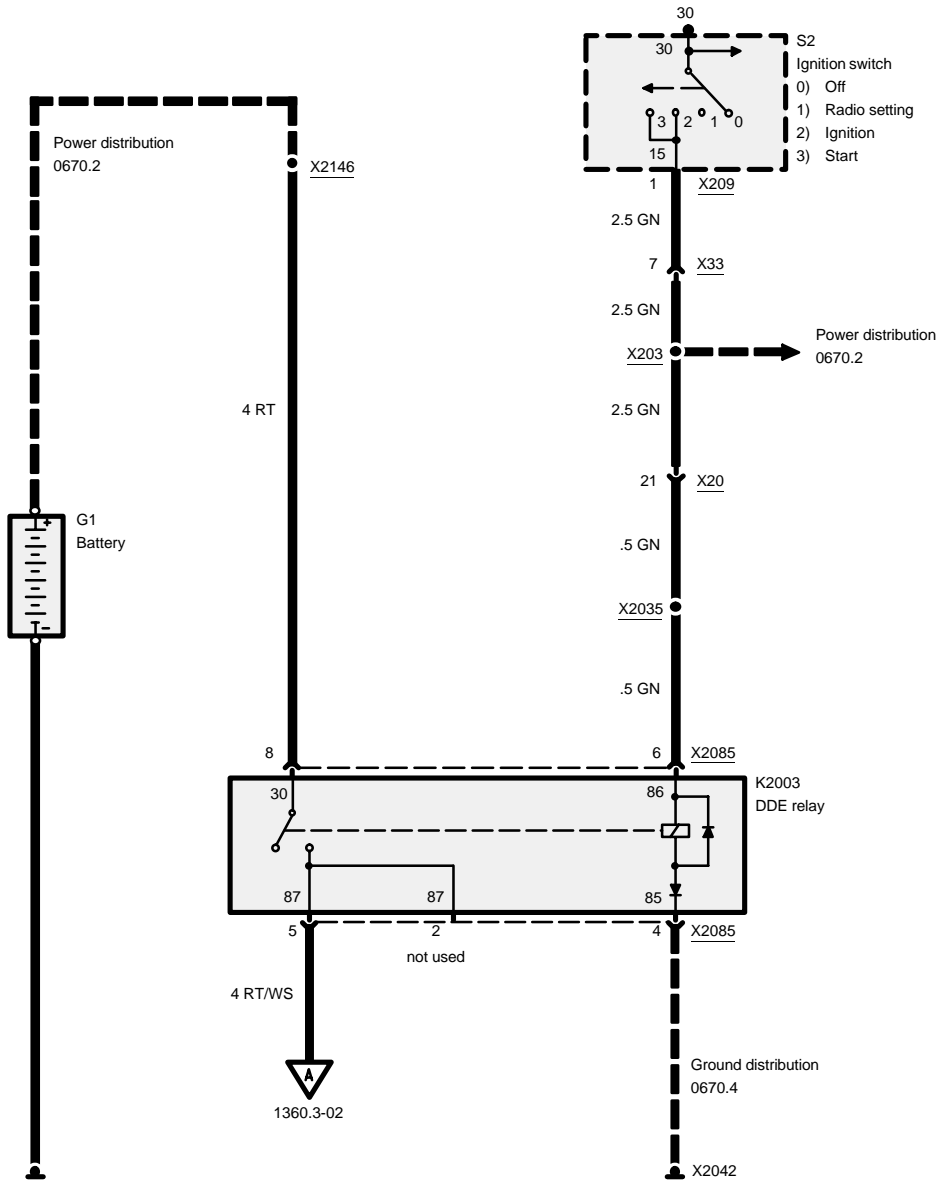


## Pin assignments

Pin	Type	Description/Function	Connection
33	A	Power supply, pedal travel sensor	Pedal travel sensor
34		not used	
35	E	Fuel temperature sensor	Injection delivery controller
36		not used	
37	E	Analog input, pedal travel sensor	Pedal travel sensor
38		not used	
39	A	Sensor supply, slide travel sensor	Injection delivery controller
40	E/A	CAN-LOW	ASC control unit
41	E	Error message	Glow plug relay
42	E/A	TxD diagnostic link	Diagnostic connector
43	E/A	CAN-HIGH	ASC control unit
44	E	Air conditioning ON signal	A/C control unit
45	E	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
46	A	Activation, terminal 85	Supply pump relay
47	E	Speed sensor	Speed sensor
48		not used	
49	E	Consumption signal TQ	Instrument cluster
50	E	Engine speed signal TD	Instrument cluster
51	A	Power supply	Boost pressure sensor
52	E	Charge air temperature signal	Charge air temperature sensor
53	E	Water temperature signal	Water temperature sensor
54	E	Boost pressure sensor signal	Boost pressure sensor
55		not used	

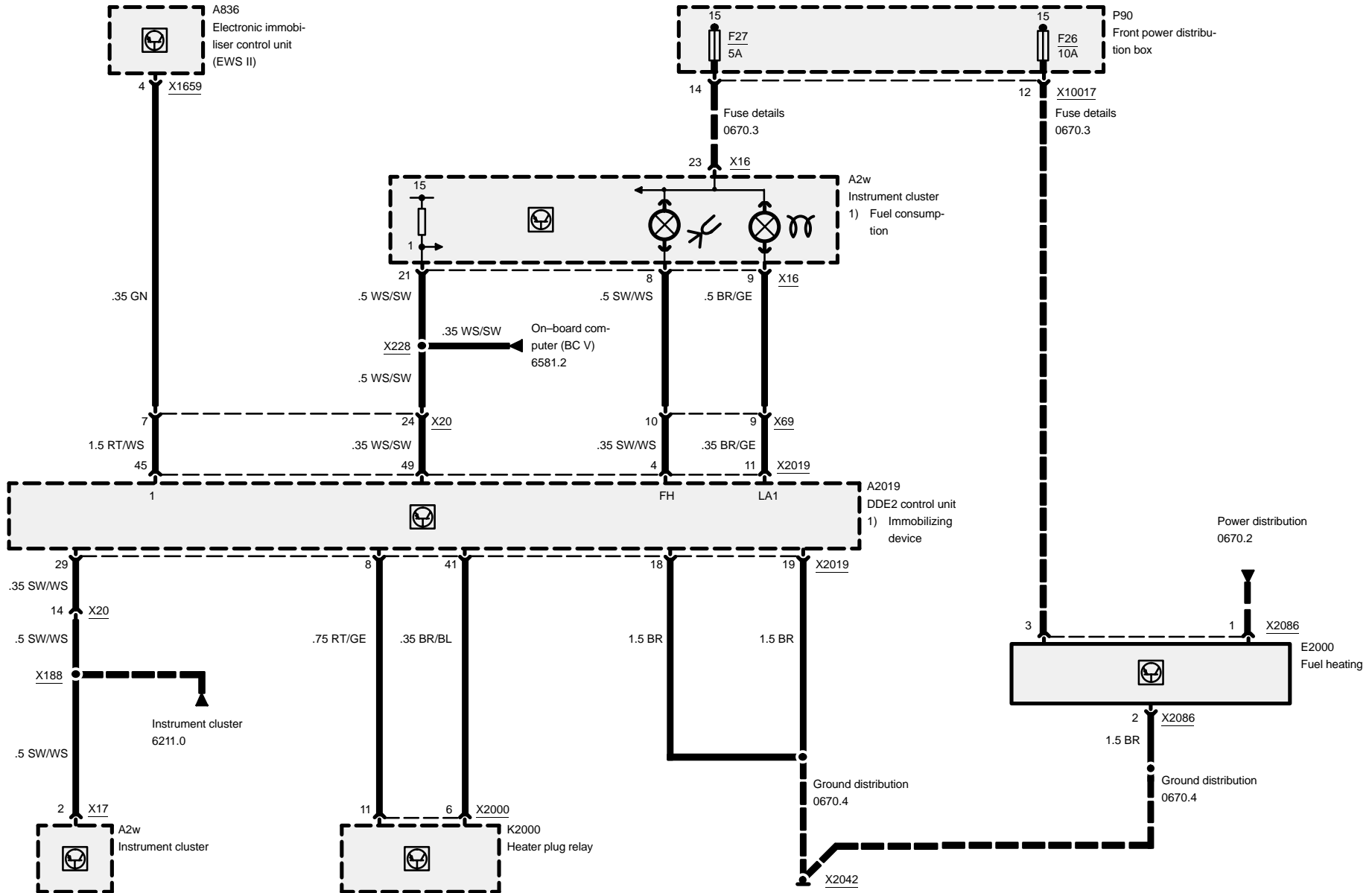


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)



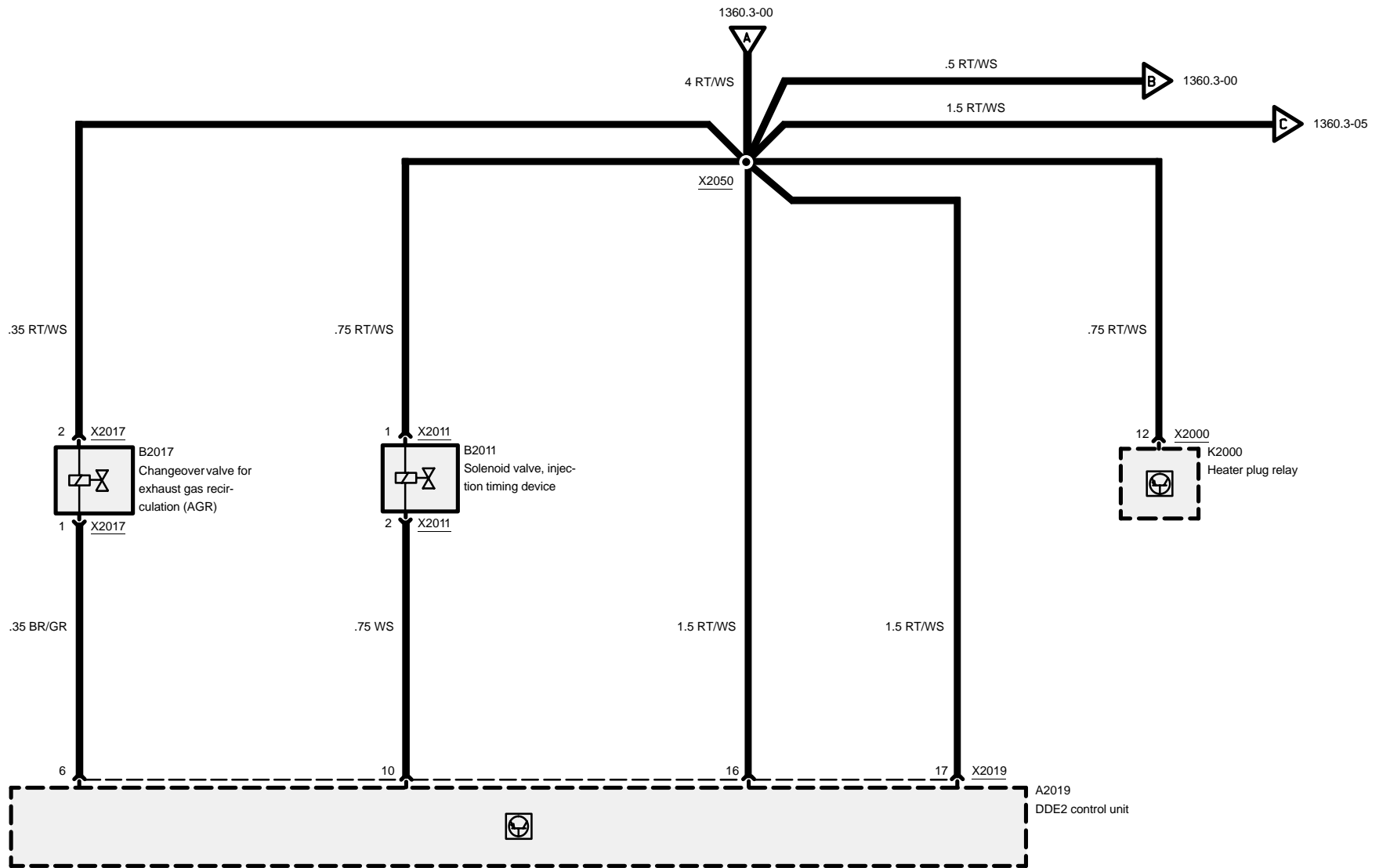


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)



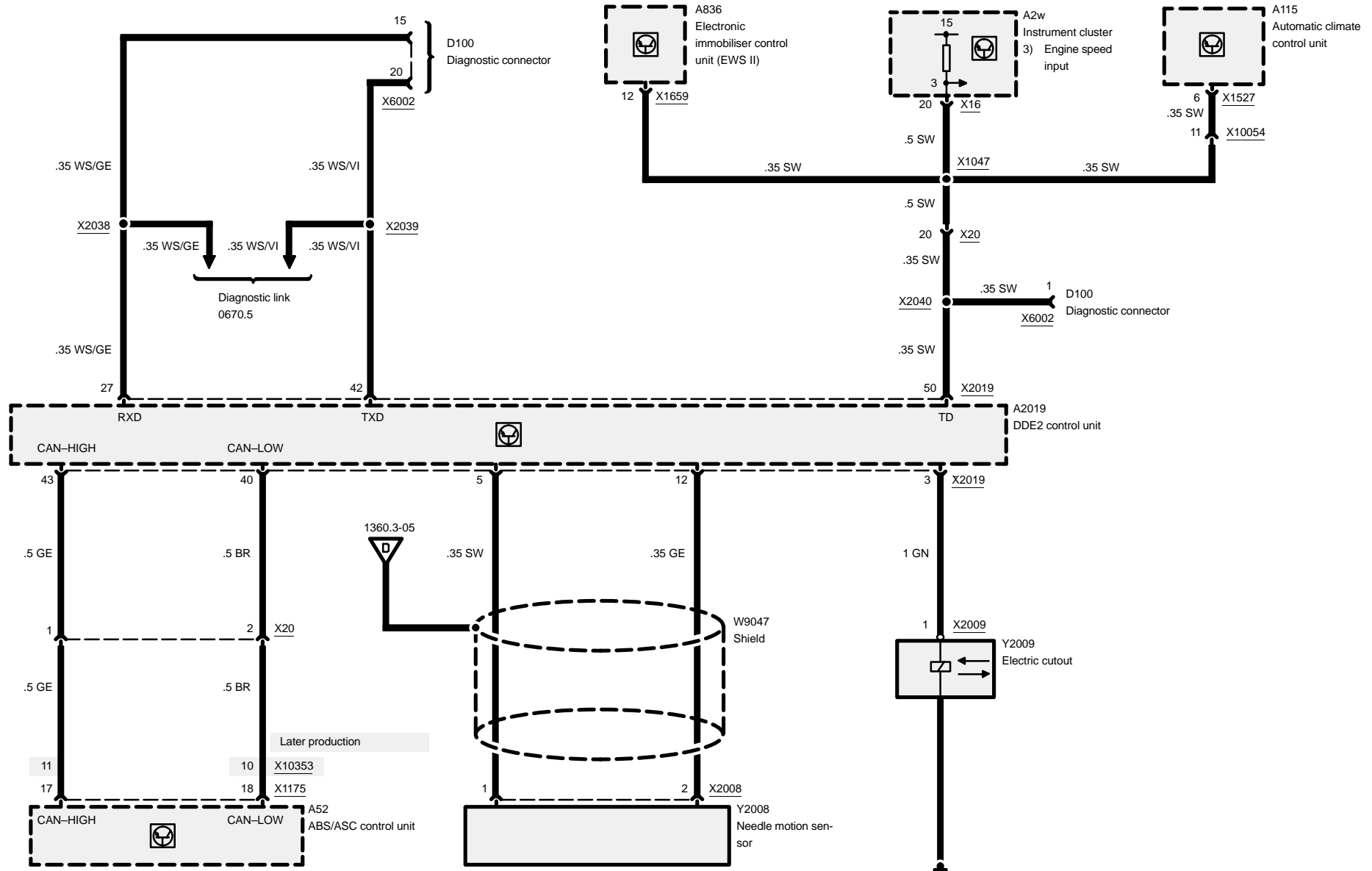


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)



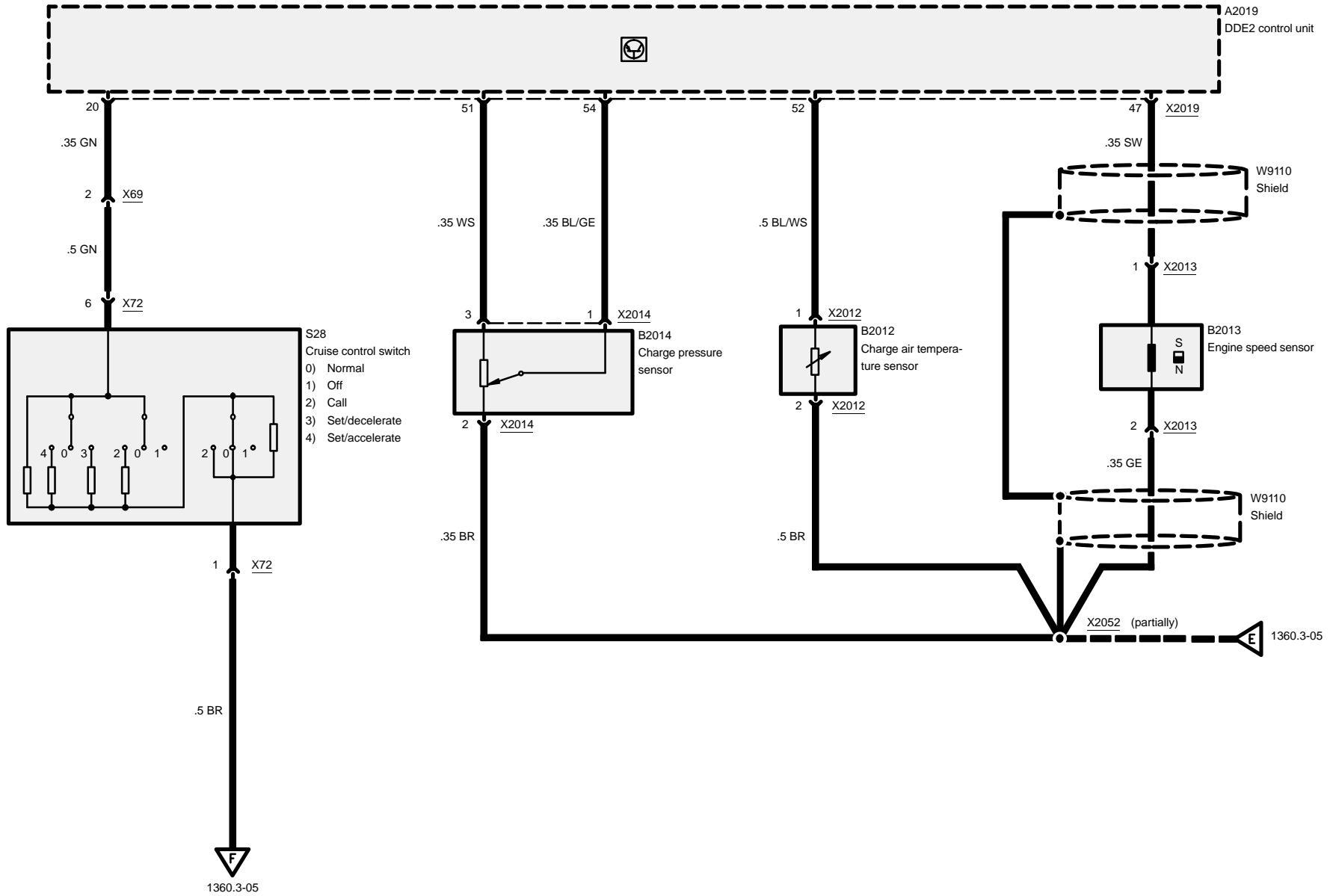


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)





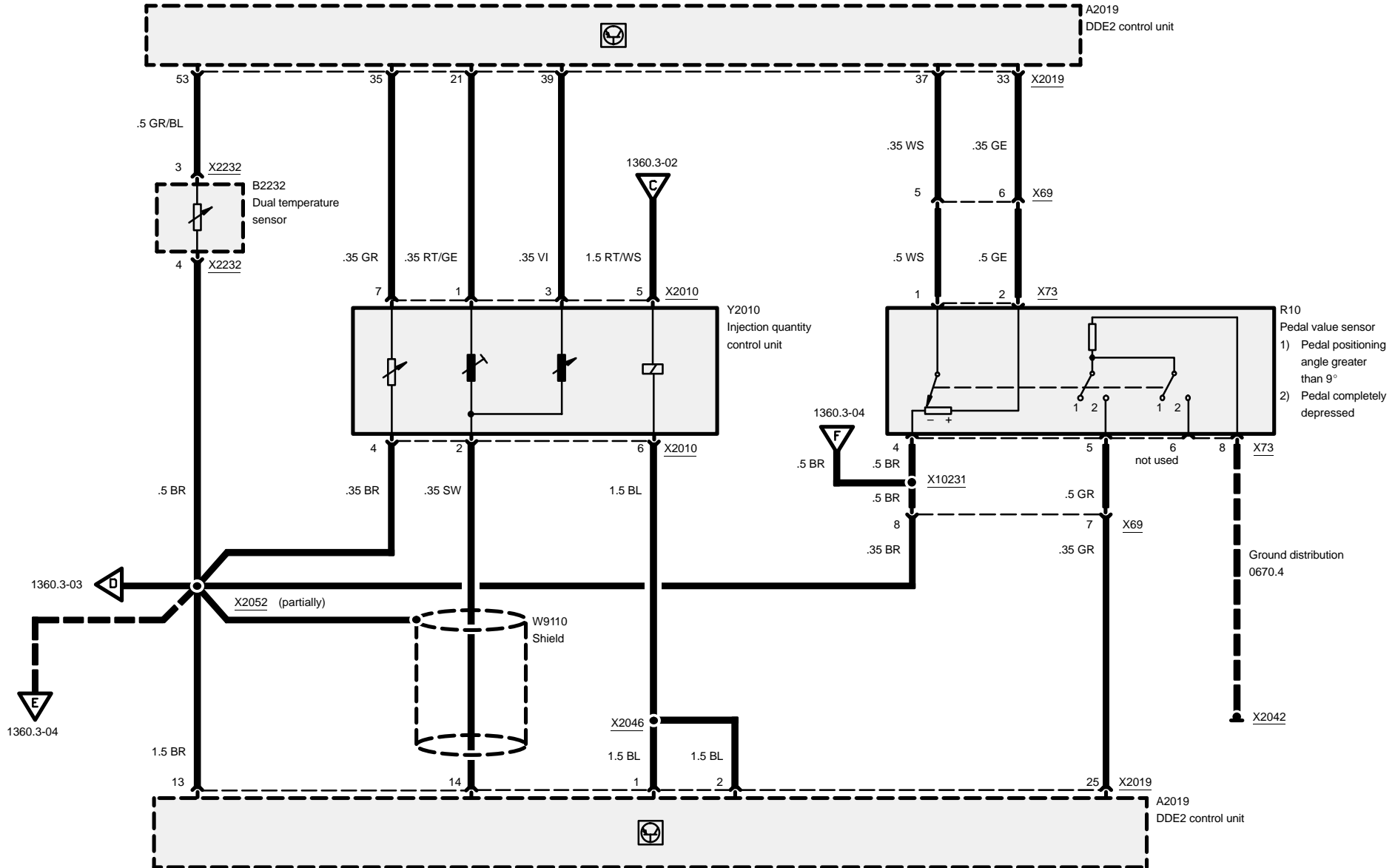
# Digital diesel electronics (DDE 2.1, 4-cylinder M41)





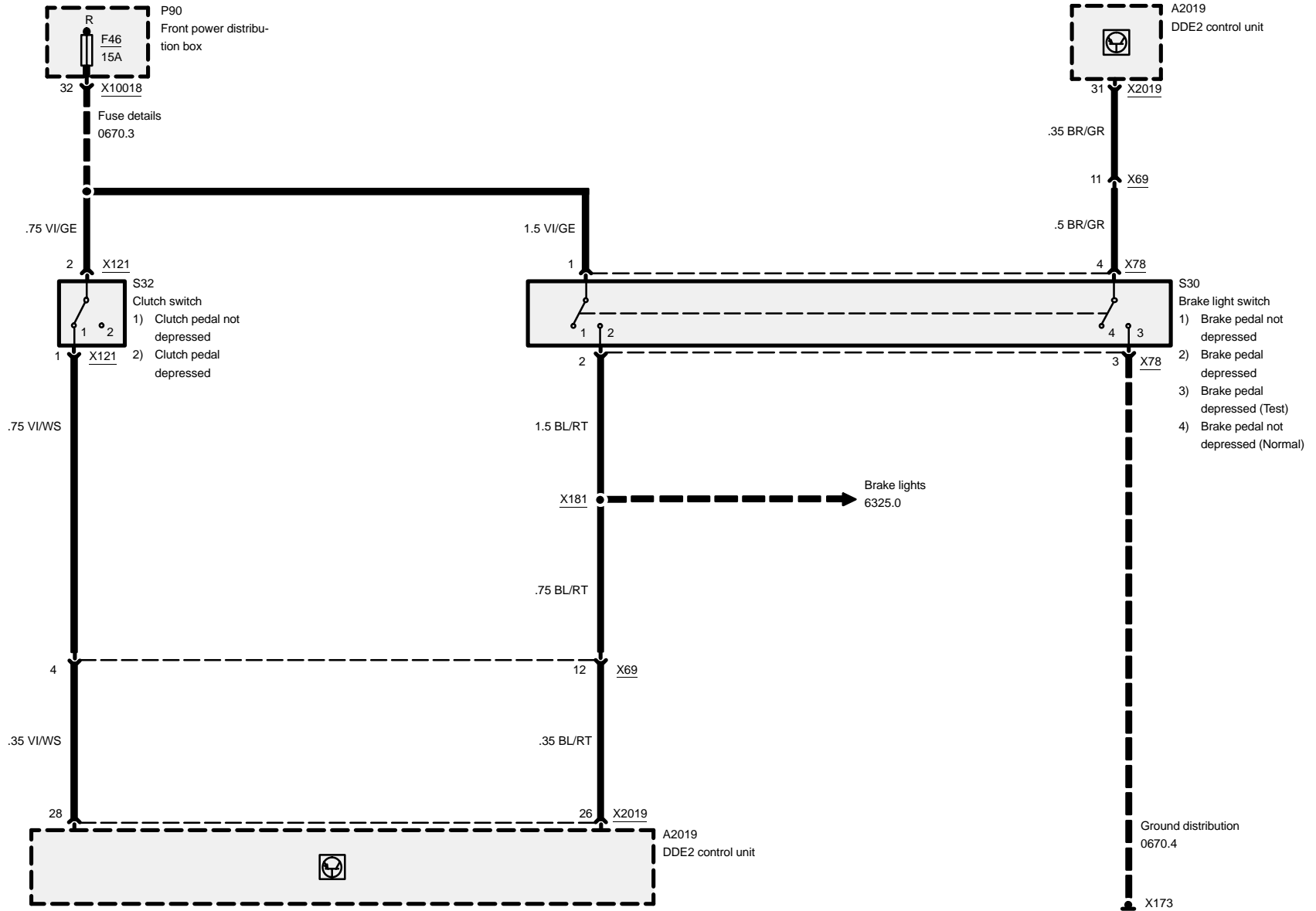


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)



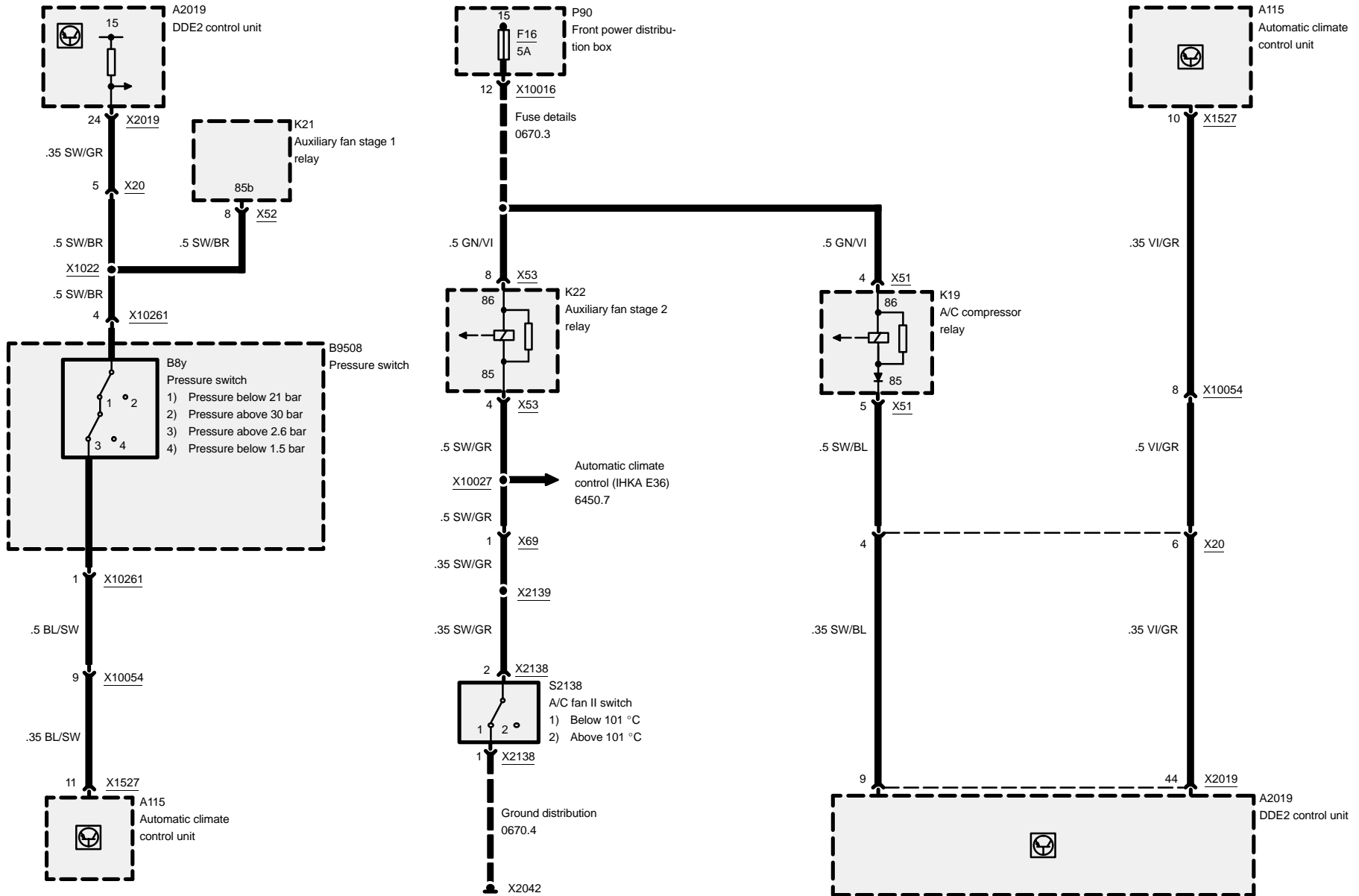


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)



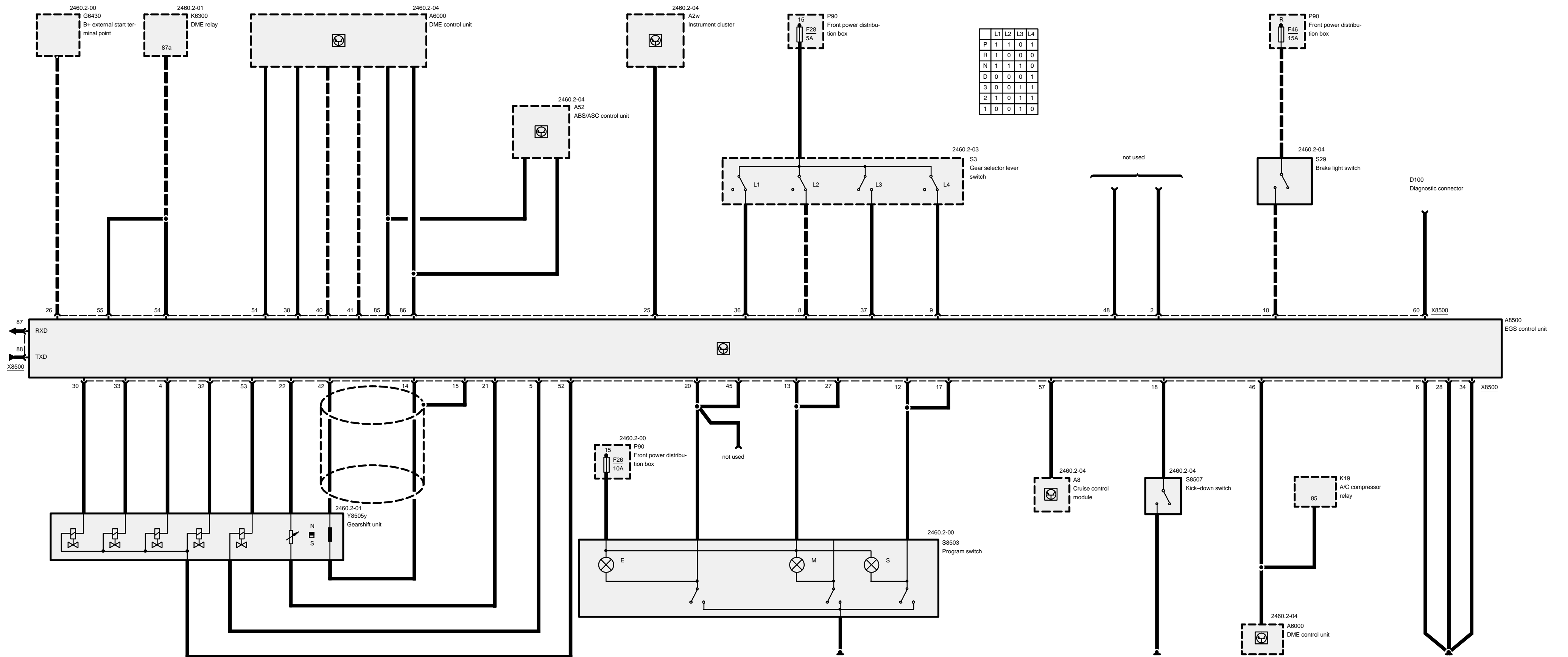


# Digital diesel electronics (DDE 2.1, 4-cylinder M41)



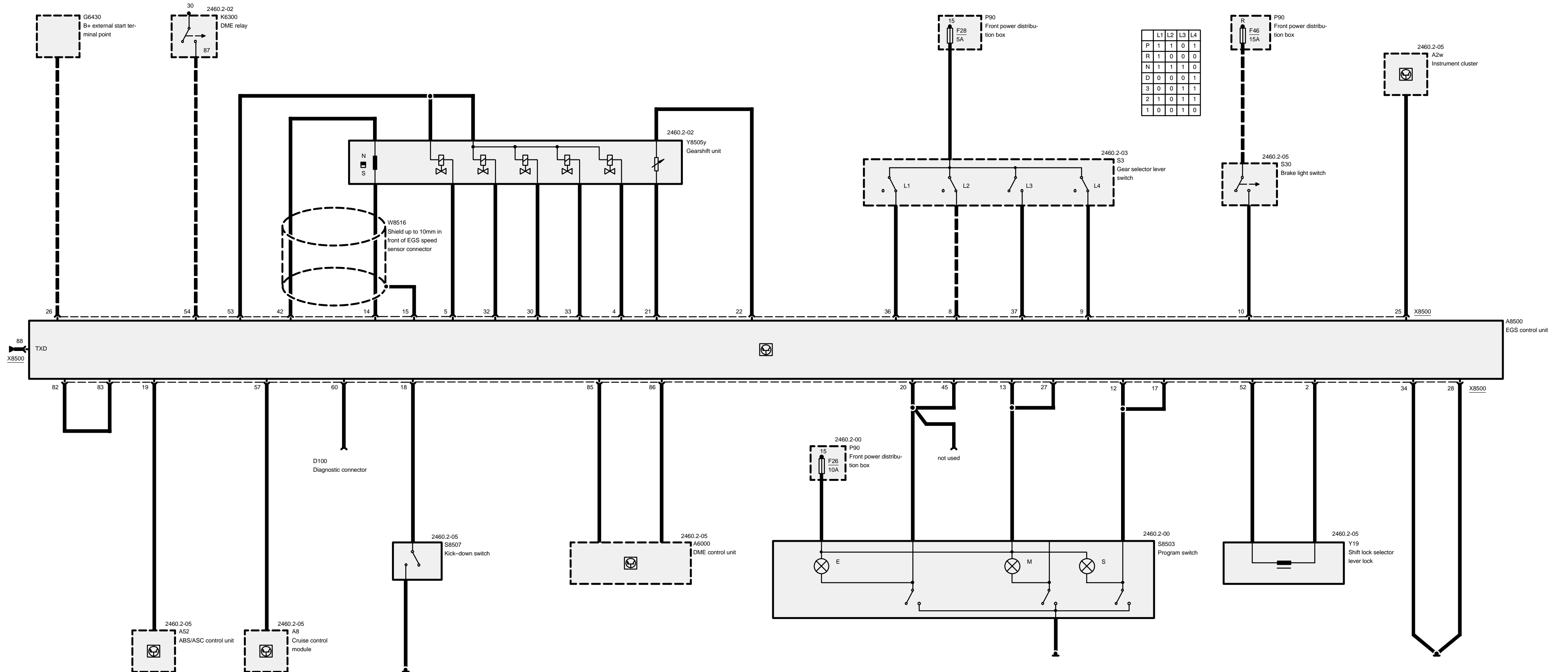
# 2460.2 Electronic transmission control (EGS A4S 310R)

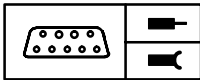
316i, 318i, 318is



	L1	L2	L3	L4
P	1	1	0	1
R	1	0	0	0
N	1	1	1	0
D	0	0	0	1
3	0	0	1	1
2	1	0	1	1
1	0	0	1	0

320i, 323i, 328i



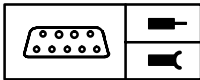


## Pin Assignments (316i, 318i, 318is)

### X8500

Pin	Type	Description/Function	Connection
1		not used	
2	A	Solenoid, P/N shift lock	not used
3		not used	
4	A	Solenoid valve 4	Gearshift unit
5	A	Solenoid valve 3	Gearshift unit
6	M	Ground	Ground connection
7		not used	
8	E	Position switch L2	Selector lever switch
9	E	Position switch L4	Selector lever switch
10	E	Brake signal	Brake light switch
11		not used	
12	E	S program	Program switch
13	E	M program	Program switch
14	M	Ground n-ab	Gearshift unit
15	M	Shield, speed sensor	Shield
16		not used	
17	E	S program	Program switch
18	E	Kick-down	Kick-down switch
19		not used	
20	E	E program	Program switch
21	M	Analog ground	Gearshift unit
22	A	Oil temperature sensor (+)	Gearshift unit
23		not used	
24		not used	
25	A	Fault indicator	Instrument cluster
26	E	B+ voltage	Jumper cable terminal point
27	E	M program	Program switch
28	M	Ground	Ground connection
29		not used	
30	A	Solenoid valve 1	Gearshift unit
31		not used	
32	A	Solenoid valve 5	Gearshift unit
33	A	Solenoid valve 2	Gearshift unit

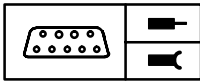
E = Input, A = Output, M = Ground



## Pin Assignments (316i, 318i, 318is)

Pin	Type	Description/Function	Connection
34	M	Ground	Ground connection
35		not used	
36	E	Position switch L1	Selector lever switch
37	E	Position switch L3	Selector lever switch
38	E	Throttle valve position	DME control unit (316i, 318i)
39		not used	
40	E	Fuel consumption (TI signal)	DME control unit
41	E	Engine speed	DME control unit (316i, 318i)
42	E	Component supply n-ab	Gearshift unit
43		not used	
44		not used	
45	E	E program	Program switch
46	E	Air conditioning ON signal	Air conditioner compressor relay
47		not used	
48	E	Brake test signal	not used
49		not used	
50		not used	
51	E	Engine speed	DME control unit (316i, 318i)
52	A	Power supply (+), solenoid valves	Gearshift unit
53	A	Solenoid valve 3	Gearshift unit
54	E	B+ voltage	DME relay
55	E	B+ voltage	DME relay
56		not used	
57	E	Cruise control (Tempomat) signal	Tempomat (318is)
58		not used	
59		not used	
60	E	Programming voltage	Diagnostic connector
61		not used	
62		not used	
63		not used	
64		not used	
65		not used	
66		not used	
67		not used	
68		not used	

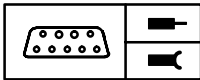
E = Input, A = Output, M = Ground



## Pin Assignments (316i, 318i, 318is)

Pin	Type	Description/Function	Connection
69		not used	
70		not used	
71		not used	
72		not used	
73		not used	
74		not used	
75		not used	
76		not used	
77		not used	
78		not used	
79		not used	
80		not used	
81		not used	
82		not used	
83		not used	
84		not used	
85	E/A	CAN-LOW	DME/ASC control unit
86	E/A	CAN-HIGH	DME/ASC control unit
87	A	RxD diagnostic link	Diagnostic connector
88	E/A	TxD diagnostic link	Diagnostic connector



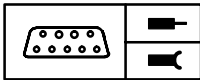


## Pin Assignments (320i, 323i, 328i)

### X8500

Pin	Type	Description/Function	Connection
1		not used	
2	A	Shift lock (+)	Selector lever lock
3		not used	
4	A	Solenoid valve 3	Gearshift unit
5	A	Pressure regulator (-)	Gearshift unit
6		not used	
7		not used	
8	E	Position switch L2	Selector lever switch
9	E	Position switch L4	Selector lever switch
10	E	Brake signal	Brake light switch
11		not used	
12	E	S program	Program switch
13	E	M program	Program switch
14	M	Ground n-ab	Gearshift unit
15	M	Shield, speed sensor	Shield
16		not used	
17	E	S program	Program switch
18	E	Kick-down	Kick-down switch
19	E	ASC signal	ASC control unit
20	E	E program	Program switch
21	M	Analog ground	Gearshift unit
22	E	Oil temperature sensor (+)	Gearshift unit
23		not used	
24		not used	
25	A	Fault indicator	Instrument cluster
26	E	B+ voltage	Jumper cable terminal point
27	E	M program	Program switch
28	M	Ground	Ground connection
29		not used	
30	A	Solenoid valve 1	Gearshift unit
31		not used	
32	A	Solenoid valve, converter lockup clutch	Gearshift unit
33	A	Solenoid valve 2	Gearshift unit

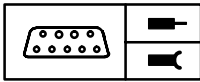
E = Input, A = Output, M = Ground



## Pin Assignments (320i, 323i, 328i)

Pin	Type	Description/Function	Connection
34	M	Ground	Ground connection
35		not used	
36	E	Position switch L1	Selector lever switch
37	E	Position switch L3	Selector lever switch
38		not used	
39		not used	
40		not used	
41		not used	
42	E	Component supply n-ab	Gearshift unit
43		not used	
44		not used	
45	E	E program	Program switch
46		not used	
47		not used	
48		not used	
49		not used	
50		not used	
51		not used	
52	A	Shift lock (-)	Selector lever lock
53	A	Solenoid valves +	Gearshift unit
54	E	B+ voltage	DME relay
55		not used	
56		not used	
57	E	Cruise control (Tempomat) signal	Cruise control (Tempomat)
58		not used	
59		not used	
60	E	Programming voltage	Diagnostic connector
61		not used	
62		not used	
63		not used	
64		not used	
65		not used	
66		not used	
67		not used	
68		not used	

E = Input, A = Output, M = Ground



### Pin Assignments (320i, 323i, 328i)

Pin	Type	Description/Function	Connection
69		not used	
70		not used	
71		not used	
72		not used	
73		not used	
74		not used	
75		not used	
76		not used	
77		not used	
78		not used	
79		not used	
80		not used	
81		not used	
82	E/A	Jumper	
83	E/A	Jumper	
84		not used	
85	E/A	CAN-LOW	DME/ASC control unit
86	E/A	CAN-HIGH	DME/ASC control unit
87		not used	
88	E/A	TxD diagnostic link	Diagnostic connector



# Electronic transmission control (EGS A4S 310R)

Engine management MS41.0 (6-cylinder M52) 1210.17	Digital motor elec- tronics (DME M1.7.3, 4-cylinder M43) 1210.19	Digital motor elec- tronics (DME M5.2, 4-cylinder M44) 1210.20
--	---	---

Power distribution  
0670.2

6 RT  
G6430  
B+ external start terminal point

6 RT  
1 RT  
X6410  
X6411 320i, 323i, 328i

26  
X8500

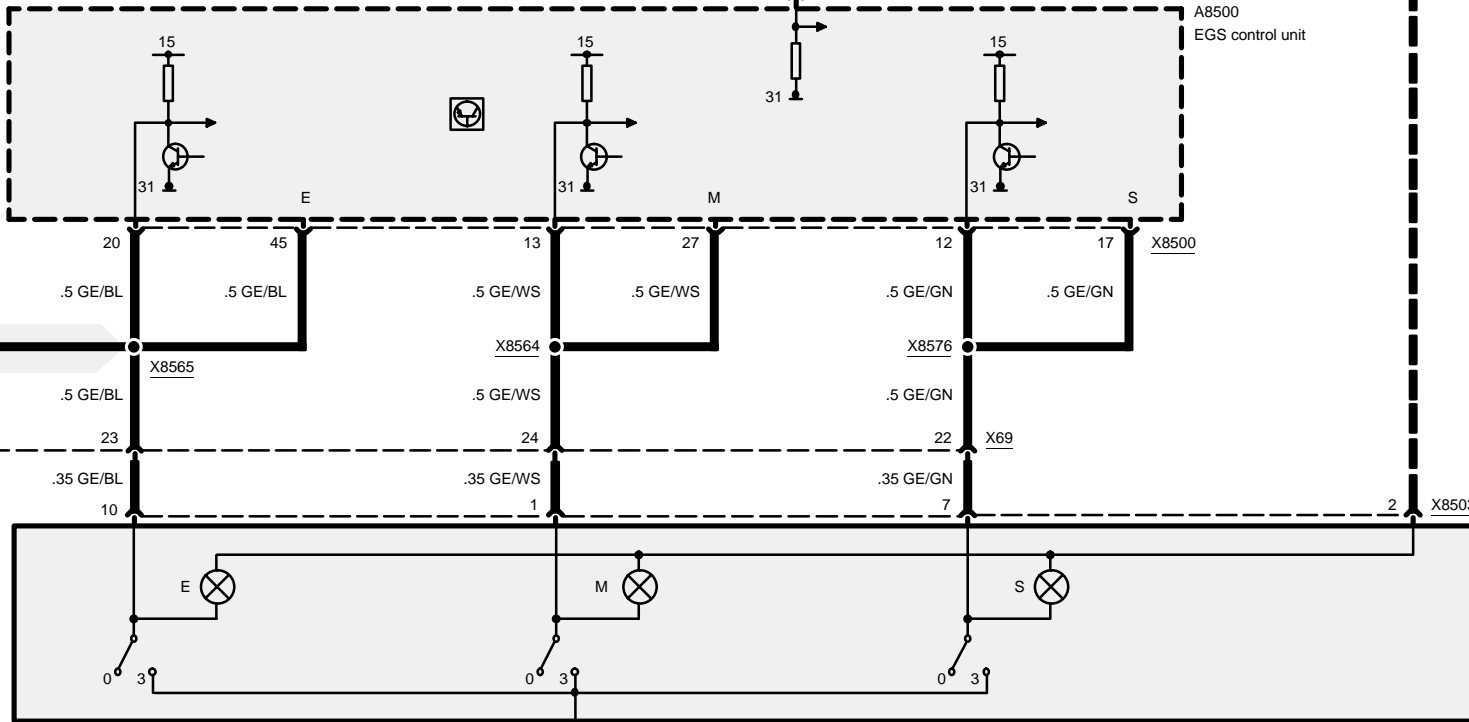
31

P90  
Front power distribu-  
tion box

15  
F26  
10A  
12  
X10017

Fuse details  
0670.3

A8500  
EGS control unit



316i, 318i, 318is

.5 GE/BL

13

not used

.5 GE/BL

.5 GE/BL

23

.35 GE/BL

10

.5 GE/BL

.5 GE/BL

23

.35 GE/BL

10

.5 GE/WS

.5 GE/WS

24

.35 GE/WS

1

.5 GE/WS

.5 GE/WS

24

.35 GE/WS

1

.5 GE/GN

.5 GE/GN

22

.35 GE/GN

7

.5 GE/GN

.5 GE/GN

22

.35 GE/GN

7

5  
X8503

Ground distribution  
0670.4

X10012



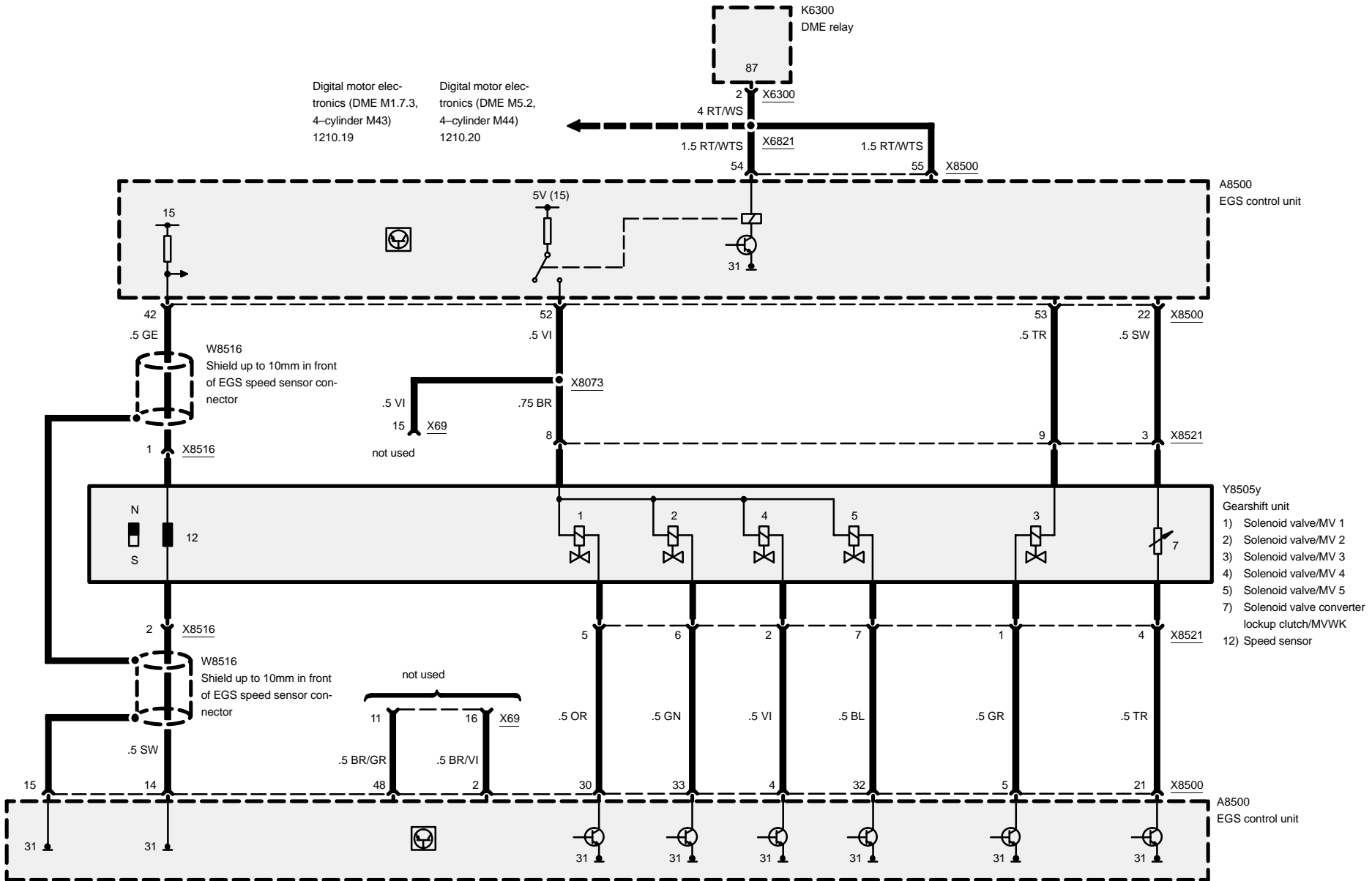
# Electronic transmission control (EGS A4S 310R)

316i, 318i, 318is

## Current

Digital motor electronics (DME M1.7.3, 4-cylinder M43) 1210.19

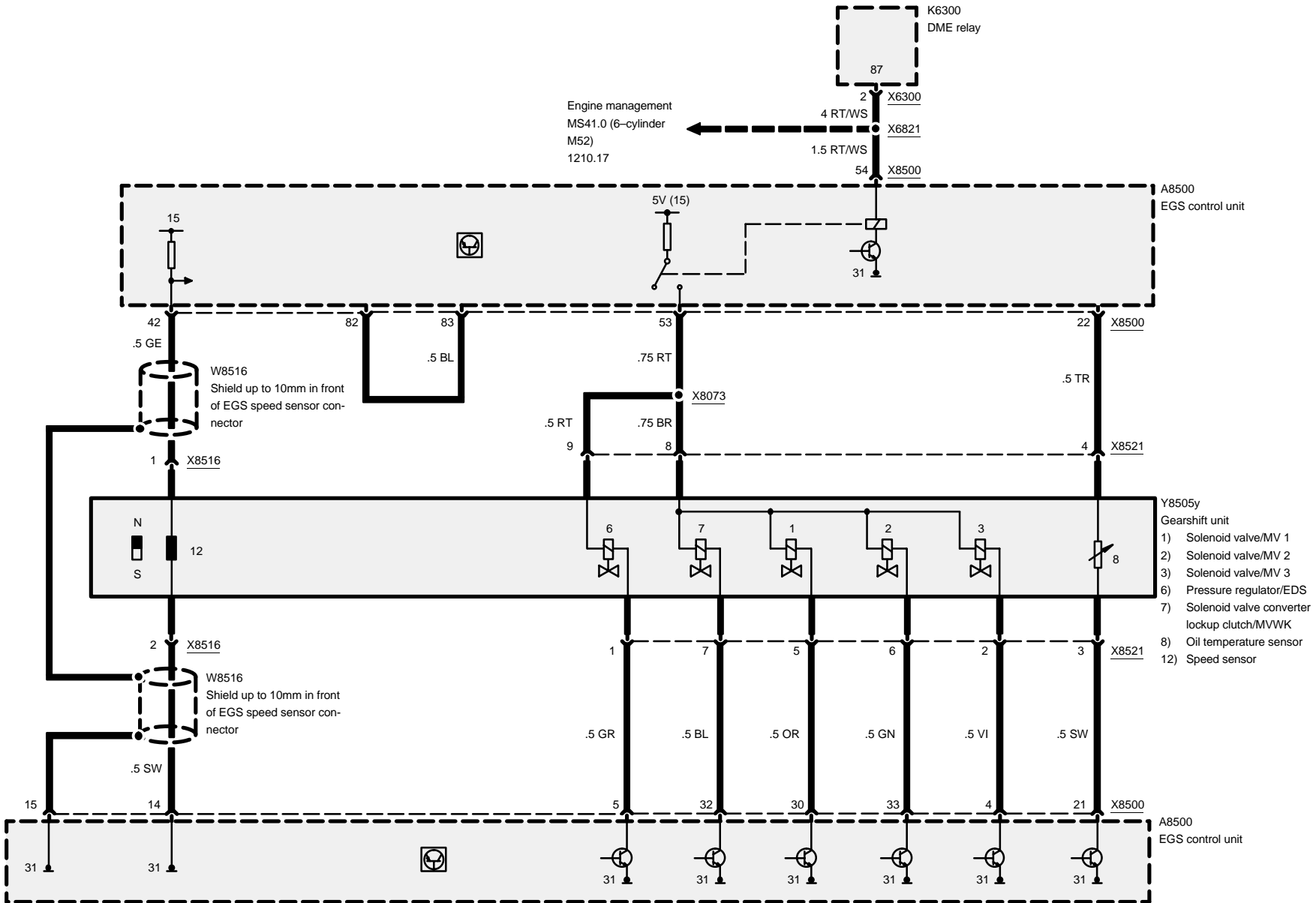
Digital motor electronics (DME M5.2, 4-cylinder M44) 1210.20





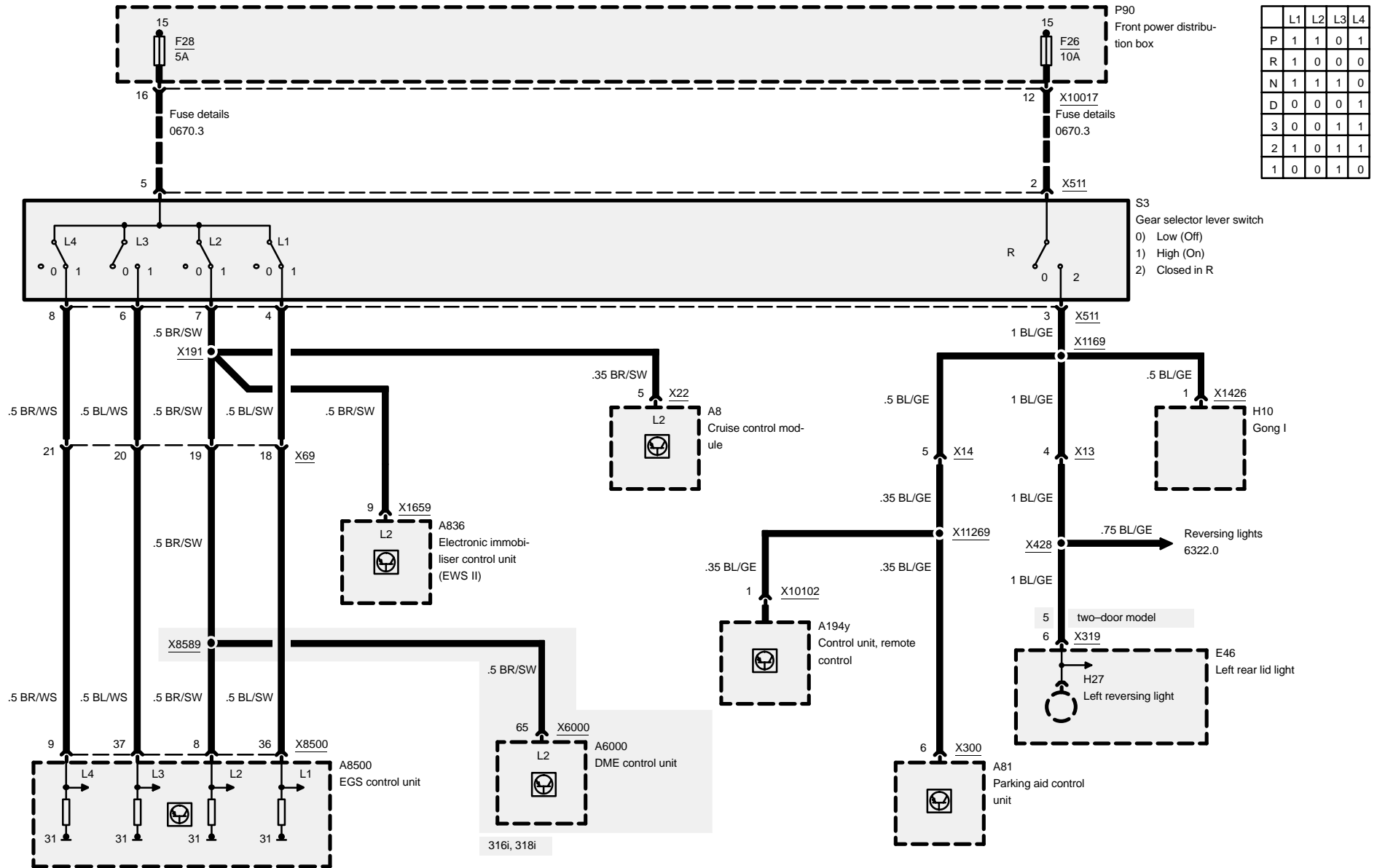
# Electronic transmission control (EGS A4S 310R)

320i, 323i, 328i





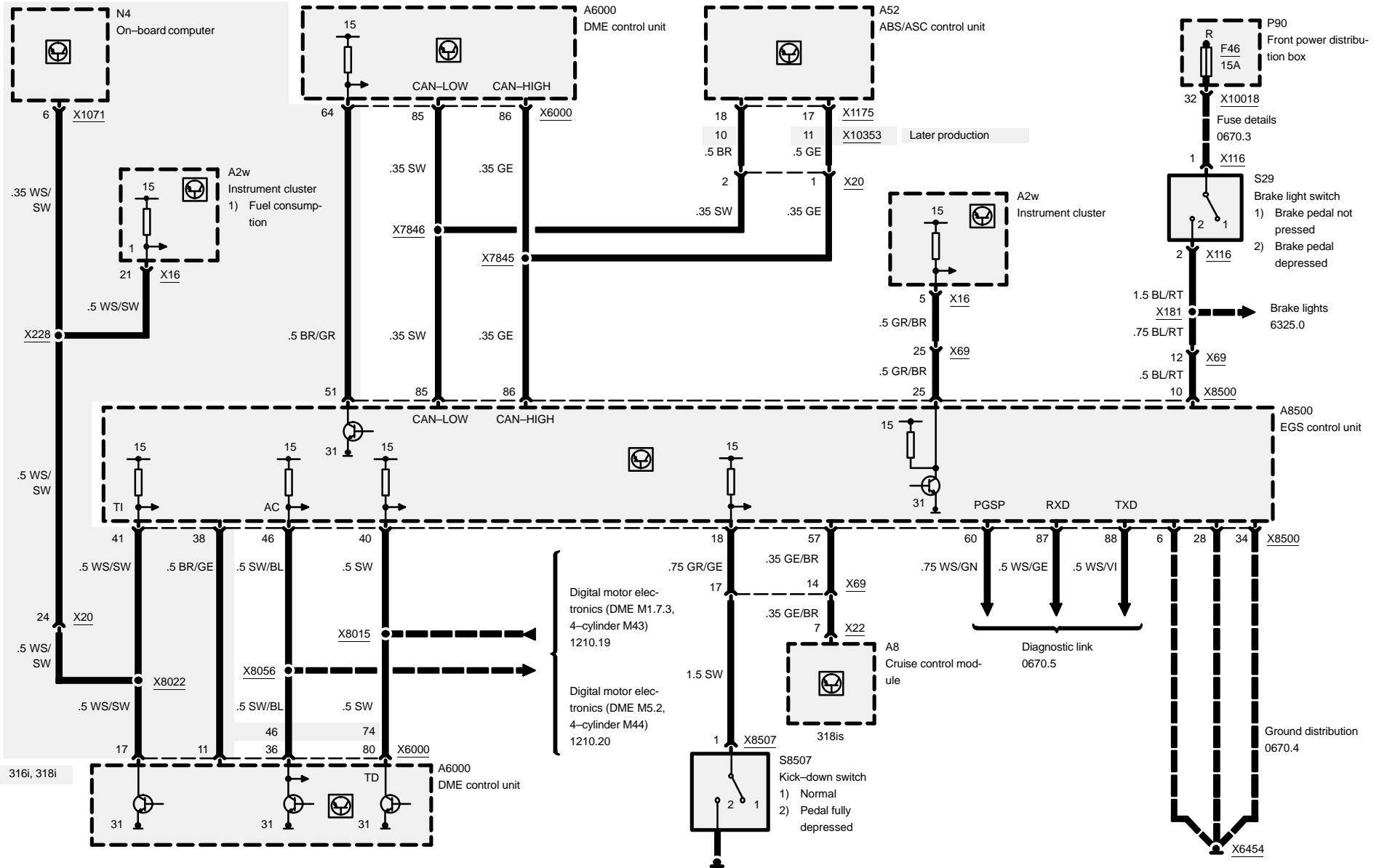
# Electronic transmission control (EGS A4S 310R)





# Electronic transmission control (EGS A4S 310R)

316i, 318i, 318is



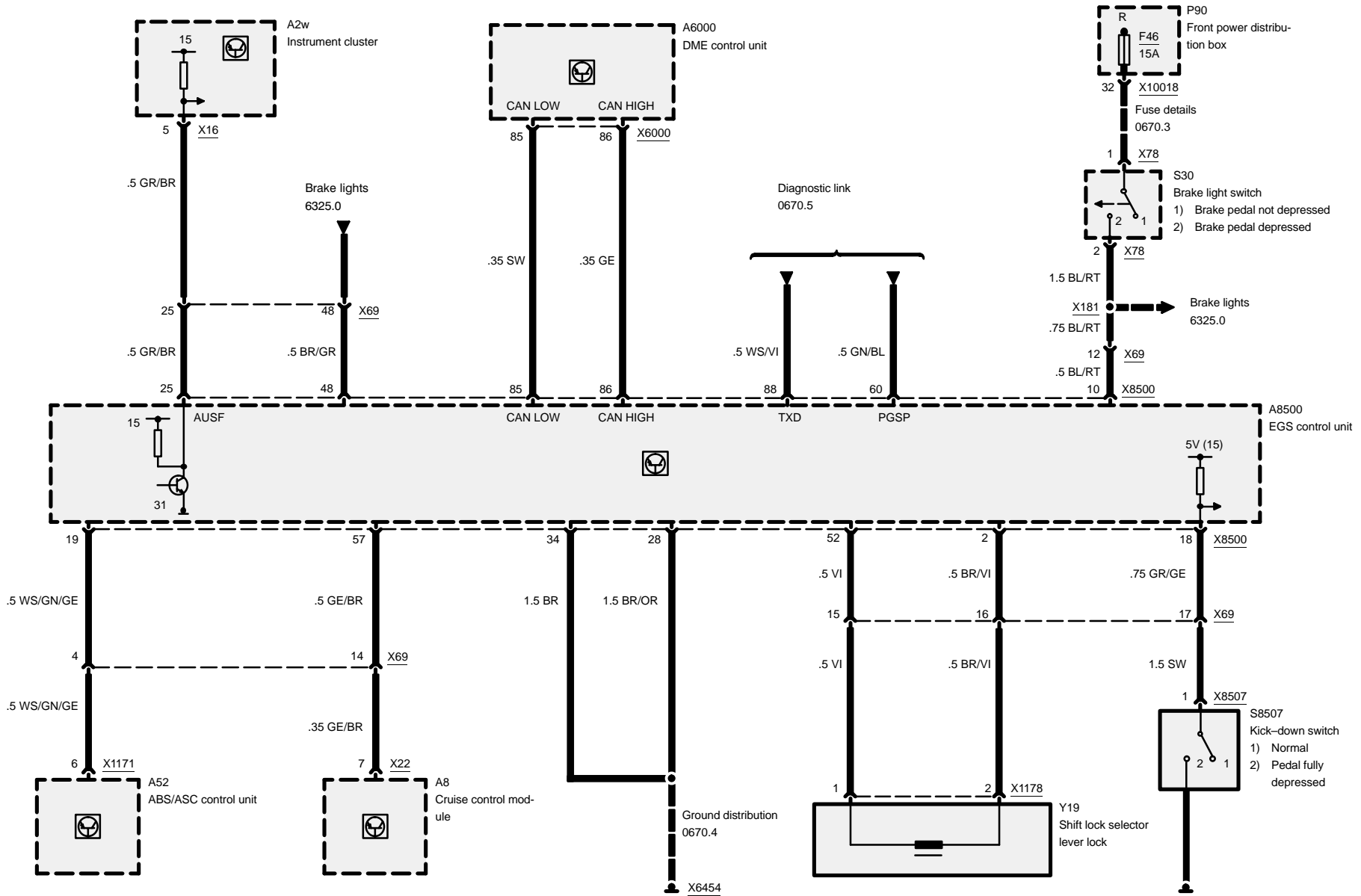
316i, 318i

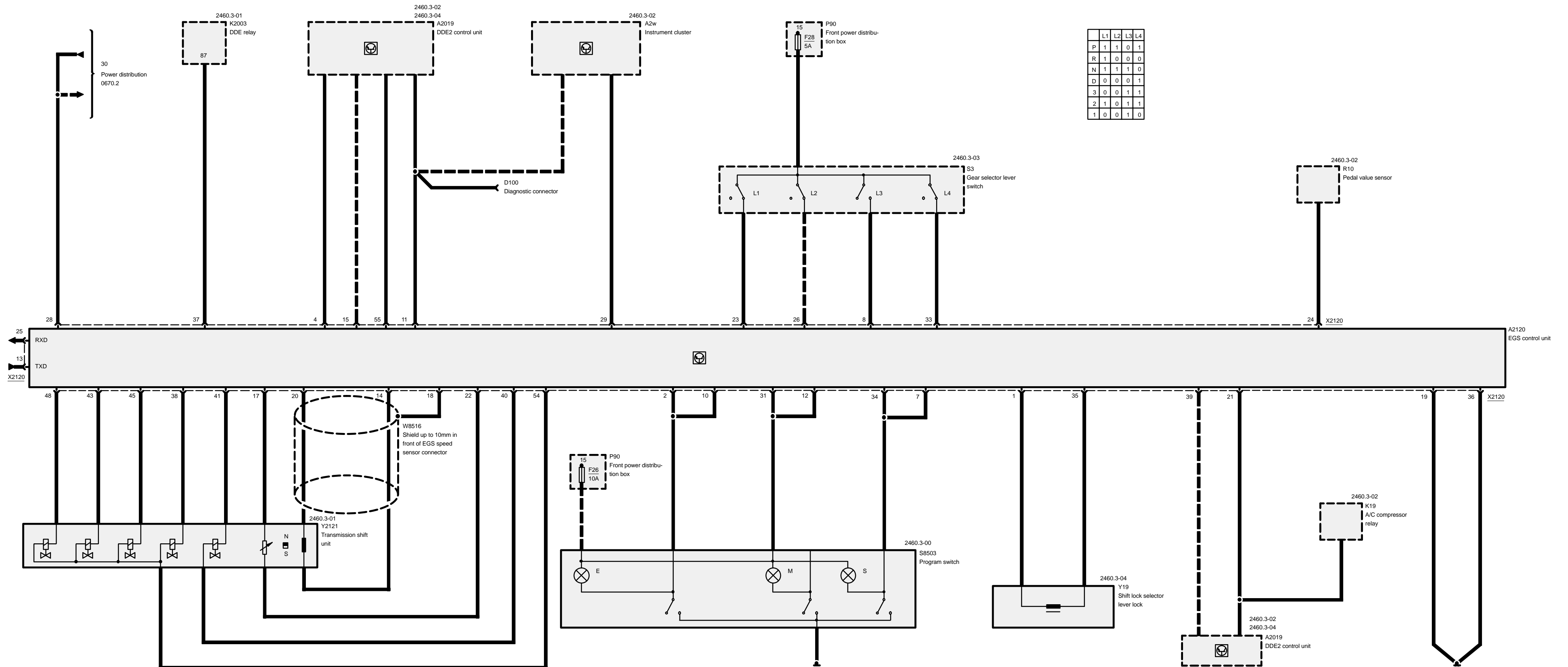


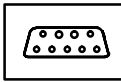


# Electronic transmission control (EGS A4S 310R)

320i, 323i, 328i





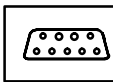


## Pin assignments

### X2120

Pin	Type	Description/Function	Connection
1	A	Shift lock (-)	Selector lever lock
2	E	E program	Program switch
3		not used	
4	A	Engine intervention	DDE control unit
5		not used	
6		not used	
7	E	S program	Program switch
8	E	Position switch L3	Transmission selector lever
9		not used	
10	E	E program	Program switch
11	E	Engine speed	DDE control unit
12	E	M program	Program switch
13	E/A	TxD link	Diagnostic connector
14	E	Speed sensor n-ab (-)	Gearshift unit
15	E	Brake test signal	Brake light switch
16		not used	
17	E	Analog ground (temperature sensor)	Gearshift unit
18	M	Shield, speed sensor	Shield
19	M	Power ground	Ground connection
20	A	Speed sensor n-ab (+)	Gearshift unit
21	E	A/C compressor	Relay, A/C compressor
22	A	Oil temperature sensor	Gearshift unit
23	E	Position switch L1	Selector lever
24	E	Analog input, pedal travel sensor	Pedal travel sensor
25	A	RxD diagnostic link	Diagnostic connector
26	E	Position switch L2	Selector lever
27		not used	
28	E	B+ voltage	B+ terminal point
29	A	Fault indicator	Instrument cluster
30		not used	
31	E	M program	Program switch
32		not used	
33	E	Position switch L4	Selector lever

E = Input, A = Output, M = Ground



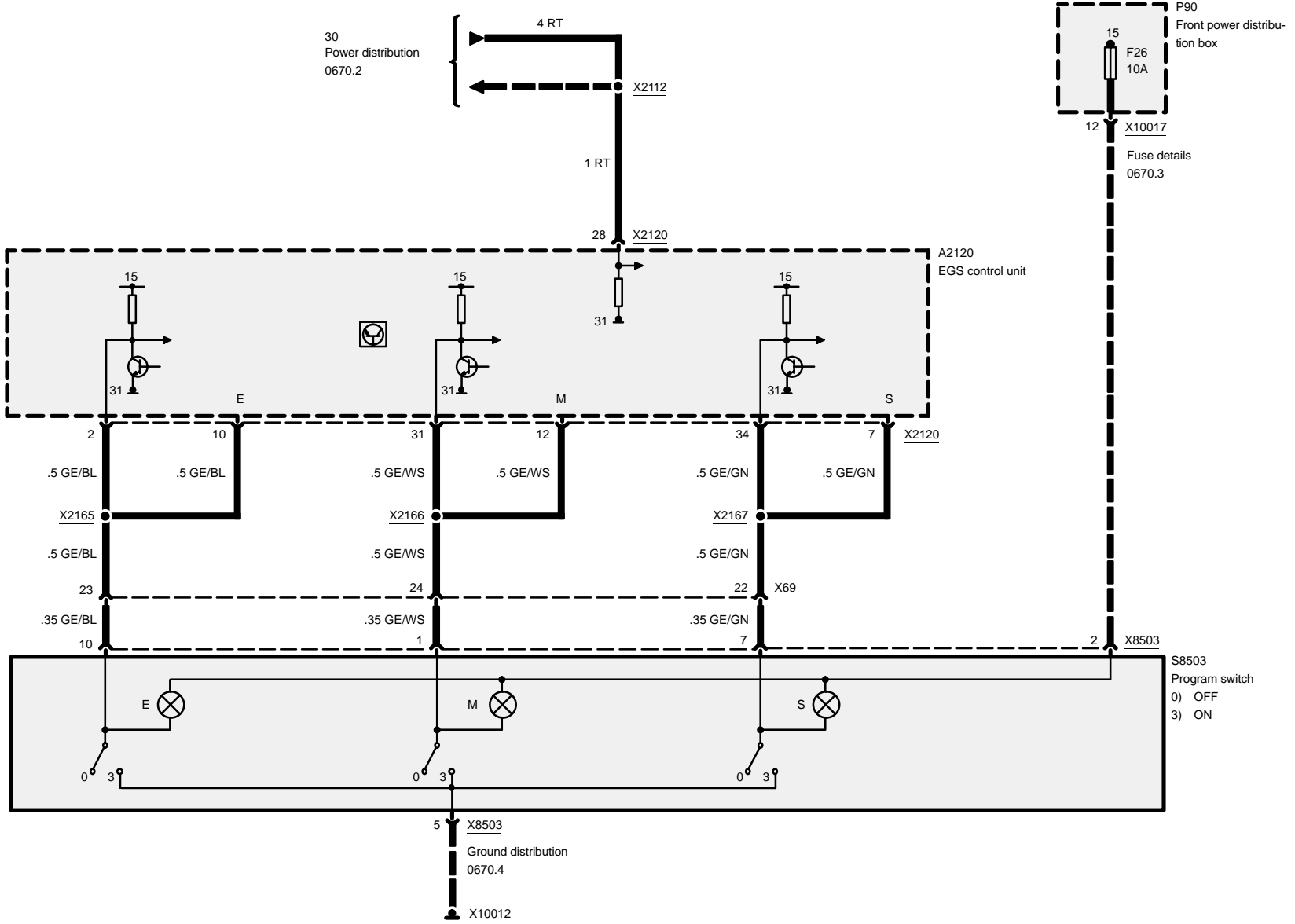
## Pin assignments

Pin	Type	Description/Function	Connection
34	E	S program	Program switch
35	A	Shift lock (+)	Selector lever lock
36	M	Ground, electronics	Ground connection
37	E	B+ voltage	DDE relay
38	A	Solenoid valve/converter lockup clutch	Gearshift unit
39	E	Brake signal	Brake light switch
40	A	Pressure regulator (+)	Gearshift unit
41	A	Pressure regulator (-)	Gearshift unit
42		not used	
43	A	Solenoid valve 2	Gearshift unit
44		not used	
45	A	Solenoid valve, band	Gearshift unit
46		not used	
47		not used	
48	A	Solenoid valve 1	Gearshift unit
49		not used	
50		not used	
51		not used	
52		not used	
53		not used	
54	E	Solenoid valves (+)	Gearshift unit
55	A	Multiplex signal	DDE control unit



# Electronic transmission control (EGS A4S 270R Diesel)

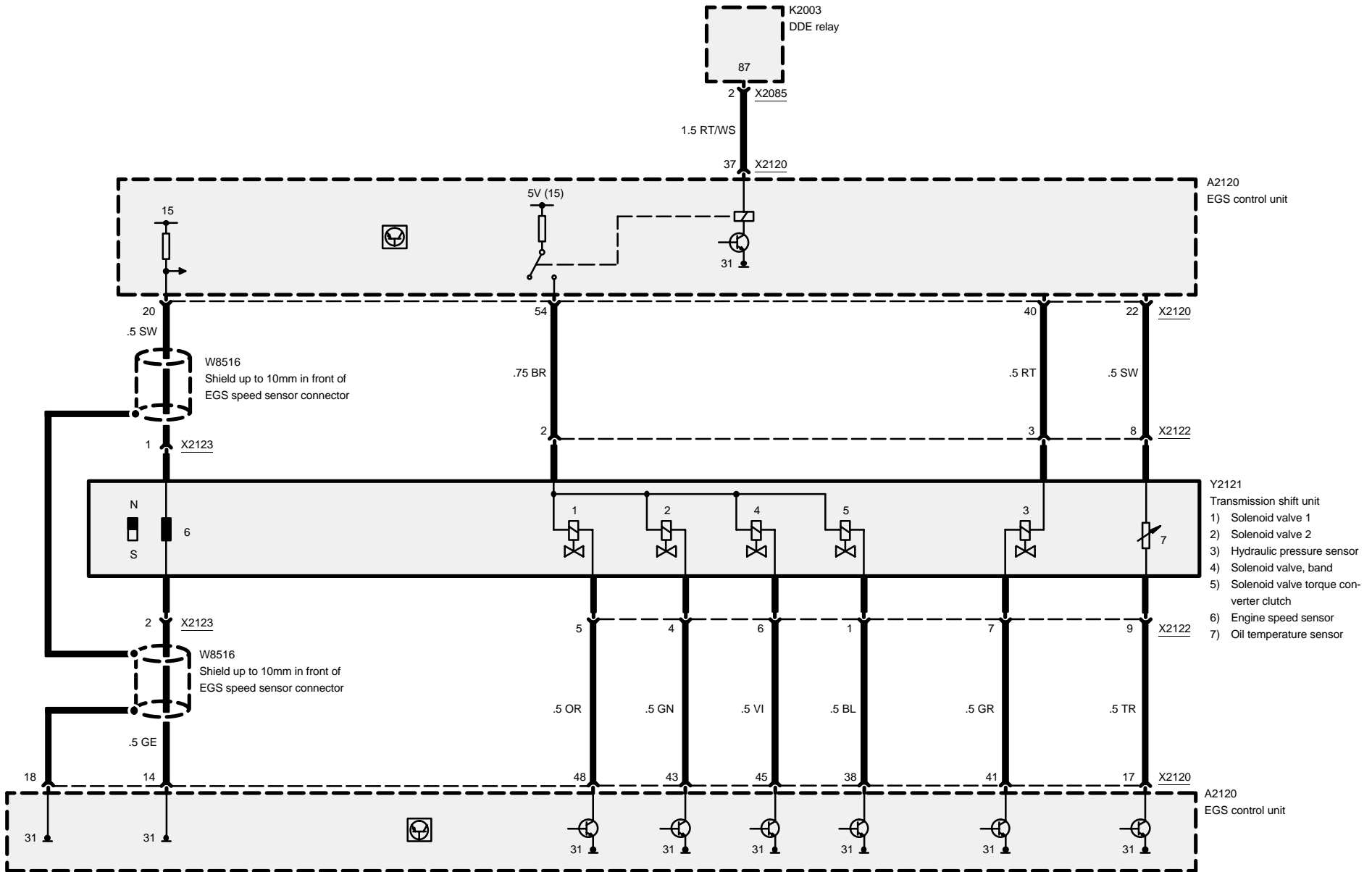
325td, 325tds





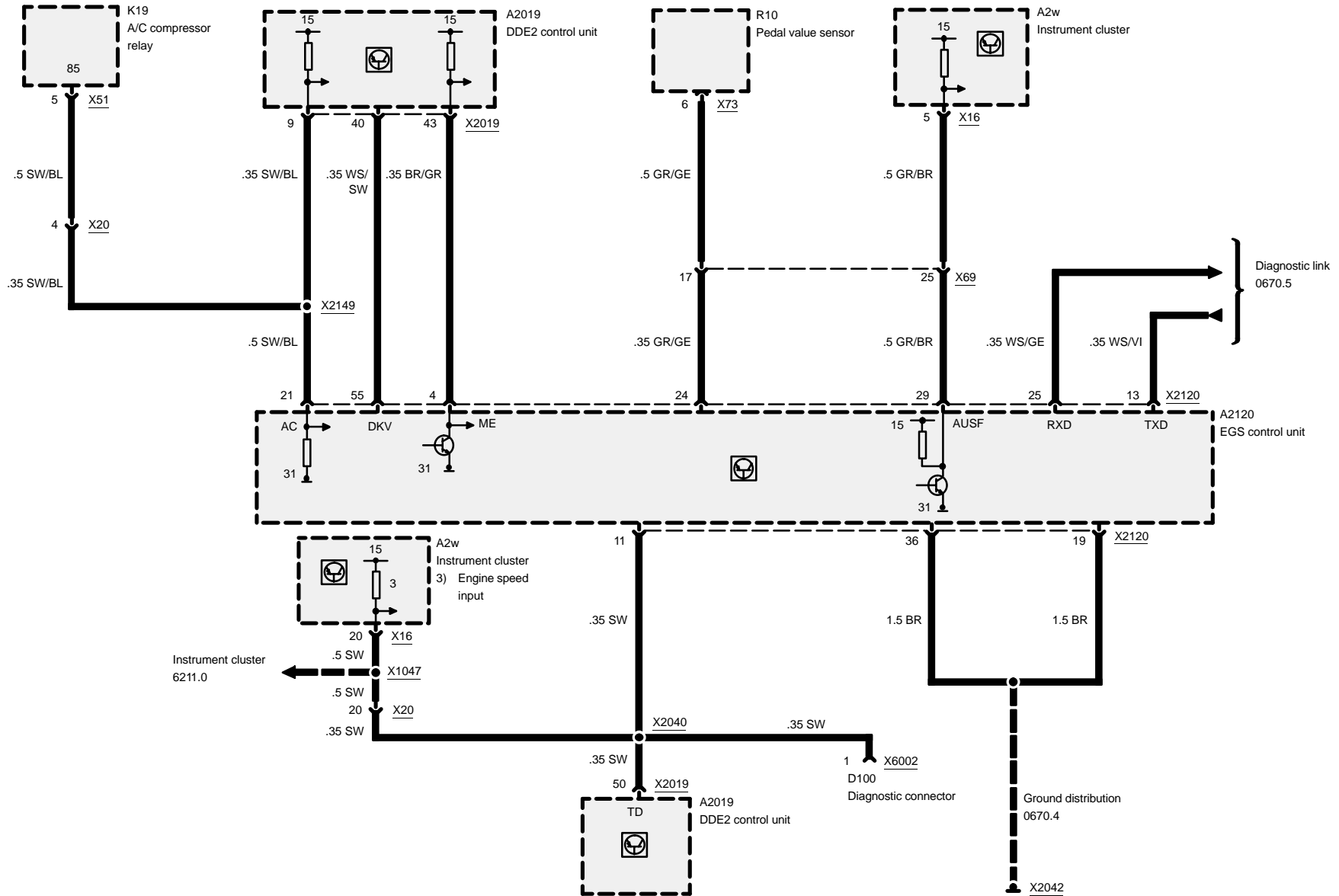
# Electronic transmission control (EGS A4S 270R Diesel)

## Current



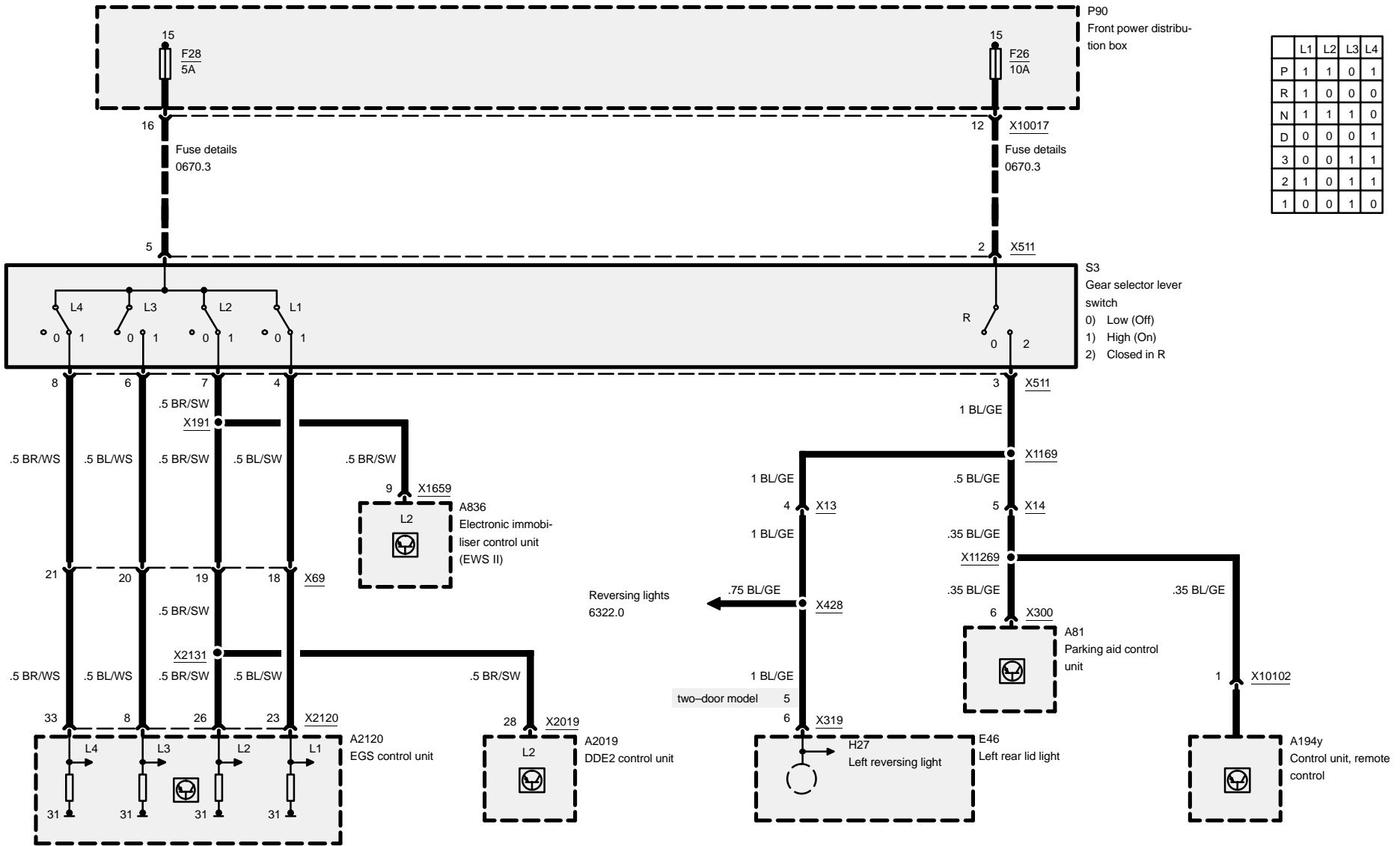


# Electronic transmission control (EGS A4S 270R Diesel)





# Electronic transmission control (EGS A4S 270R Diesel)

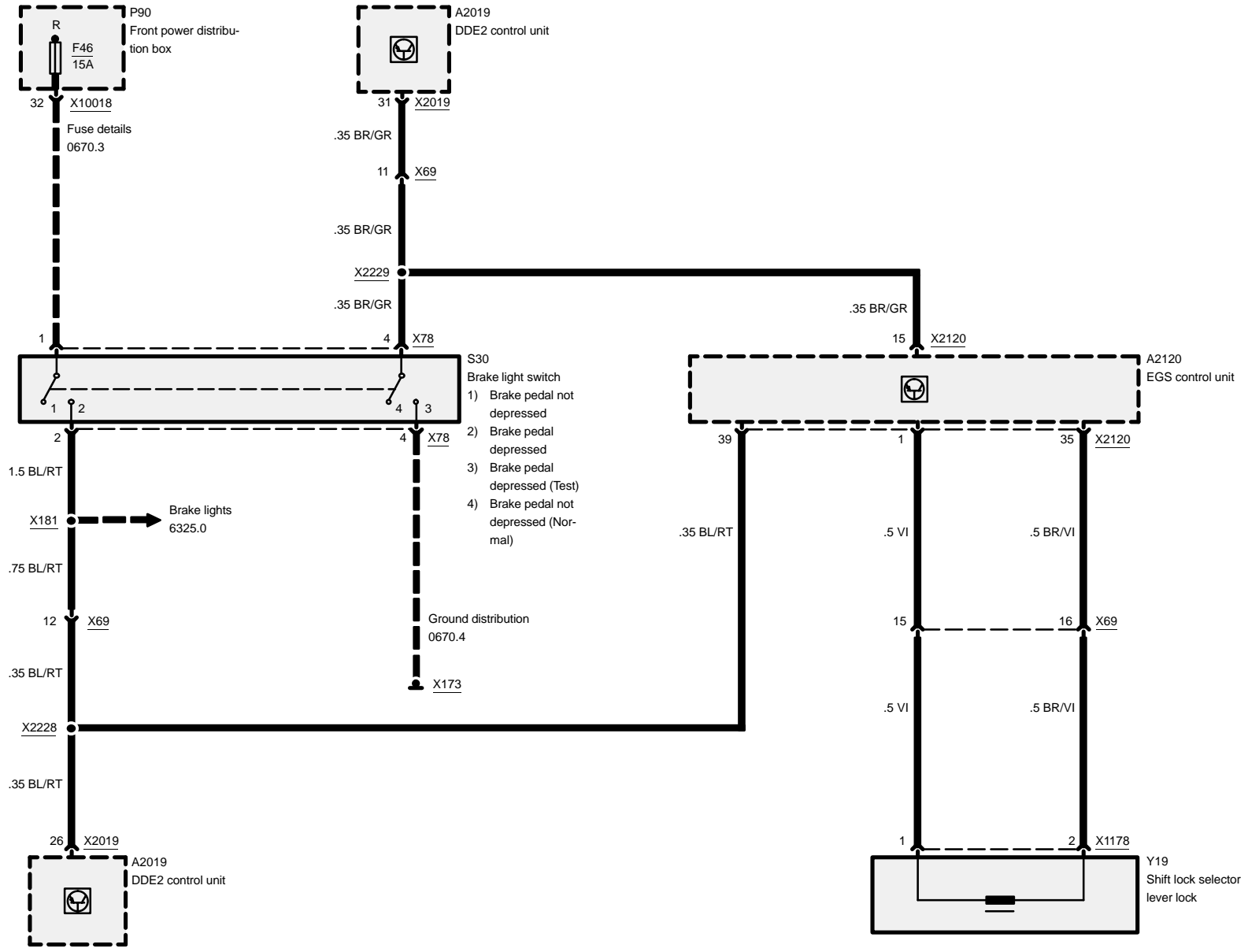


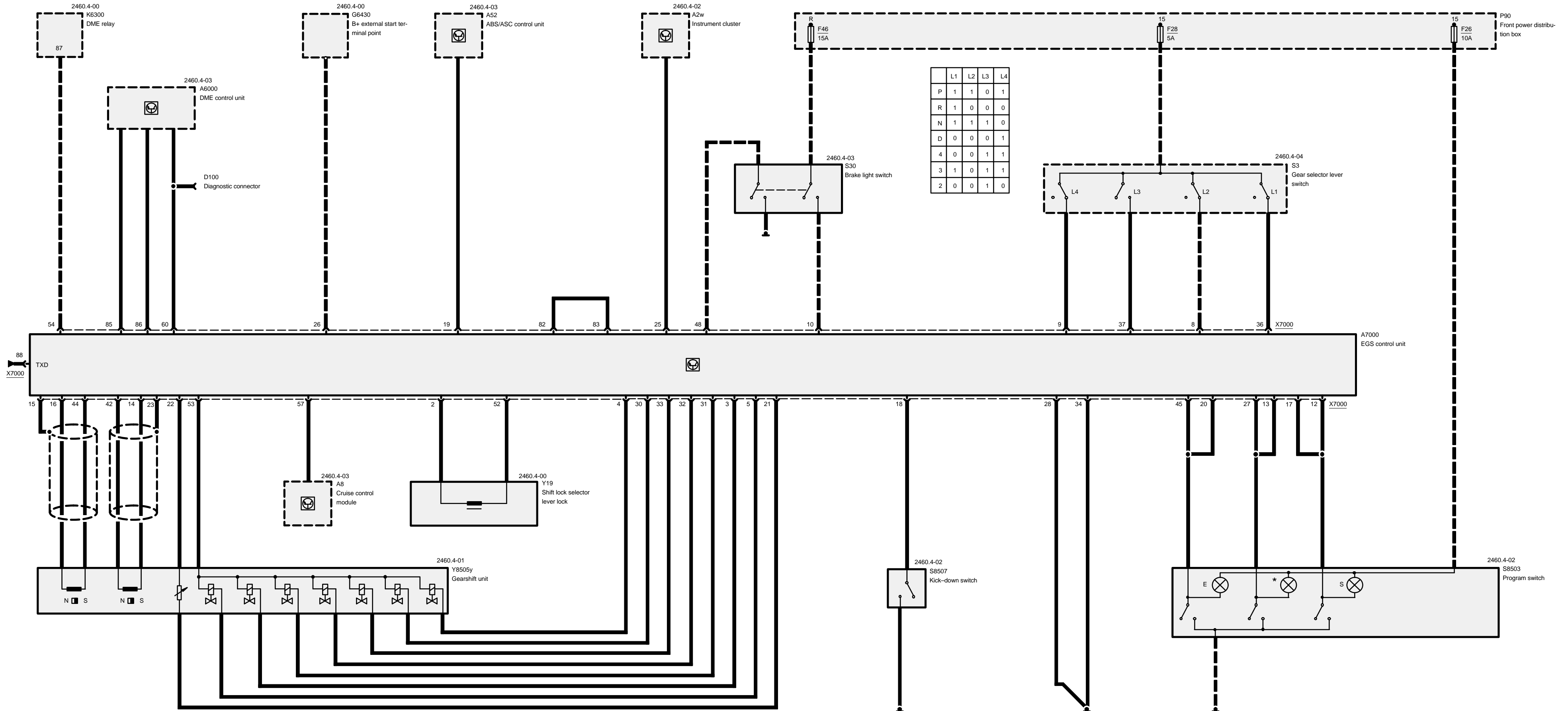
	L1	L2	L3	L4
P	1	1	0	1
R	1	0	0	0
N	1	1	1	0
D	0	0	0	1
3	0	0	1	1
2	1	0	1	1
1	0	0	1	0

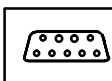




# Electronic transmission control (EGS A4S 270R Diesel)





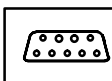


## Pin assignments

### X7000

Pin	Type	Description/Function	Connection
1		not used	
2	A	Shift lock (+)	Selector lever lock
3	A	Solenoid valve 5	Gearshift unit
4	A	Solenoid valve, converter lockup clutch	Gearshift unit
5	A	Pressure regulator (-)	Gearshift unit
6		not used	
7		not used	
8	E	Position switch L2	Selector lever
9	E	Position switch L4	Selector lever
10	E	Brake signal	Brake light switch
11		not used	
12	E	S program	Program switch
13	E	* program	Program switch
14	E	Speed sensor n-ab (-)	Gearshift unit
15	M	Shield, speed sensor	Shield
16	E	Speed sensor, n-turbine (+)	Gearshift unit
17	E	S program	Program switch
18	E	Kick-down signal	Kick-down switch
19	E	ASC signal	ASC control unit
20	E	E program	Program switch
21	M	Ground, oil temperature sensor	Gearshift unit
22	E	Oil temperature sensor, NTC	Gearshift unit
23	M	Shield for speed sensor	Shield
24		not used	
25	A	Fault indicator	Instrument cluster
26	E	Terminal 30	Jumper cable terminal point
27	E	* program	Program switch
28	M	Ground, electronics	Ground connection
29		not used	
30	A	Solenoid valve 1	Gearshift unit
31	A	Solenoid valve 4	Gearshift unit
32	A	Solenoid valve 3	Gearshift unit
33	A	Solenoid valve 2	Gearshift unit

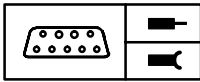
E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	M	Power ground	Ground connection
35		not used	
36	E	Position switch L1	Selector lever
37	E	Position switch L3	Selector lever
38		not used	
39		not used	
40		not used	
41		not used	
42	E	Speed sensor n-ab (+)	Gearshift unit
43		not used	
44	E	Turbine speed sensor (-)	Gearshift unit
45	E	E program	Program switch
46		not used	
47		not used	
48	E	Brake test signal	Brake light switch
49		not used	
50		not used	
51		not used	
52	A	Shift lock (-)	Selector lever lock
53	A	Positive supply, solenoid valves	Gearshift unit
54	E	B+ voltage	DME relay
55		not used	
56		not used	
57	E	Cruise control (Tempomat) signal	Tempomat control unit
58		not used	
59		not used	
60	E	Programming voltage	Diagnostic connector
61		not used	
62		not used	
63		not used	
64		not used	
65		not used	
66		not used	
67		not used	
68		not used	

E = Input, A = Output, M = Ground

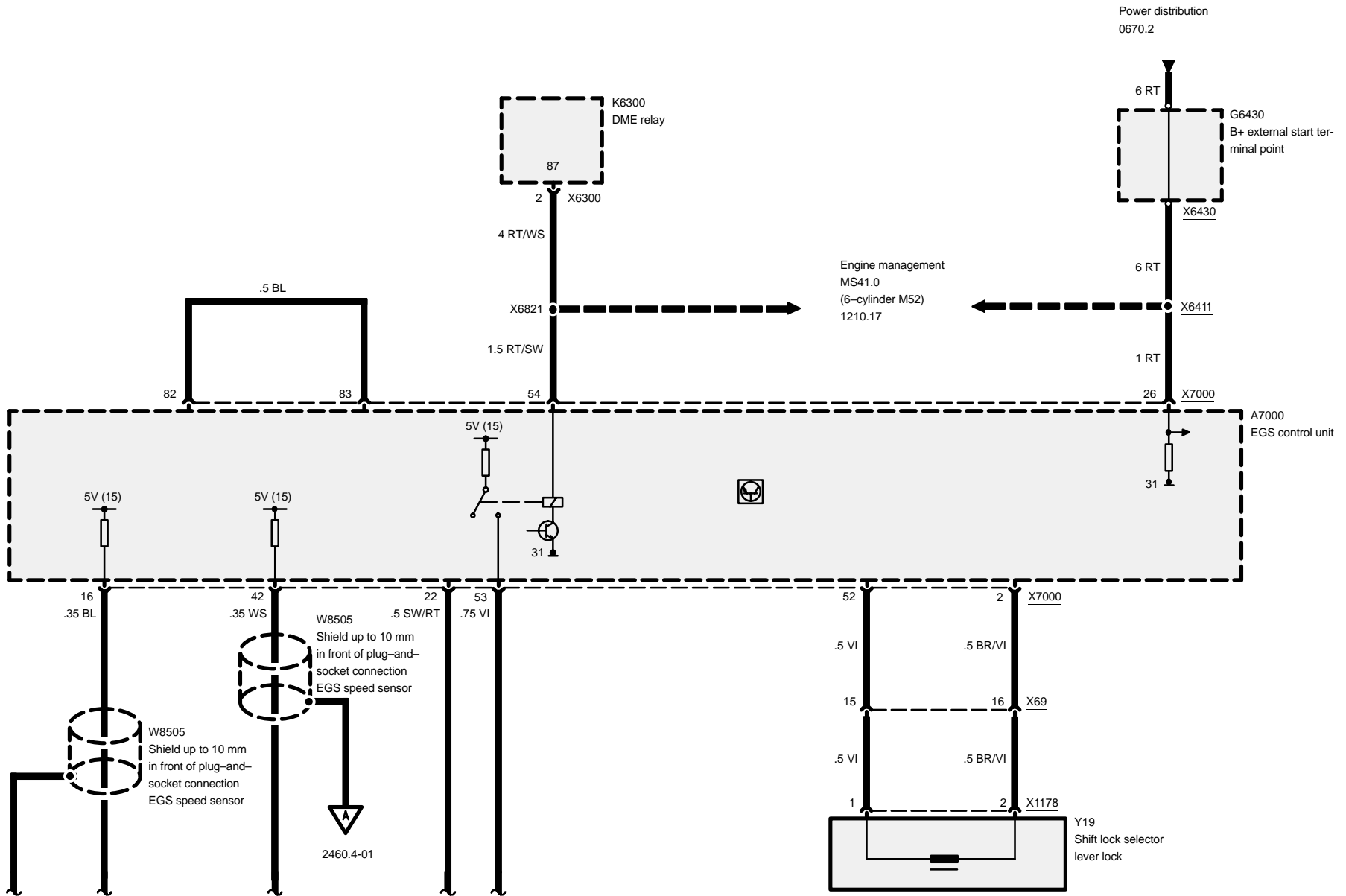


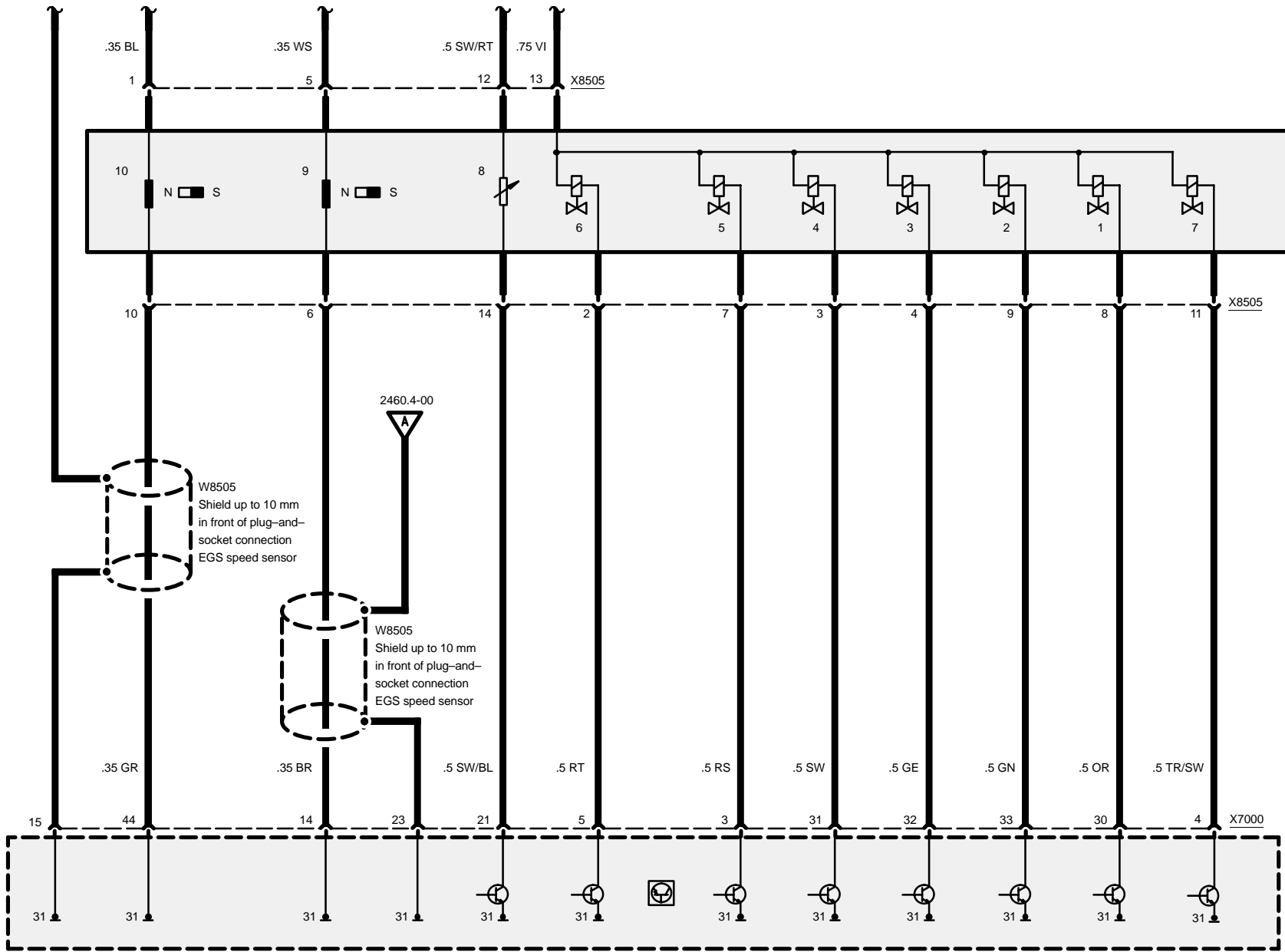
### Pin assignments

Pin	Type	Description/Function	Connection
69		not used	
70		not used	
71		not used	
72		not used	
73		not used	
74		not used	
75		not used	
76		not used	
77		not used	
78		not used	
79		not used	
80		not used	
81		not used	
82	E/A	Jumper	
83	E/A	Jumper	
84		not used	
85	E/A	CANCA-LOW	DME control unit
86	E/A	CANCA-HIGH	DME control unit
87		not used	
88	E/A	TxD diagnostic link	Diagnostic connector



# Electronic transmission control (EGS A5S 310Z)





- Y8505y  
Gearshift unit
- 1) Solenoid valve/MV 1
  - 2) Solenoid valve/MV 2
  - 3) Solenoid valve/MV 3
  - 4) Solenoid valve/MV 4
  - 5) Solenoid valve/MV 5
  - 6) Pressure regulator/EDS
  - 7) Solenoid valve converter lockup clutch/MVWK
  - 8) Oil temperature sensor
  - 9) Output speed sensor
  - 10) Turbine speed sensor

W8505  
Shield up to 10 mm  
in front of plug-and-  
socket connection  
EGS speed sensor

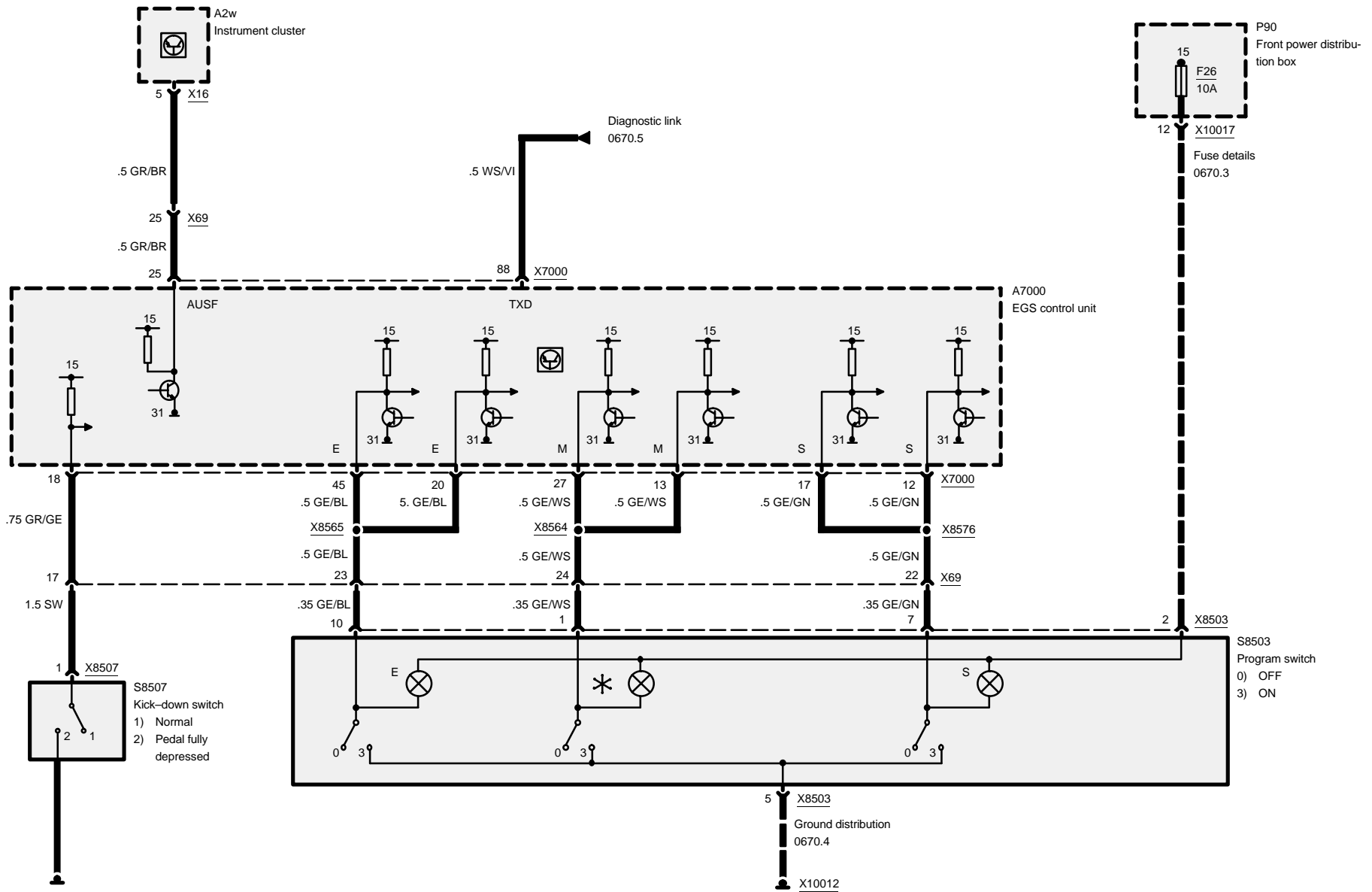
2460.4-00  
A

W8505  
Shield up to 10 mm  
in front of plug-and-  
socket connection  
EGS speed sensor

A7000  
EGS control unit



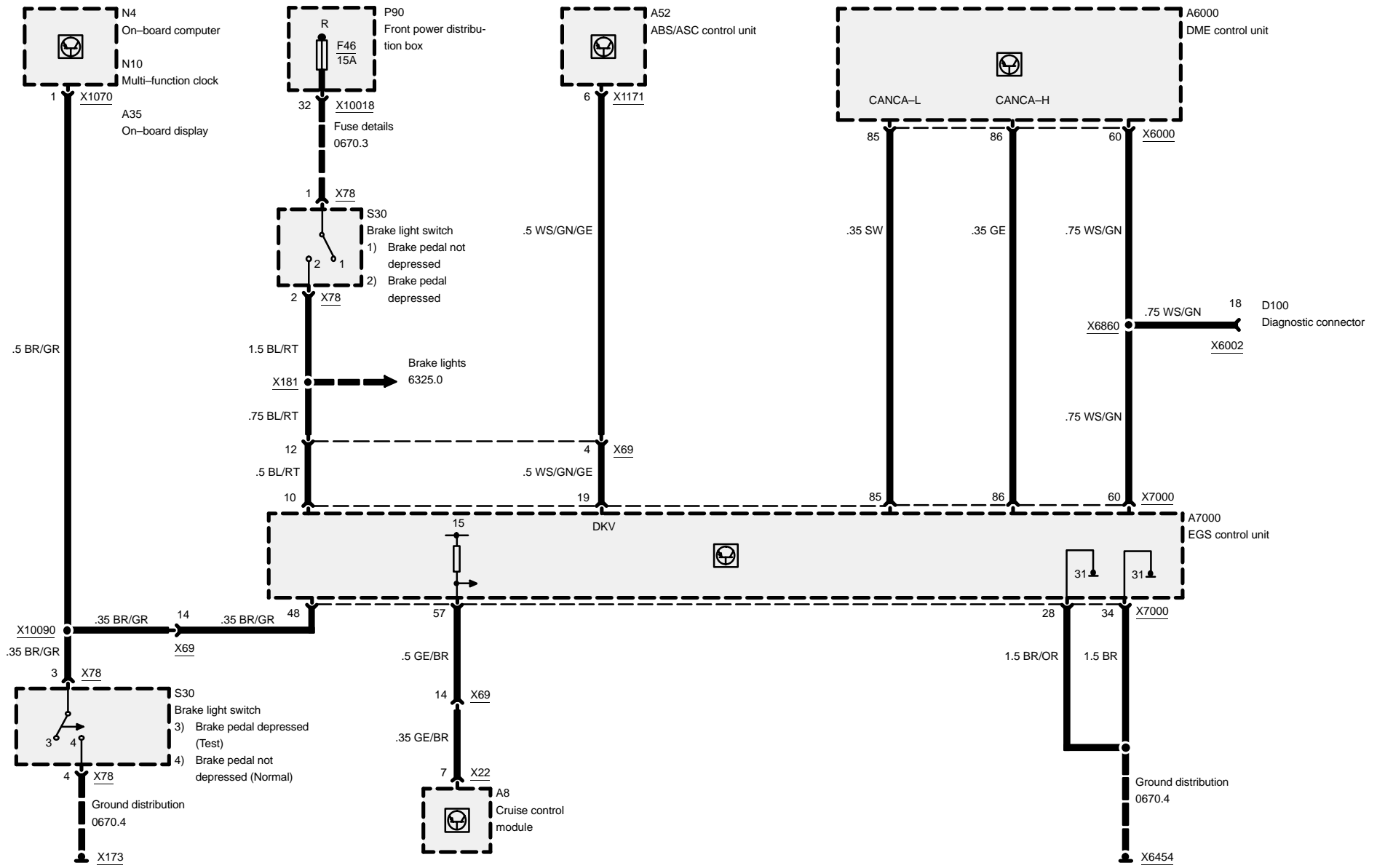
# Electronic transmission control (EGS A5S 310Z)





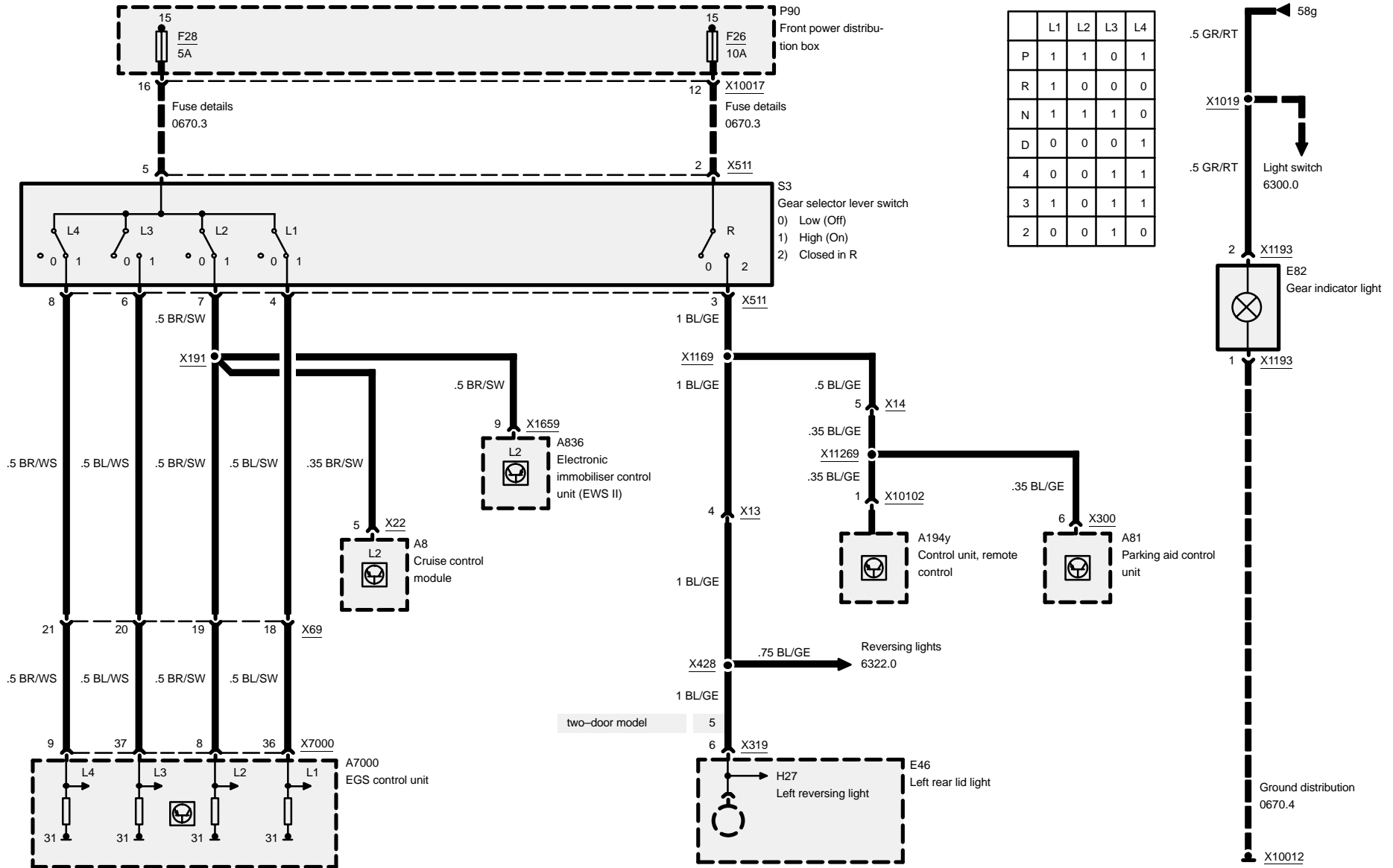


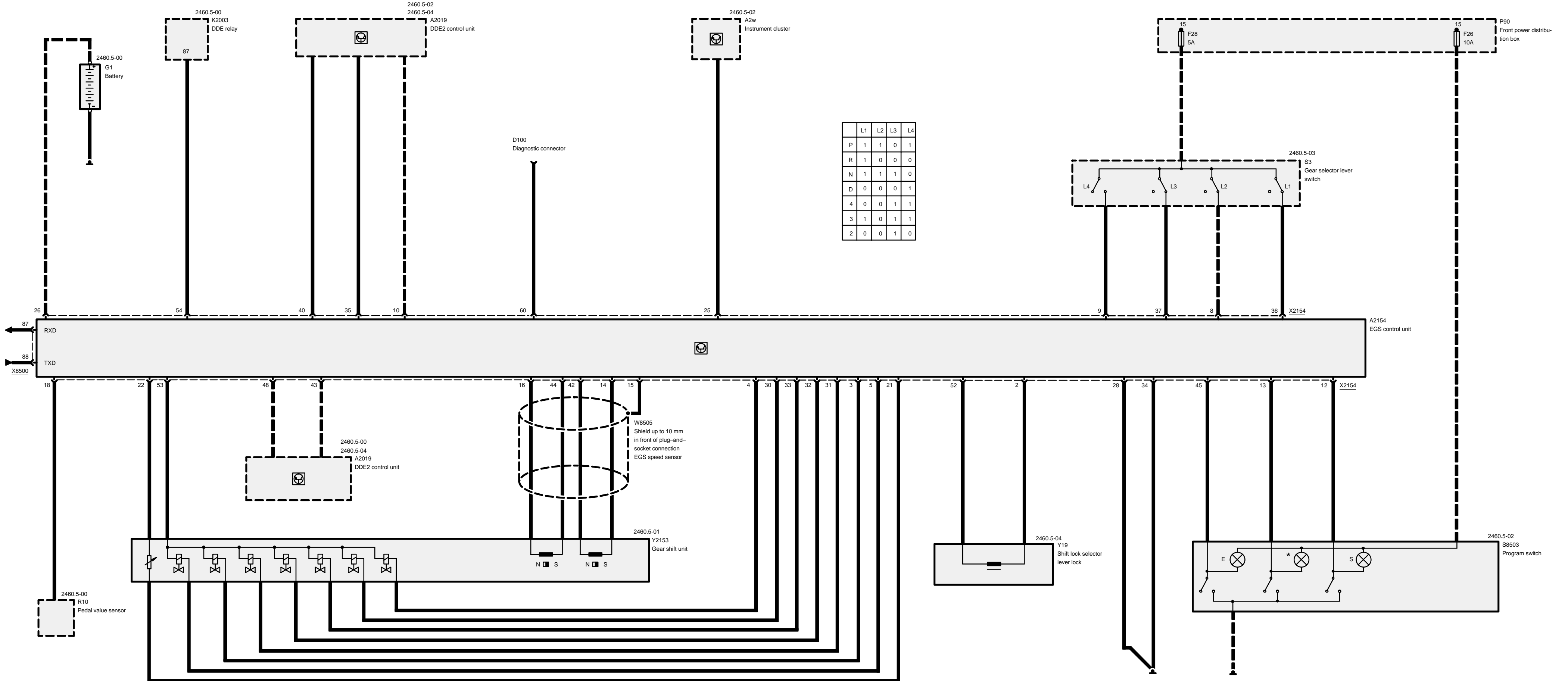
# Electronic transmission control (EGS A5S 310Z)

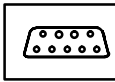




# Electronic transmission control (EGS A5S 310Z)





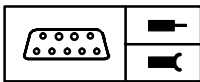


## Pin assignments

### X2154

Pin	Type	Description/Function	Connection
1		not used	
2	A	Shift lock (+)	Selector lever lock
3	A	Solenoid valve 5	Gearshift unit
4	A	Solenoid valve, converter lockup clutch	Gearshift unit
5	A	Pressure regulator (-)	Gearshift unit
6		not used	
7		not used	
8	E	Position switch L2	Selector lever
9	E	Position switch L4	Selector lever
10	E	Brake test signal	Brake light switch
11		not used	
12	E/A	L5 S program	Program switch
13	E/A	L7 * program	Program switch
14	E	Speed sensor n-ab (-)	Gearshift unit
15	A	Shield, speed sensor n-ab/n turbine	Shield
16	E	Speed sensor n-turbine (+) pinion speed	Gearshift unit
17		not used	
18	E	Analog input, pedal travel sensor	Pedal travel sensor
19		not used	
20		not used	
21	M	Ground, oil temperature sensor	Gearshift unit
22	E	Oil temperature sensor, NTC	Gearshift unit
23		not used	
24		not used	
25	A	Fault indicator	Instrument cluster
26	E	Terminal 30	B+ terminal point
27		not used	
28	M	Ground, electronics	Ground connection
29		not used	
30	A	Solenoid valve 1	Gearshift unit
31	A	Solenoid valve 4	Gearshift unit
32	A	Solenoid valve 3	Gearshift unit
33	A	Solenoid valve 2	Gearshift unit

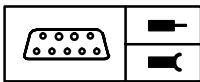
E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	M	Power ground	Ground connection
35	E	Multiplex signal	DDE control unit
36	E	Position switch L1	Selector lever
37	E	Position switch L3	Selector lever
38		not used	
39		not used	
40	A	Engine intervention	DDE control unit
41		not used	
42	E	Speed sensor n-ab (+)	Gearshift unit
43	E	Engine speed n-mot (TD signal)	DDE control unit
44	E	Speed sensor, n-turbine (-)	Gearshift unit
45	E	L6 E program	Program switch
46		not used	
47		not used	
48	E	Brake signal	Brake light switch
49		not used	
50		not used	
51		not used	
52	A	Shift lock (-)	Selector lever lock
53	E	Solenoid valve (+)	Gearshift unit
54	E	Voltage supply	DDE relay
55		not used	
56		not used	
57		not used	
58		not used	
59		not used	
60	E	Programming voltage	Diagnostic connector
61		not used	
62		not used	
63		not used	
64		not used	
65		not used	
66		not used	
67		not used	
68		not used	

E = Input, A = Output, M = Ground

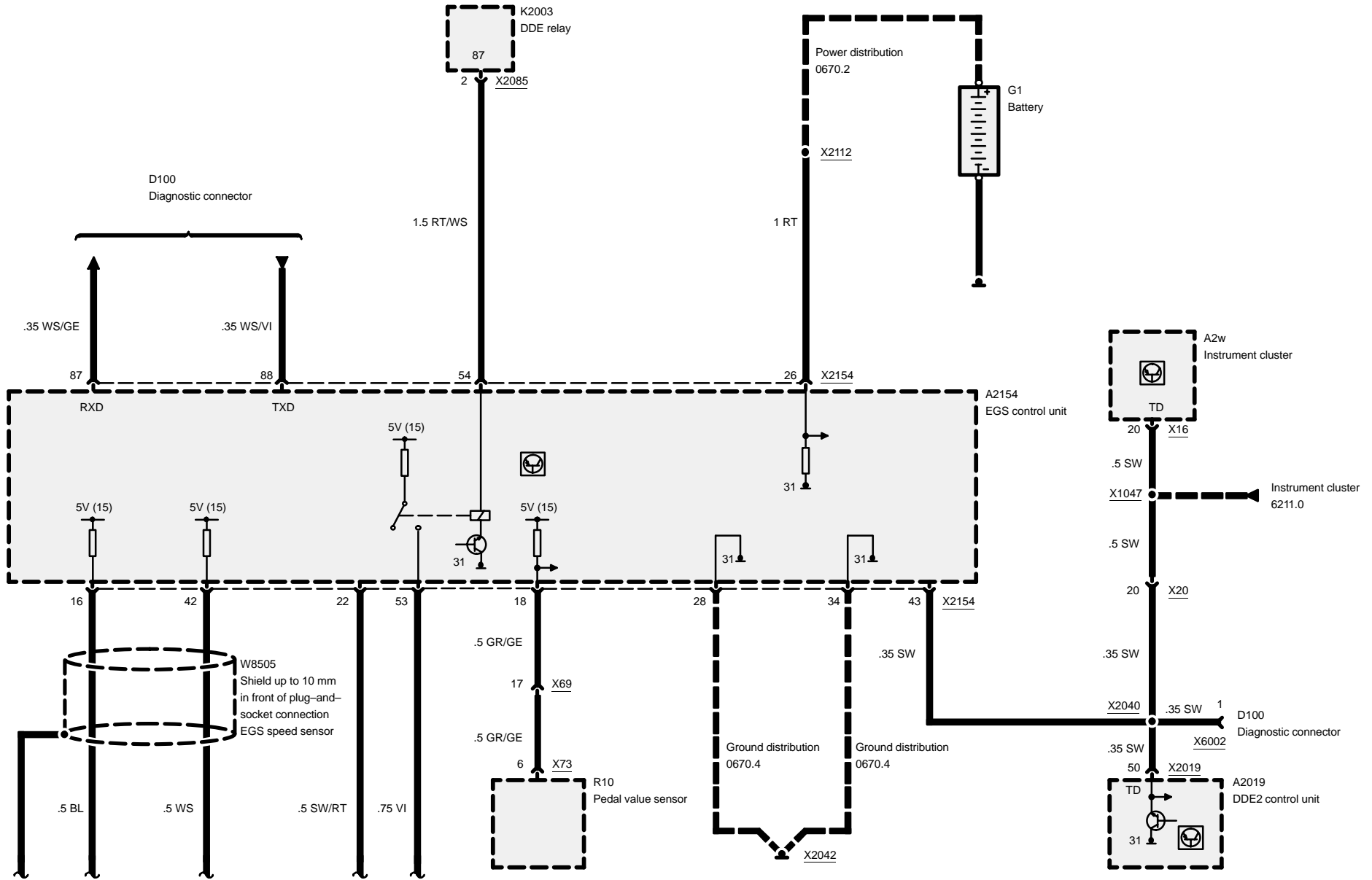


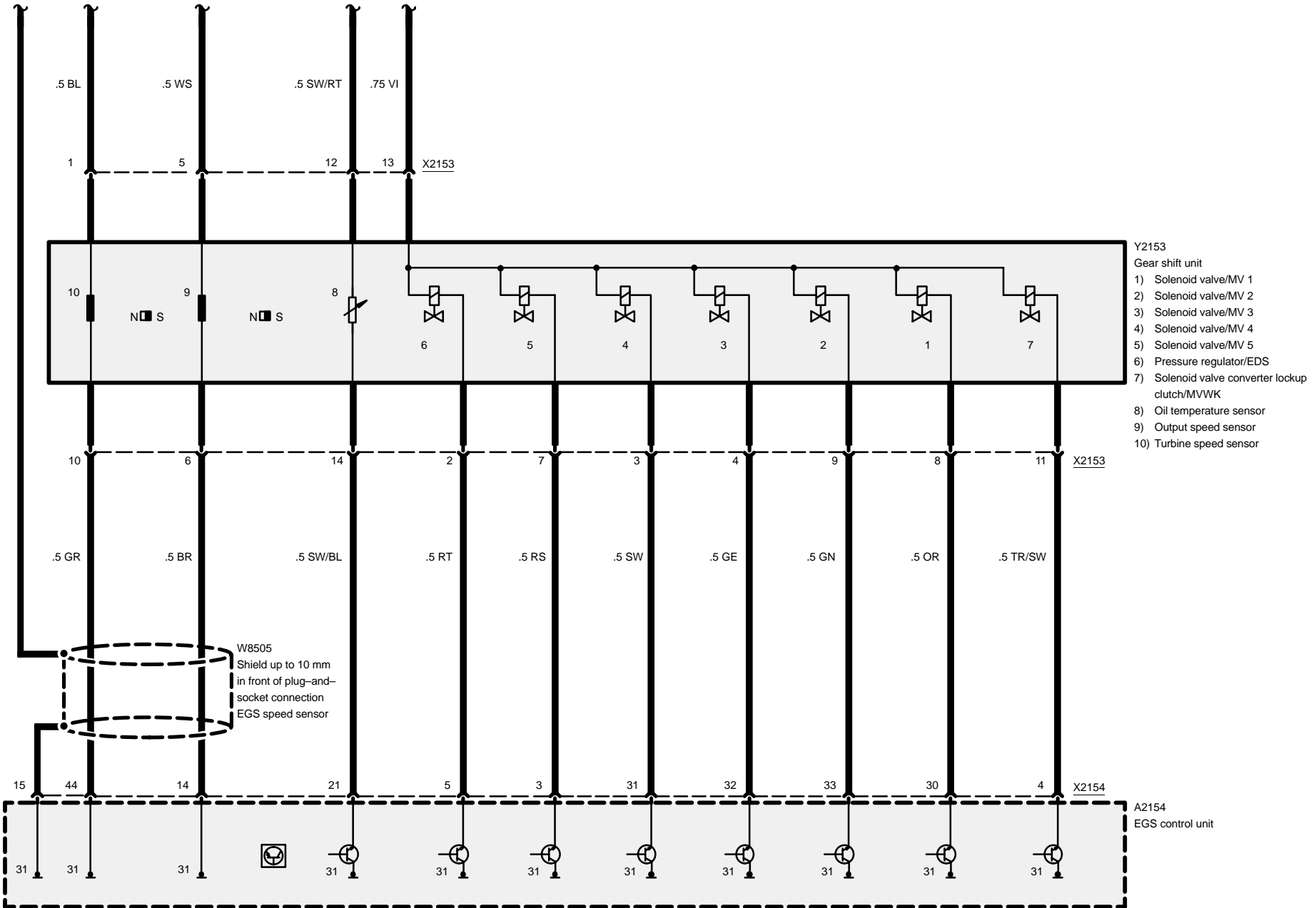
## Pin assignments

Pin	Type	Description/Function	Connection
69		not used	
70		not used	
71		not used	
72		not used	
73		not used	
74		not used	
75		not used	
76		not used	
77		not used	
78		not used	
79		not used	
80		not used	
81		not used	
82		not used	
83		not used	
84		not used	
85		not used	
86		not used	
87	A	RxD diagnostic link	Diagnostic connector
88	E/A	TxD diagnostic link	Diagnostic connector



# Electronic transmission control (EGS A5S 310Z Diesel)





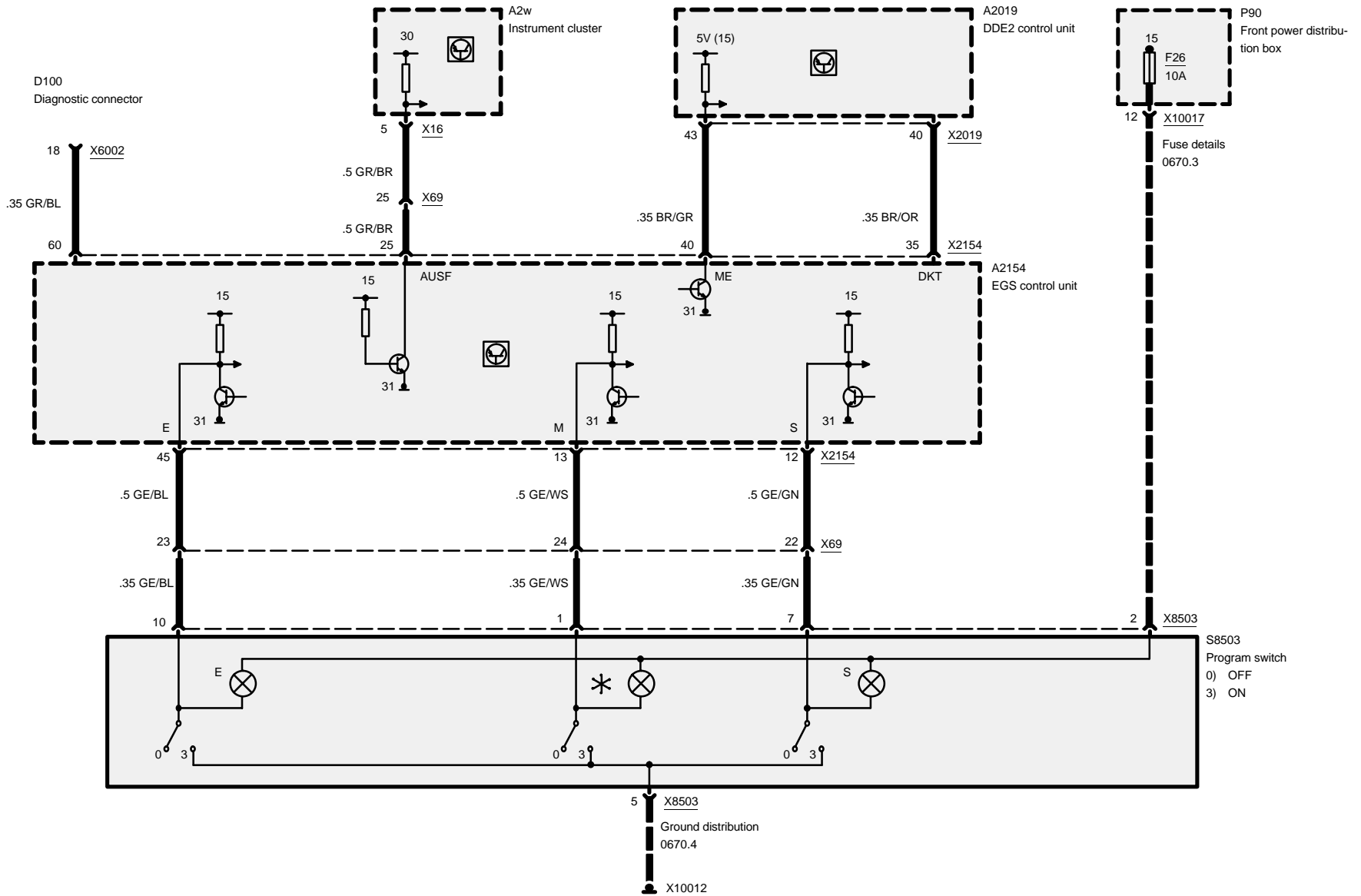
- Y2153  
Gear shift unit
- 1) Solenoid valve/MV 1
  - 2) Solenoid valve/MV 2
  - 3) Solenoid valve/MV 3
  - 4) Solenoid valve/MV 4
  - 5) Solenoid valve/MV 5
  - 6) Pressure regulator/EDS
  - 7) Solenoid valve converter lockup clutch/MVWK
  - 8) Oil temperature sensor
  - 9) Output speed sensor
  - 10) Turbine speed sensor

A2154  
EGS control unit



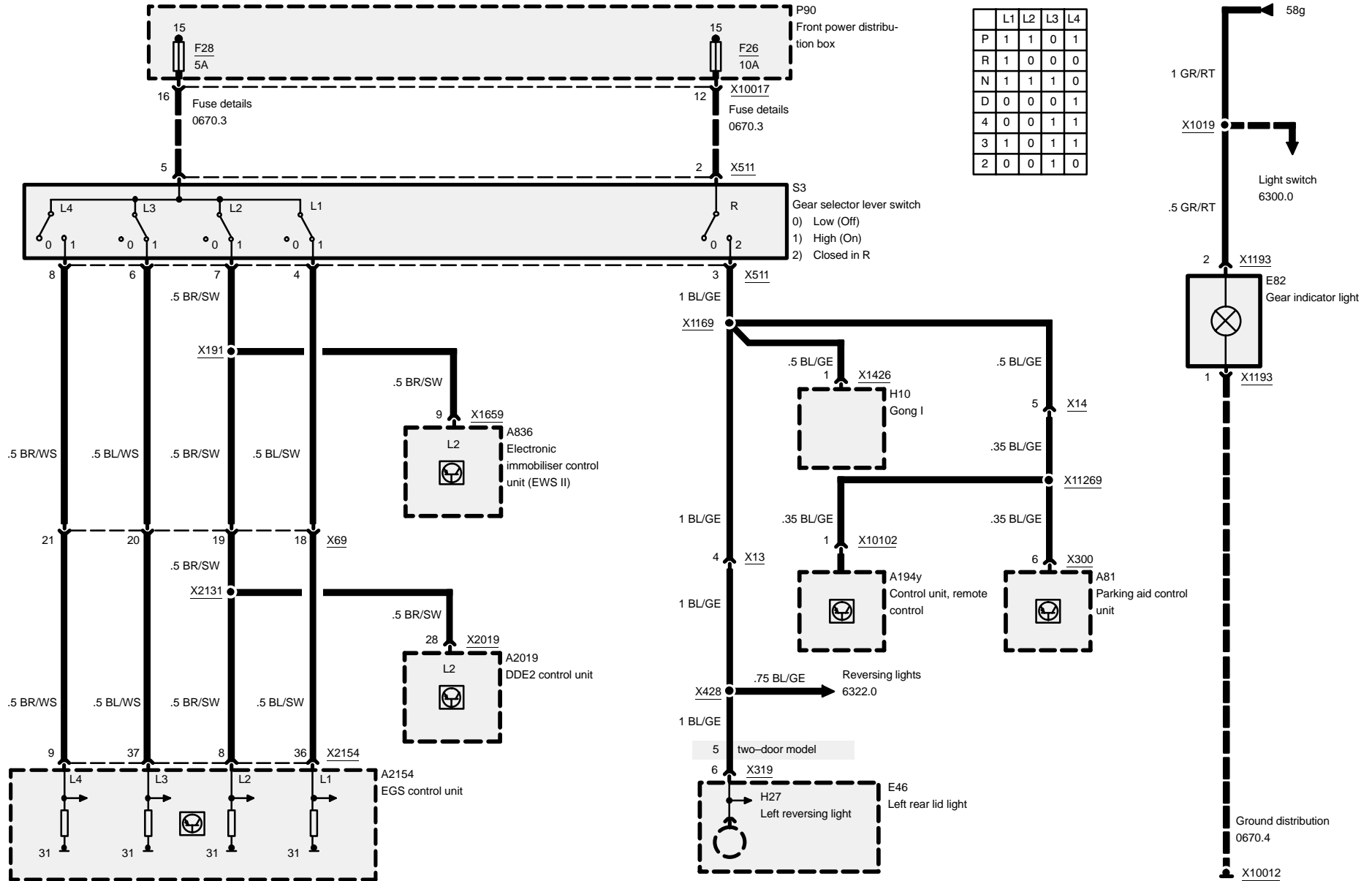


# Electronic transmission control (EGS A5S 310Z Diesel)



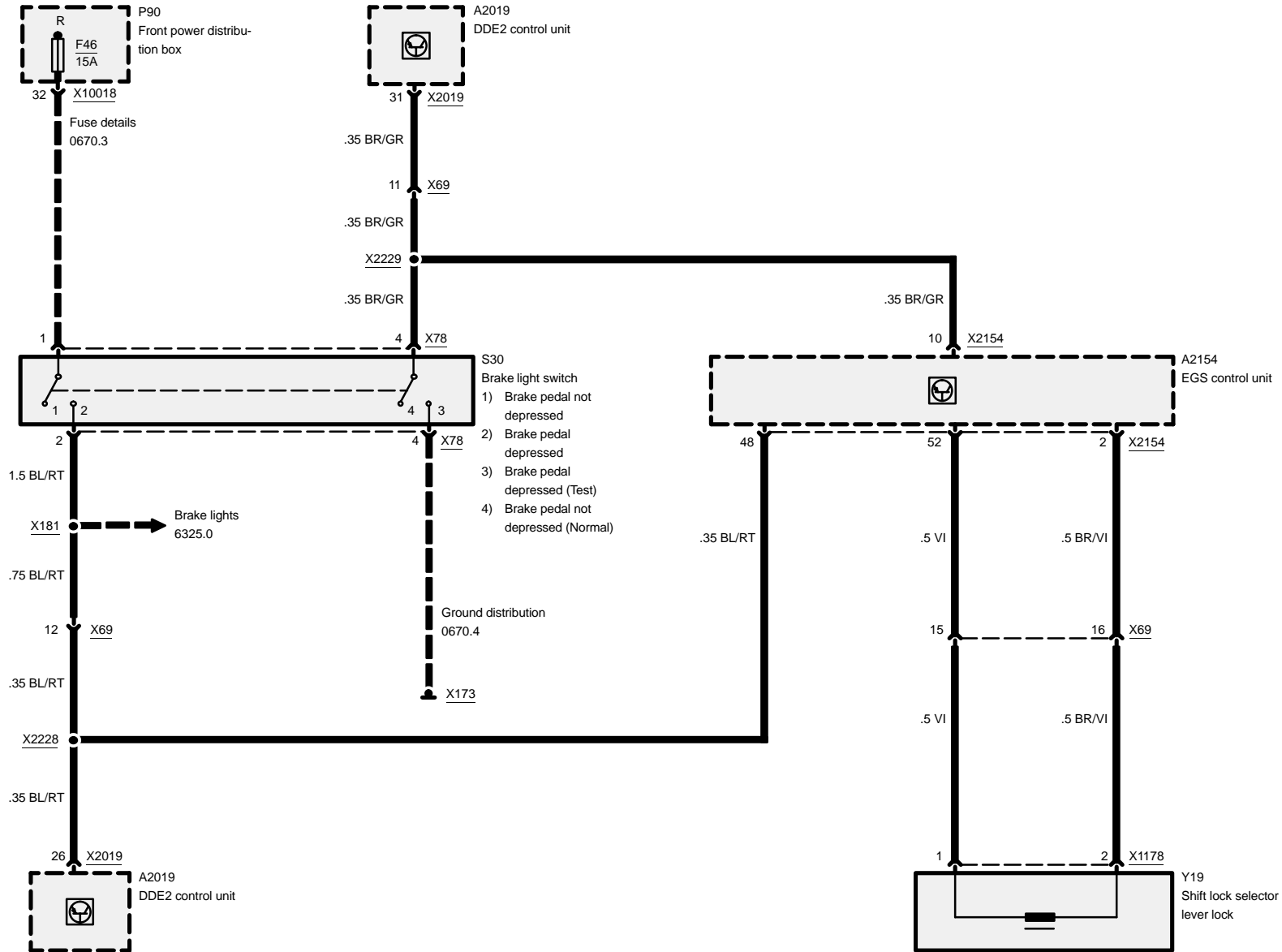


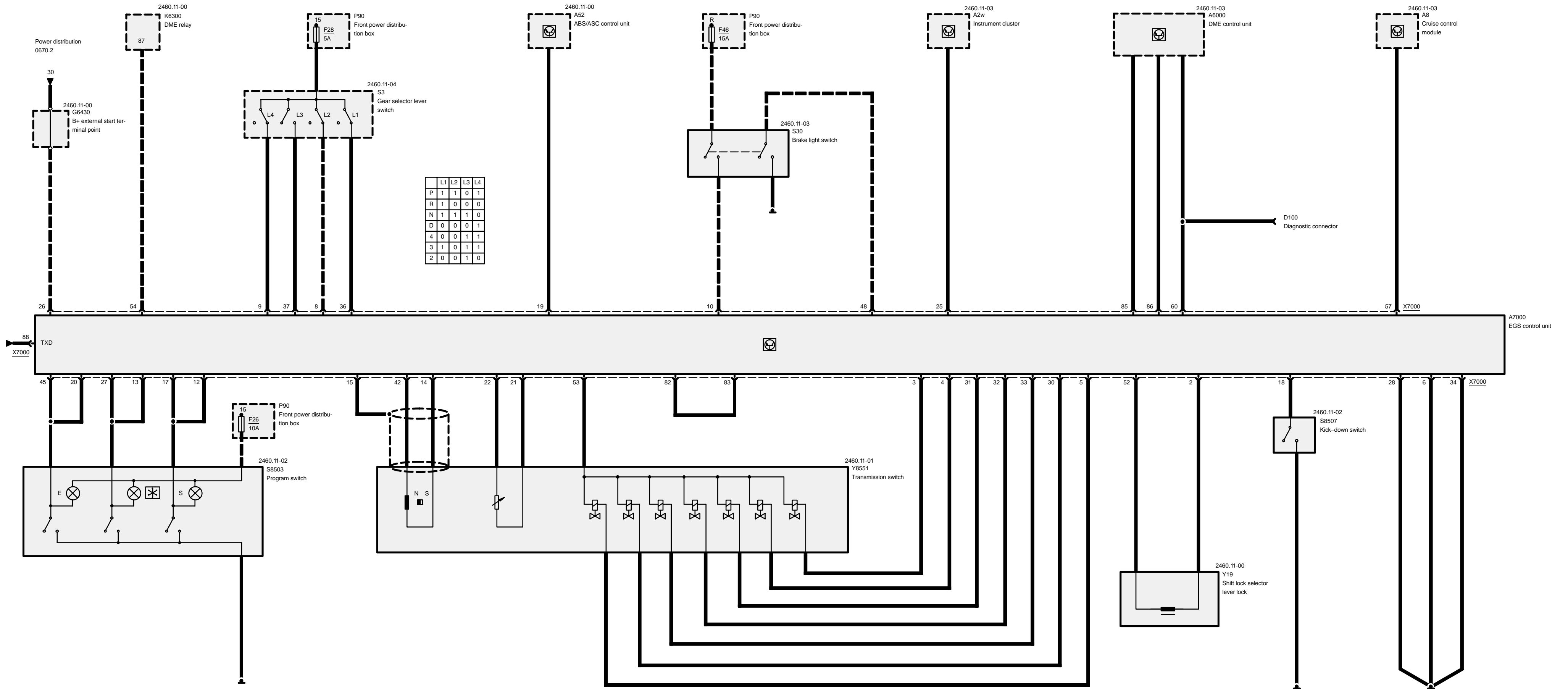
# Electronic transmission control (EGS A5S 310Z Diesel)

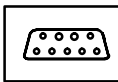




# Electronic transmission control (EGS A5S 310Z Diesel)





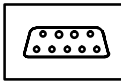


## Pin assignments

### X7000

Pin	Type	Description/Function	Connection
1		not used	
2	A	Shift lock (+)	Selector lever lock
3	A	Solenoid valve, R-lock	Gearshift unit
4	A	Solenoid valve, converter lockup clutch	Gearshift unit
5	A	Solenoid valve, main pressure	Gearshift unit
6	M	Ground	Ground connection
7		not used	
8	E	Position switch L2	Transmission selector lever
9	E	Position switch L4	Transmission selector lever
10	E	Brake signal	Brake light switch
11		not used	
12	E	S program	Program switch
13	E	* program	Program switch
14	E	Speed sensor n-ab (-)	Gearshift unit
15	M	Shield, speed sensor	Shield
16		not used	
897	E	S program	Program switch
18	E	Kick-down signal	Kick-down switch
19	E	ASC signal	ASC control unit
900	E	E program	Program switch
21	M	Ground, oil temperature sensor	Gearshift unit
22	E	Oil temperature sensor, NTC	Gearshift unit
23		not used	
24		not used	
25	A	Fault indicator	Instrument cluster
26	E	Terminal 30	Jumper cable terminal point
27	E	* program	Program switch
28	M	Ground, electronics	Ground connection
29		not used	
30	A	Solenoid valve A	Gearshift unit
31	A	Solenoid valve, overdrive	Gearshift unit
32	A	Solenoid valve C	Gearshift unit
33	A	Solenoid valve B	Gearshift unit

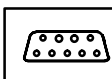
E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	M	Power ground	Ground connection
35		not used	
36	E	Position switch L1	Transmission selector lever
37	E	Position switch L3	Transmission selector lever
38		not used	
39		not used	
40		not used	
41		not used	
42	E	Speed sensor n-ab (+)	Gearshift unit
43		not used	
44		not used	
45	E	E program	Program switch
46		not used	
47		not used	
48	E	Brake test signal	Brake light switch
49		not used	
50		not used	
51		not used	
52	A	Shift lock (-)	Selector lever lock
53	A	Positive supply, solenoid valves	Gearshift unit
54	E	B+ voltage	DME relay
55		not used	
56		not used	
57	E	Cruise control (Tempomat) signal	Tempomat control unit
58		not used	
59		not used	
60	E	Programming voltage	Diagnostic connector
61		not used	
62		not used	
63		not used	
64		not used	
65		not used	
66		not used	
67		not used	
68		not used	

E = Input, A = Output, M = Ground

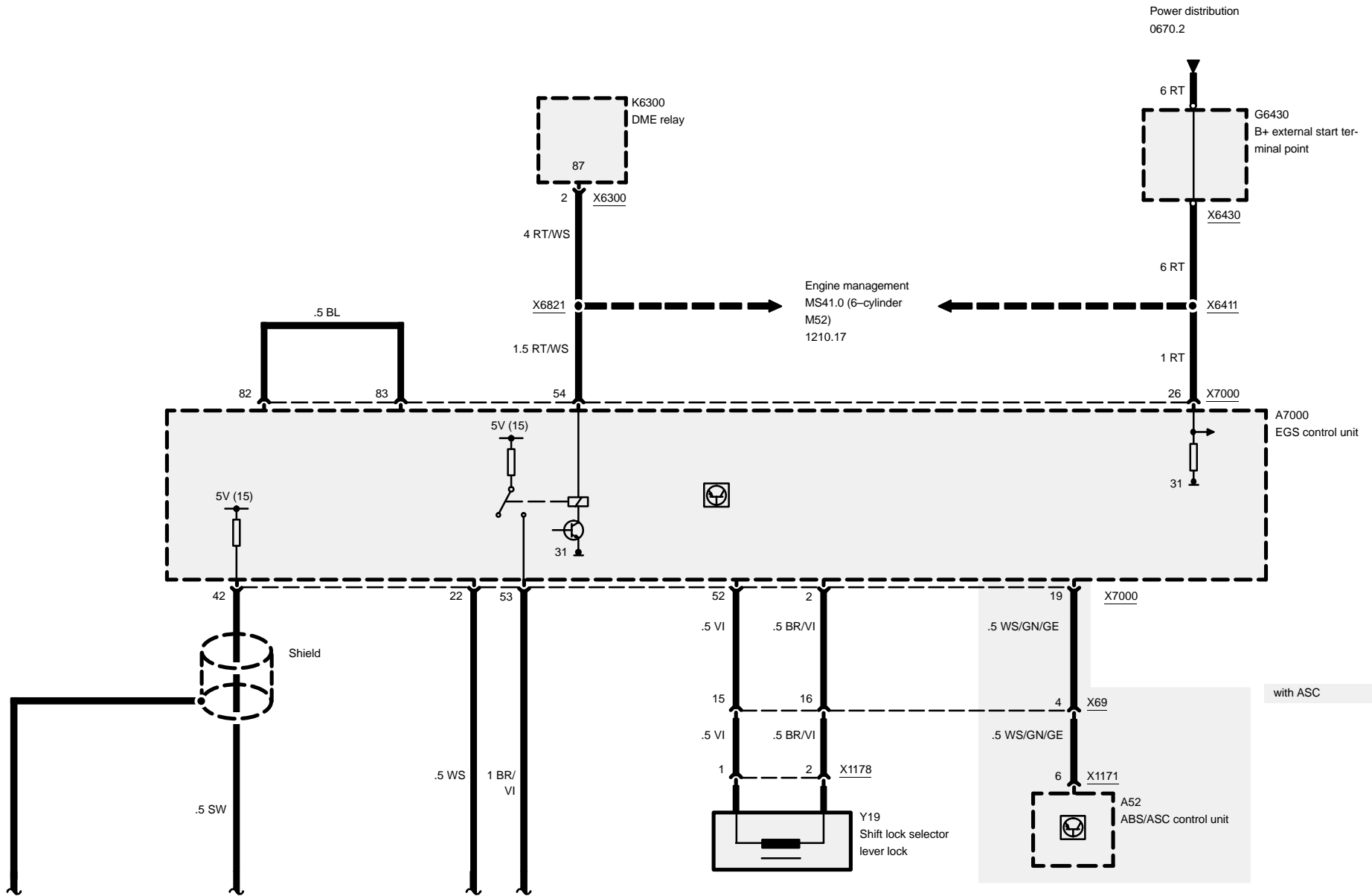


## Pin assignments

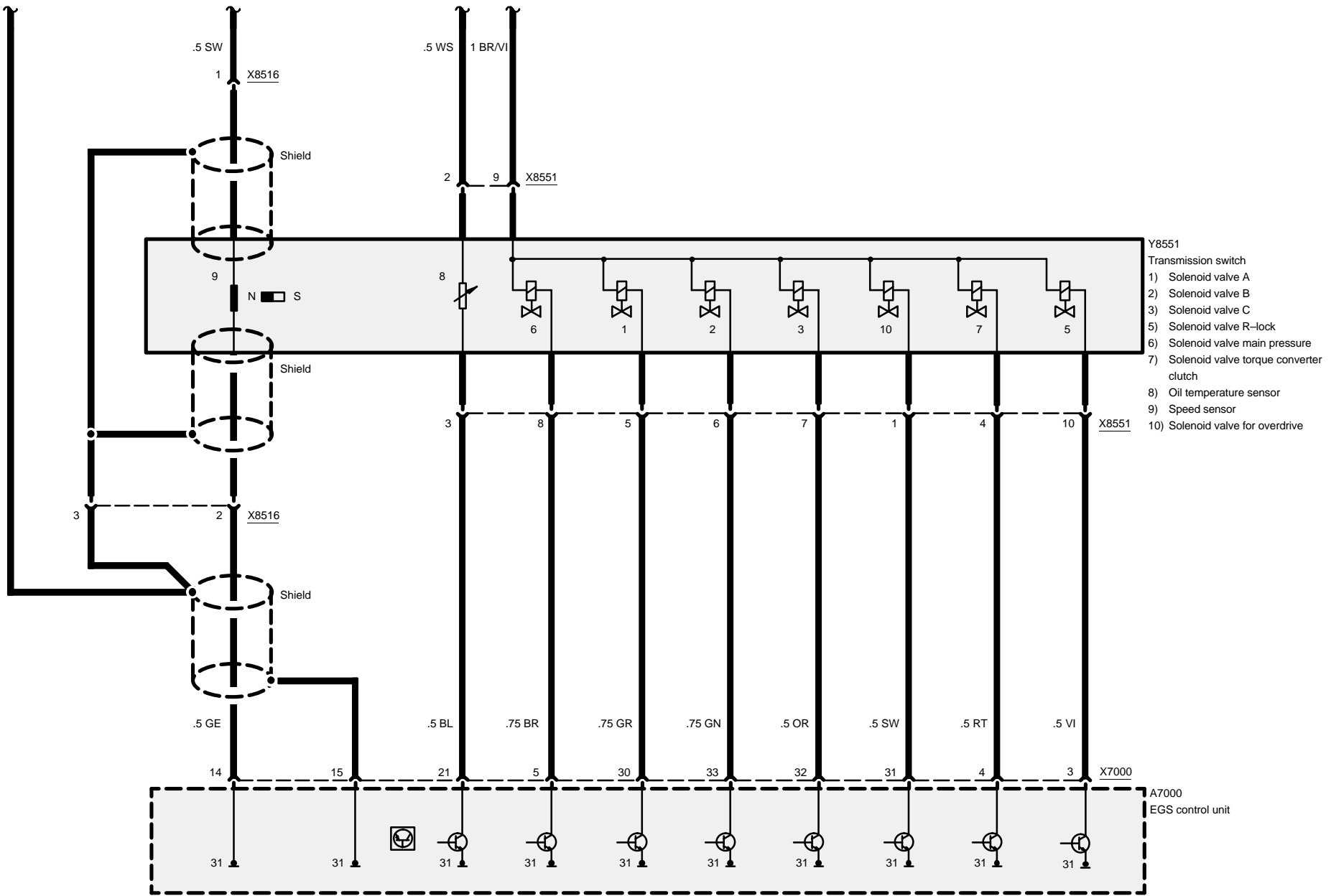
Pin	Type	Description/Function	Connection
69		not used	
70		not used	
71		not used	
72		not used	
73		not used	
74		not used	
75		not used	
76		not used	
77		not used	
78		not used	
79		not used	
80		not used	
81		not used	
82	E/A	Jumper	
83	E/A	Jumper	
84		not used	
85	E/A	CANCA-LOW	DME control unit
86	E/A	CANCA-HIGH	DME control unit
87		not used	
88	E/A	TxD diagnostic link	Diagnostic connector



# Electronic transmission control (EGS A5S 300J M52)

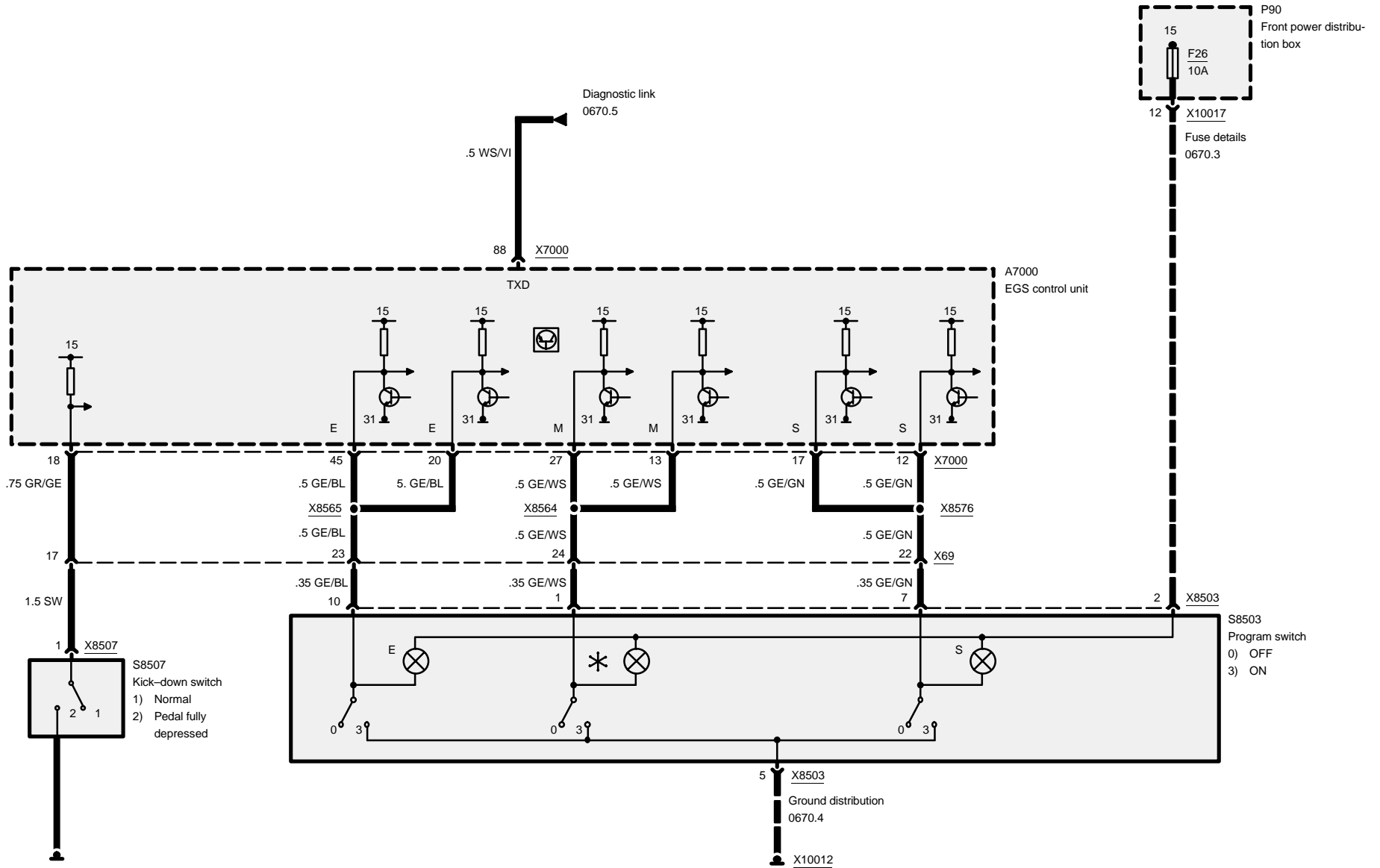






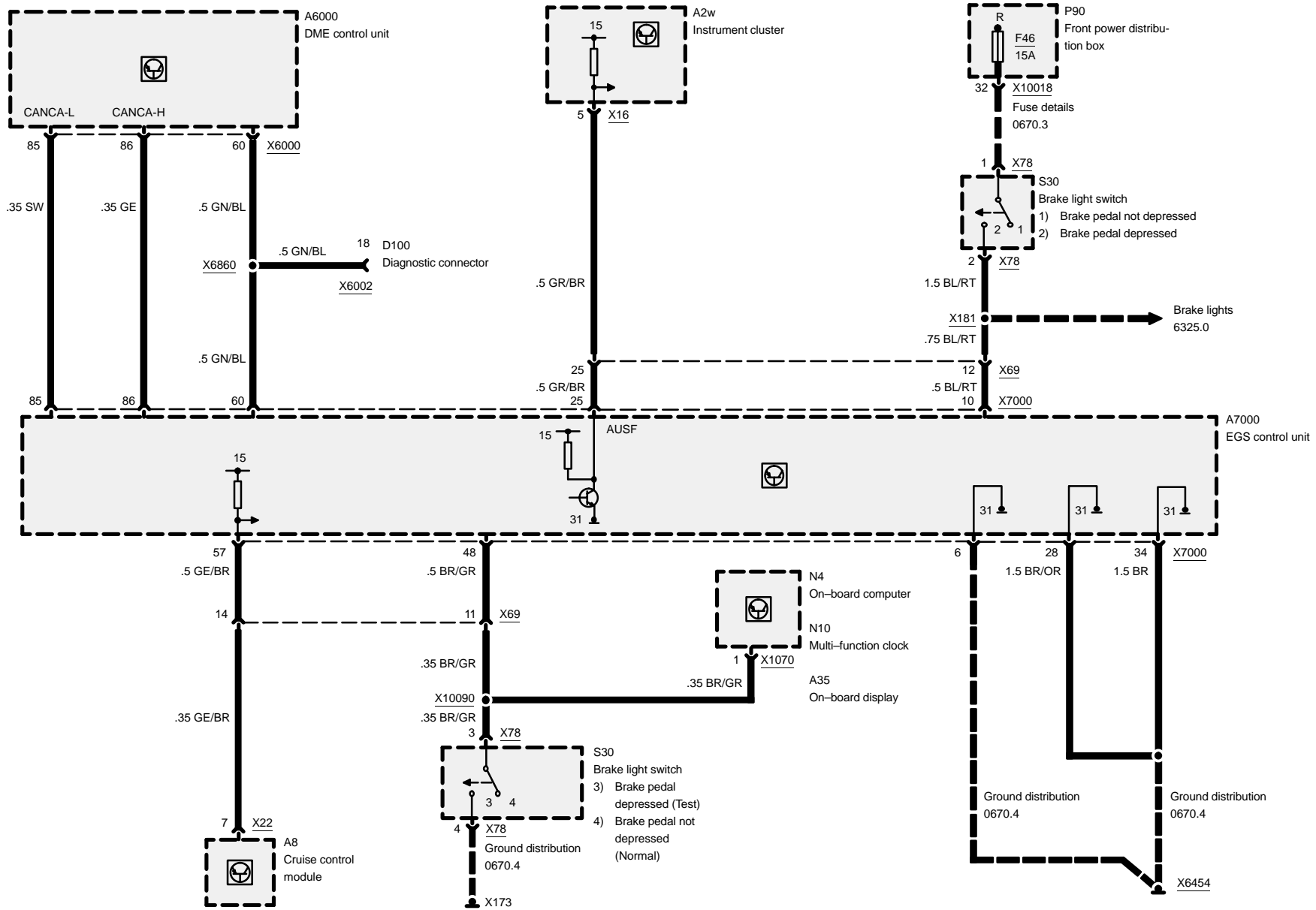


# Electronic transmission control (EGS A5S 300J M52)



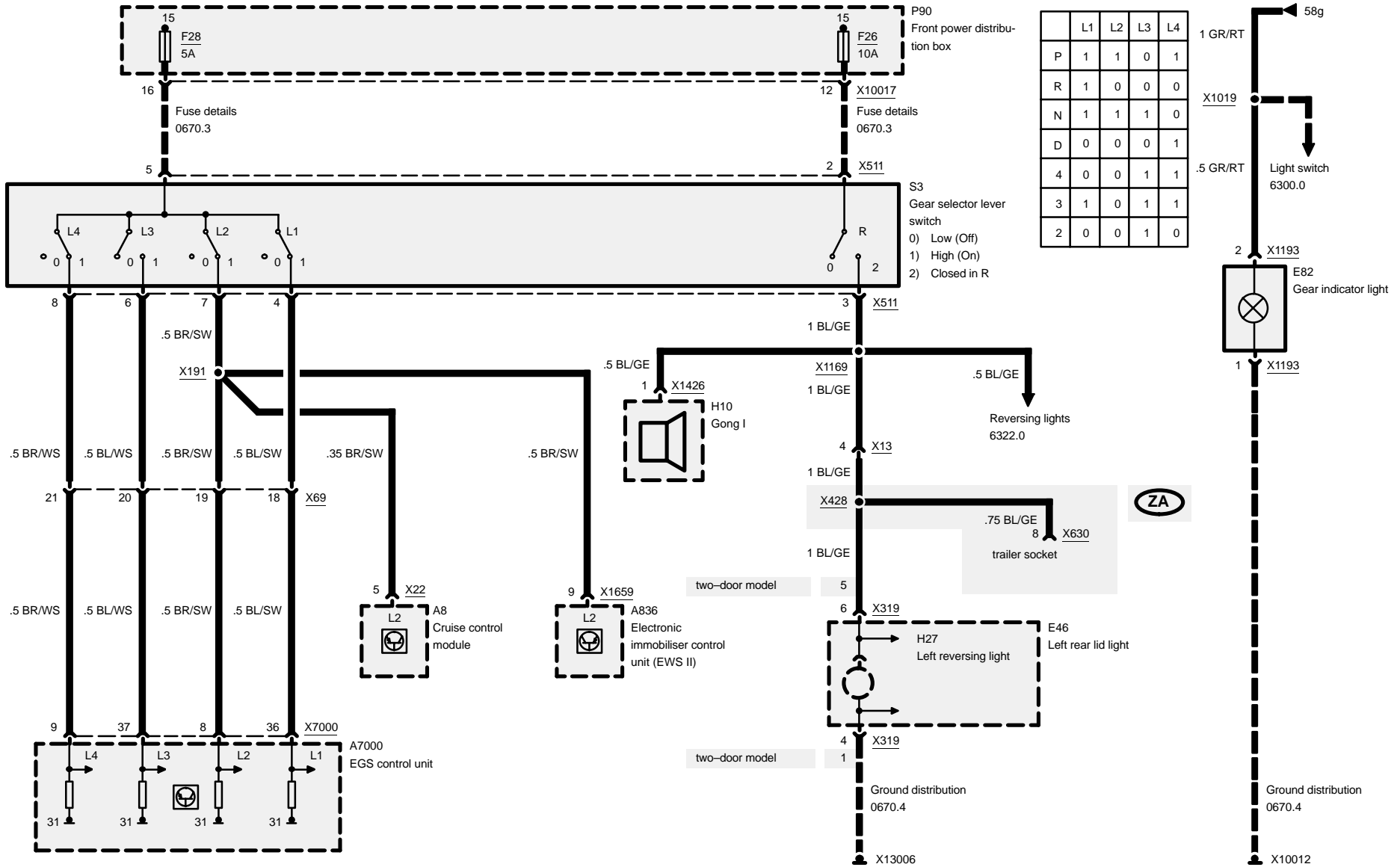


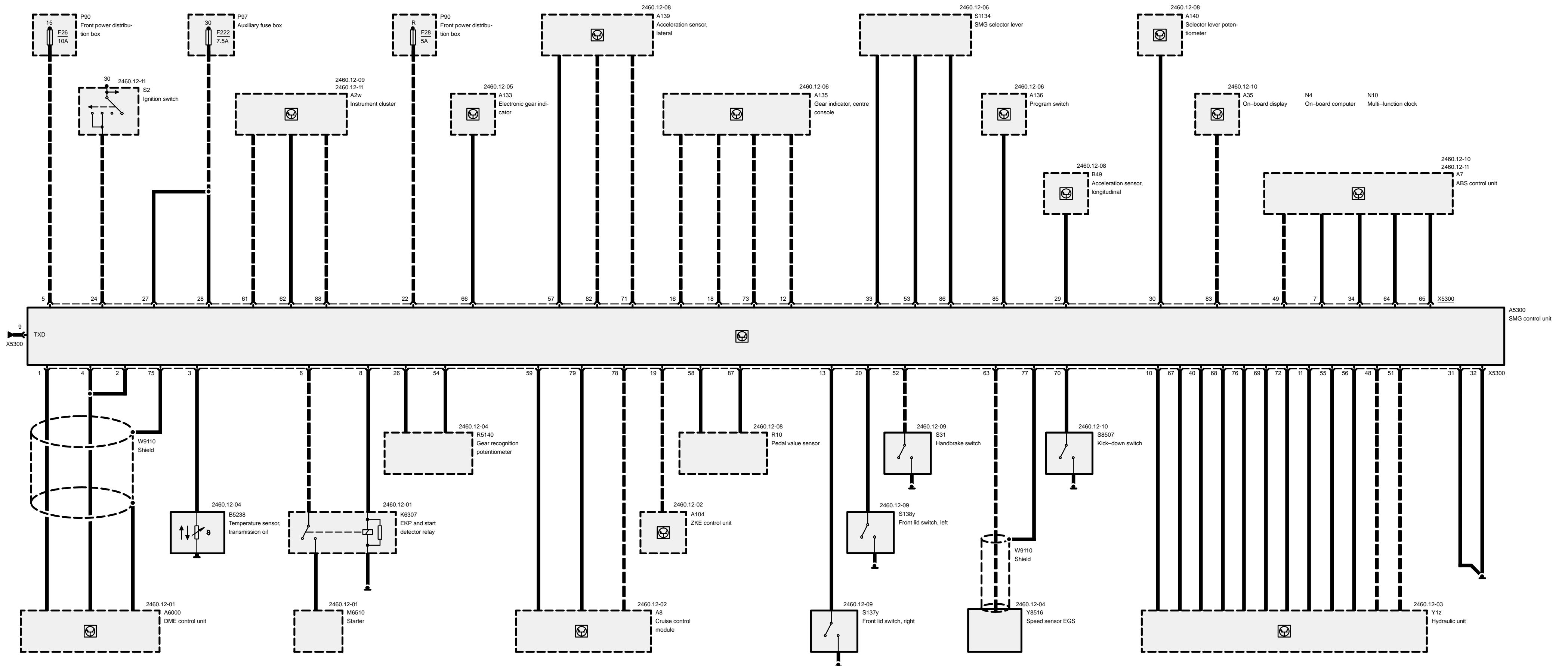
# Electronic transmission control (EGS A5S 300J M52)

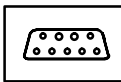




# Electronic transmission control (EGS A5S 300J M52)





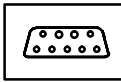


## Pin Assignments

### X5300

Pin	Type	Description/Function	Connection
1	E/A	CAN LOW	DME control unit
2	E/A	CAN HIGH	DME control unit
3	E	Oil temperature, transmission	Sensor, ATF temperature
4	E/A	CAN High	DME control unit
5	A	Activation, hydraulic pump relay	Hydraulic pump relay
6	E	Signal, terminal 50	Relay, start recognition
7	E	Wheel speed, RL	ABS control unit
8	A	Signal, terminal 86	Relay, start recognition
9	E/A	TxD data link	Diagnostic connector
10	A	Solenoid valve activation, clutch (+)	Hydraulic unit
11	A	Solenoid valve activation, gear V (-)	Hydraulic unit
12	A	Battery voltage	Gear indicator, center console
13	E	Signal, engine hood	Engine hood switch, right
14		not used	
15		not used	
16	E	Selector lever setting, switch 1	Gear indicator N
17		not used	
18	E	Selector lever setting, manual	Gear indicator S
19	E	Signal, door contact	Door contact, driver's door
20	E	Signal, engine hood	Engine hood switch, left
21		not used	
22	E	Terminal R	Fuse 28
23		not used	
24	E	Terminal 15	Ignition switch
25		not used	
26	E	Gear recognition	Gear recognition potentiometer, SMG
27	E	Terminal 30	Fuse 222
28	E	Terminal 30	Fuse 222
29	E	Acceleration sensor	Acceleration sensor, longitudinal
30	E	Throttle valve potentiometer	Selector lever potentiometer
31	M	Ground	Ground connection
32	M	Ground	Ground connection
33	A	Selector lever, blocking	Selector lever, SM transmission shift lock

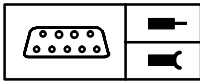
E = Input, A = Output, M = Ground



## Pin Assignments

Pin	Type	Description/Function	Connection
34	E	Wheel speed, FL	ABS control unit
35		not used	
36		not used	
37		not used	
38		not used	
39		not used	
40	A	Solenoid valve, gate (+)	Hydraulic unit
41		not used	
42		not used	
43		not used	
44		not used	
45		not used	
46		not used	
47		not used	
48	M	Ground, sensors	Hydraulic unit
49	E	ABS controlled braking	ABS/hydraulic unit
50		not used	
51	A	Power supply, sensor (+5V)	Hydraulic unit
52	E	Handbrake	Handbrake switch
53	E	Stepping switch, gear "up"	Selector lever, ASG
54	E	Transmission, gear recognition	Gear recognition potentiometer, SMG
55	A	Clutch position	Hydraulic unit
56	A	Hydraulic pressure	Hydraulic unit
57	E	Acceleration sensor	Acceleration sensor, transverse
58	E	Accelerator travel sensor	Pedal travel sensor
59	E	Switch off cruise control (Tempomat)	Tempomat control unit
60		not used	
61	A	Warning output	Instrument cluster
62	A	Fault lamp	Instrument cluster
63	E	Speed, transmission input	Speed sensor, transmission
64	E	Wheel speed, FR	ABS control unit
65	E	Wheel speed, RR	ABS control unit
66	A	Gear indicator	Gear indicator
67	A	Solenoid valve, clutch (-)	Hydraulic unit
68	A	Solenoid valve, gate (-)	Hydraulic unit

E = Input, A = Output, M = Ground



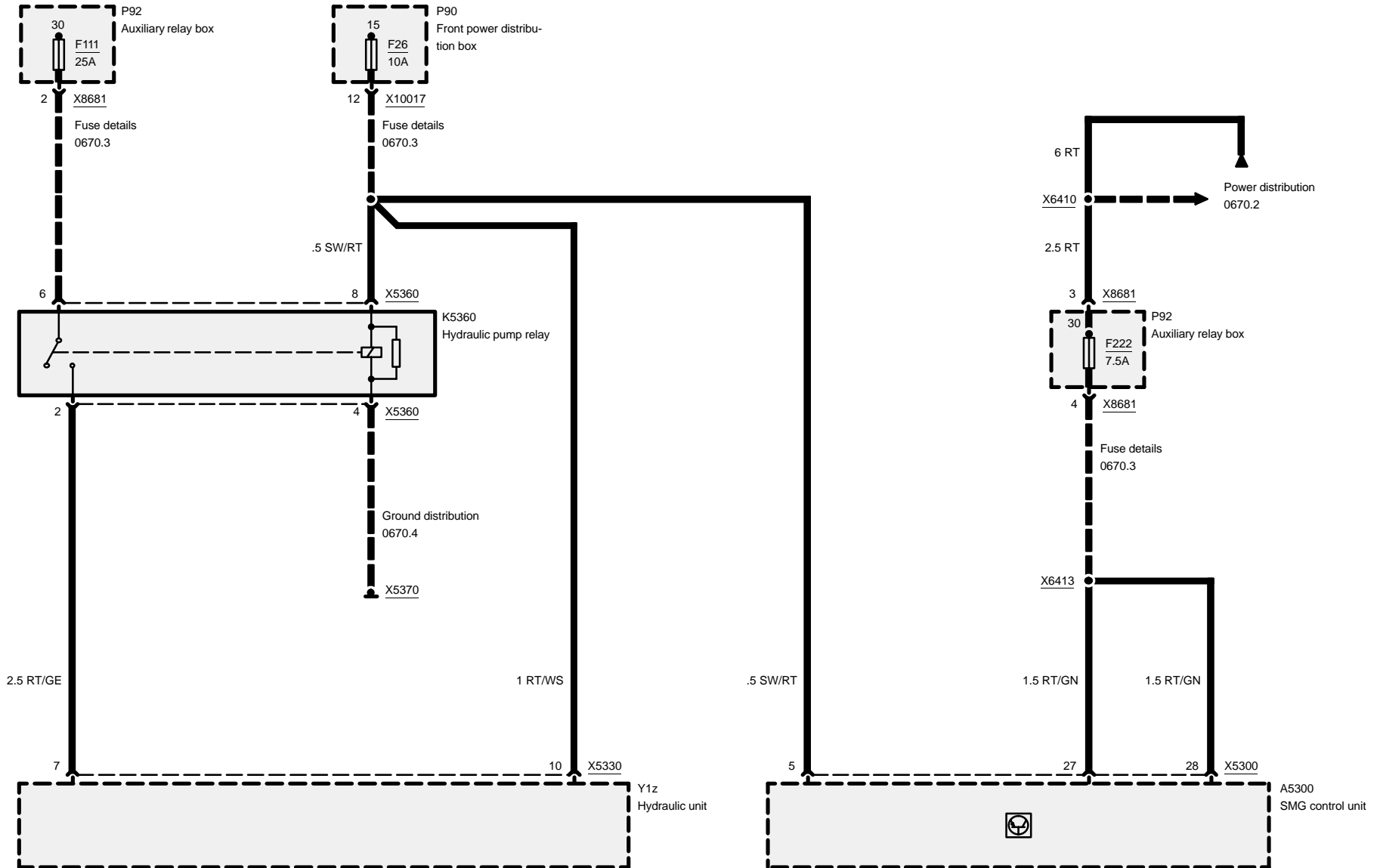
## Pin Assignments

Pin	Type	Description/Function	Connection
69	A	Solenoid valve, gear Z (-)	Hydraulic unit
70	E	Kick-down	Kick-down switch
71	M	Ground	Ground, sensors
72	A	Solenoid valve, gear V (+)	Hydraulic unit
73	E	Selector lever setting, switch 2	Gear indicator R
74		not used	
75	M	Ground CAN	Shield
76	A	Solenoid valve, gear Z (+)	Hydraulic unit
77	M	Ground, shielding	Shield
78	A	Brake light	Tempomat control unit
79	E	Cruise control (Tempomat)	Tempomat control unit
80		not used	
81		not used	
82	A	Power supply, sensor (+5V)	Pedal travel sensor
83	E	Brake light	Brake light switch
84		not used	
85	E	Program selection "Winter"	Program switch
86	E	Stepping switch, gear "down"	Selector lever, SM transmission
87	E	Idle speed switch	Pedal travel sensor
88	E	TD signal	Instrument cluster





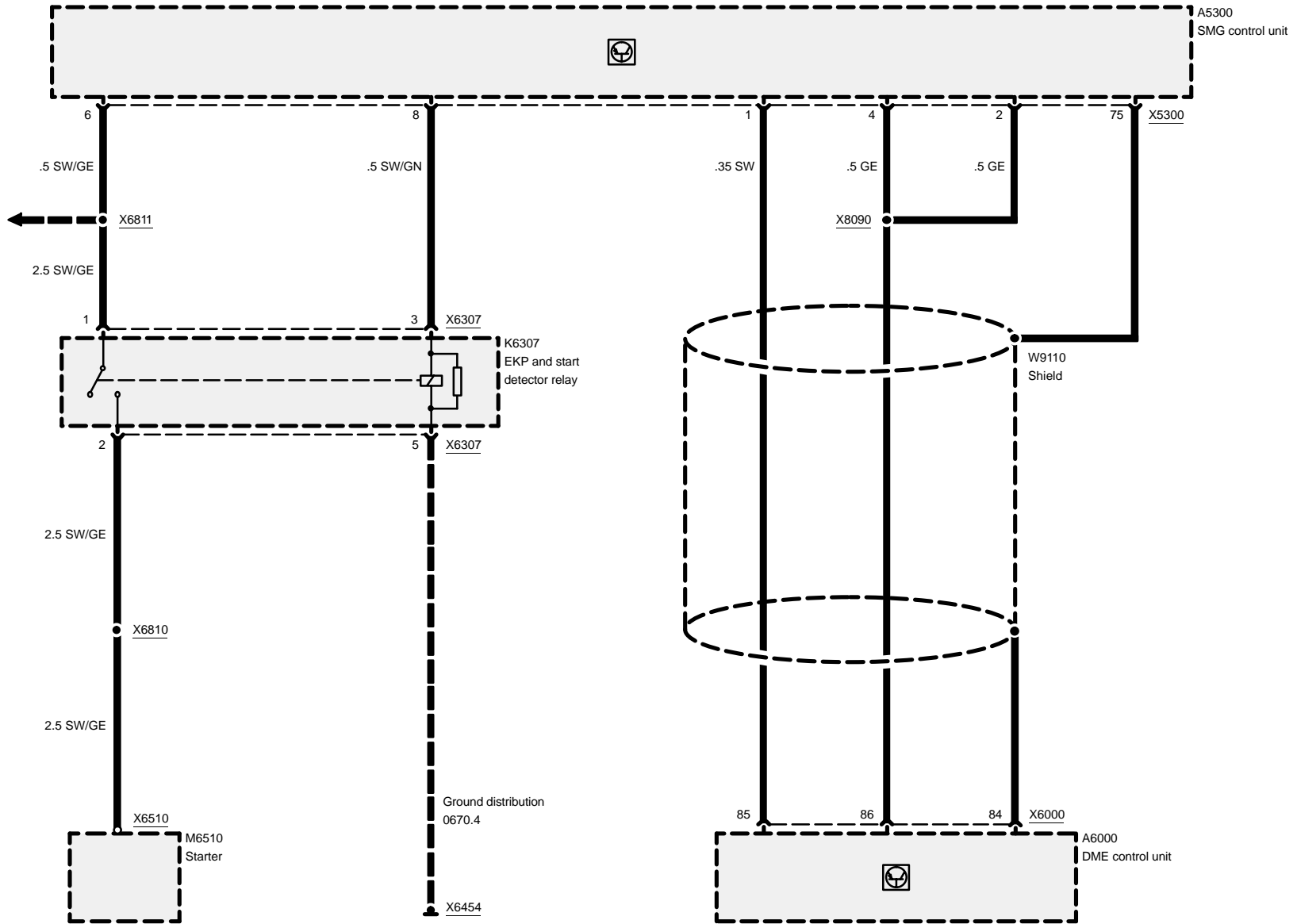
# Sequential M–transmission (SMG)





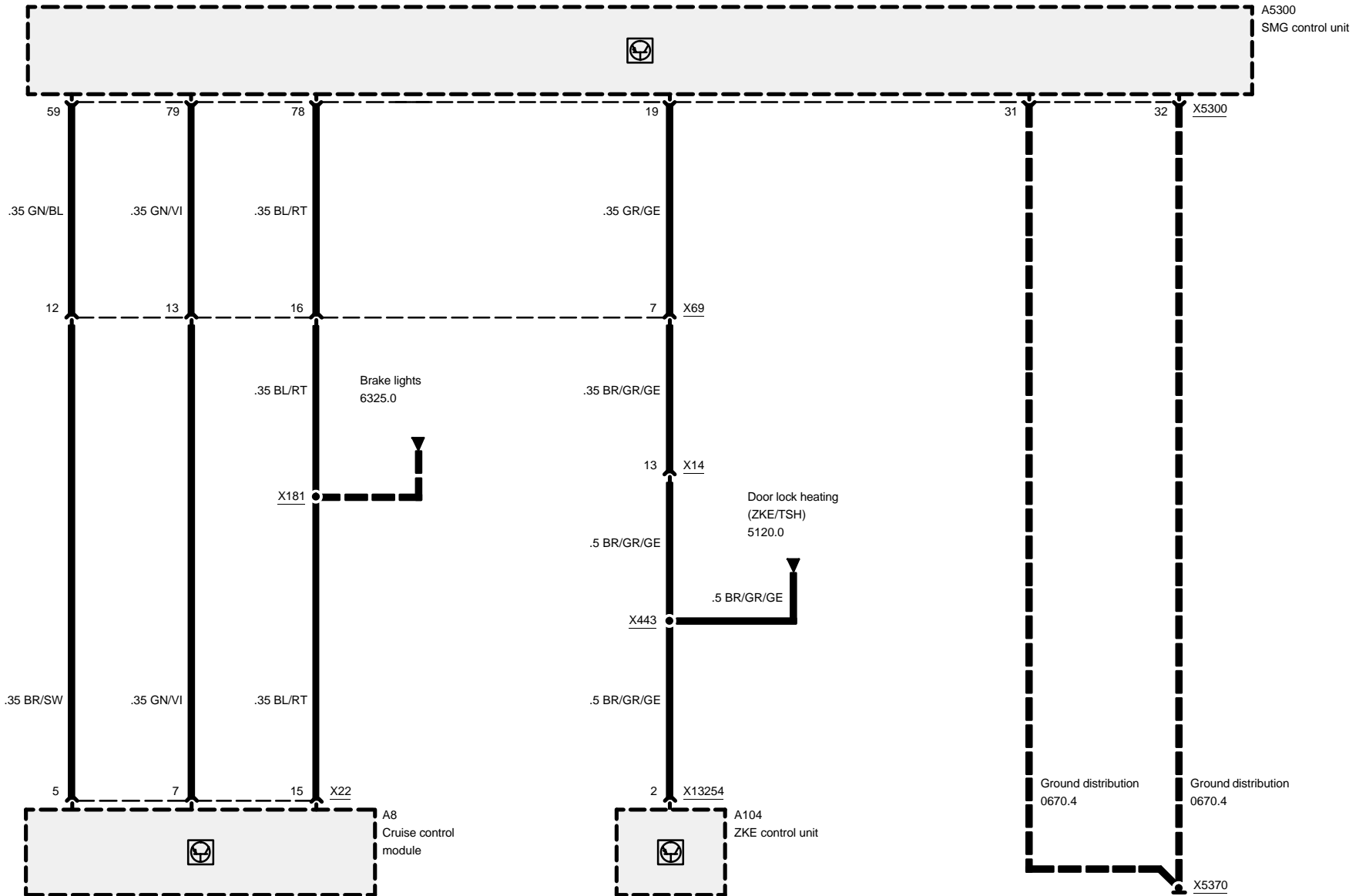
# Sequential M-transmission (SMG)

Digital motor electronics (DME)  
MSS50, 6-cylinder  
S50 B32)  
1210.21



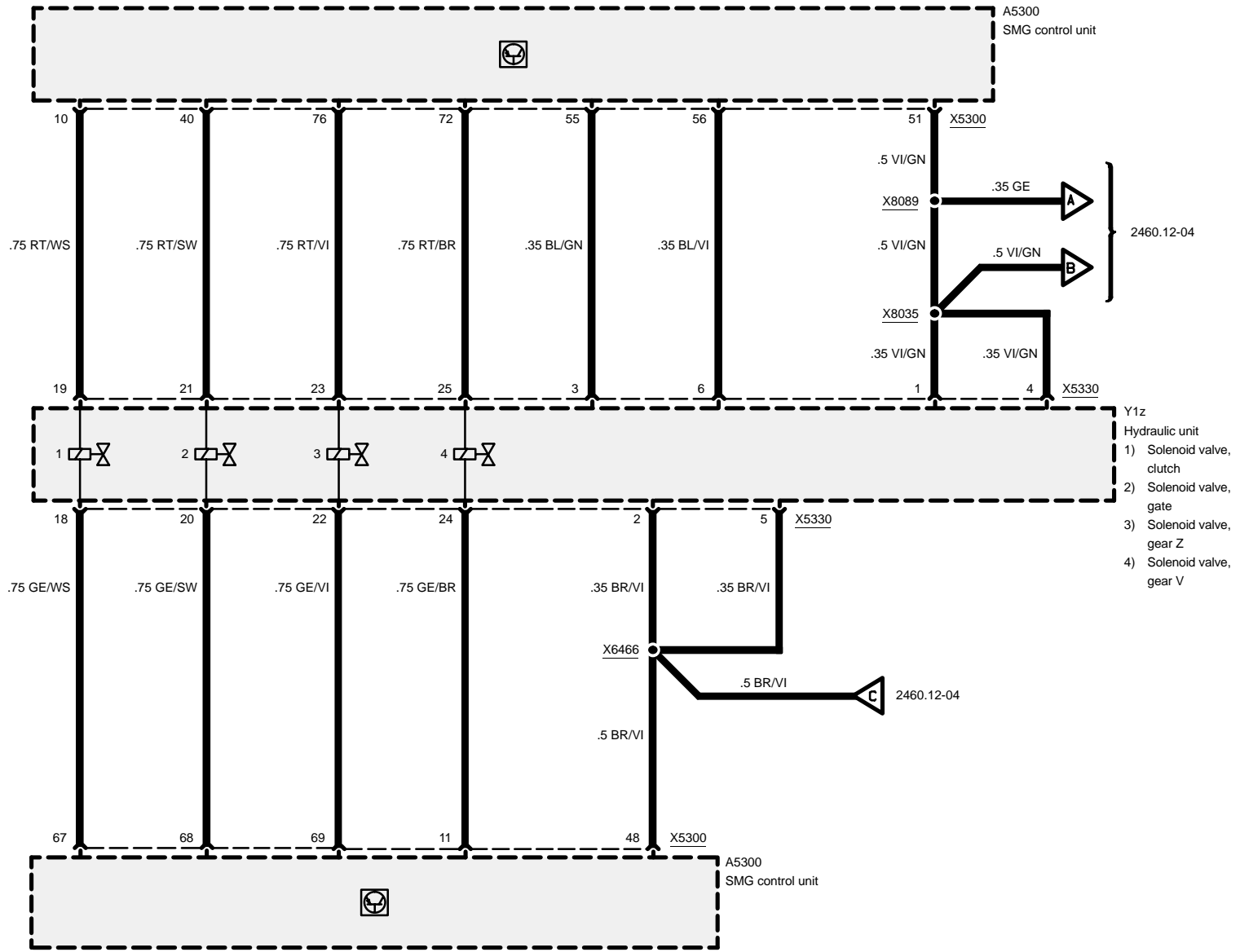


# Sequential M–transmission (SMG)



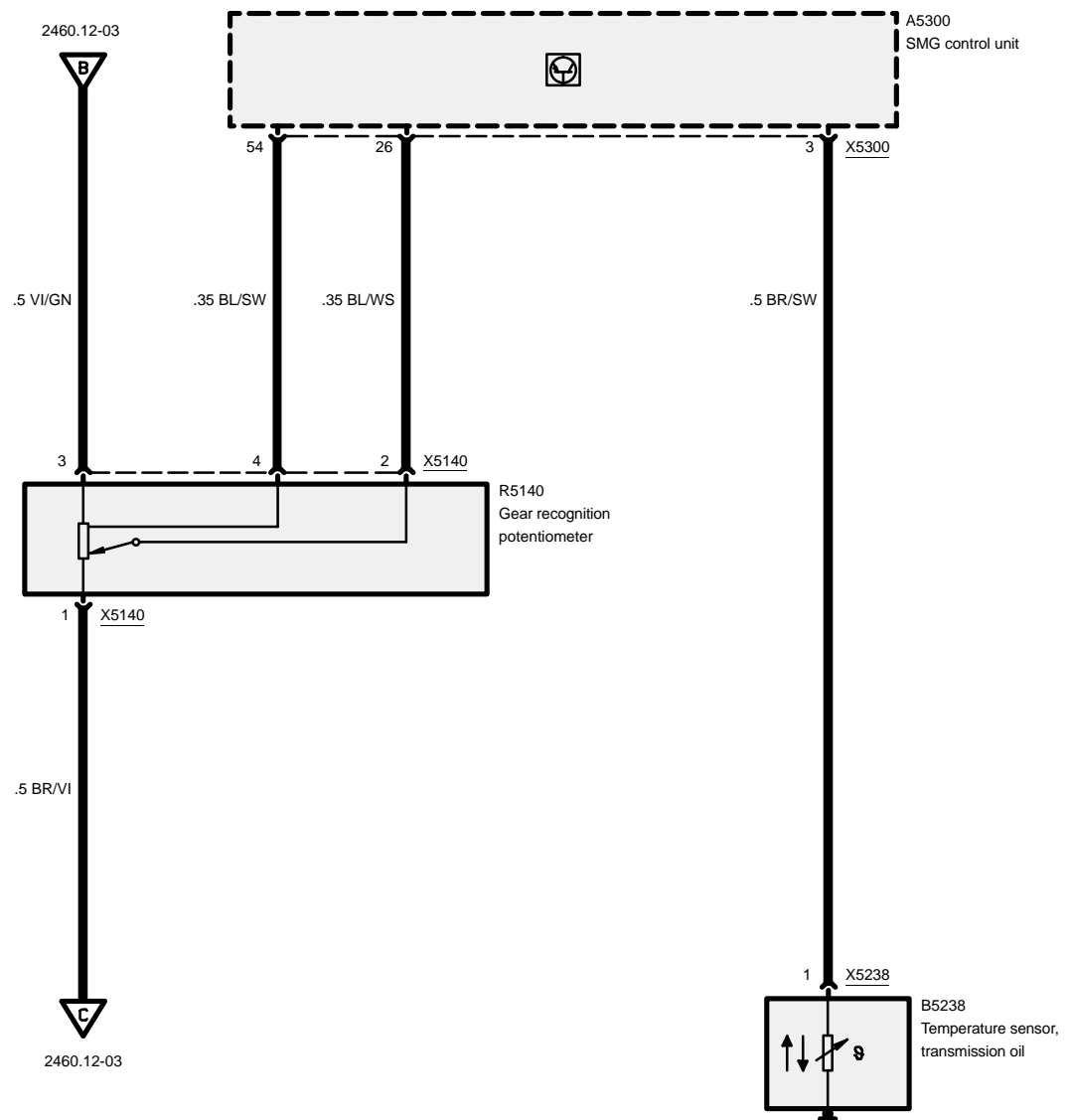
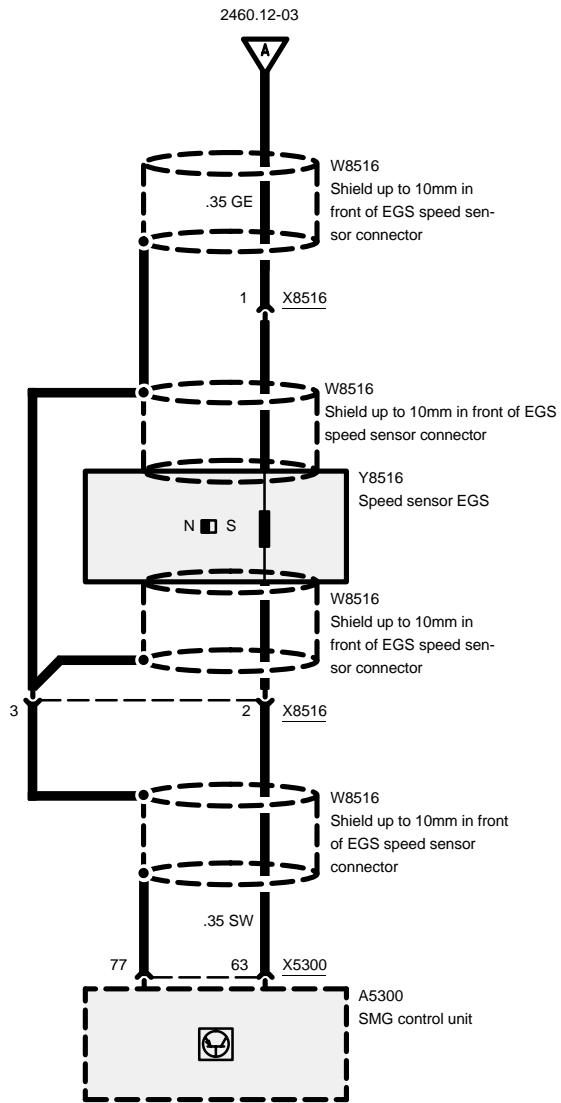


# Sequential M-transmission (SMG)



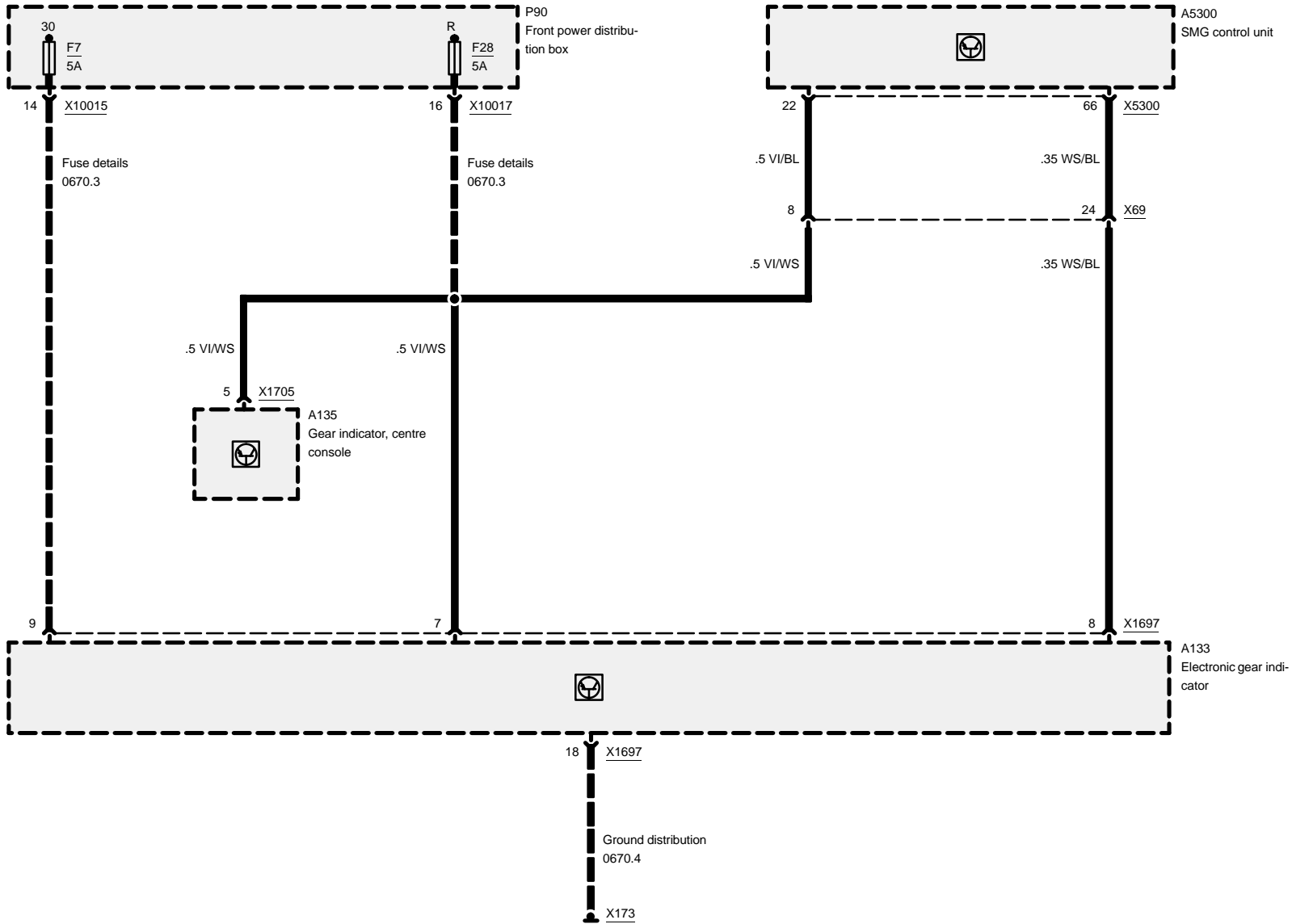


# Sequential M–transmission (SMG)



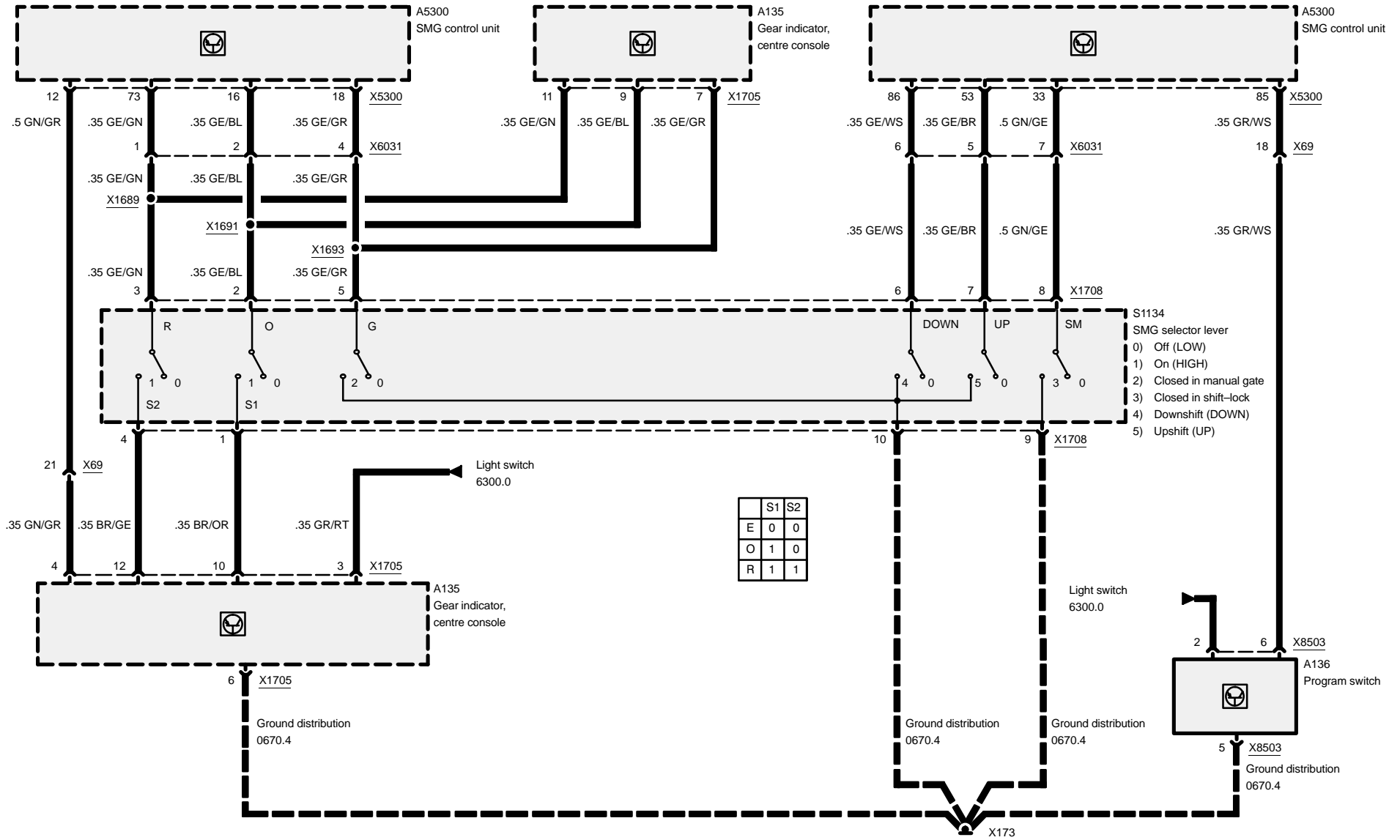


# Sequential M-transmission (SMG)





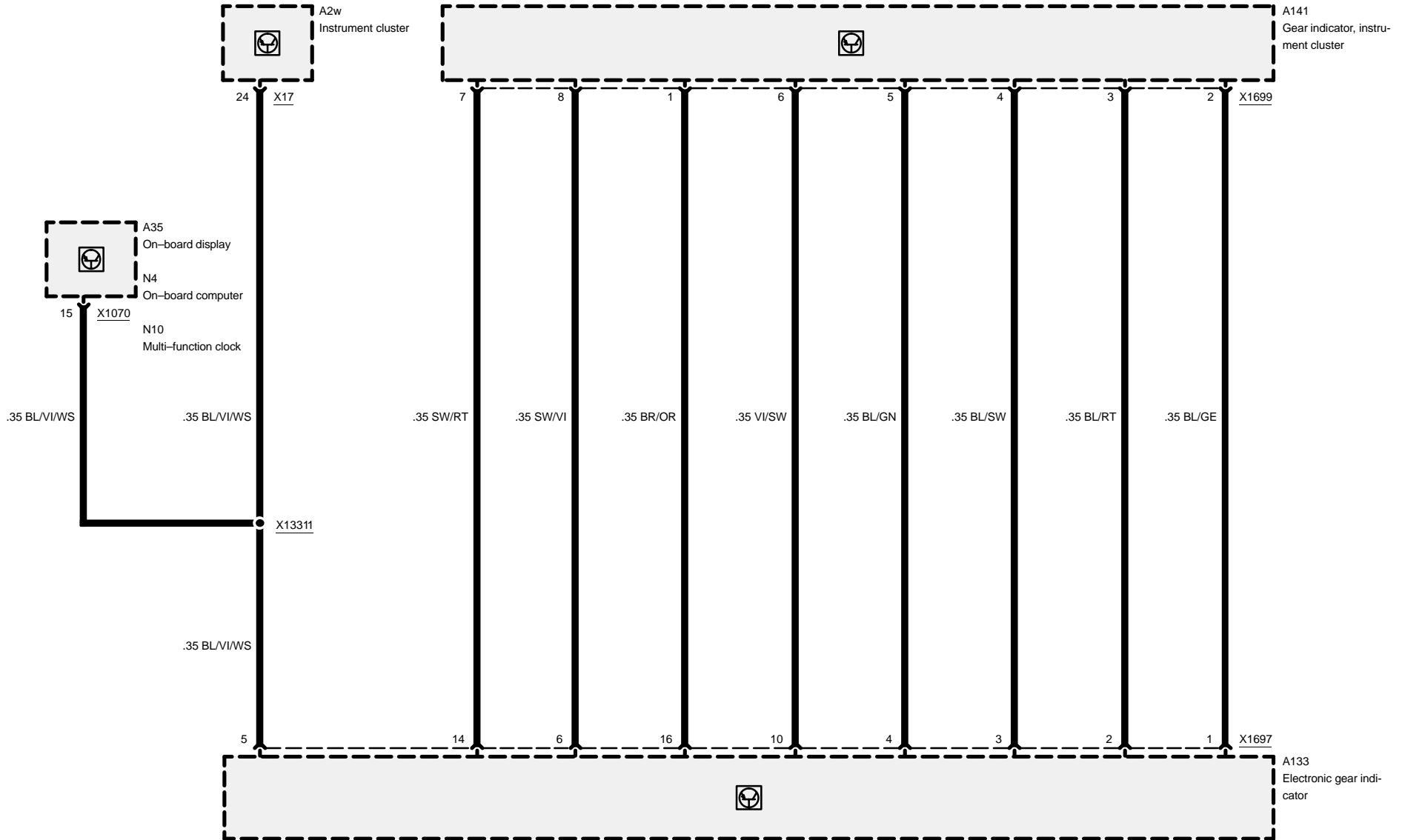
# Sequential M-transmission (SMG)



	S1	S2
E	0	0
O	1	0
R	1	1



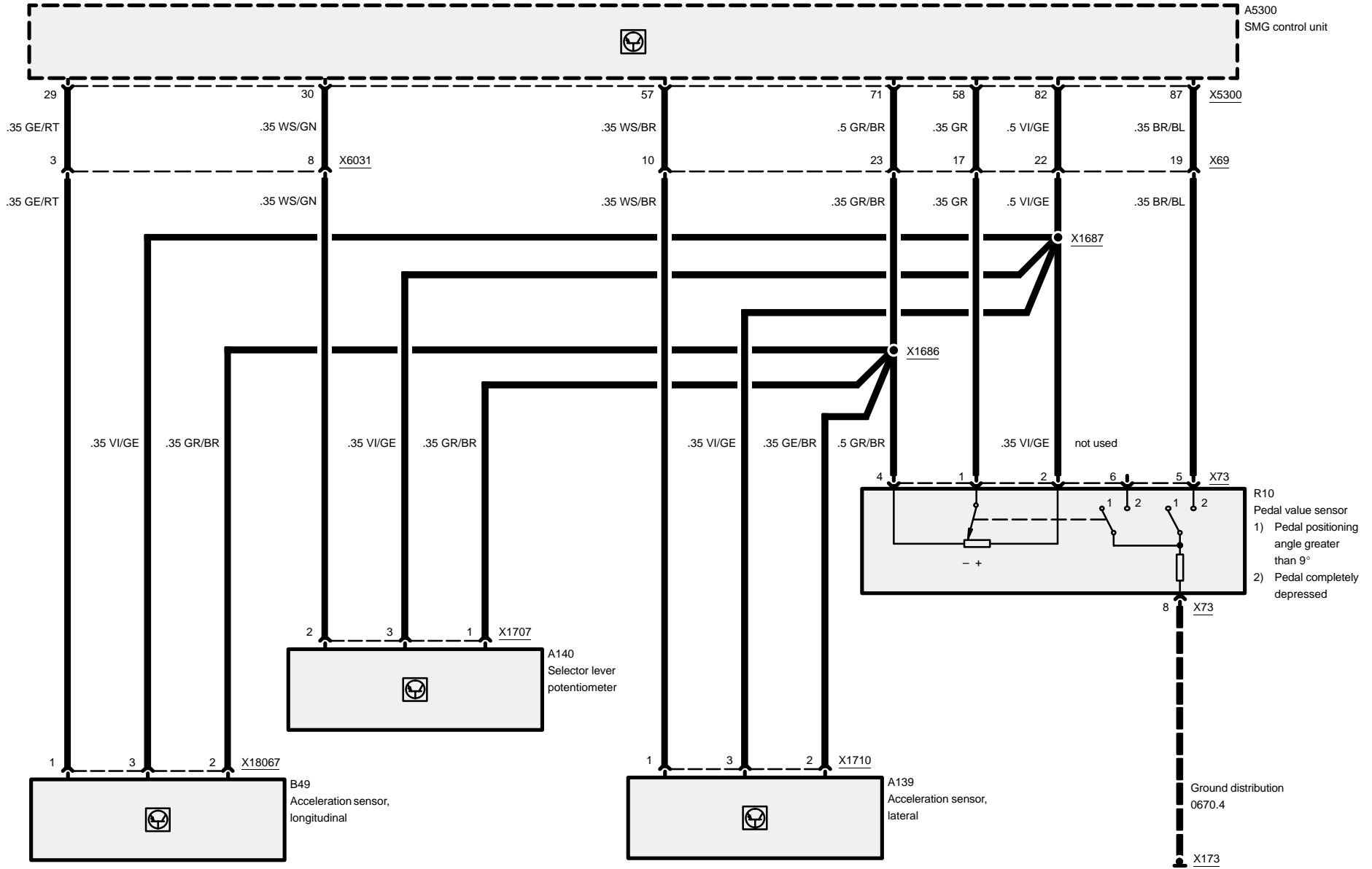
# Sequential M–transmission (SMG)





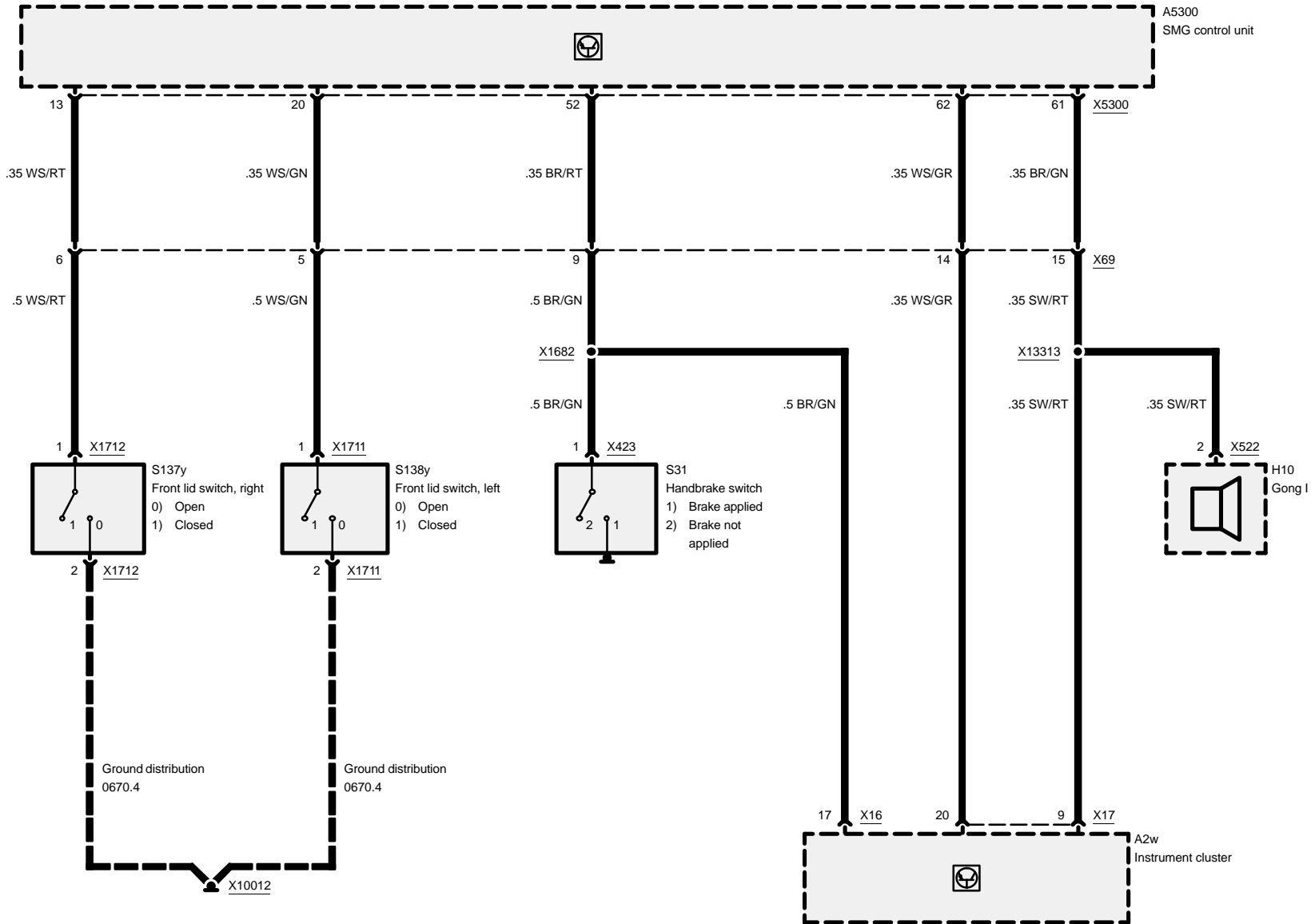


# Sequential M-transmission (SMG)



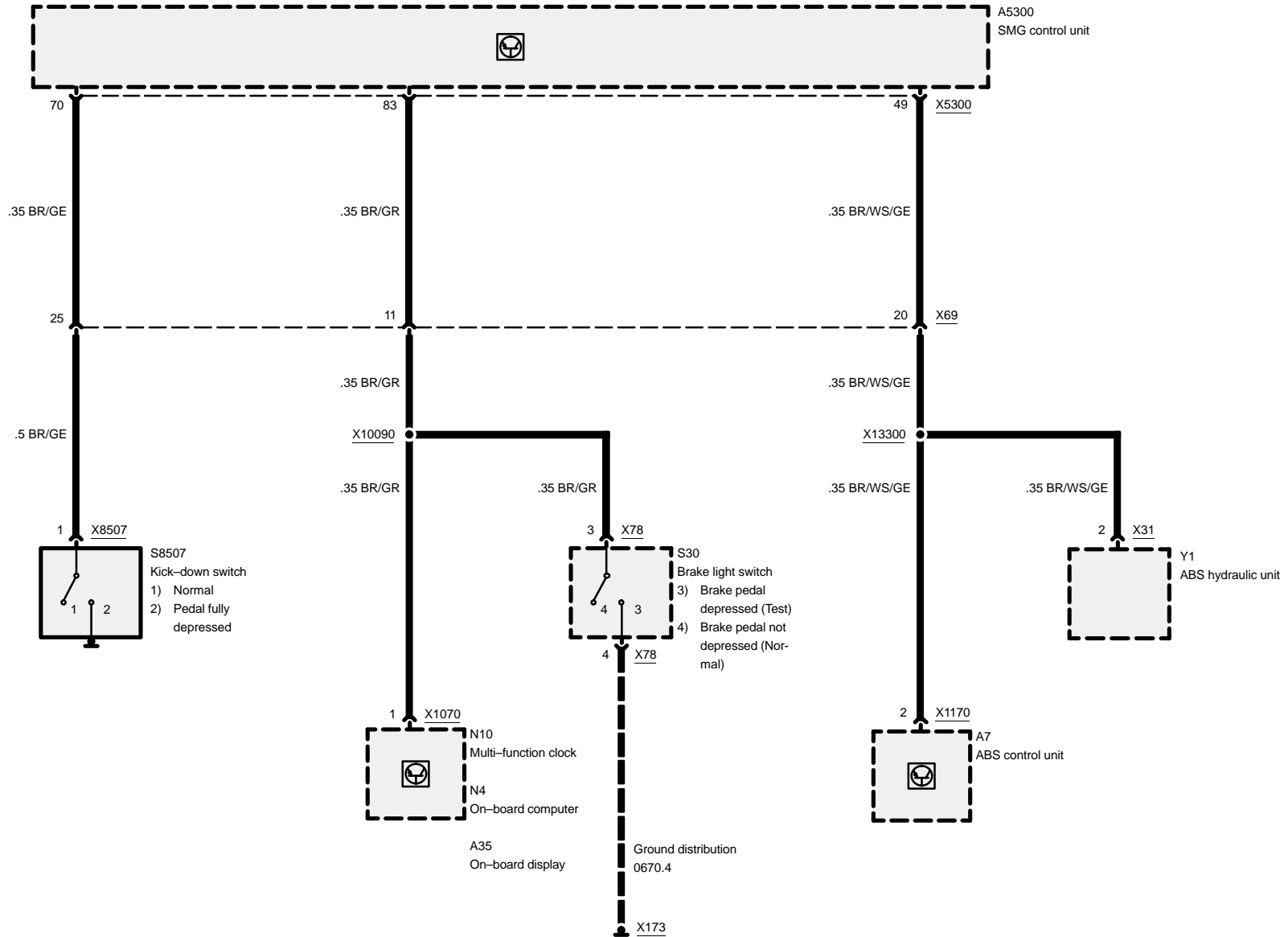


# Sequential M–transmission (SMG)



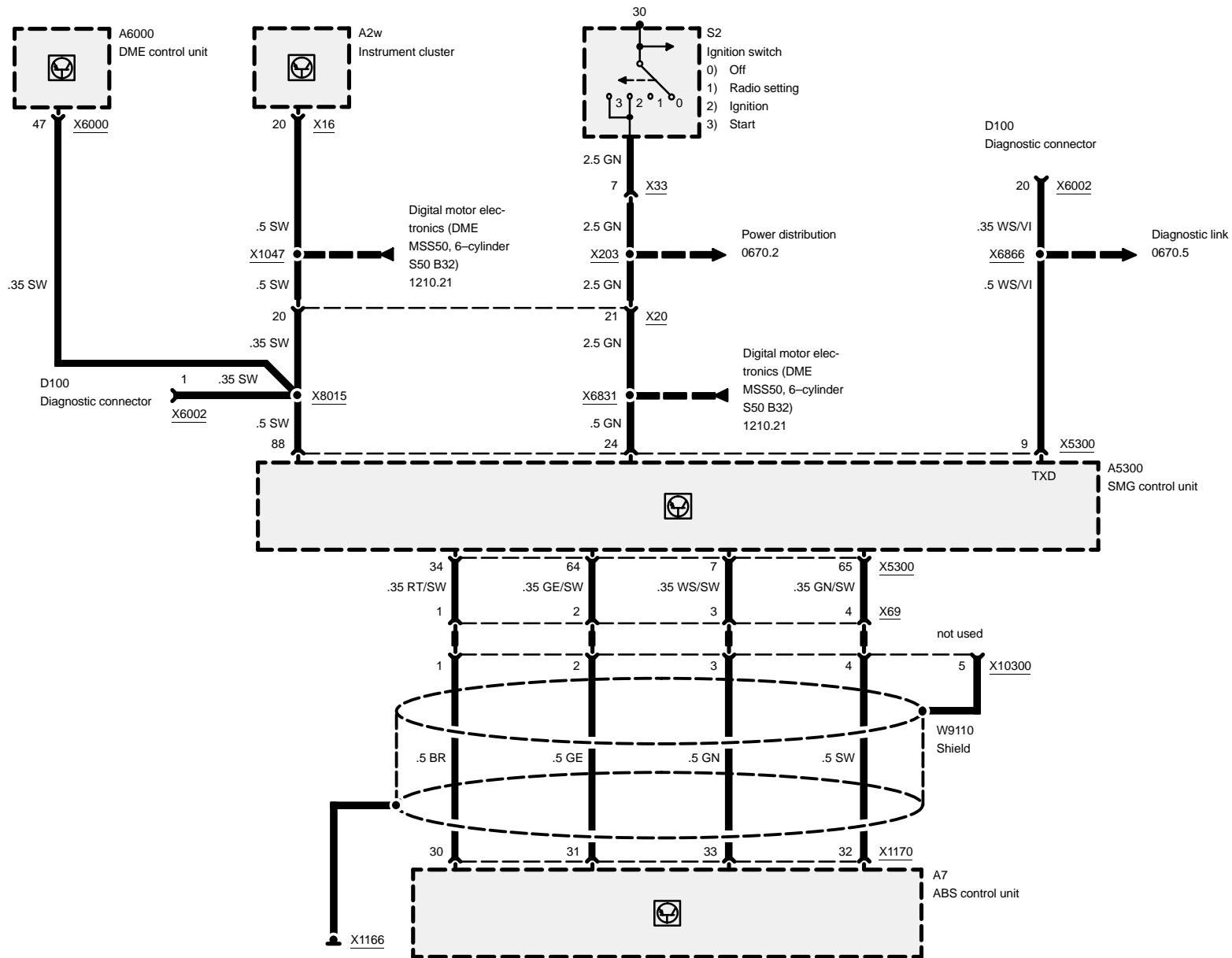


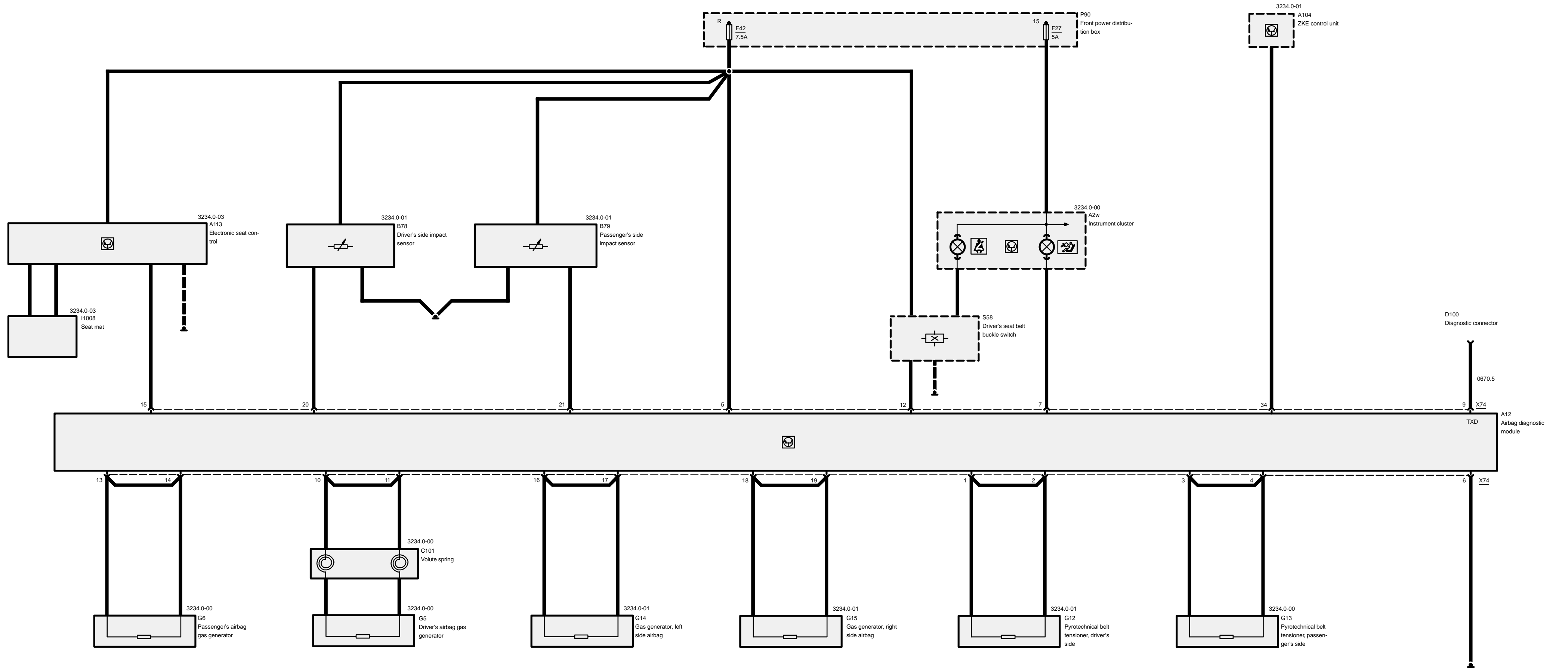
# Sequential M–transmission (SMG)

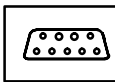




# Sequential M–transmission (SMG)





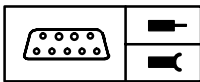


## Pin assignments

### X74

Pin	Type	Description/Function	Connection
1	A	Pyrotechnic seat belt tensioner	Pyrotechnic seat belt tensioner, driver's side
2	A	Pyrotechnic seat belt tensioner	Pyrotechnic seat belt tensioner, driver's side
3	A	Pyrotechnic seat belt tensioner	Pyrotechnic seat belt tensioner, passenger's side
4	A	Pyrotechnic seat belt tensioner	Pyrotechnic seat belt tensioner, passenger's side
5	E	Supply voltage	Distribution board box, fuse 42
6	M	Ground	Ground connection
7	A	Airbag warning light	Instrument housing
8		not used	
9	E/A	TxD diagnostic link	Diagnostic connector
10	A	Airbag (+)	Gas generator, airbag, driver's side
11	A	Airbag (-)	Gas generator, airbag, driver's side
12	E	Seat-belt lock switch	Seat-belt lock switch, driver
13	A	Airbag (+)	Gas generator, airbag, passenger's side
14	A	Airbag (-)	Gas generator, airbag, passenger's side
15	E	Seat occupancy electronics	Seat occupancy electronics
16	A	Gas generator	Gas generator, side airbag, left
17	A	Gas generator	Gas generator, side airbag, left
18	A	Gas generator	Gas generator, side airbag, right
19	A	Gas generator	Gas generator, side airbag, right
20	E	Crash sensor	Crash sensor, driver's side
21	E	Crash sensor	Crash sensor, passenger's side
22		not used	
23		not used	
24		not used	
25		not used	
26		not used	
27		not used	
28		not used	
29		not used	
30		not used	
31		not used	

E = Input, A = Output, M = Ground

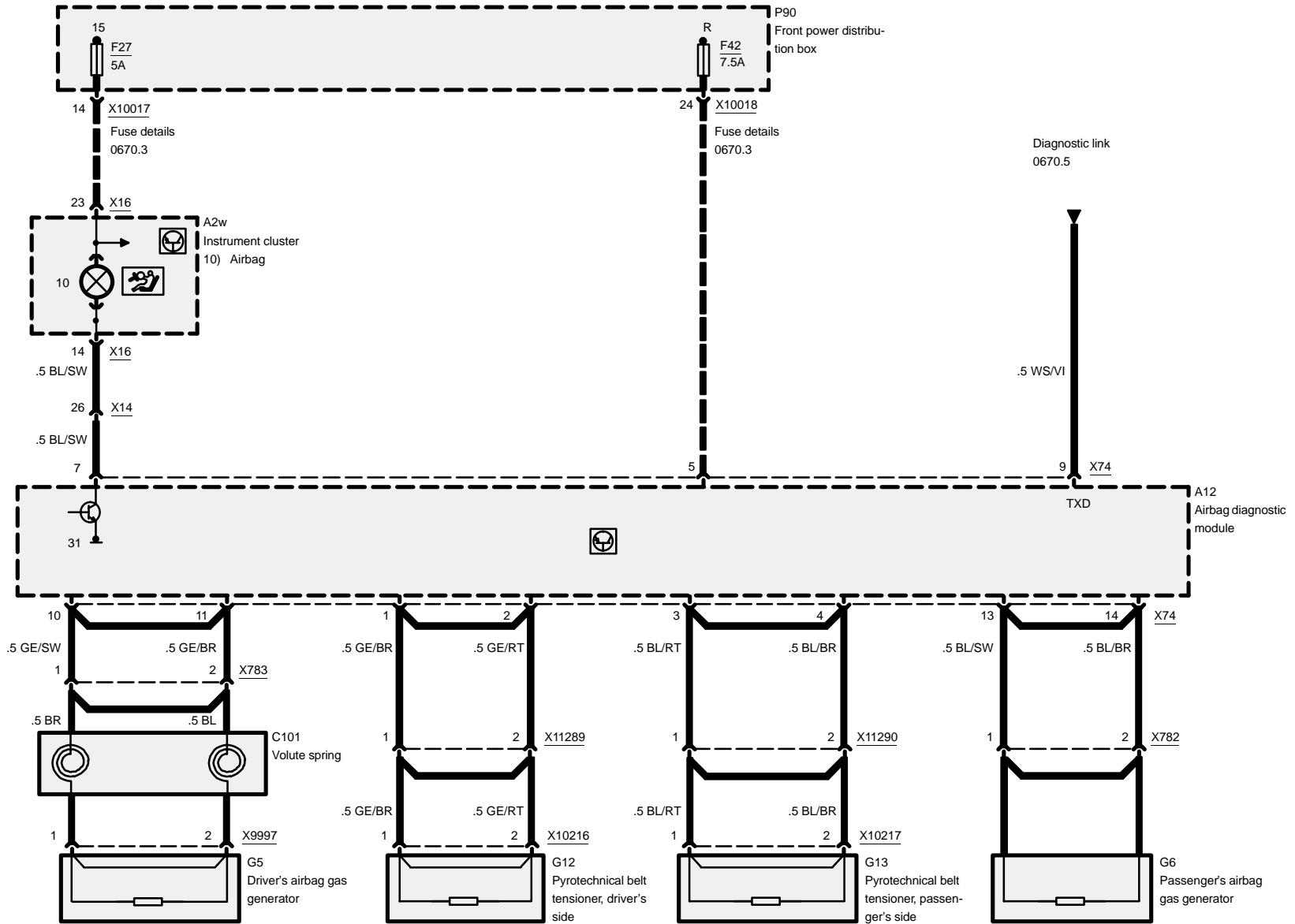


### Pin assignments

Pin	Type	Description/Function	Connection
32		not used	
33		not used	
34	A	Crash signal	ZKE control unit/Central locking system module (ZVM)
35		not used	
36		not used	
37		not used	
38		not used	
39		not used	
40		not used	
41		not used	
42		not used	
43		not used	
44		not used	
45		not used	
46		not used	
47		not used	
48		not used	
49		not used	
50		not used	



# Airbag (AB)

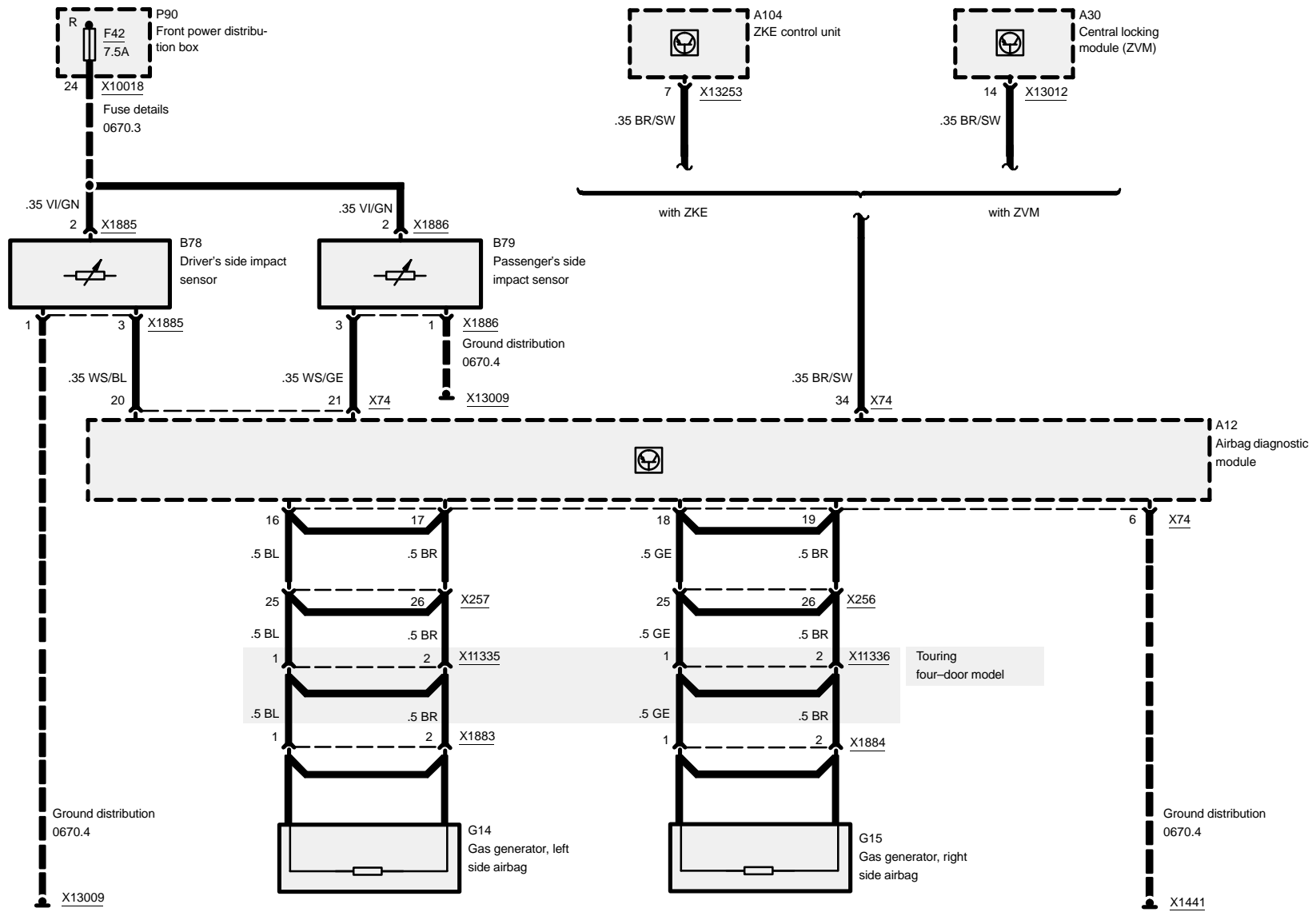






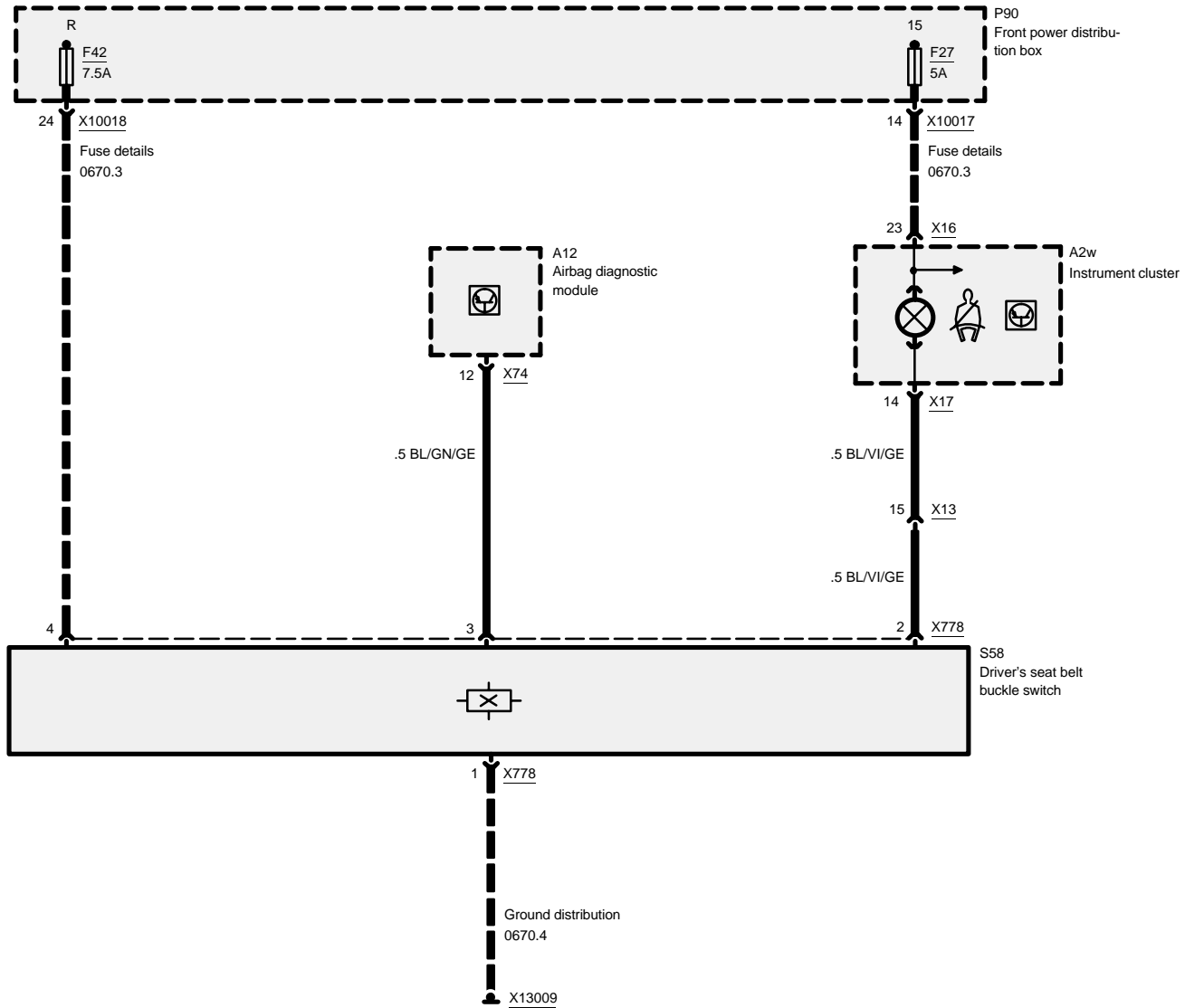
# Airbag (AB)

## Side airbag



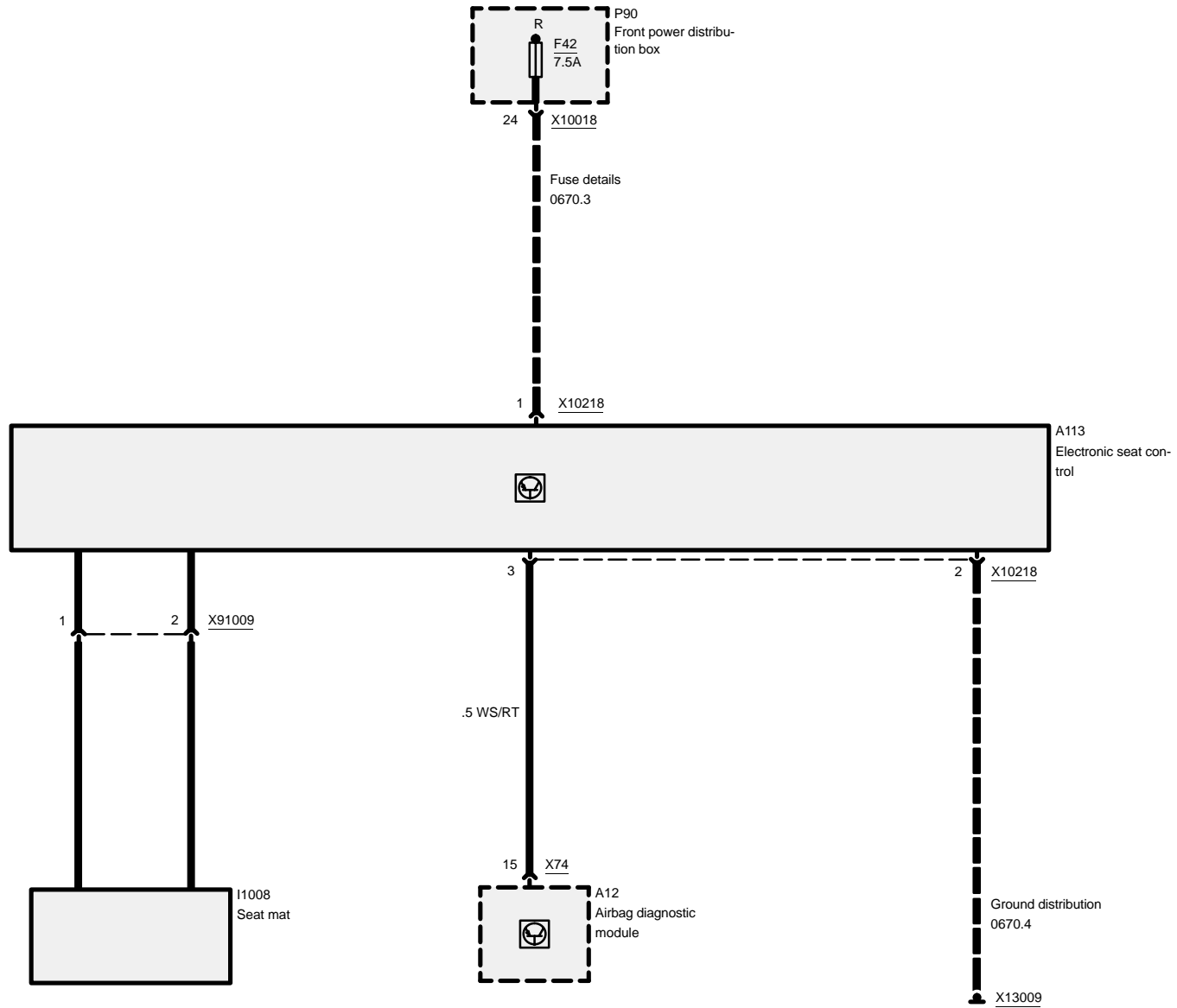


# Airbag (AB)

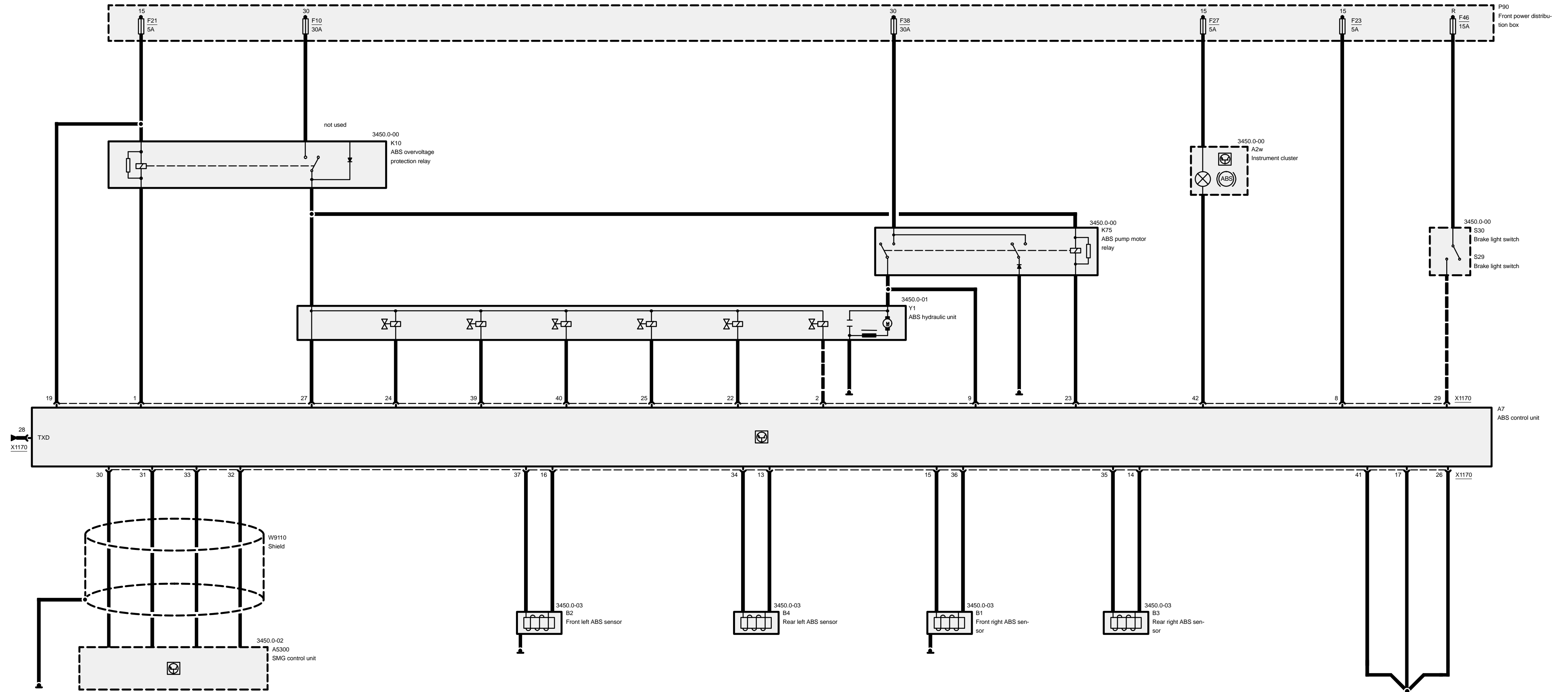


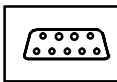


# Airbag (AB)



M3



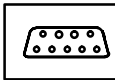


## Pin assignments

### X1170

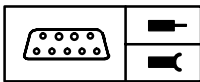
Pin	Type	Description/Function	Connection
1	A	ABS overvoltage protection relay	ABS overvoltage protection relay
2	A	Activation, front left inlet valve	ABS hydraulic unit
3		not used	
4		not used	
5		not used	
6		not used	
7		not used	
8	E	Terminal 15	Fuse 23
9	E	Operating voltage	ABS pump motor relay
10		not used	
11		not used	
12		not used	
13	A	Speed sensor ground, rear left	Speed sensor, rear left
14	A	Speed sensor ground, rear right	Speed sensor, rear right
15	E	Signal, speed sensor, front right	Speed sensor, front right
16	A	Speed sensor ground, front left	Speed sensor, front left
17	M	Component ground	Ground connection
18		not used	
19	E	Terminal 15	Fuse 21
20		not used	
21		not used	
22	A	Activation, front left inlet valve	ABS hydraulic unit
23	A	Activation, pump relay	ABS pump motor relay
24	A	Activation, intake valve, rear axle	ABS hydraulic unit
25	M	Component ground	ABS hydraulic unit, FL solenoid valve
26	M	Component ground	Ground connection
27	E	Voltage supply	ABS hydraulic unit
28	E/A	TxD diagnostic link	Diagnostic connector
29	E	Terminal 54	Brake light switch
30	E	Speed sensor, front left	SMG control unit
31	E	Speed sensor, front right	SMG control unit
32	E	Speed sensor, rear right	SMG control unit
33	E	Speed sensor, rear left	SMG control unit

E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
34	E	Signal, speed sensor, rear left	Speed sensor, rear left
35	E	Signal, speed sensor, rear right	Speed sensor, rear right
36	A	Speed sensor ground, front right	Speed sensor, front right
37	E	Signal, speed sensor, front left	Speed sensor, front left
38		not used	
39	A	Activation, rear outlet valve	ABS hydraulic unit
40	A	Activation, front right inlet valve	ABS hydraulic unit
41	M	Component ground	Ground connection
42	A	Activation, ABS warning lamp	Instrument cluster
43		not used	
44		not used	
45		not used	
46		not used	
47		not used	
48		not used	
49		not used	
50		not used	



## Pin assignments

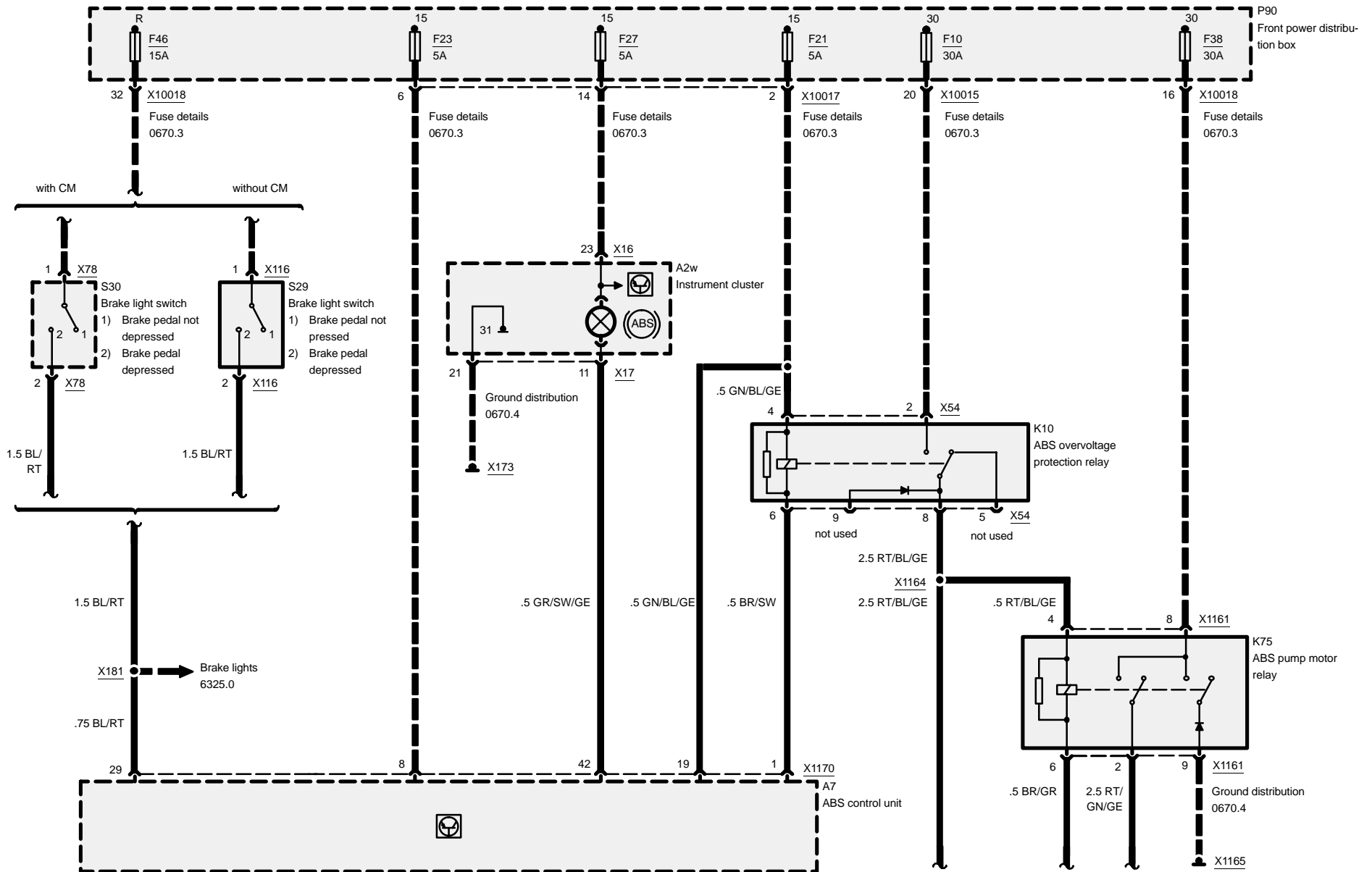
### X11394

Pin	Type	Description/Function	Connection
1	A	Signal, speed sensor, front left	Speed sensor, front left
2	E	Signal, speed sensor, front left	Speed sensor, front left
3		not used	
4	E	Terminal 15	Fuse 21
5	A	Signal, speed sensor, rear left	Speed sensor, rear left
6	E	Signal, speed sensor, rear left	Speed sensor, rear left
7	E/A	TxD diagnostic link	Diagnostic connector
8	M	Ground	Component ground
9	E	Terminal 30	Fuse 38
10		not used	
11		not used	
12		not used	
13		not used	
14		not used	
15		not used	
16	A	Activation, ABS warning lamp	Instrument cluster
17		not used	
18	E	Terminal 54	Brake light switch
19	A	Signal, speed sensor, front right	Speed sensor, front right
20	E	Signal, speed sensor, front right	Speed sensor, front right
21	E	Signal, ABS	DME control unit
22	A	Signal, speed sensor, rear right	Speed sensor, rear right
23	E	Signal, speed sensor, rear right	Speed sensor, rear right
24	M	Ground	Component ground
25	E	Terminal 30	Fuse 10

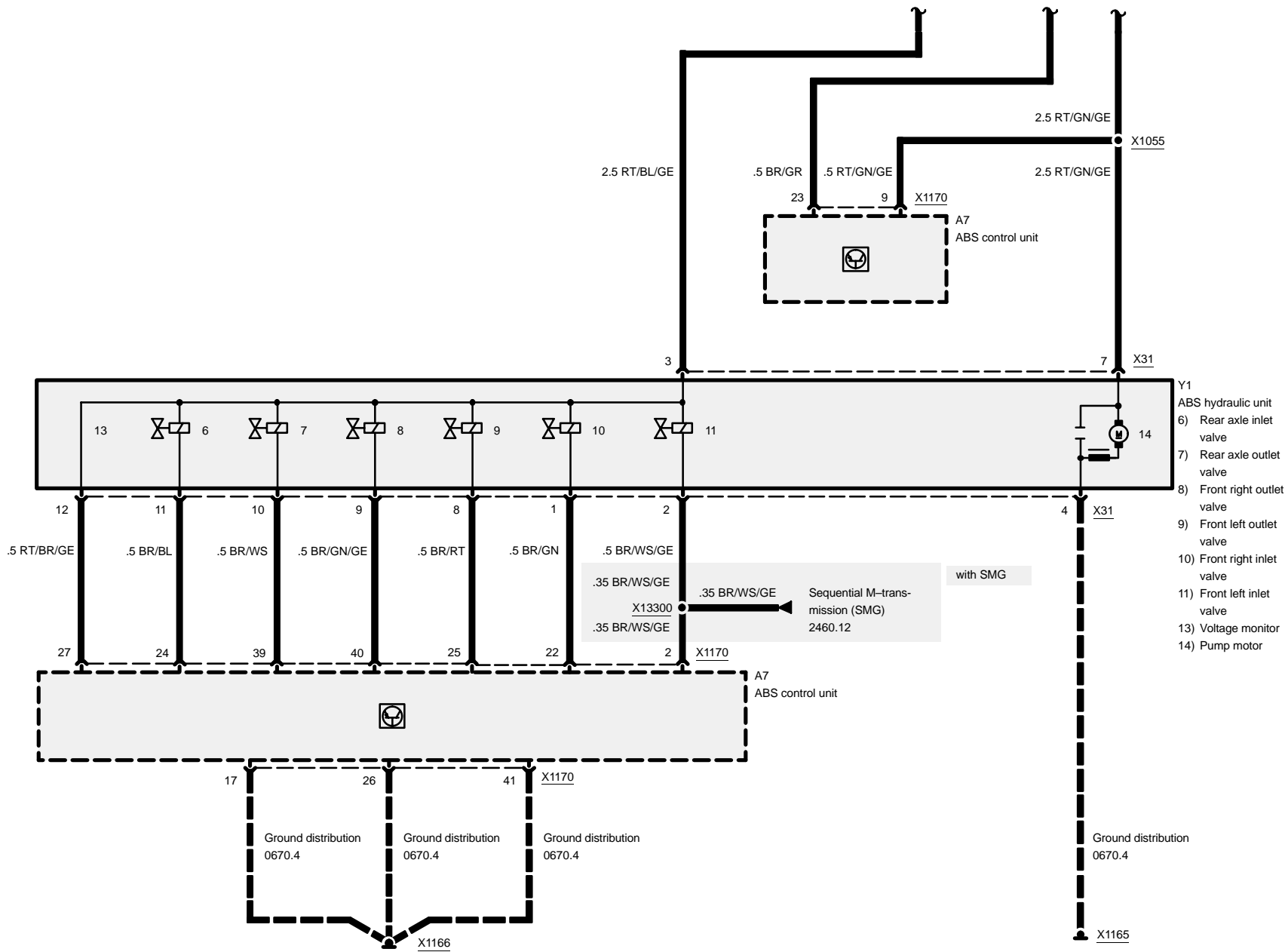


# Antilock brake system (ABS)

## M3





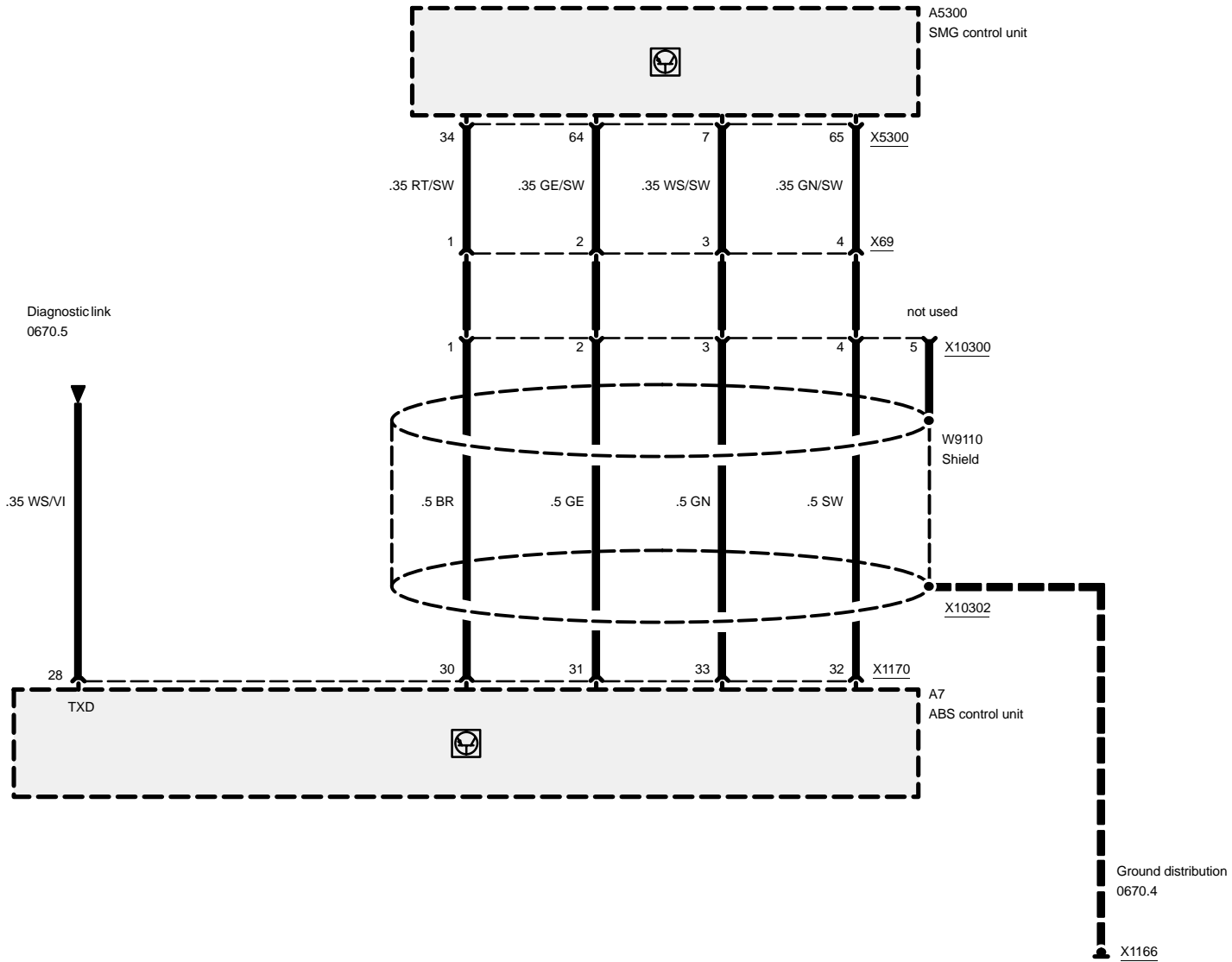


- Y1  
ABS hydraulic unit
- 6) Rear axle inlet valve
- 7) Rear axle outlet valve
- 8) Front right outlet valve
- 9) Front left outlet valve
- 10) Front right inlet valve
- 11) Front left inlet valve
- 13) Voltage monitor
- 14) Pump motor



# Antilock brake system (ABS) With sequential M-transmission (SMG)

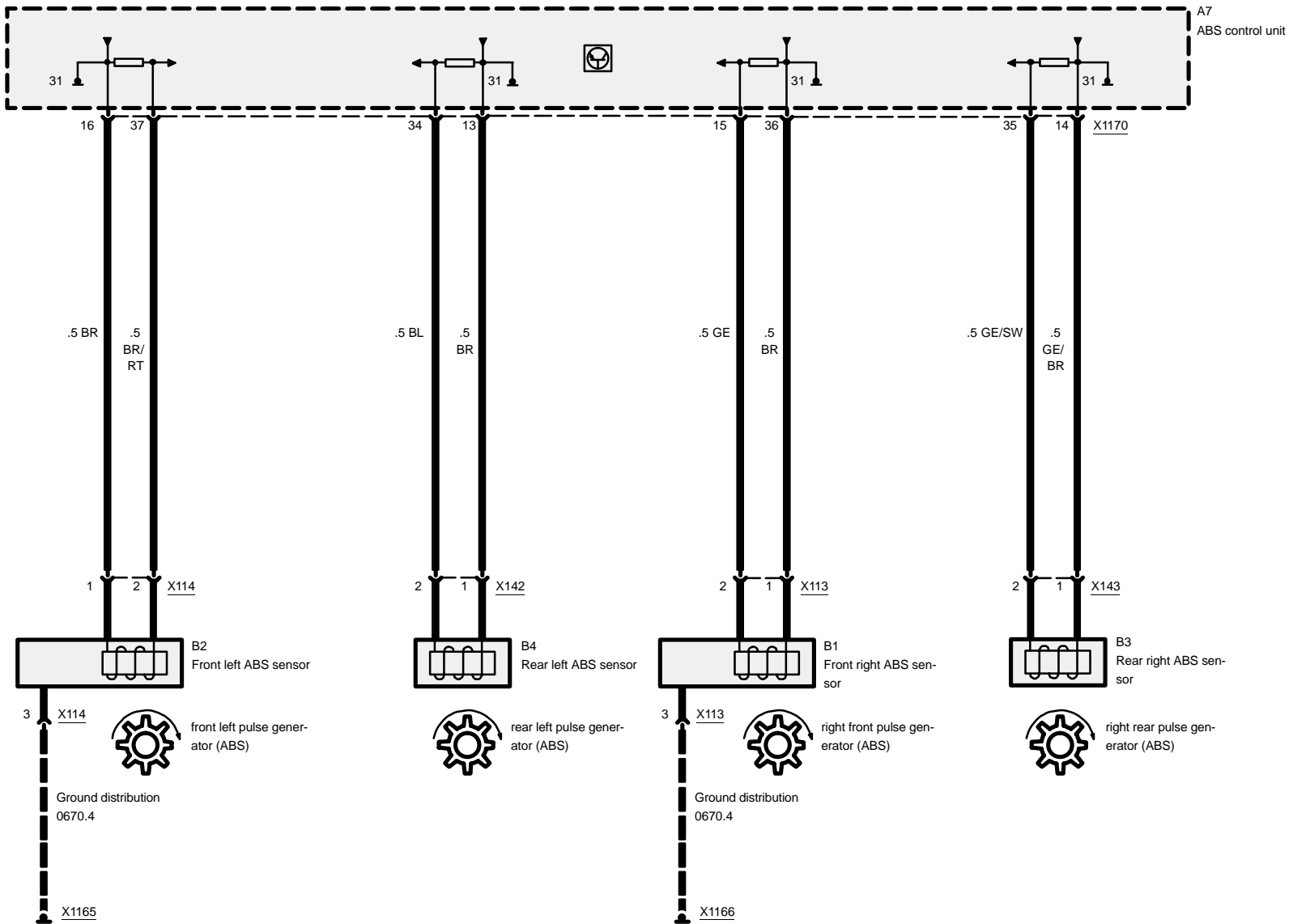
M3





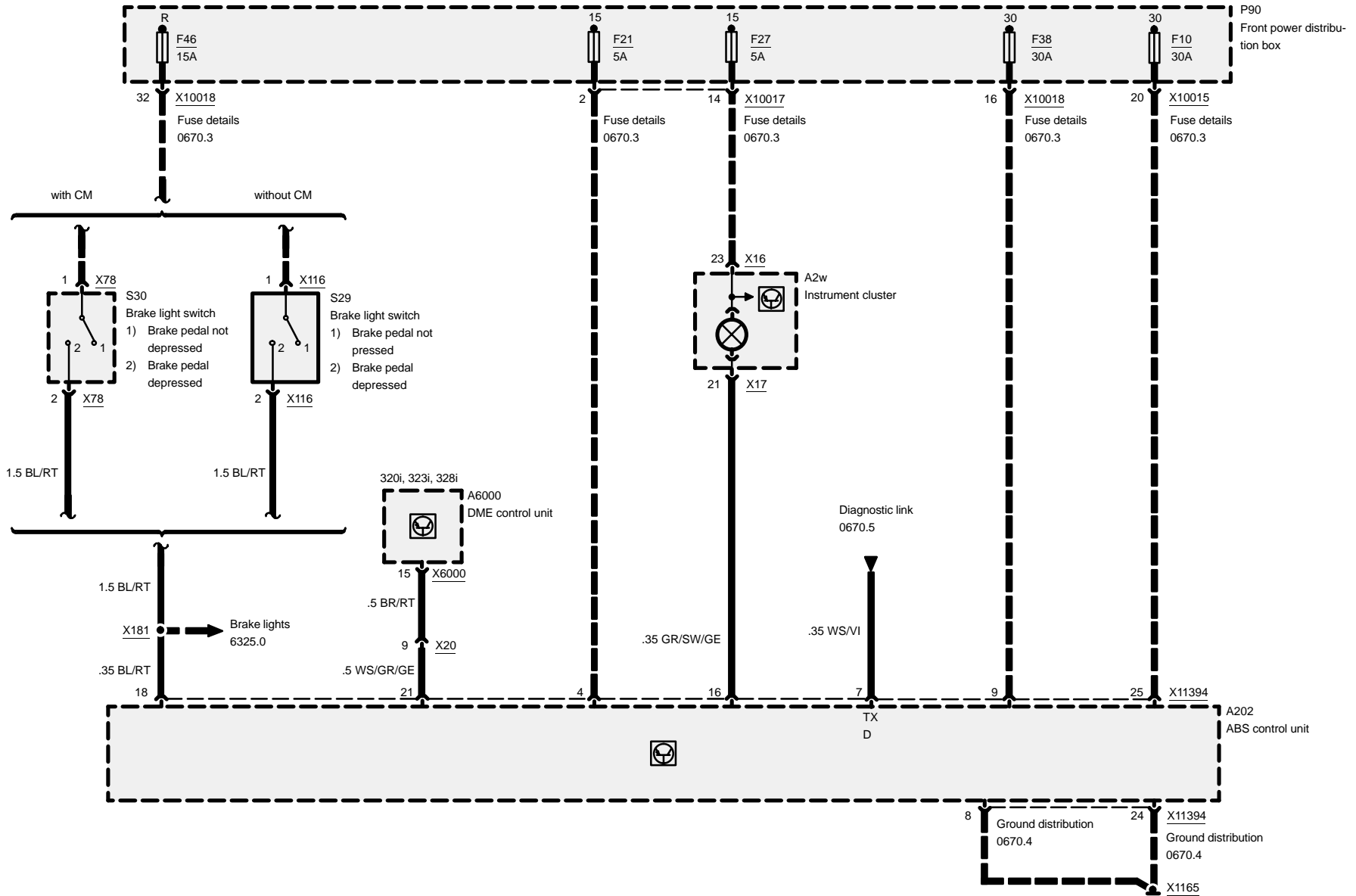
# Antilock brake system (ABS)

M3



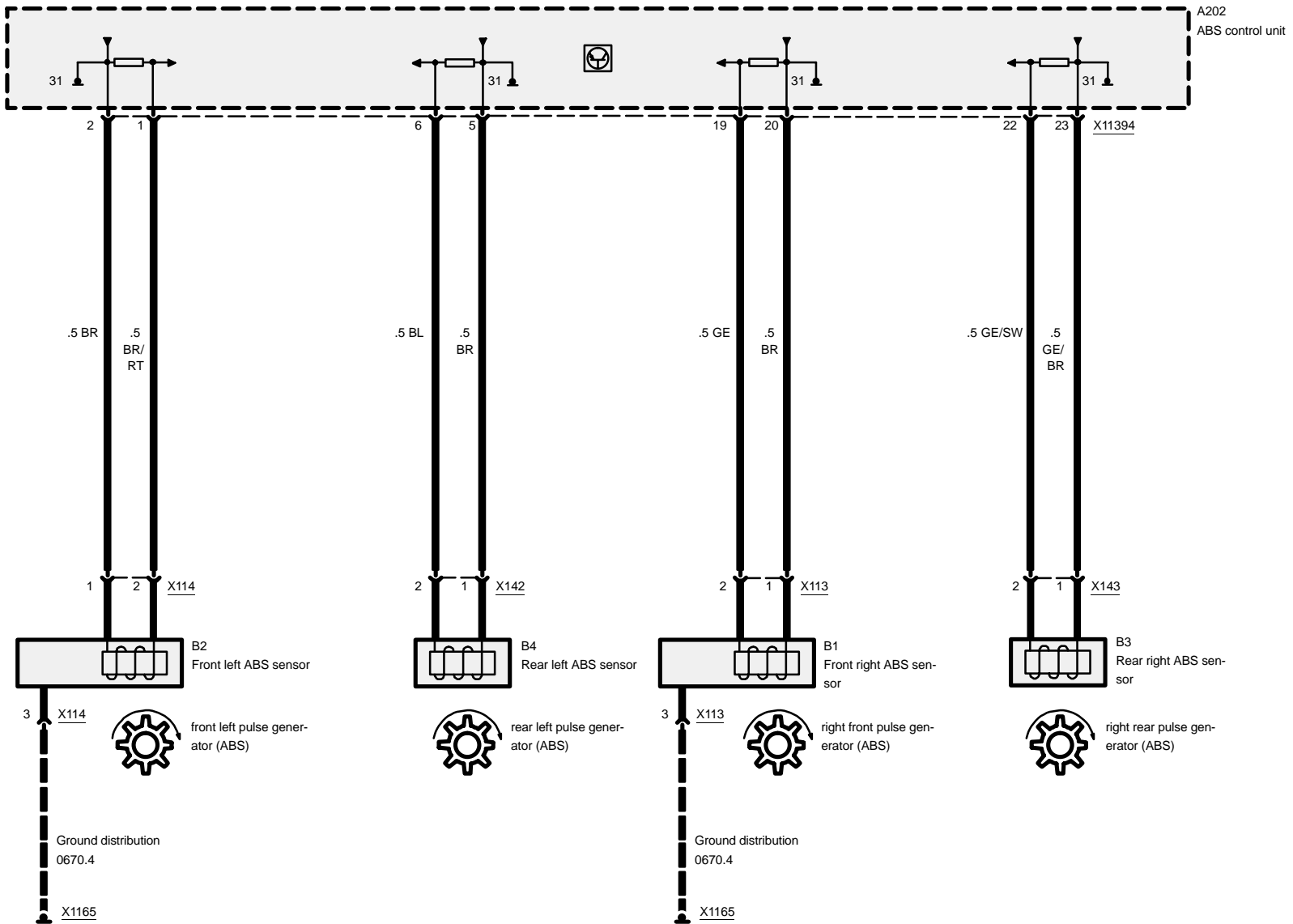


# Antilock brake system (ABS)

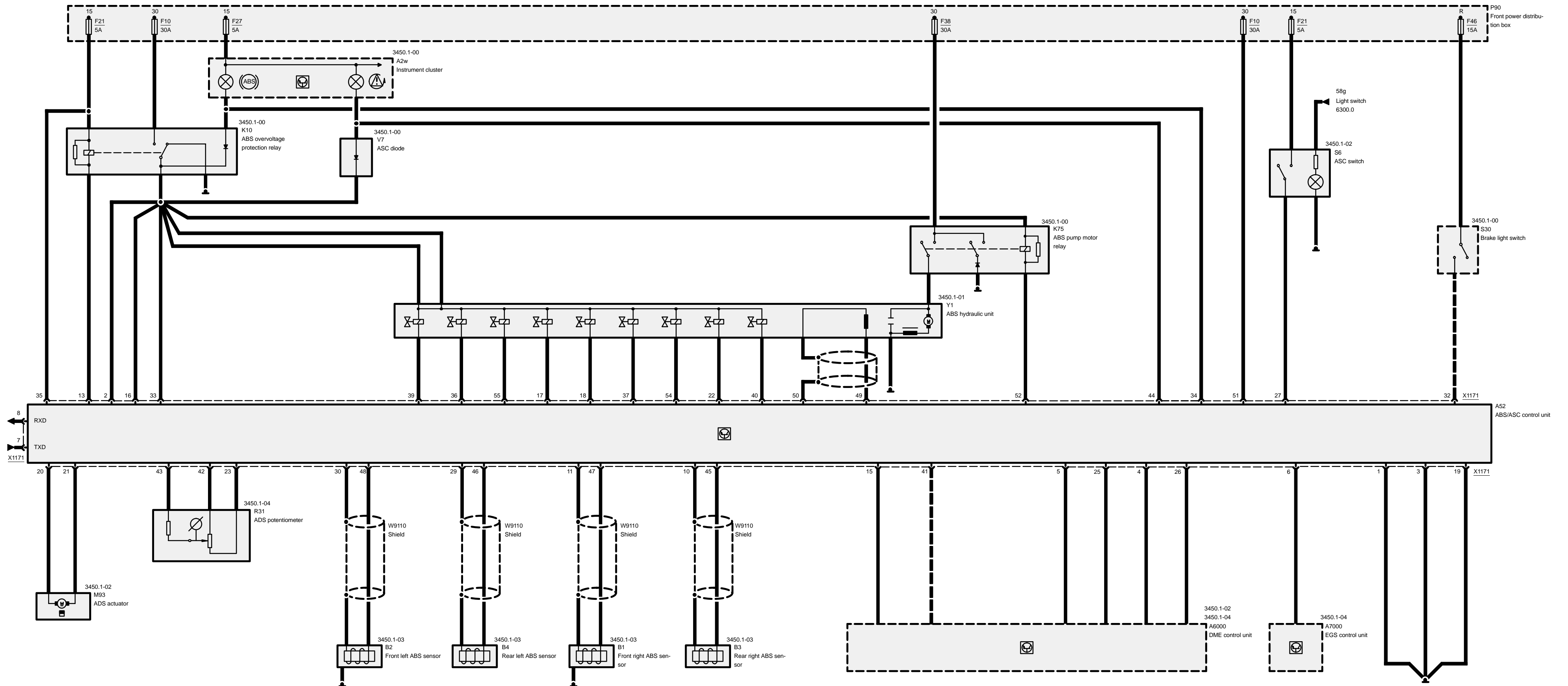




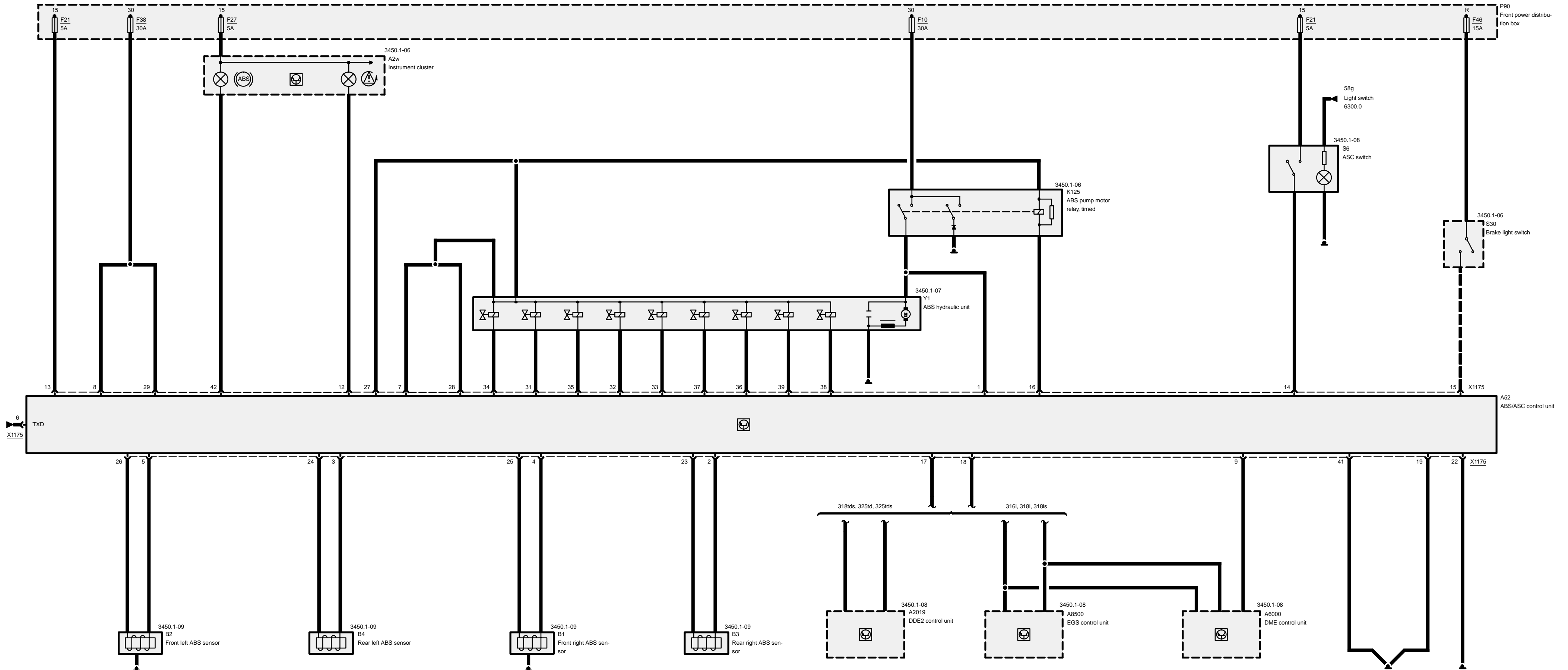
# Antilock brake system (ABS)



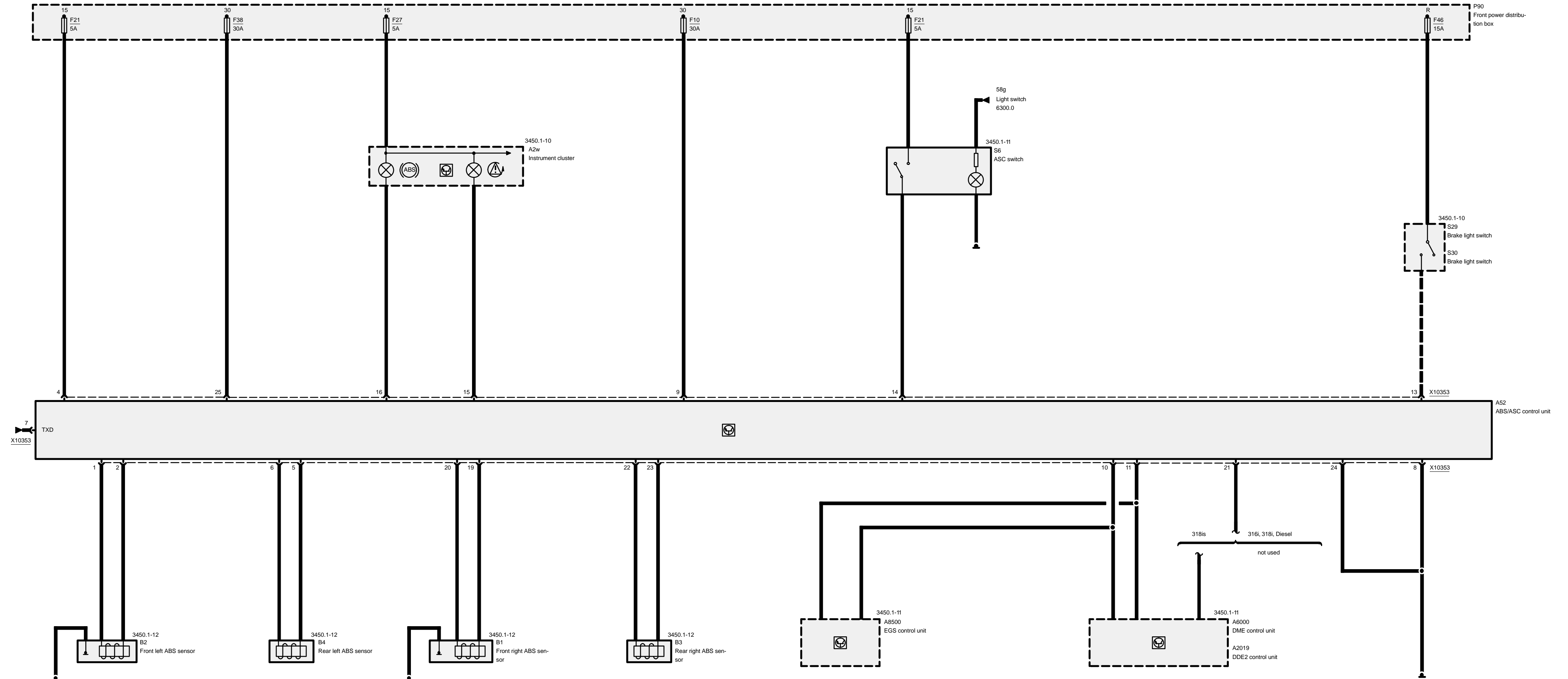
6-cylinder Petrol model



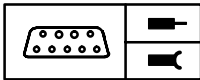
4-cylinder and Diesel, Earlier production



4-cylinder and Diesel, Later production





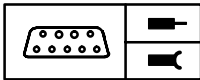


## Pin assignments (6-cylinder petrol engine)

### X1171

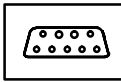
Pin	Type	Description/Function	Connection
1	M	Component ground	Ground connection
2	E	Operating voltage	ABS overvoltage protection relay
3	M	Component ground	Ground connection
4	E	Signal, traction control system	DME control unit
5	A	EML signal	DME control unit
6	A	Transmission intervention	EGS control unit
7	E/A	TxD diagnostic link	Diagnostic connector
8	A	RxD diagnostic link	Diagnostic connector
9		not used	
10	A	Speed sensor ground, rear right	Speed sensor, rear right
11	A	Speed sensor ground, front right	Speed sensor, front right
12		not used	
13	A	ABS overvoltage protection relay	ABS overvoltage protection relay
14		not used	
15	A	Signal, ASC	DME control unit
16	E	Operating voltage	ABS overvoltage protection relay
17	A	Activation, rear left inlet valve	ABS hydraulic unit
18	A	Activation, rear left outlet valve	ABS hydraulic unit
19	M	Component ground	Ground connection
20	A	ADS actuator	ADS actuator
21	A	ADS actuator	ADS actuator
22	A	Activation, front right inlet valve	ABS hydraulic unit
23	E	ASC throttle valve potentiometer	ASC throttle valve potentiometer
24		not used	
25	E	Signal, engine drag torque control	DME control unit
26	A	Throttle valve position	DME control unit
27	E	Signal, ASC switch	ASC switch
28		not used	
29	A	Speed sensor ground, rear left	Speed sensor, rear left
30	A	Speed sensor ground, front left	Speed sensor, front left
31		not used	
32	E	Terminal 54	Brake light switch
33	E	Operating voltage	ABS overvoltage protection relay

E = Input, A = Output, M = Ground



## Pin assignments (6-cylinder petrol engine)

Pin	Type	Description/Function	Connection
34	A	Activation, ABS warning lamp	Instrument cluster
35	E	Terminal 15	Fuse 21
36	A	Separating valve	ABS hydraulic unit
37	A	Activation, front right outlet valve	ABS hydraulic unit
38		not used	
39	A	Activation, rear left inlet valve	ABS hydraulic unit
40	A	Activation, front left inlet valve	ABS hydraulic unit
41	E	Vehicle speed signal	DME control unit
42	E	ASC throttle valve potentiometer	ASC throttle valve potentiometer
43	E	ASC throttle valve potentiometer	ASC throttle valve potentiometer
44	A	Activation, ASC warning lamp	Instrument cluster
45	E	Signal, speed sensor, rear right	Speed sensor, rear right
46	E	Signal, speed sensor, rear left	Speed sensor, rear left
47	E	Signal, speed sensor, front right	Speed sensor, front right
48	E	Signal, speed sensor, front left	Speed sensor, front left
49	E	Signal, pump motor sensor	ABS hydraulic unit
50	E	Shield, pump motor sensor	ABS hydraulic unit
51	E	Voltage supply	Fuse 10
52	A	ABS pump motor relay	ABS pump motor relay
53		not used	
54	A	Activation, front left outlet valve	ABS hydraulic unit
55	A	Activation, rear left outlet valve	ABS hydraulic unit

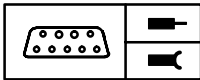


## Pin Assignments (4-Cylinder and Diesel, Early Production)

### X1175

Pin	Type	Description/Function	Connection
1	E	Pump signal	ABS pump motor relay
2	E	Signal, speed sensor, rear right	Speed sensor, rear right
3	E	Signal, speed sensor, rear left	Speed sensor, rear left
4	E	Signal, speed sensor, front right	Speed sensor, front right
5	E	Signal, speed sensor, front left	Speed sensor, front left
6	E/A	TxD diagnostic link	Diagnostic connector
7	A	Signal, ABS	ABS hydraulic unit
8	E	Terminal 30	Fuse 38
9	A	Speed signal, rear right	DME control unit
10		not used	
11		not used	
12	A	Signal, ABS/ASC	Instrument cluster
13	E	Terminal 15	Fuse 21
14	E	ASC ON signal	ASC switch
15	E	Terminal 54	Brake light switch
16	A	ABS pump motor relay	ABS pump motor relay
17	E/A	CAN-HIGH	DME/EGS/DDEcontrol unit
18	E/A	CAN-LOW	DME/EGS/DDEcontrol unit
19	M	Component ground	Ground connection
20		not used	
21		not used	
22	M	Component ground	Ground connection
23	A	Speed sensor ground, rear right	Speed sensor, rear right
24	A	Speed sensor ground, rear left	Speed sensor, rear left
25	A	Speed sensor ground, front right	Speed sensor, front right
26	A	Speed sensor ground, front left	Speed sensor, front left
27	A	Signal, ABS	ABS pump motor relay
28	A	Signal, ABS	ABS hydraulic unit
29	E	Terminal 30	Fuse 38
30		not used	
31	A	Separating valve	ABS hydraulic unit
32	A	Activation, inlet valve, rear left	ABS hydraulic unit
33	A	Activation, outlet valve, rear left	ABS hydraulic unit

E = Input, A = Output, M = Ground



## Pin Assignments (4-Cylinder and Diesel, Later Production)

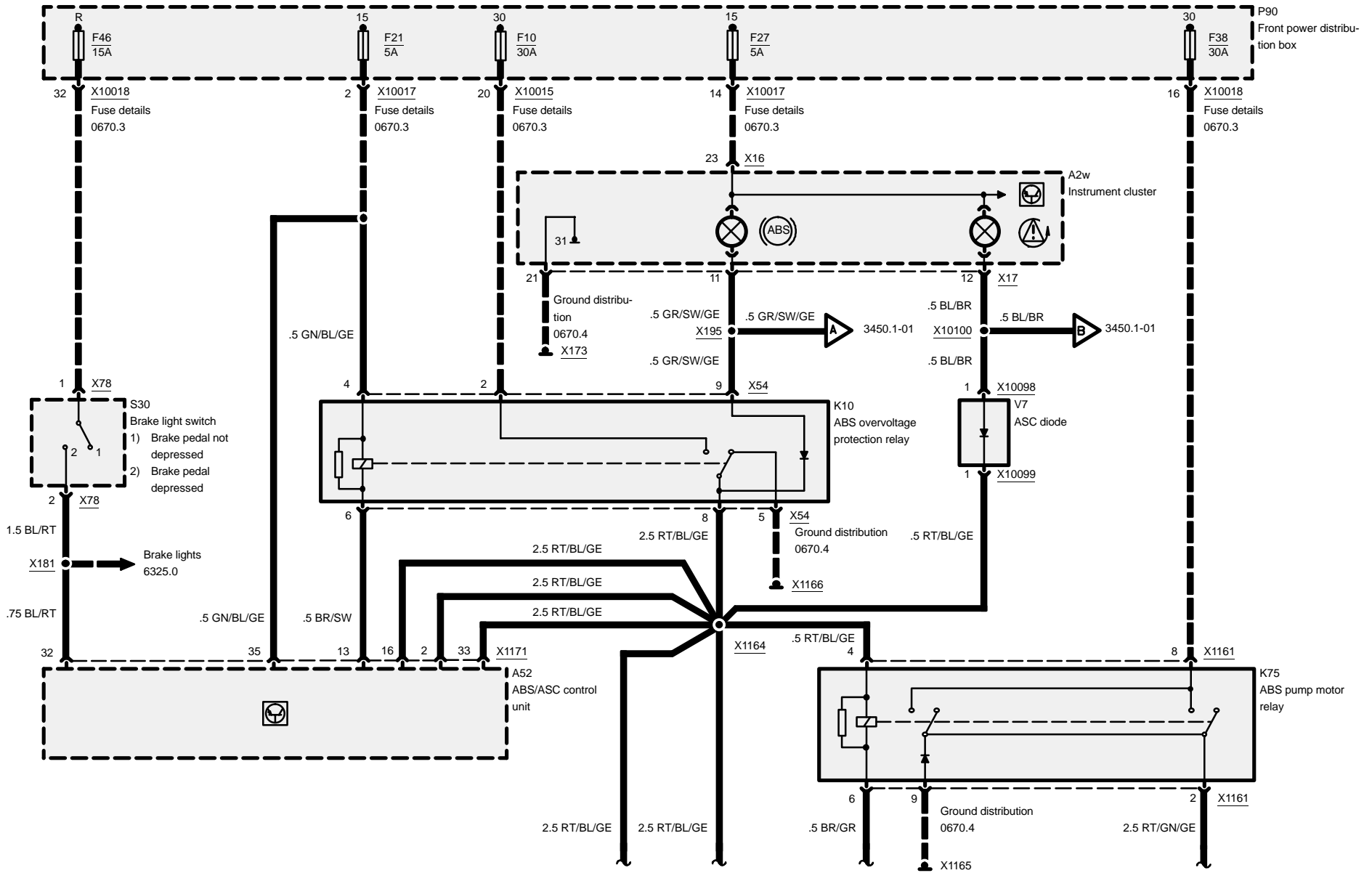
### X10353

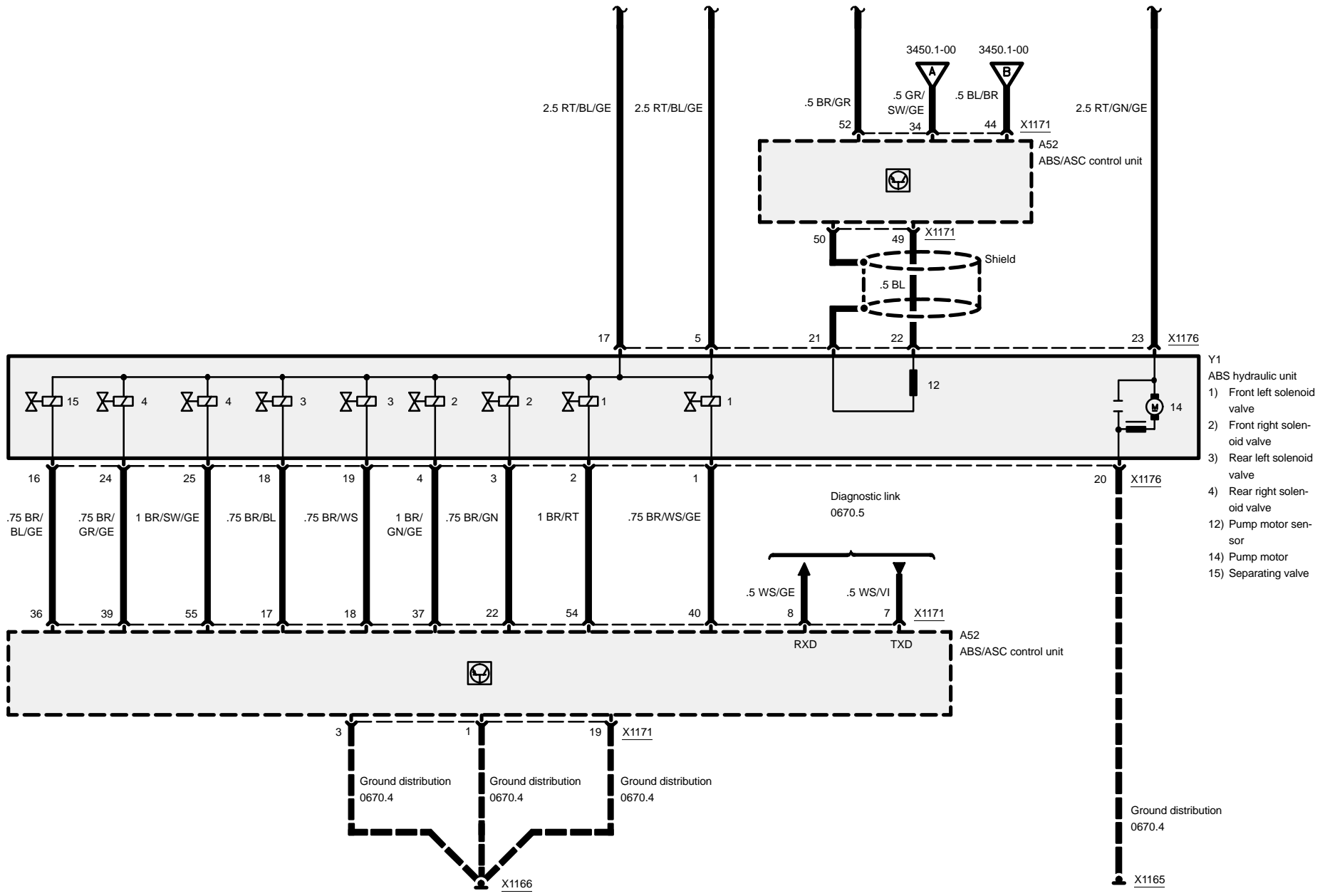
Pin	Type	Signal	Description/Function	Connection
1	A	VL-	Ground, speed sensor, front left	Speed sensor, front left
2	E	VL+	Signal, speed sensor, front left	Speed sensor, front left
3			not used	
4	E	15<21	Terminal 15	Fuse 21
5	A	HL-	Ground, speed sensor, rear left	Speed sensor, rear left
6	E	HL+	Signal, speed sensor, rear left	Speed sensor, rear left
7	E/A	TXD	TxD diagnostic data link	Diagnostic connector
8	M	31L	Component ground	Ground connection
9	E	30<10	Terminal 30	Fuse 10
10	E/A	CAN-	CAN-	DME/EGS/DDE2 control unit
11	E/A	CAN+	CAN+	DME/EGS/DDE2 control unit
12			not used	
13	E	KI.54	Terminal 54	Brake light switch
14	E	ASCS	ASC ON signal	ASC switch
15	A	WLASC	ASC warning lamp	Instrument cluster
16	A	WLABS	ABS warning lamp	Instrument cluster
17			not used	
18			not used	
19	A	VR-	Ground, speed sensor, front right	Speed sensor, front right
20	E	VR+	Signal, speed sensor, front right	Speed sensor, front right
21	A	RROUT	Signal, speed, rear right	DME control unit
22	E	HR+	Signal, speed sensor, rear right	Speed sensor, rear right
23	A	HR-	Ground, speed sensor, rear right	Speed sensor, rear right
24	M	31L	Component ground	Ground connection
25	E	30<38	Terminal 30	Fuse 38



# Automatic stability control (ASC)

# 6-cylinder Petrol model



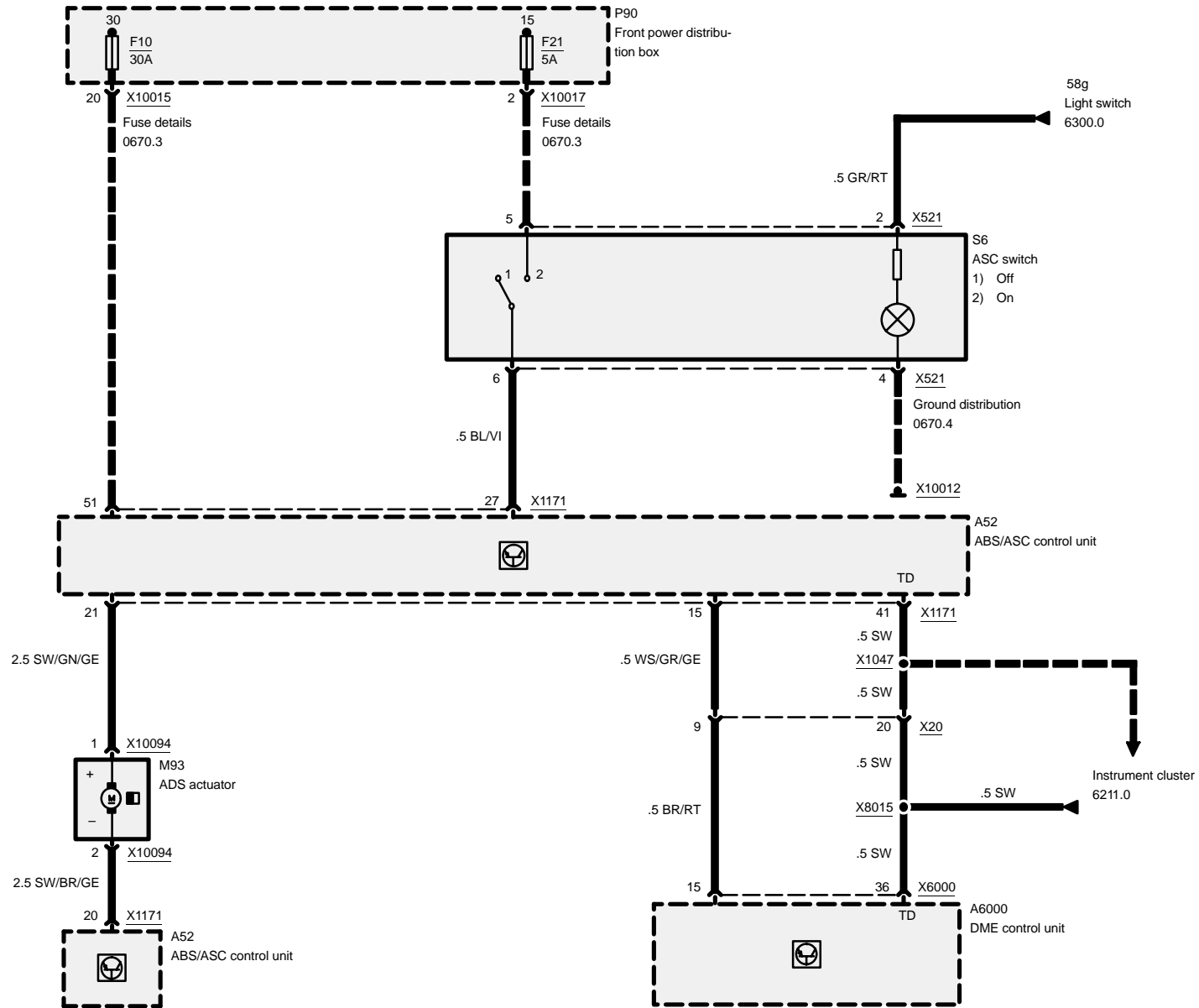


- Y1  
ABS hydraulic unit
- 1) Front left solenoid valve
  - 2) Front right solenoid valve
  - 3) Rear left solenoid valve
  - 4) Rear right solenoid valve
  - 12) Pump motor sensor
  - 14) Pump motor
  - 15) Separating valve



# Automatic stability control (ASC)

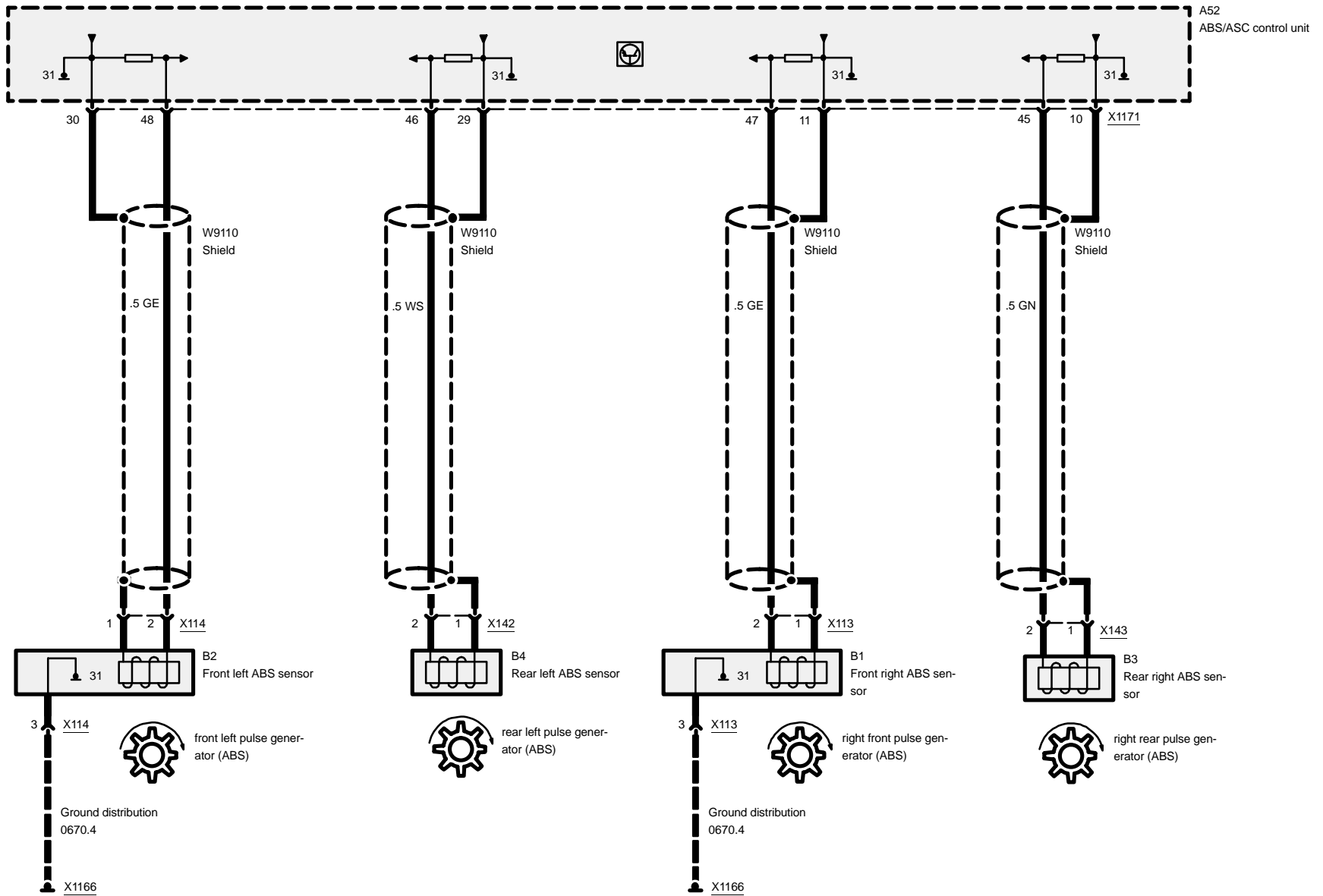
# 6-cylinder Petrol model





# Automatic stability control (ASC)

# 6-cylinder Petrol model

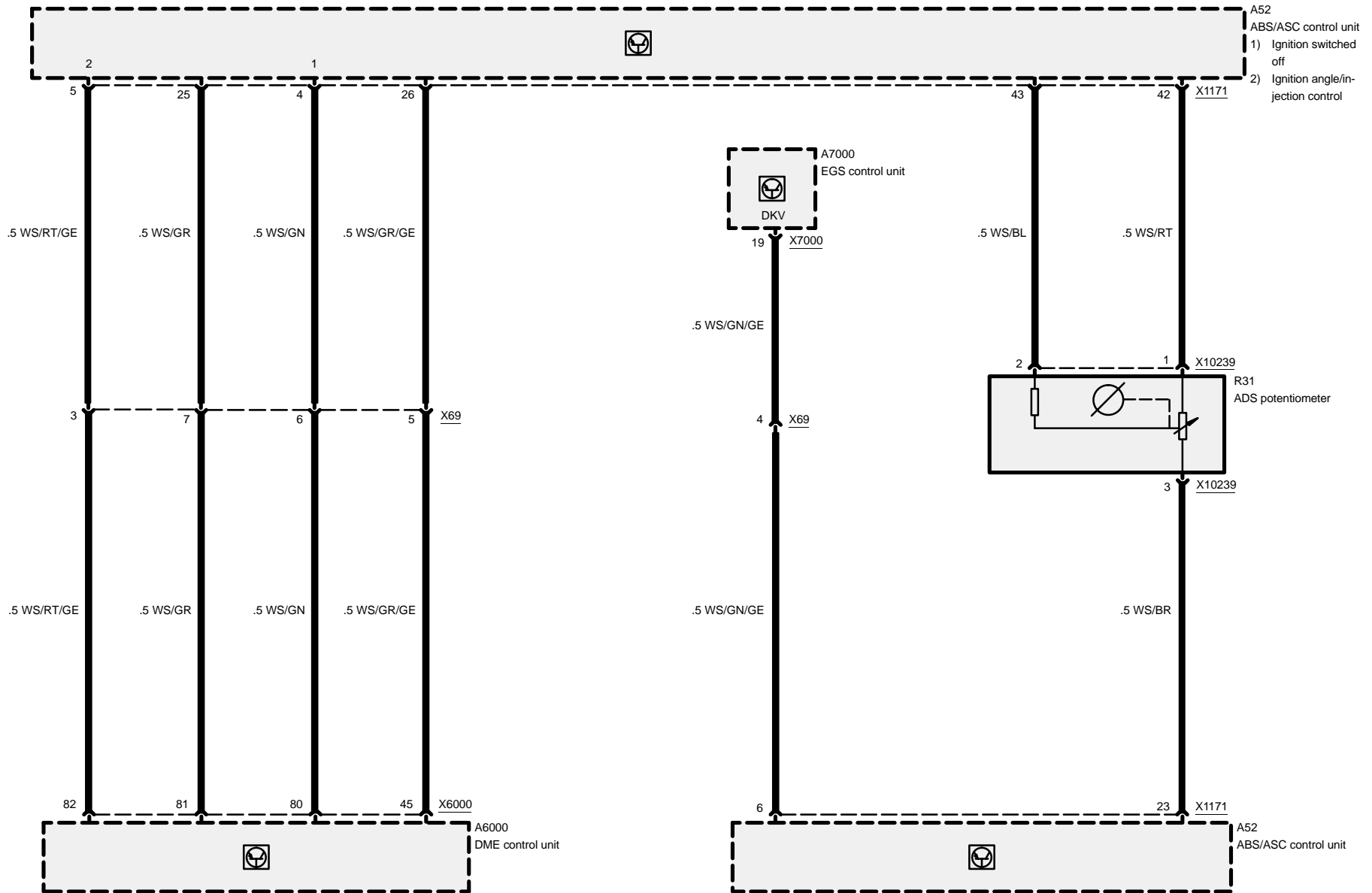






# Automatic stability control (ASC)

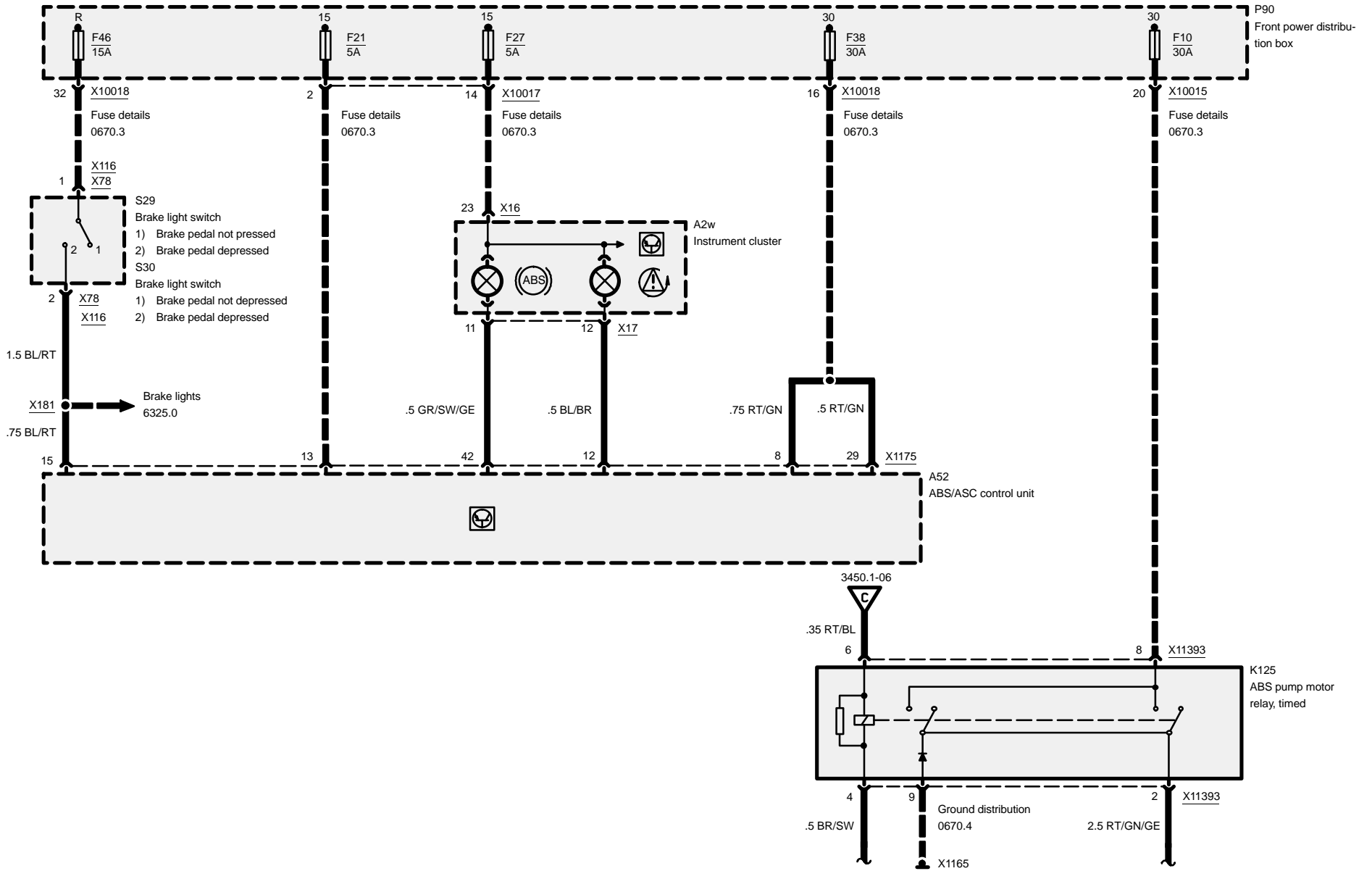
# 6-cylinder Petrol model

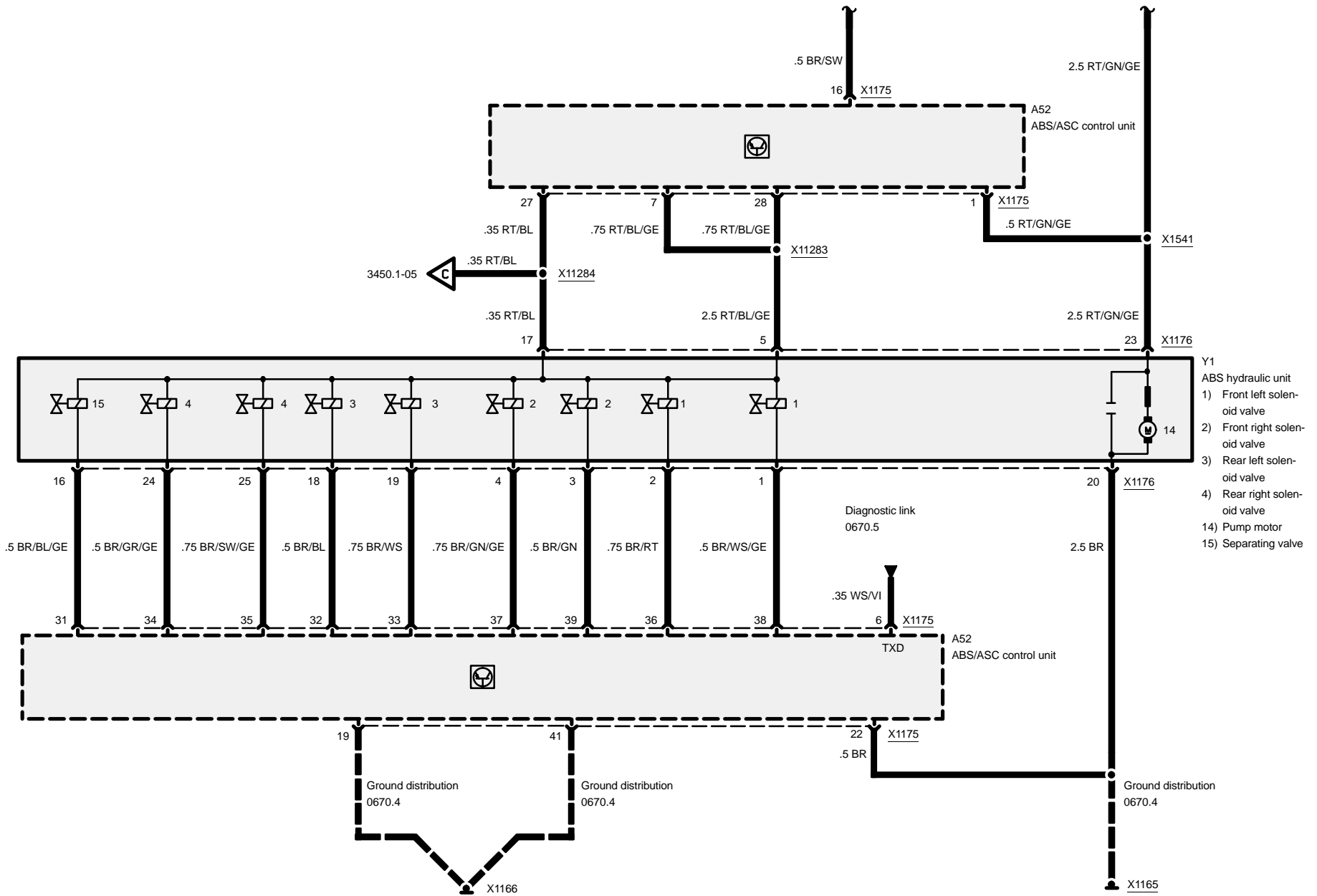




# Automatic stability control (ASC)

# 4-cylinder and Diesel Earlier production

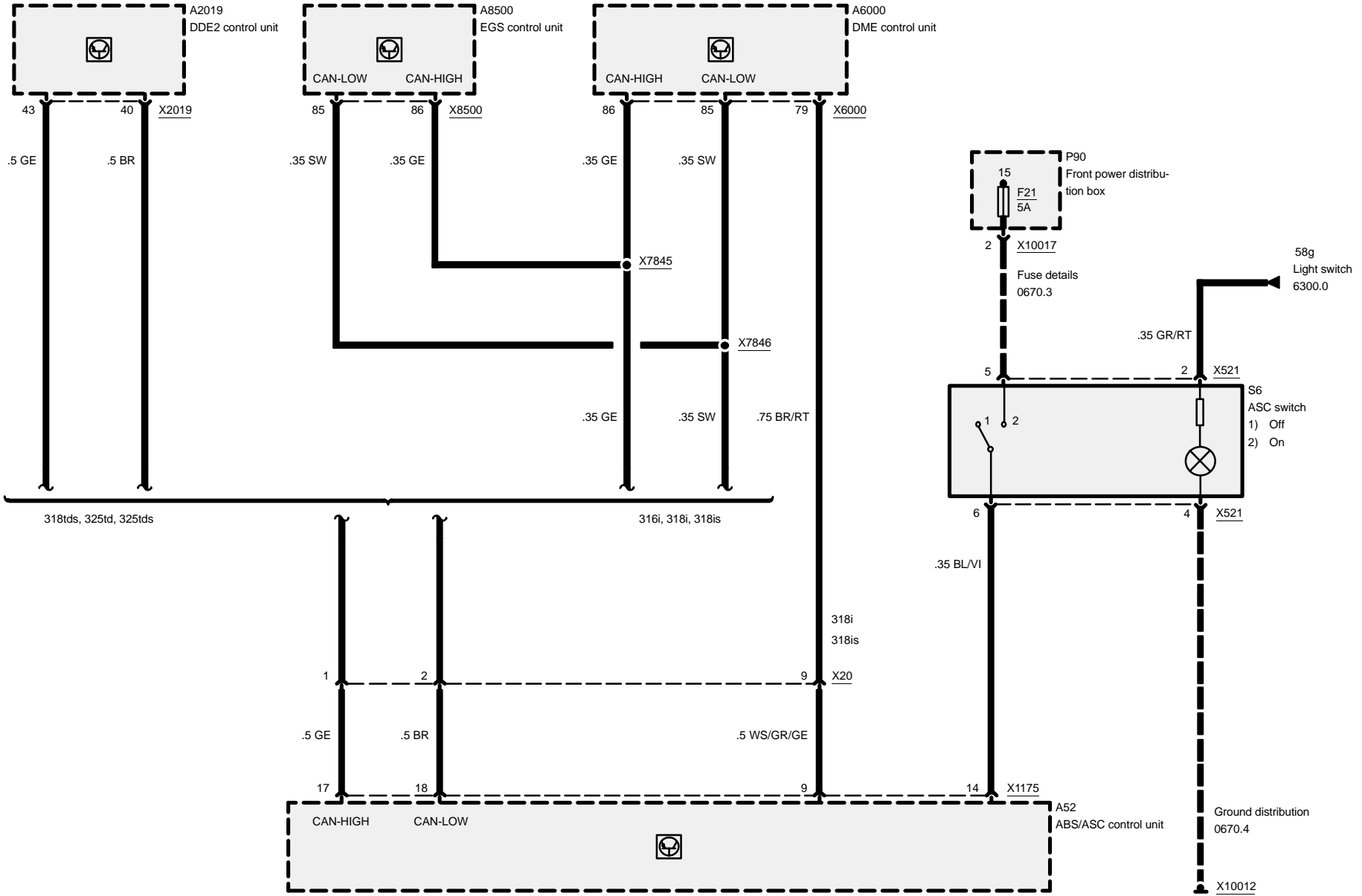






# Automatic stability control (ASC)

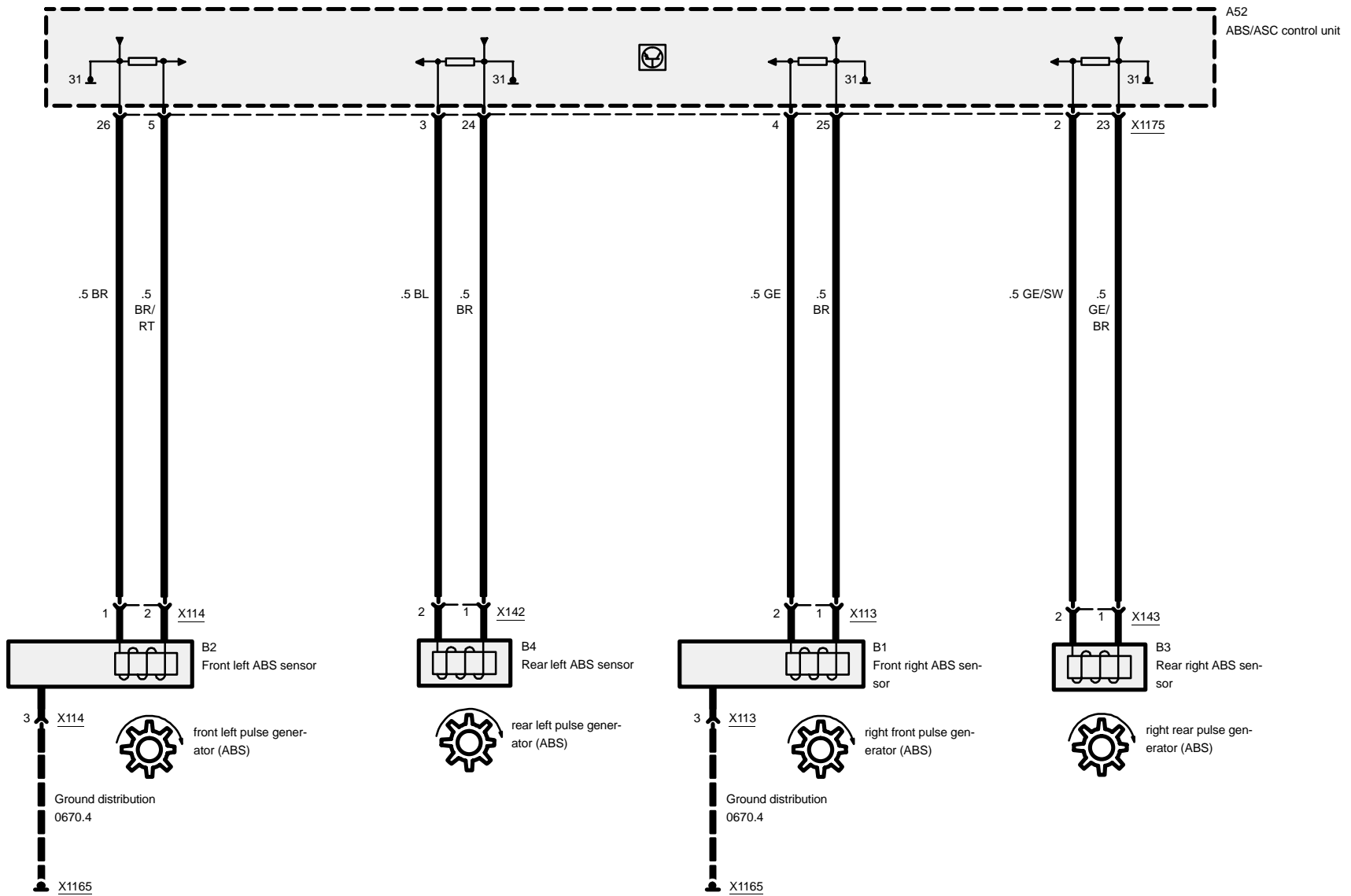
## 4-cylinder and Diesel Earlier production





# Automatic stability control (ASC)

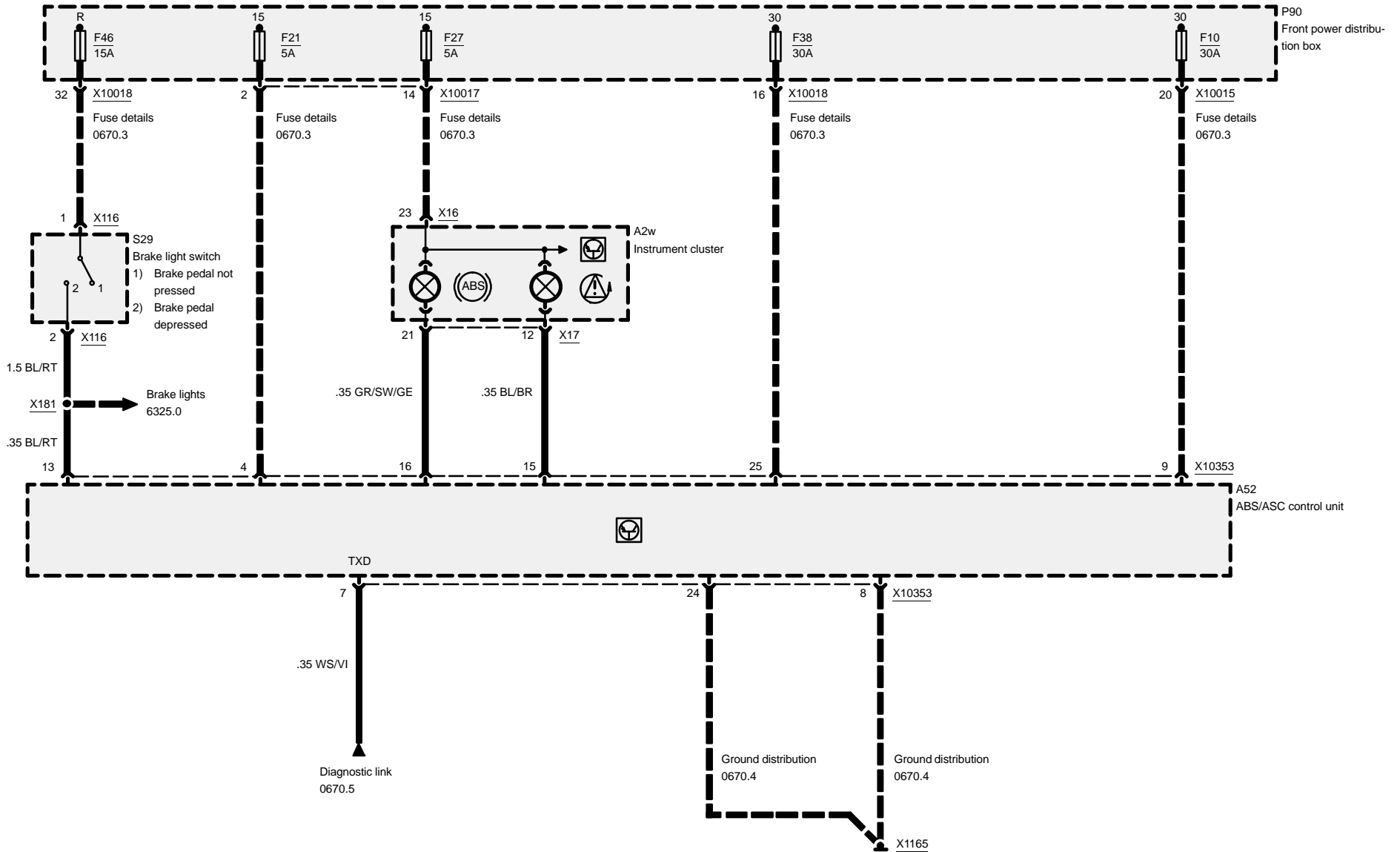
## 4-cylinder and Diesel Earlier production





# Automatic stability control (ASC)

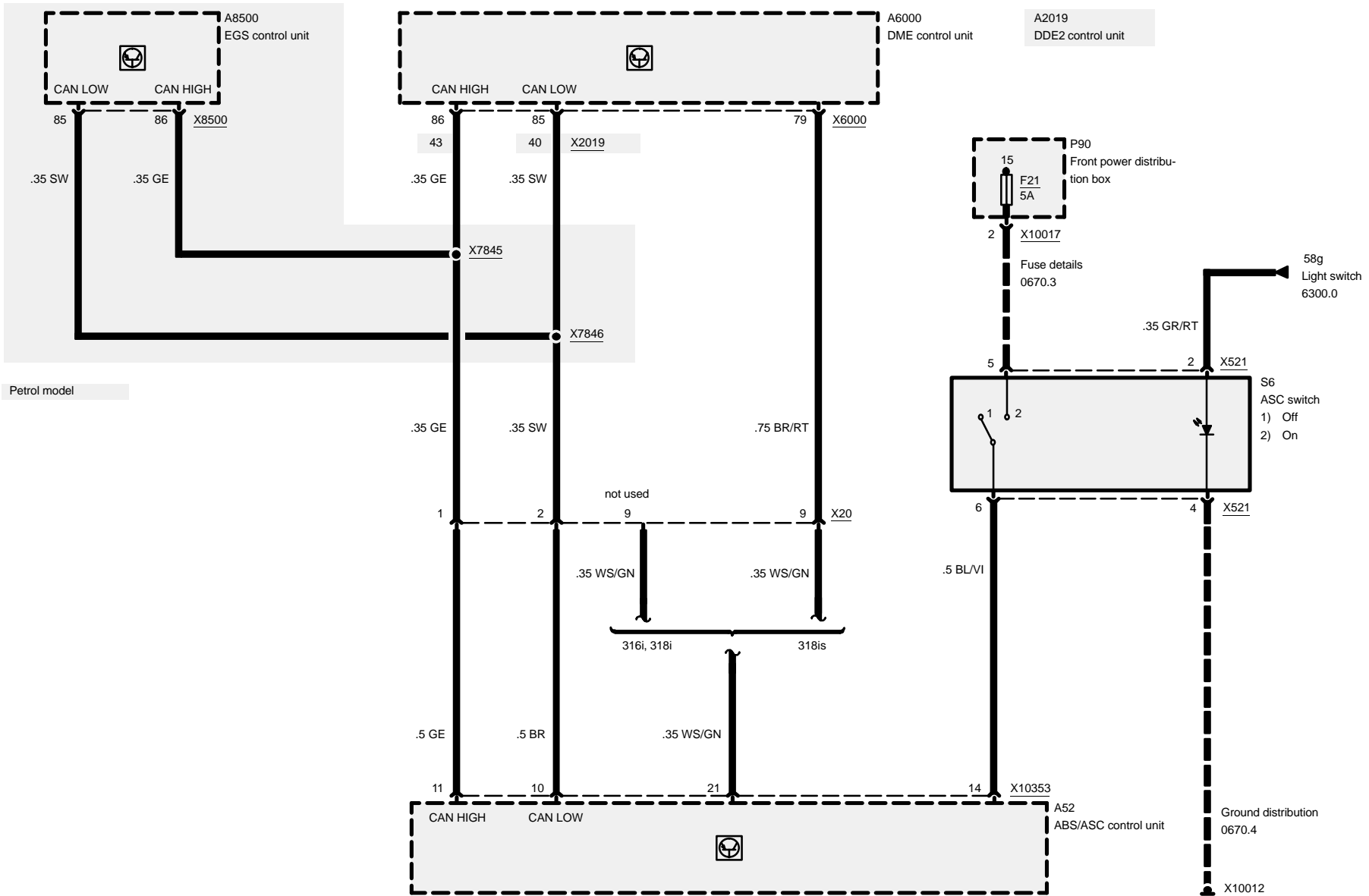
4-cylinder and Diesel Later production





# Automatic stability control (ASC)

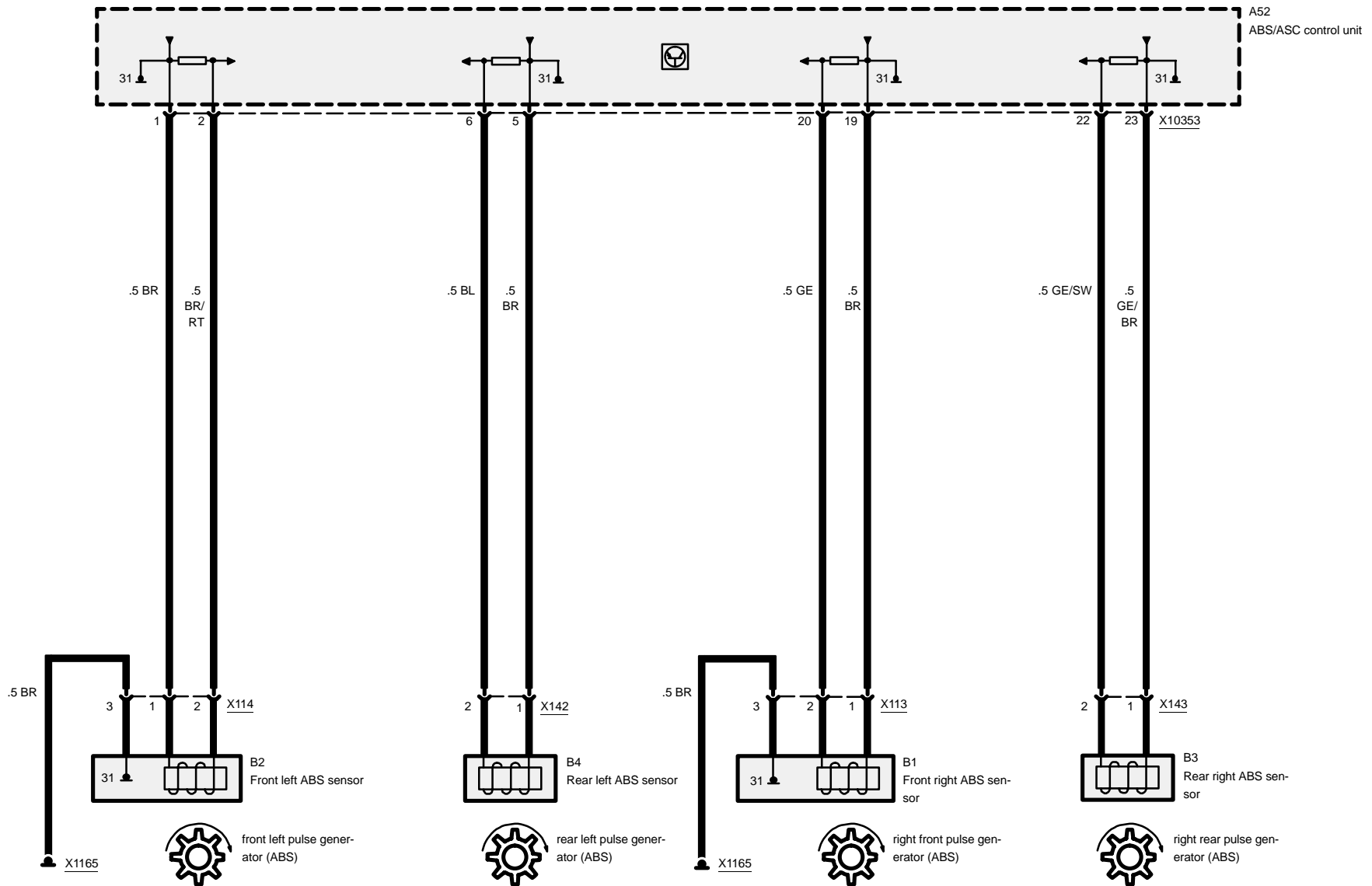
## 4-cylinder and Diesel Later production





# Automatic stability control (ASC)

4-cylinder and Diesel Later production

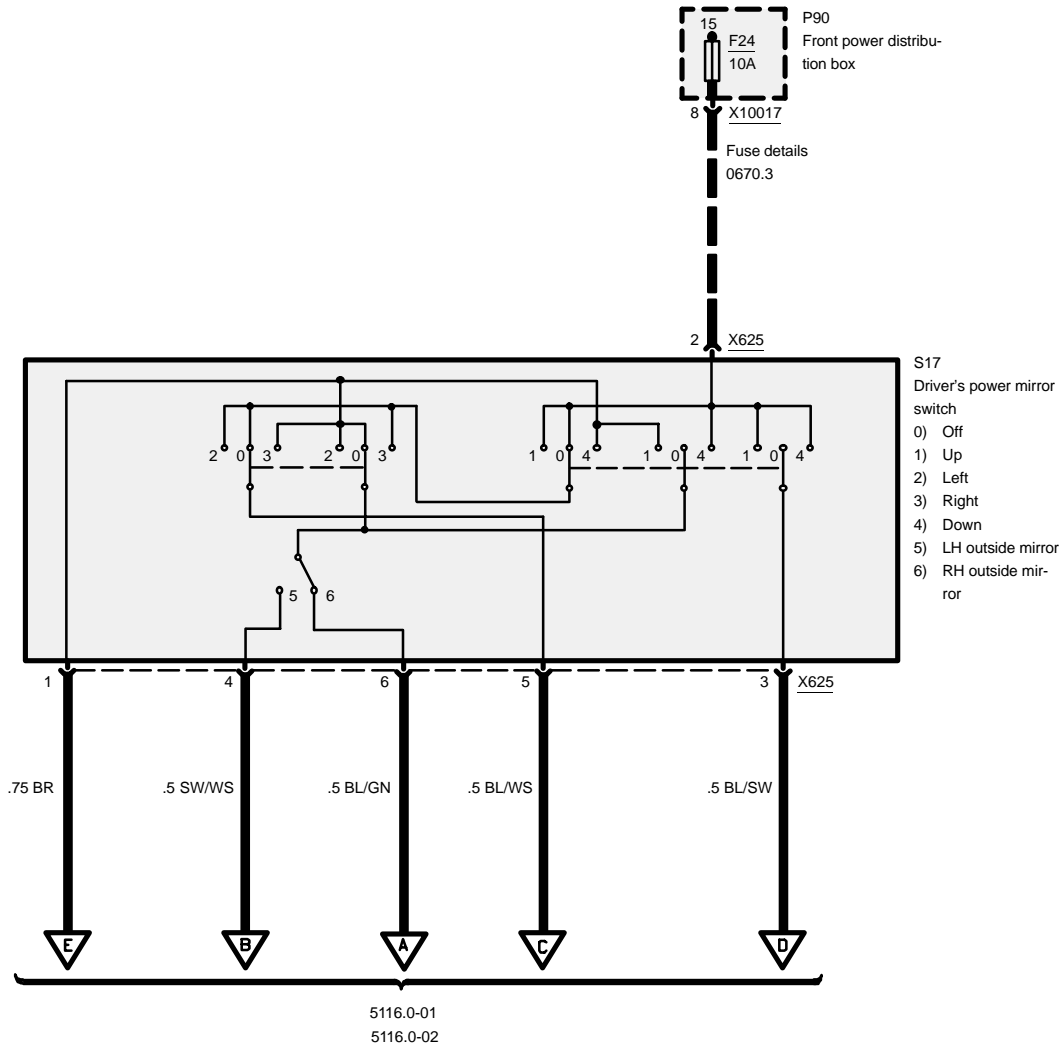






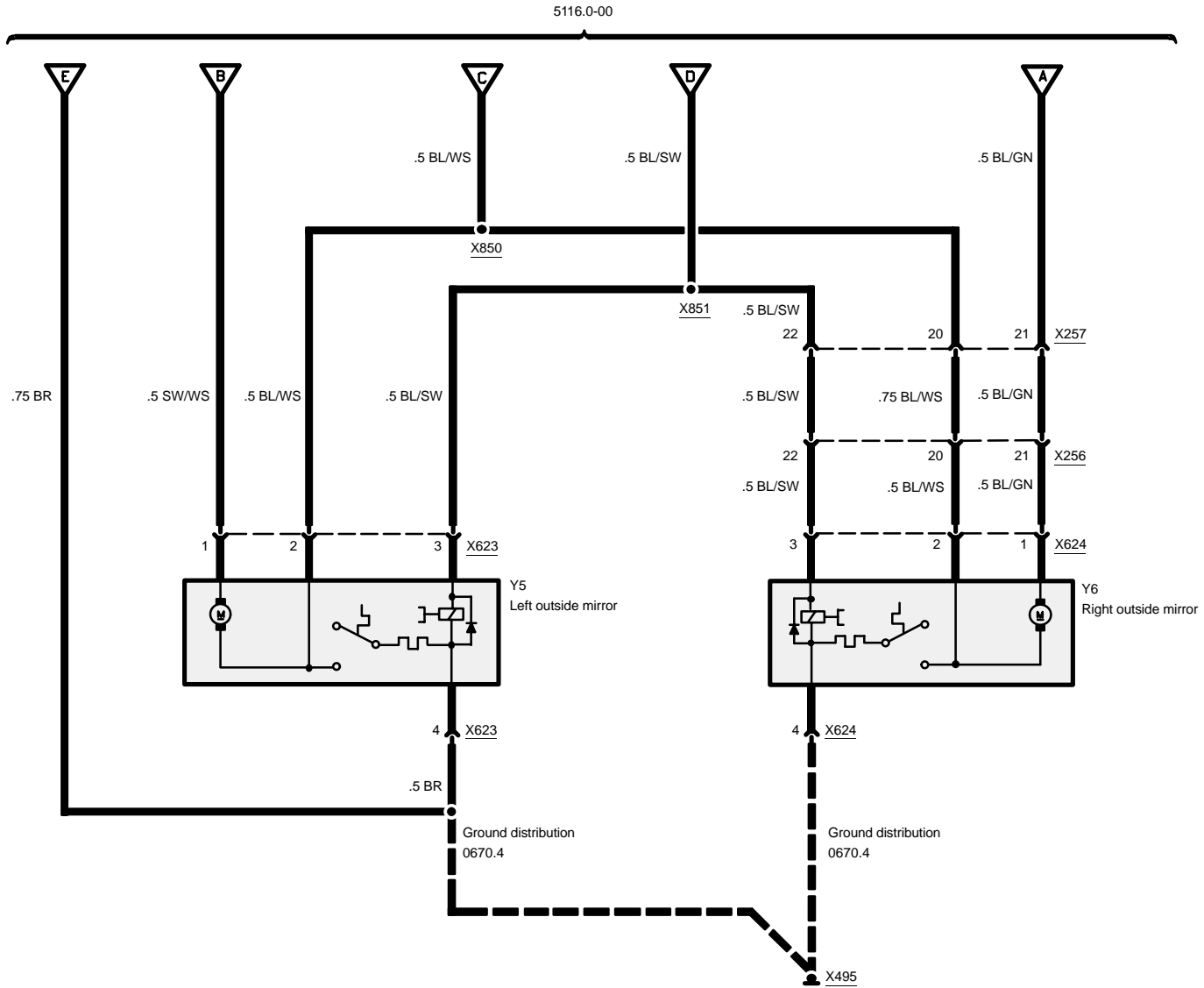
# 5116.0 Power mirrors

## Outside mirror



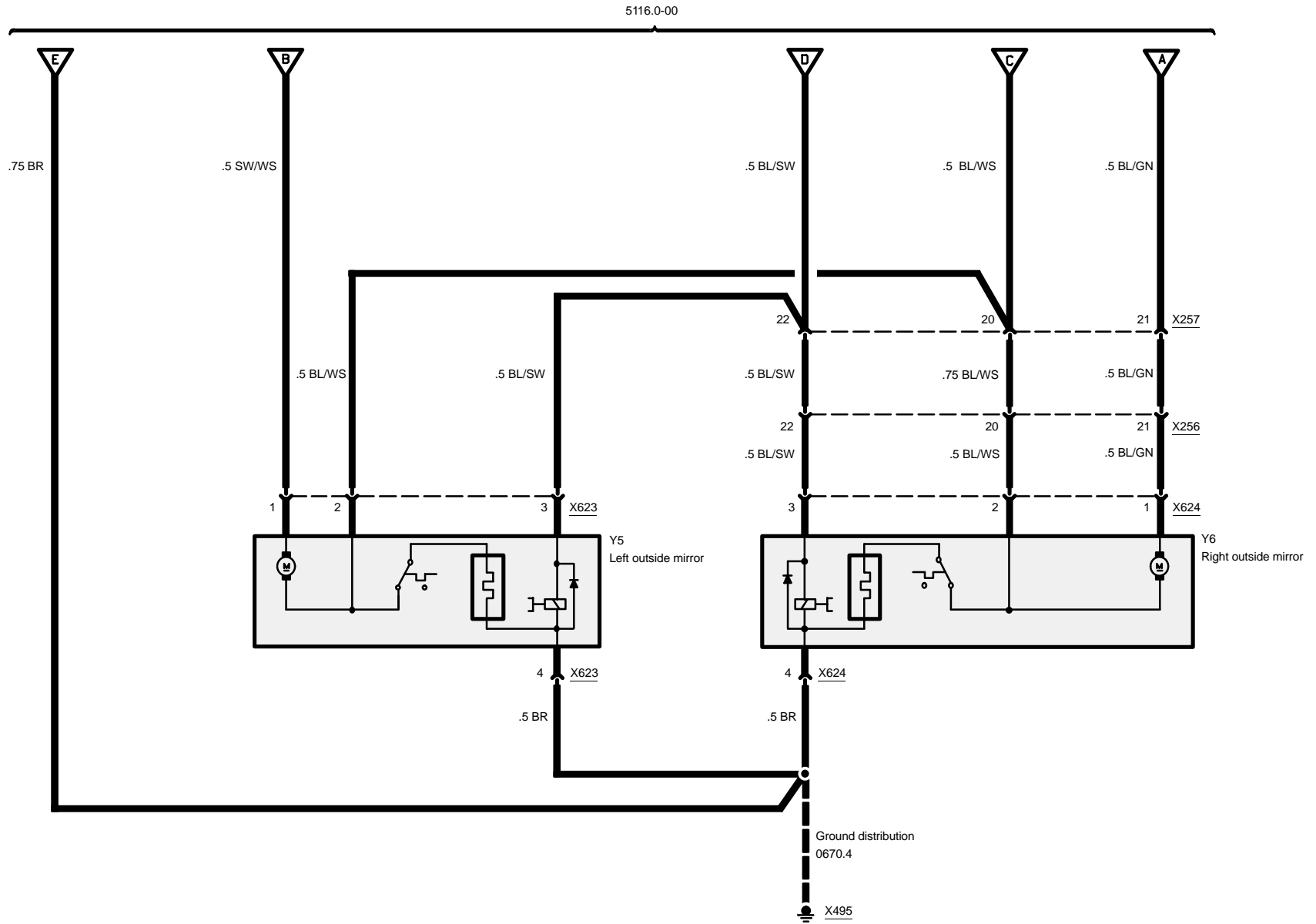


# Power mirrors





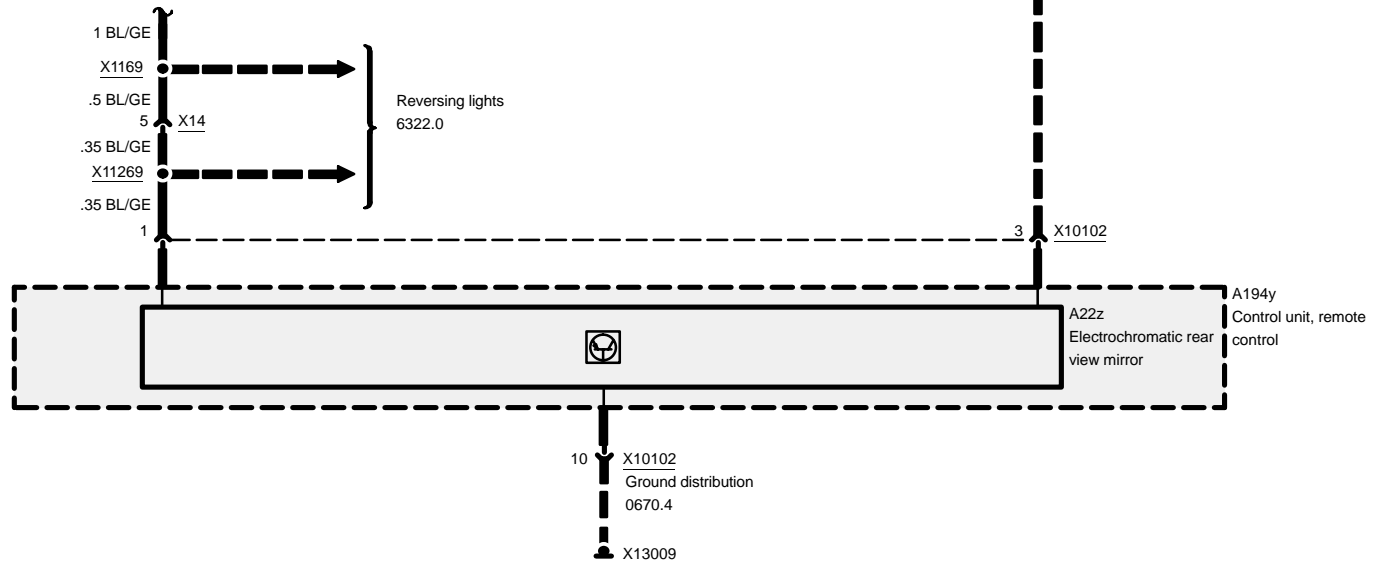
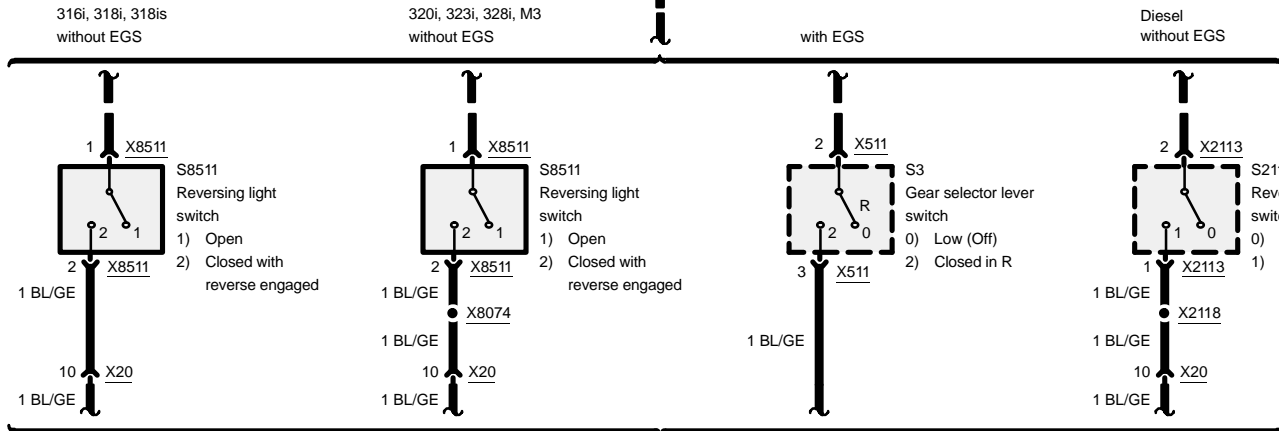
# Power mirrors





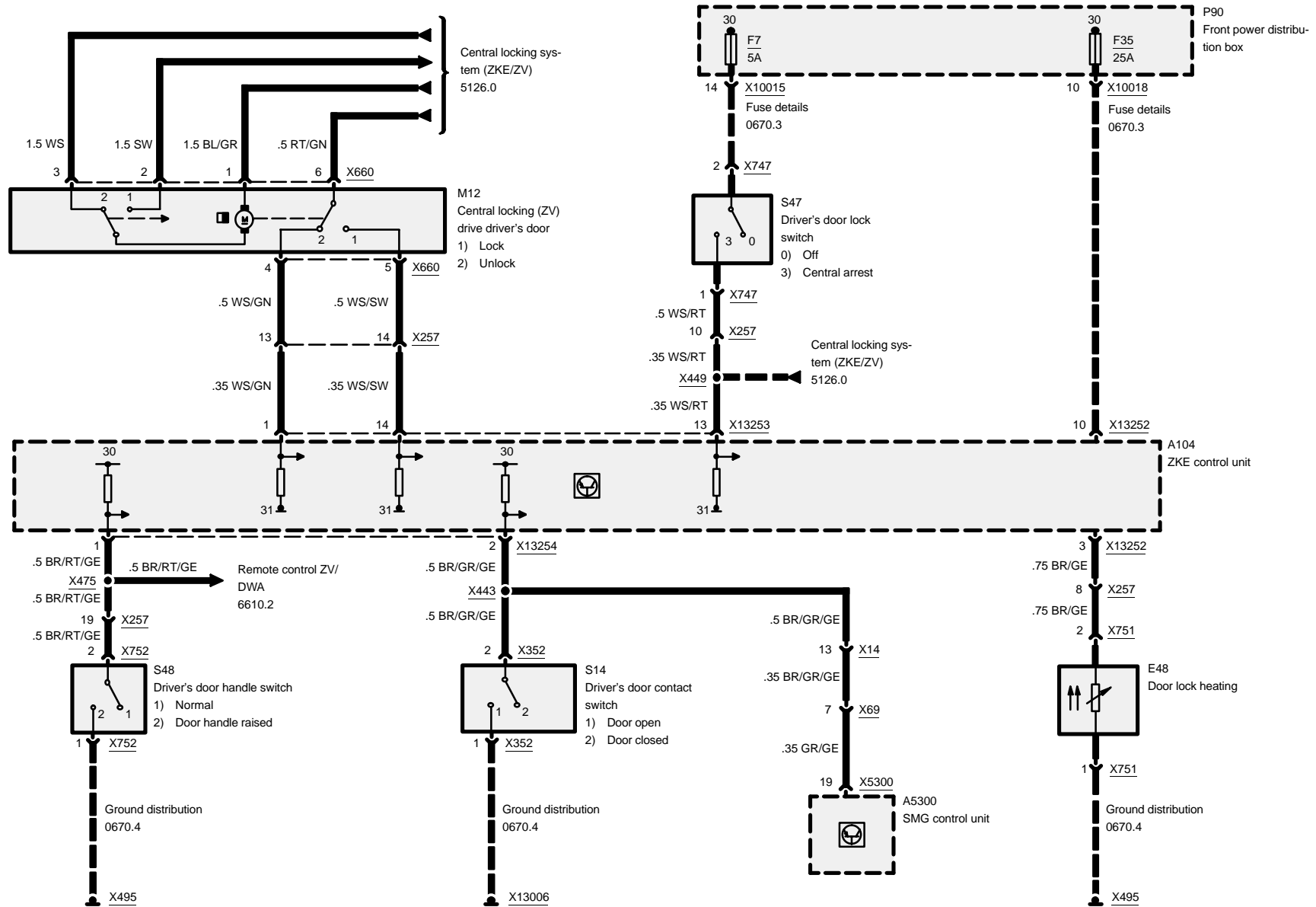
# Power mirrors

## Interior rear-view mirror



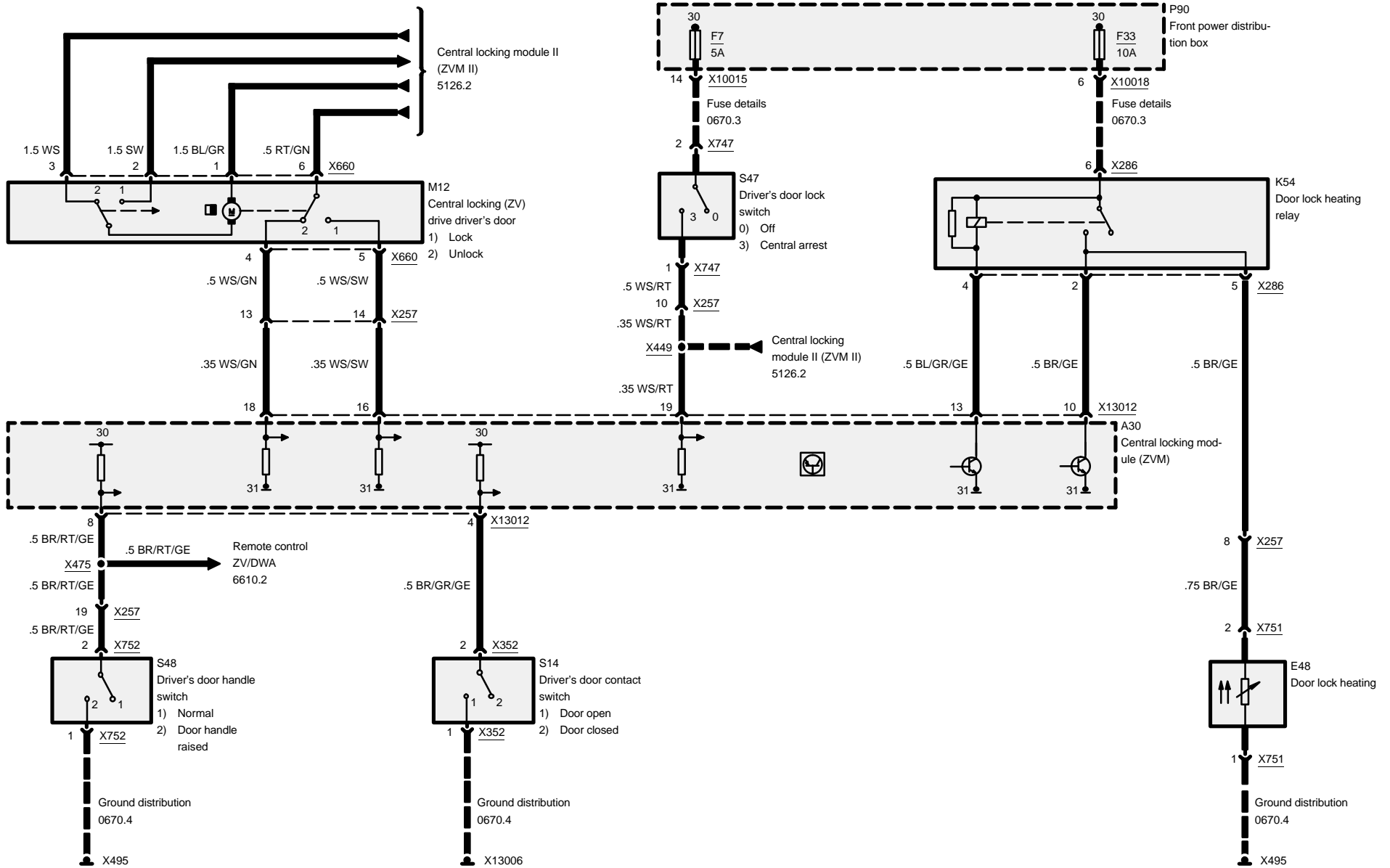


# 5120.0 Door lock heating (ZKE/TSH)





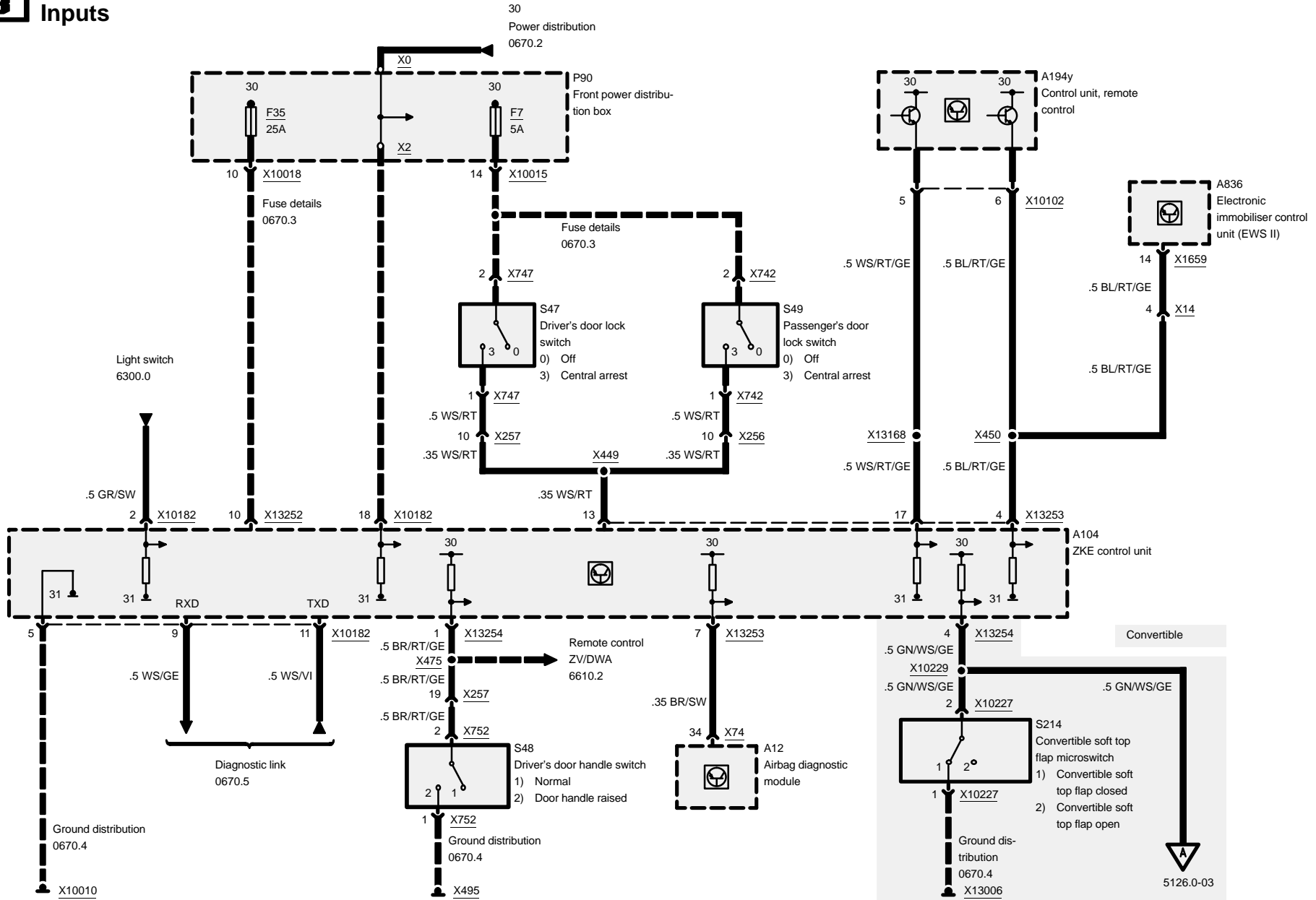
# 5120.1 Door lock heating (ZVM/TSH)





# 5126.0 Central locking system (ZKE/ZV)

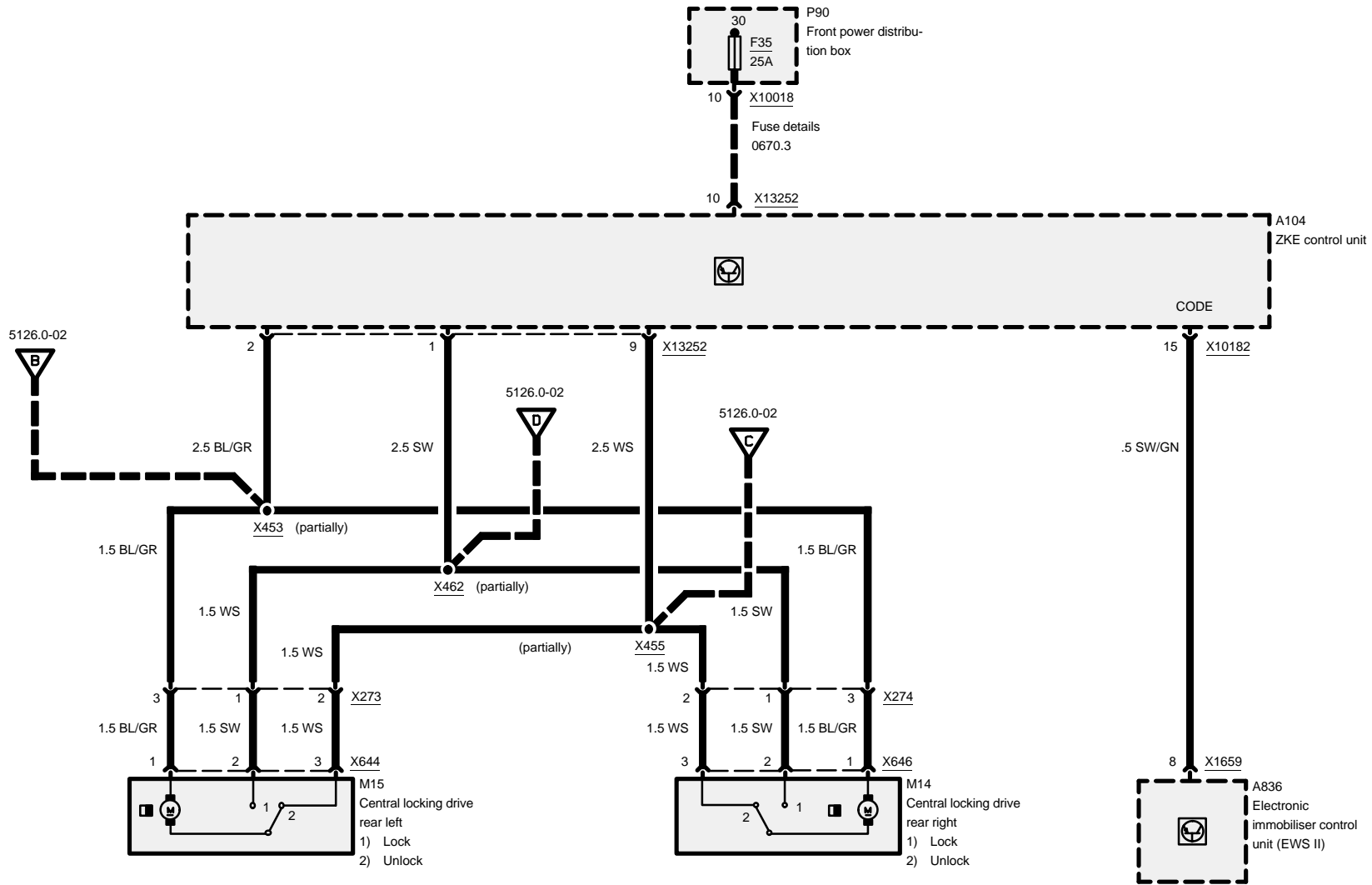
## Inputs





# Central locking system (ZKE/ZV)

## Outputs

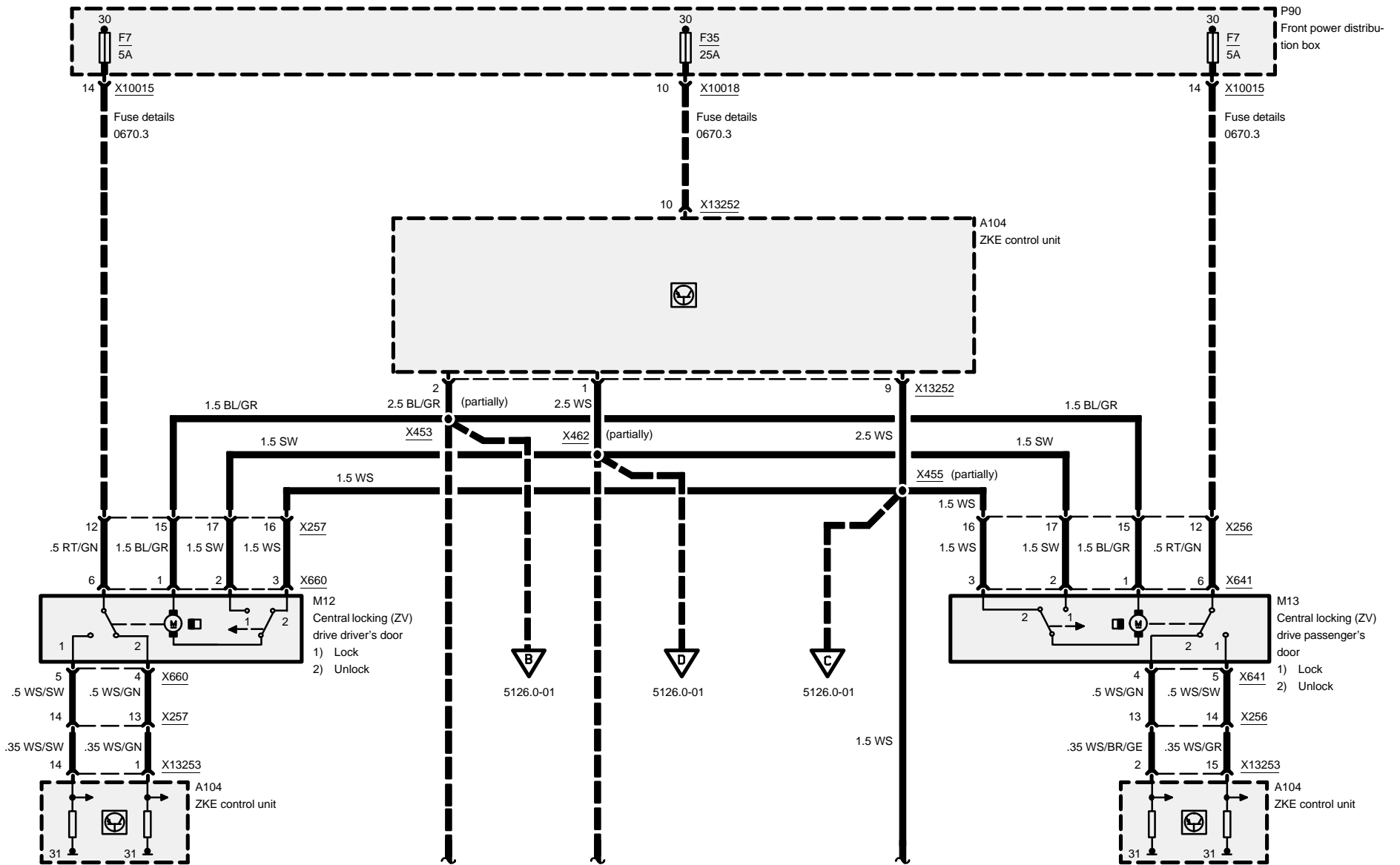


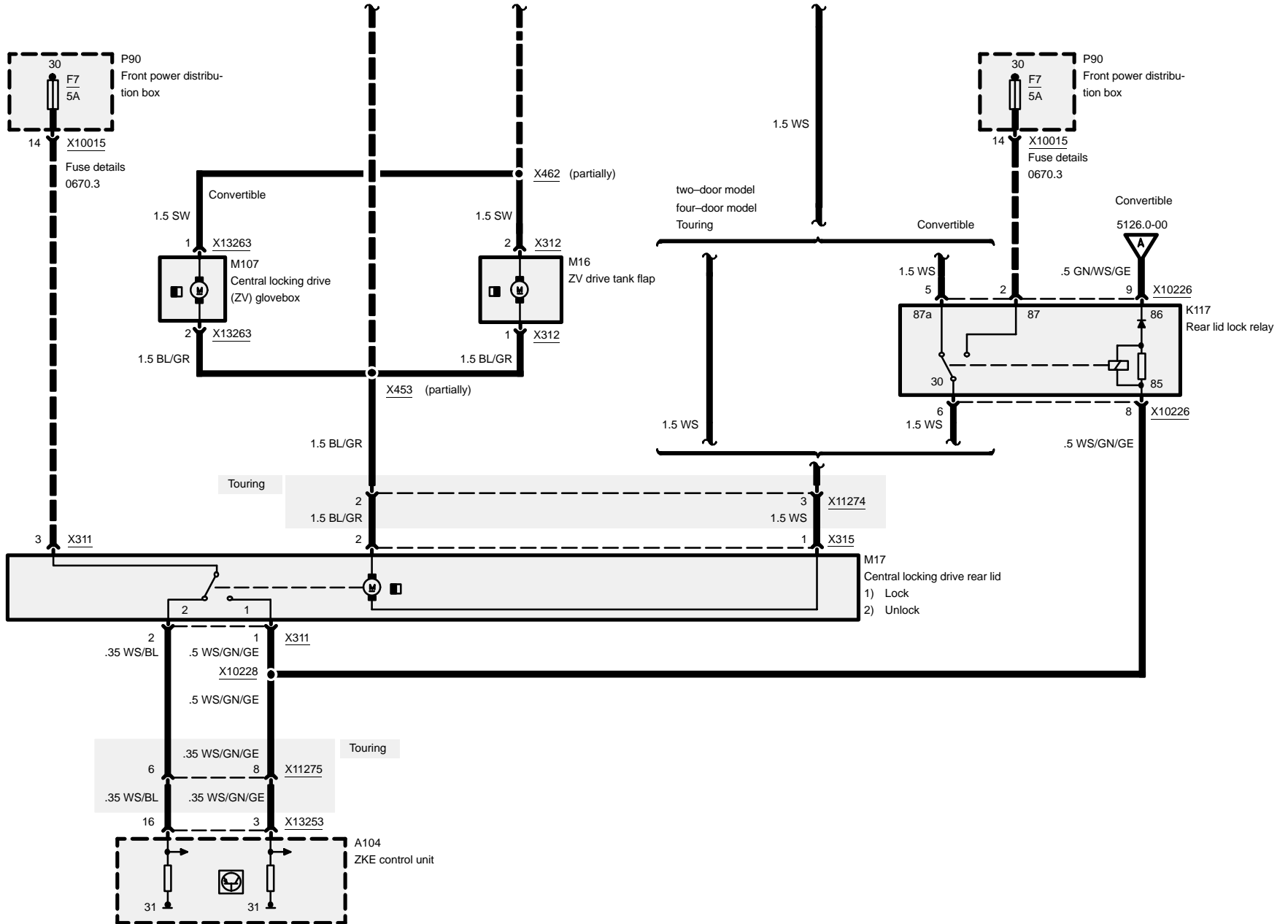


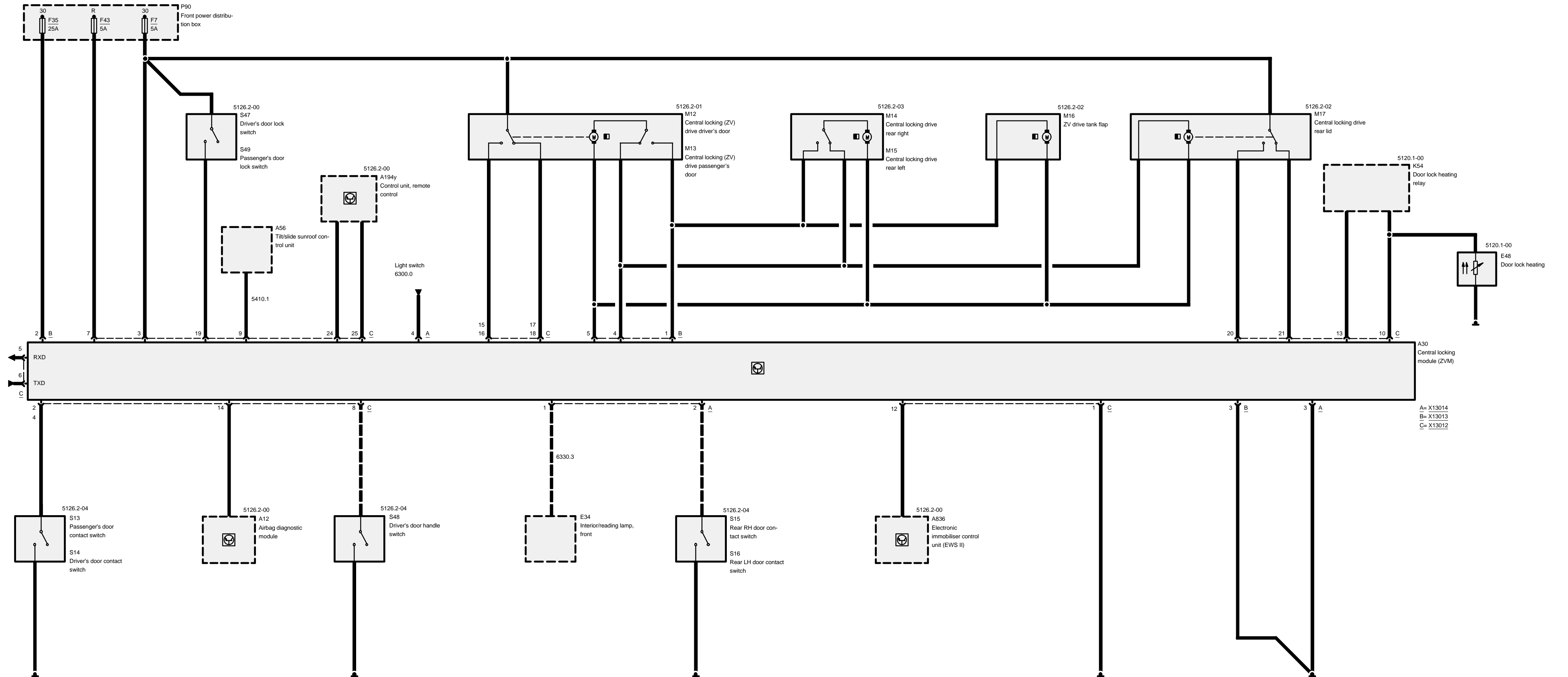


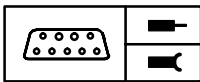
# Central locking system (ZKE/ZV)

## Outputs





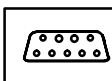




## Pin assignments

### X13012

Pin	Type	Description/Function	Connection
1	M	Ground for electronics	Ground connection
2	E	Passenger's door contact	Door contact
3	E	B+ for electronics	Fuse 7
4	E	Driver's door contact	Door contact
5	A	RxD diagnostic link	Diagnostic connector
6	E/A	TxD diagnostic link	Diagnostic connector
7	E	Ignition lock, terminal R	Fuse 43
8	E	Door handle contact	Microswitch on door handle
9	A	Output for sunroof	Control unit, slide-tilt sunroof
10	E	Heating signal	Relay, door lock heating
11		not used	
12	A	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
13	A	Activation, door lock heating	Relay, door lock heating
14	E	Crash signal	Airbag diagnostic module
15	E	Pin contact, passenger's door	Central locking drive
16	E	Pin contact, driver's door	Central locking drive
17	E	Pin contact, passenger's door	Central locking drive
18	E	Pin contact, driver's door	Central locking drive
19	E	Lock switch for fuse	Lock switch
20	E	Pin contact, trunk lid locked	Central locking drive
21	E	Pin contact, trunk lid unlocked	Central locking drive
22		not used	
23		not used	
24	E	Interface for locking system	Control unit remote control
25	E	Interface for locking system	Control unit remote control
26		not used	



## Pin assignments

### X13013

Pin	Type	Description/Function	Connection
1	A	Double-lock central locking drives	Central locking drive
2	E	B+ for central locking drives	Fuse 35, terminal 30
3	E	Ground for central locking drives	Ground connection
4	A	Lock central locking drives	Central locking drive
5	A	Unlock central locking drives	Central locking drive

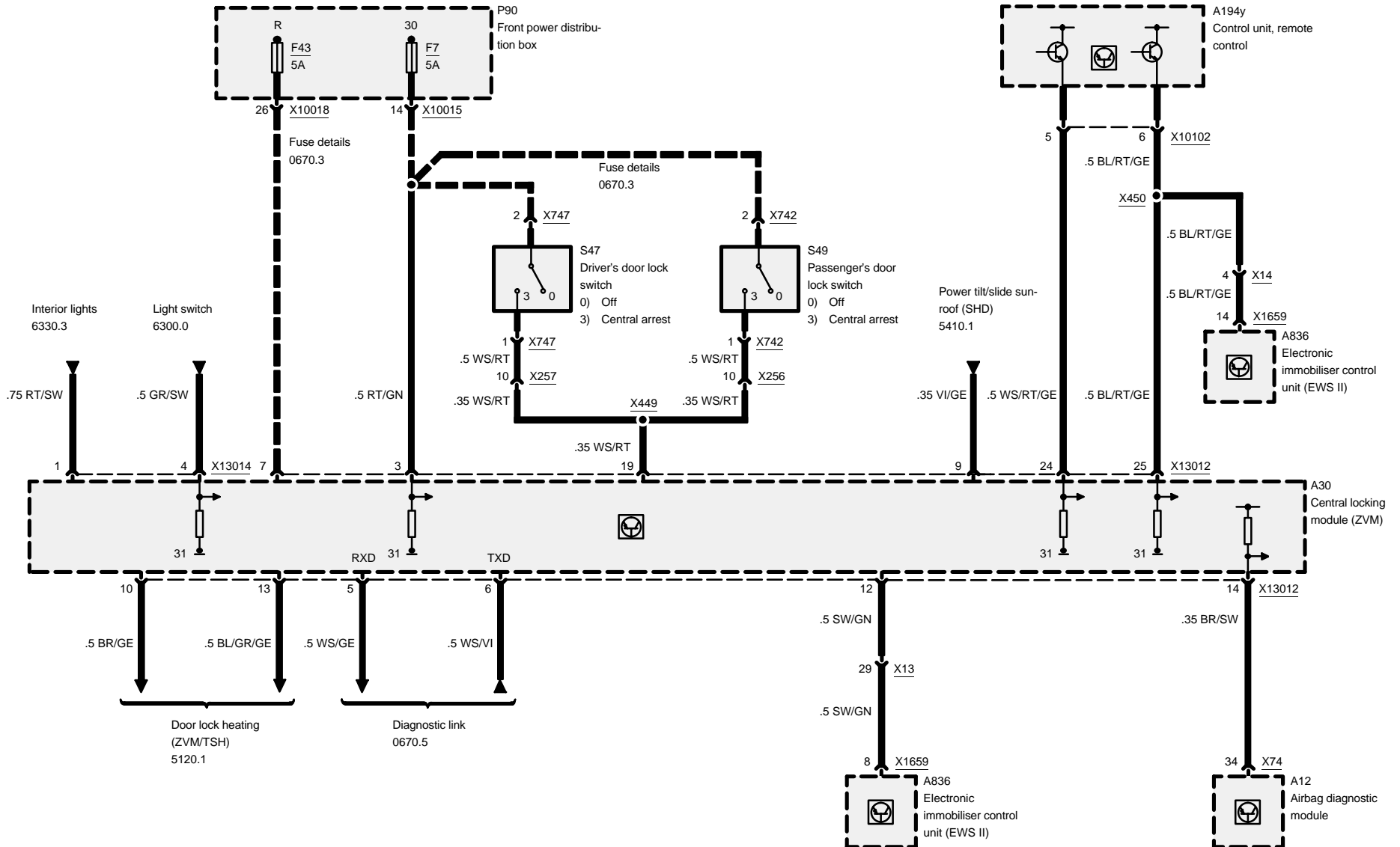
### X13014

Pin	Type	Description/Function	Connection
1	A	Activation, interior lights	Interior reading light, front
2	E	Door contacts, rear	Door contacts, rear
3	E	Ground for interior lights	Ground connection
4	E	Parking light detection	Light switch



# Central locking module II (ZVM II)

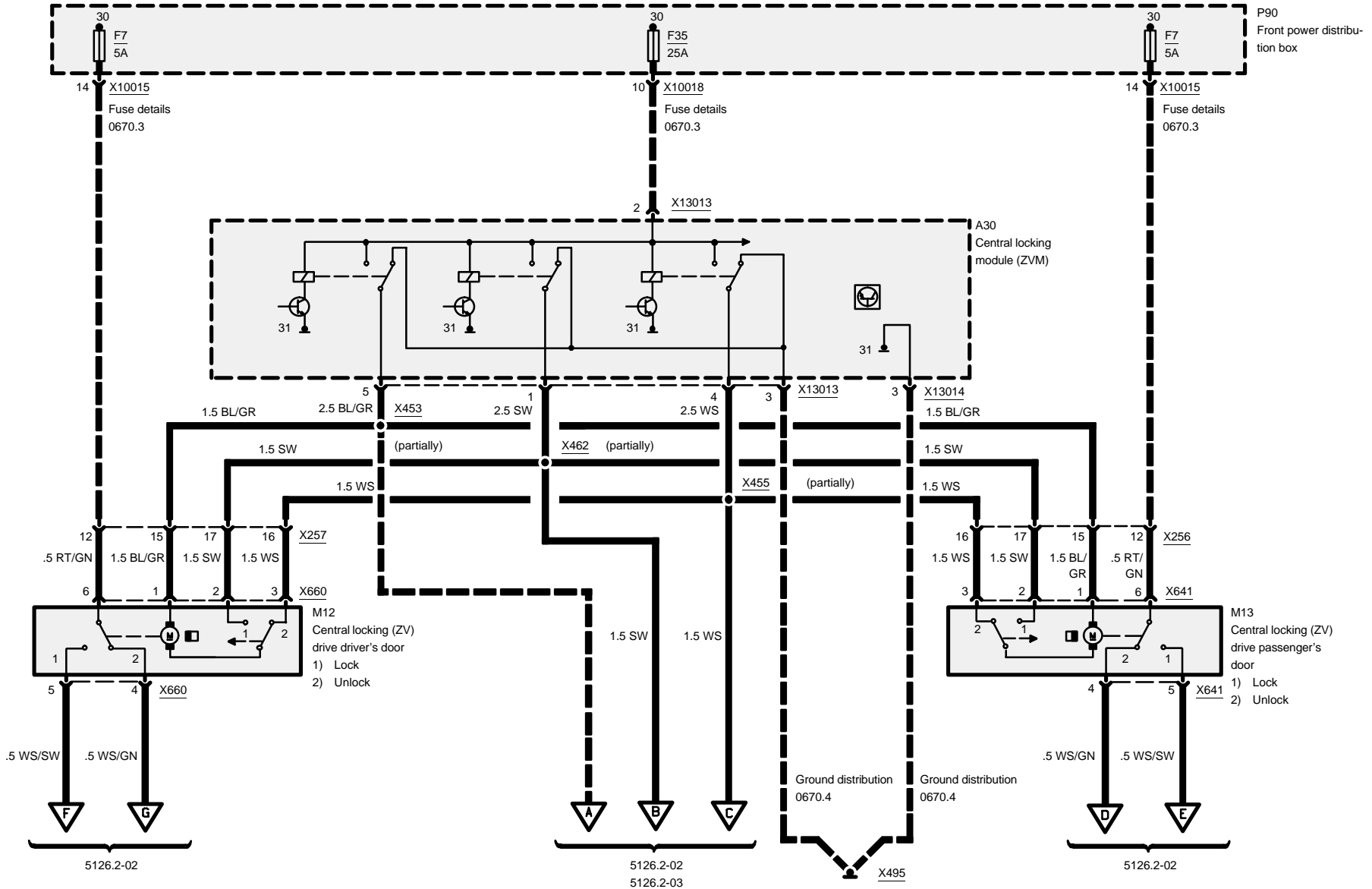
## Inputs





# Central locking module II (ZVM II)

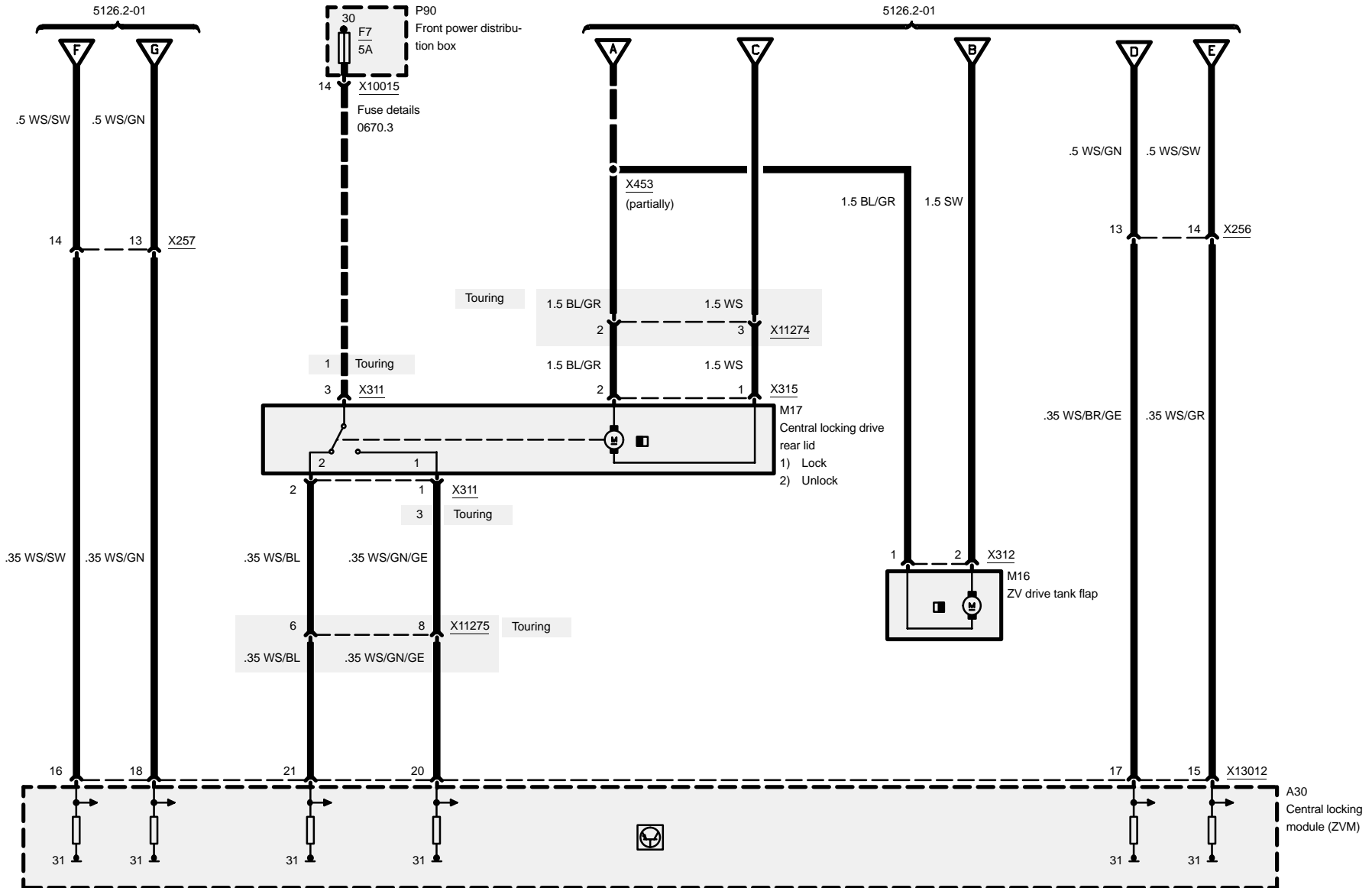
## Outputs





# Central locking module II (ZVM II)

## Outputs

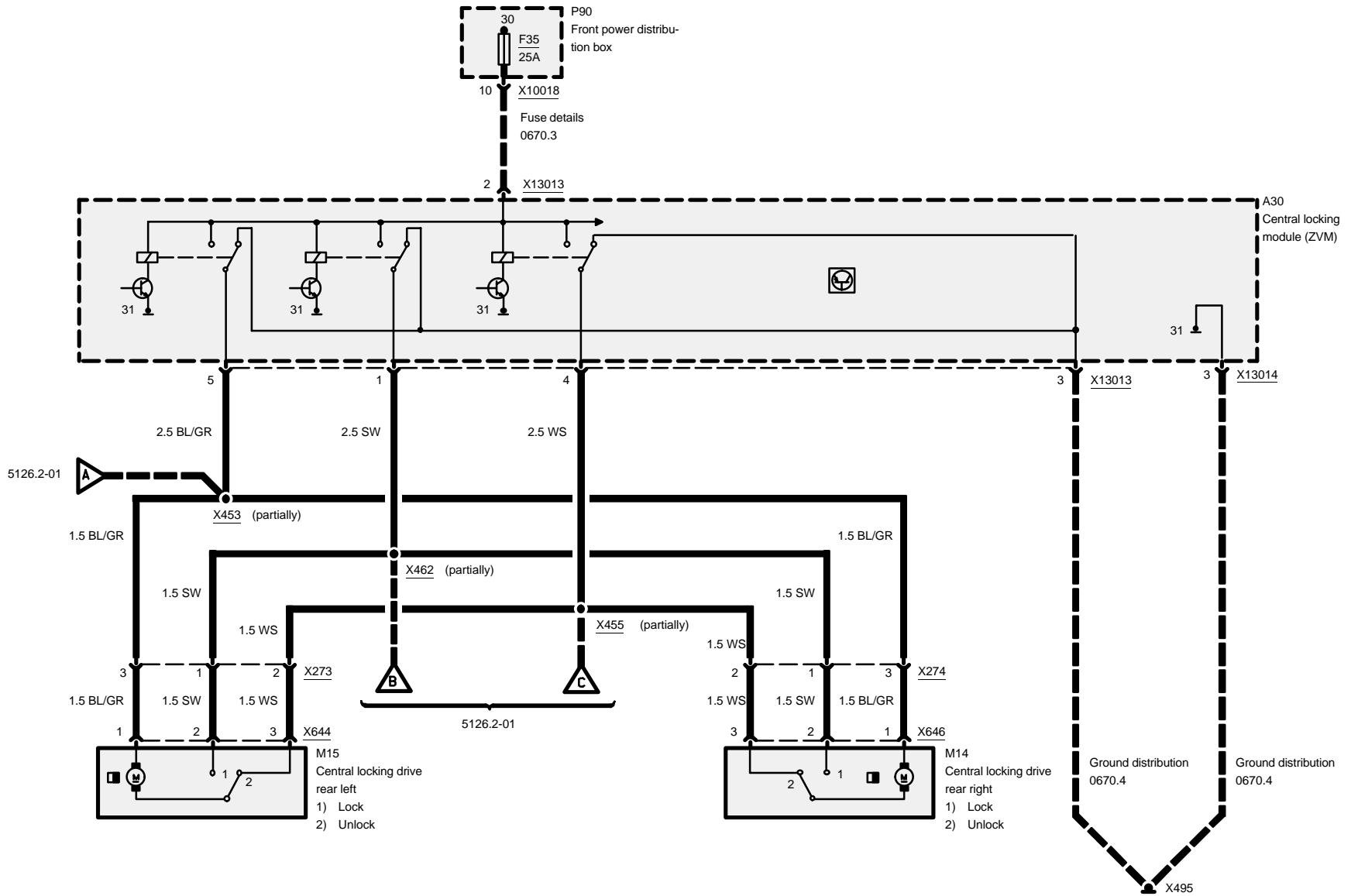






# Central locking module II (ZVM II)

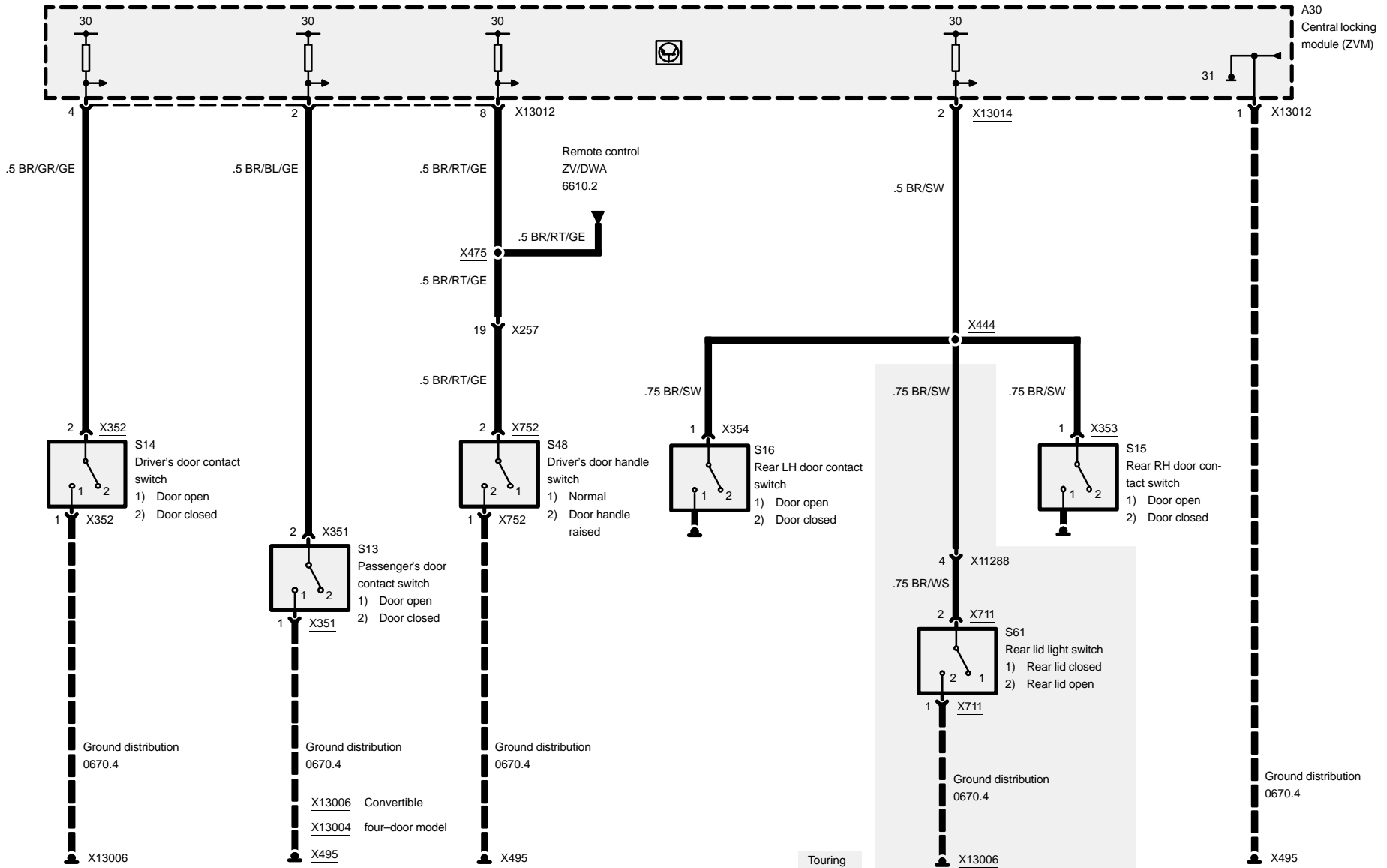
## Outputs





# Central locking module II (ZVM II)

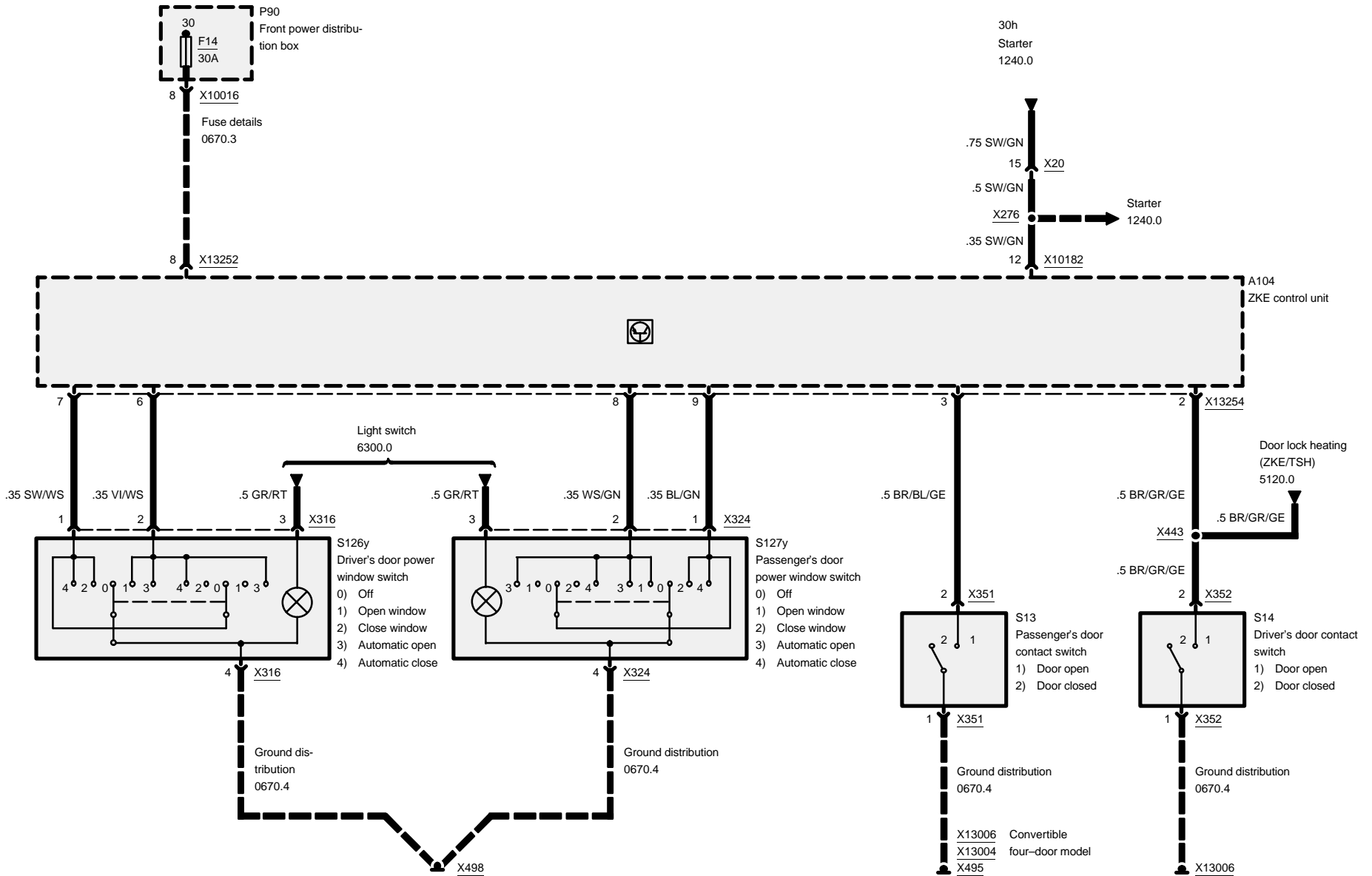
## Inputs





# 5133.0 Power windows (ZKE/FH)

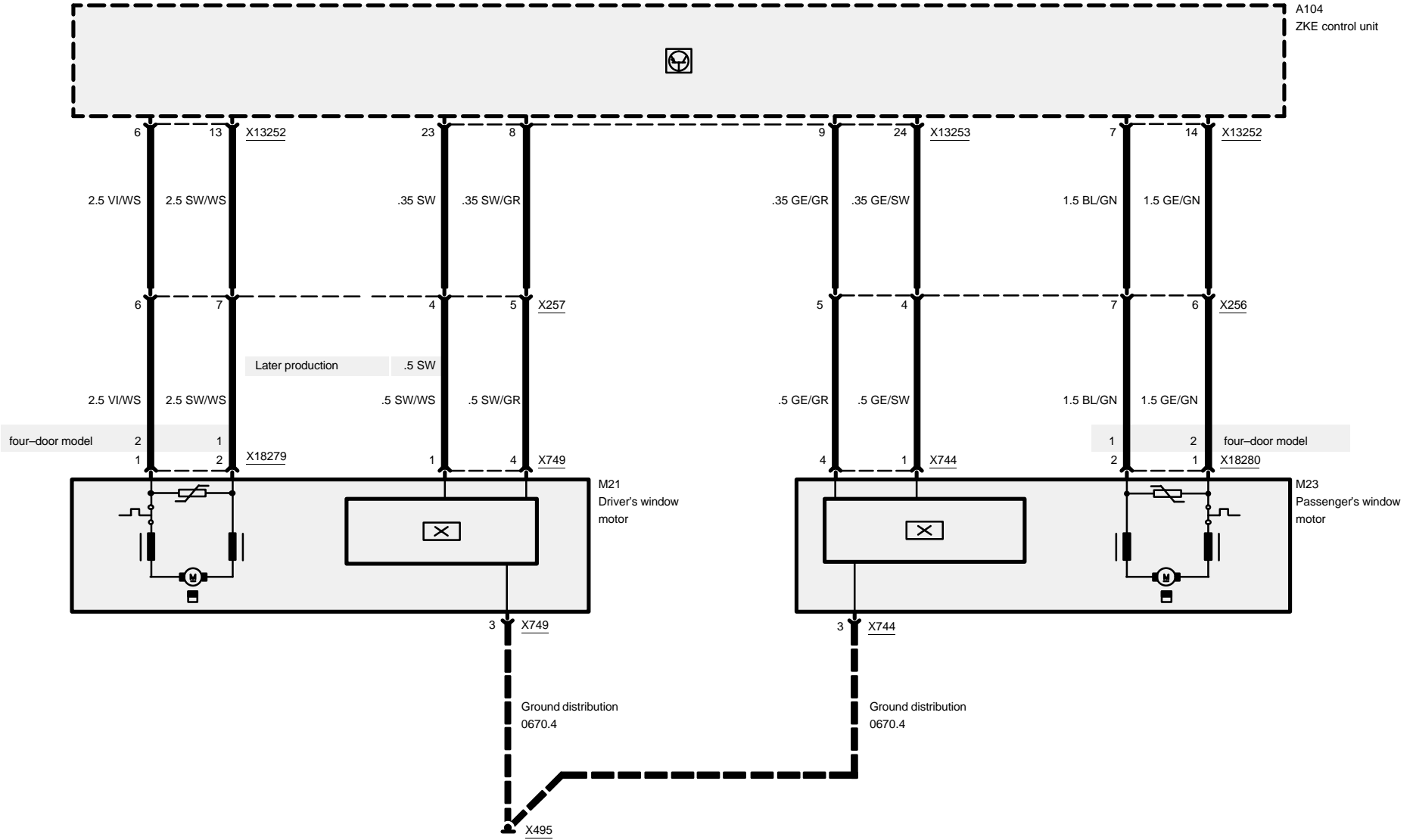
## Front





# Power windows (ZKE/FH)

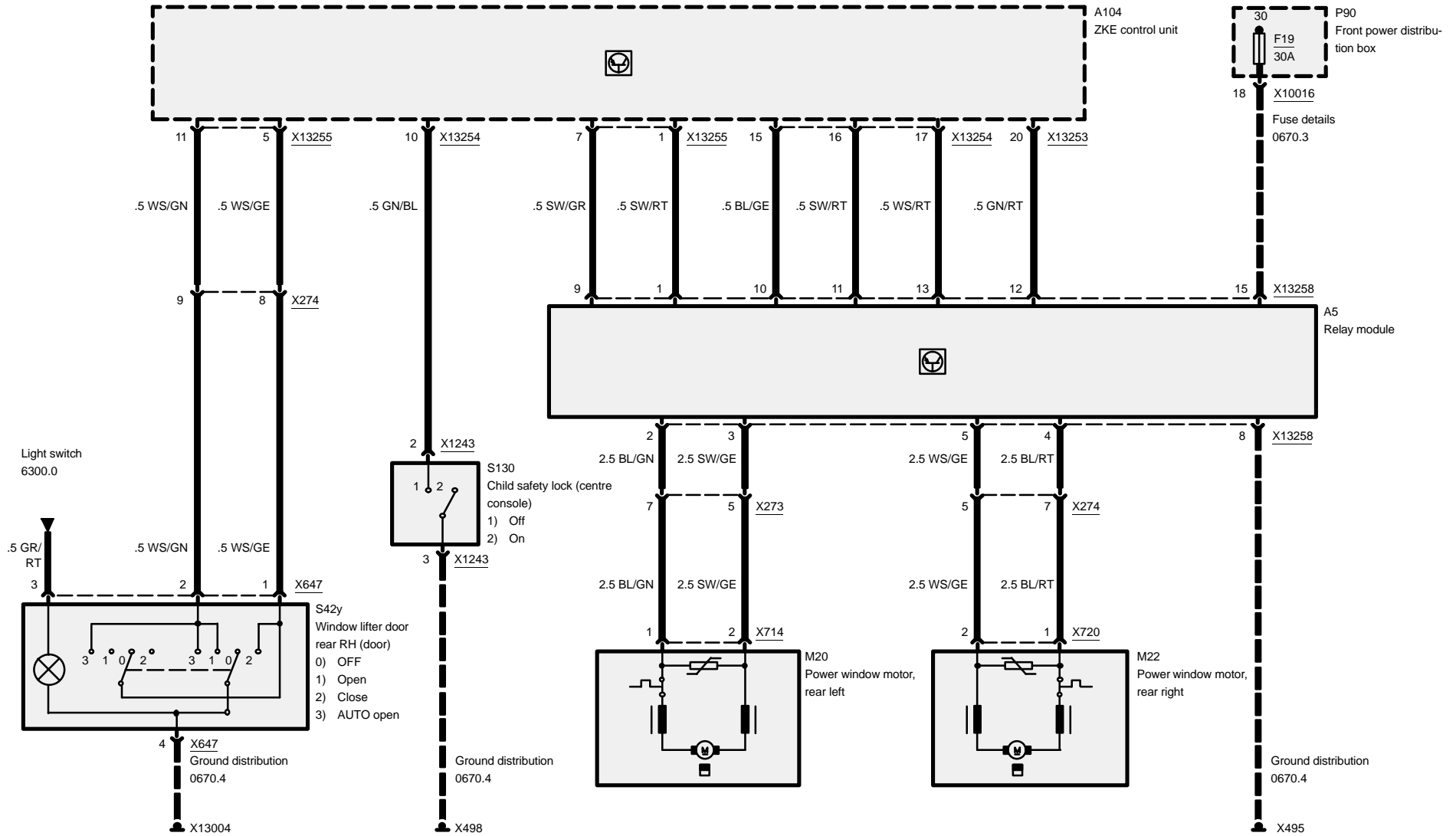
## Front





# Power windows (ZKE/FH)

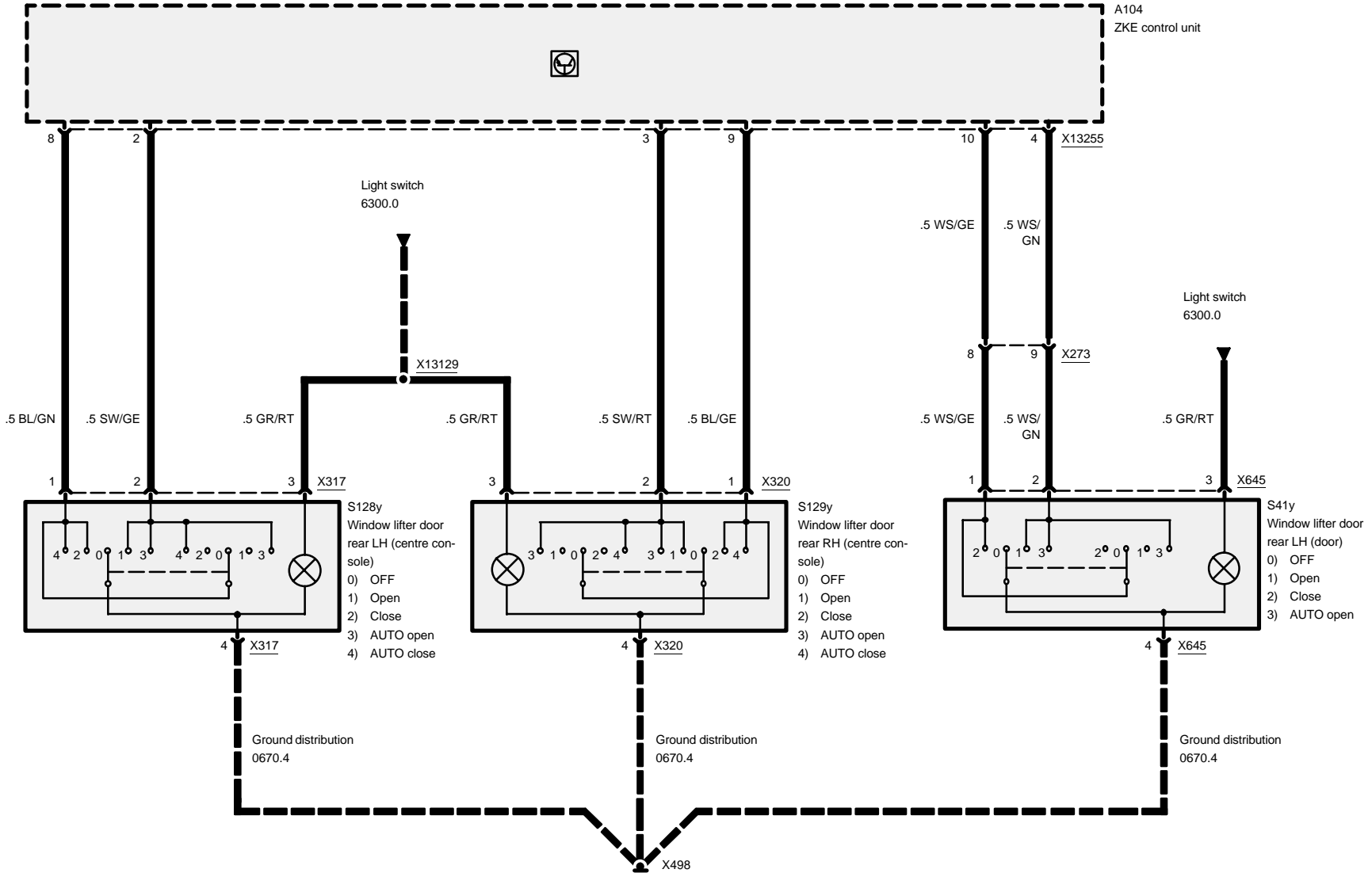
## Rear – four-door model





# Power windows (ZKE/FH)

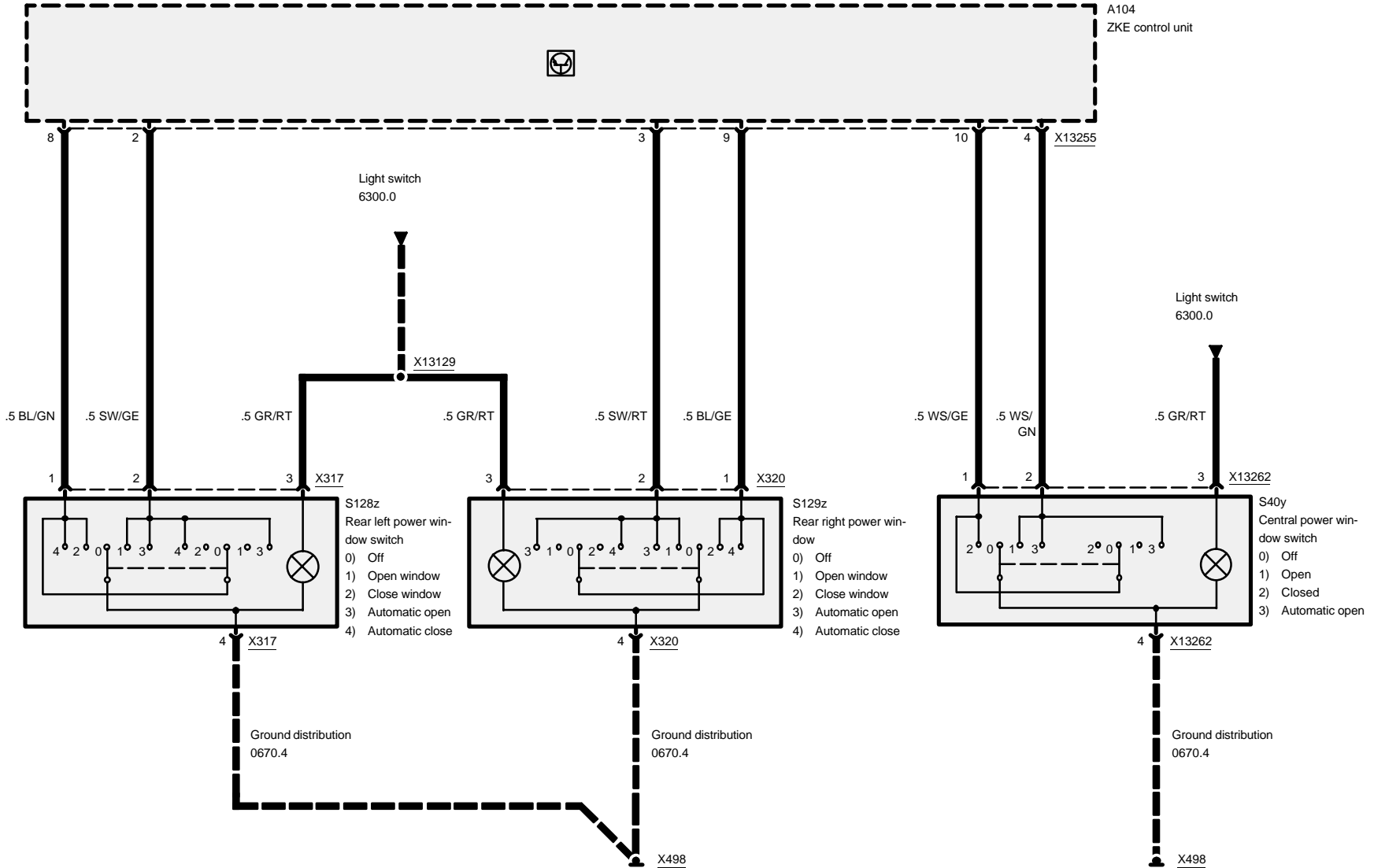
## Rear – four-door model





# Power windows (ZKE/FH)

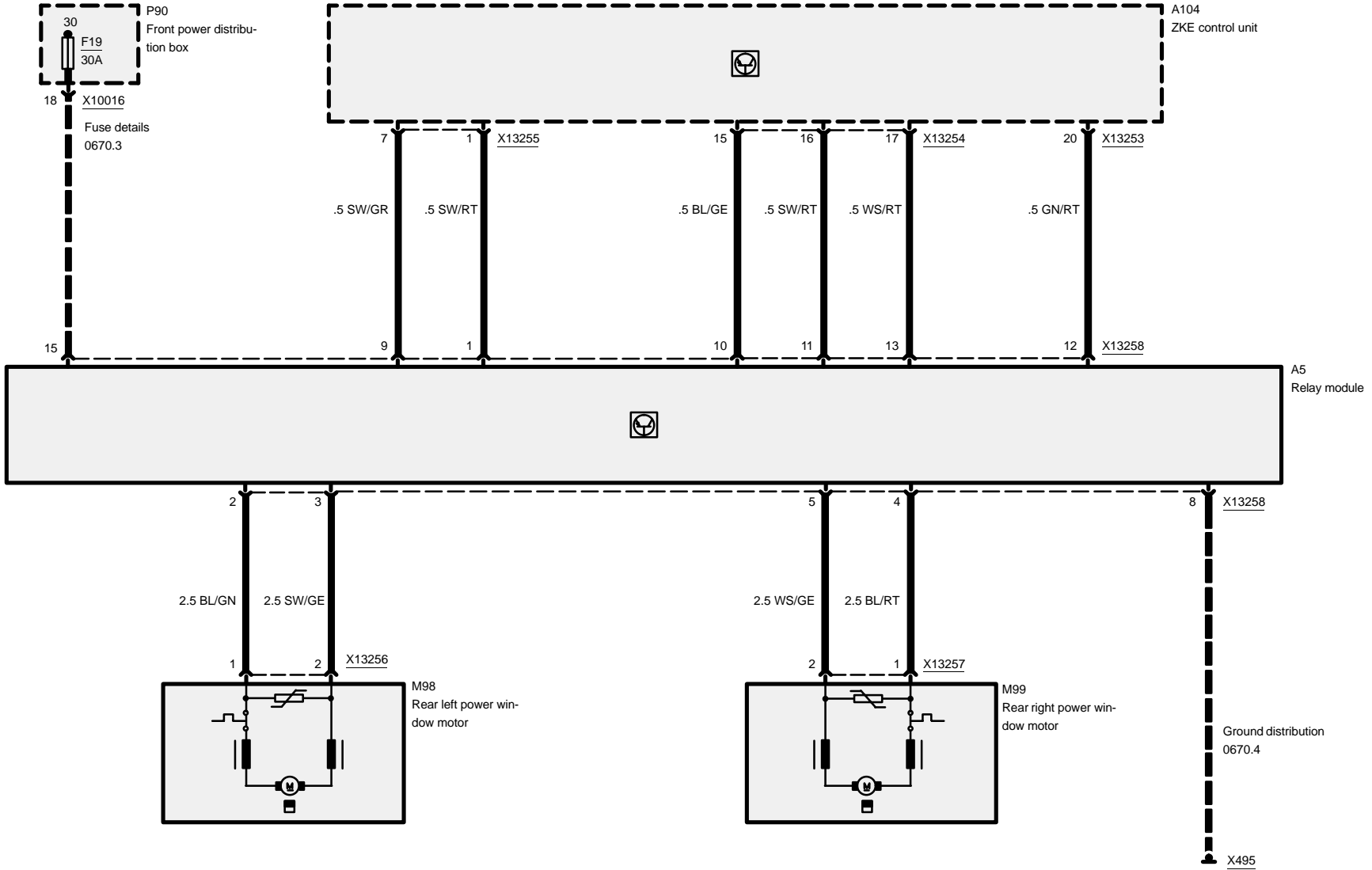
## Rear – Convertible





# Power windows (ZKE/FH)

## Rear – Convertible

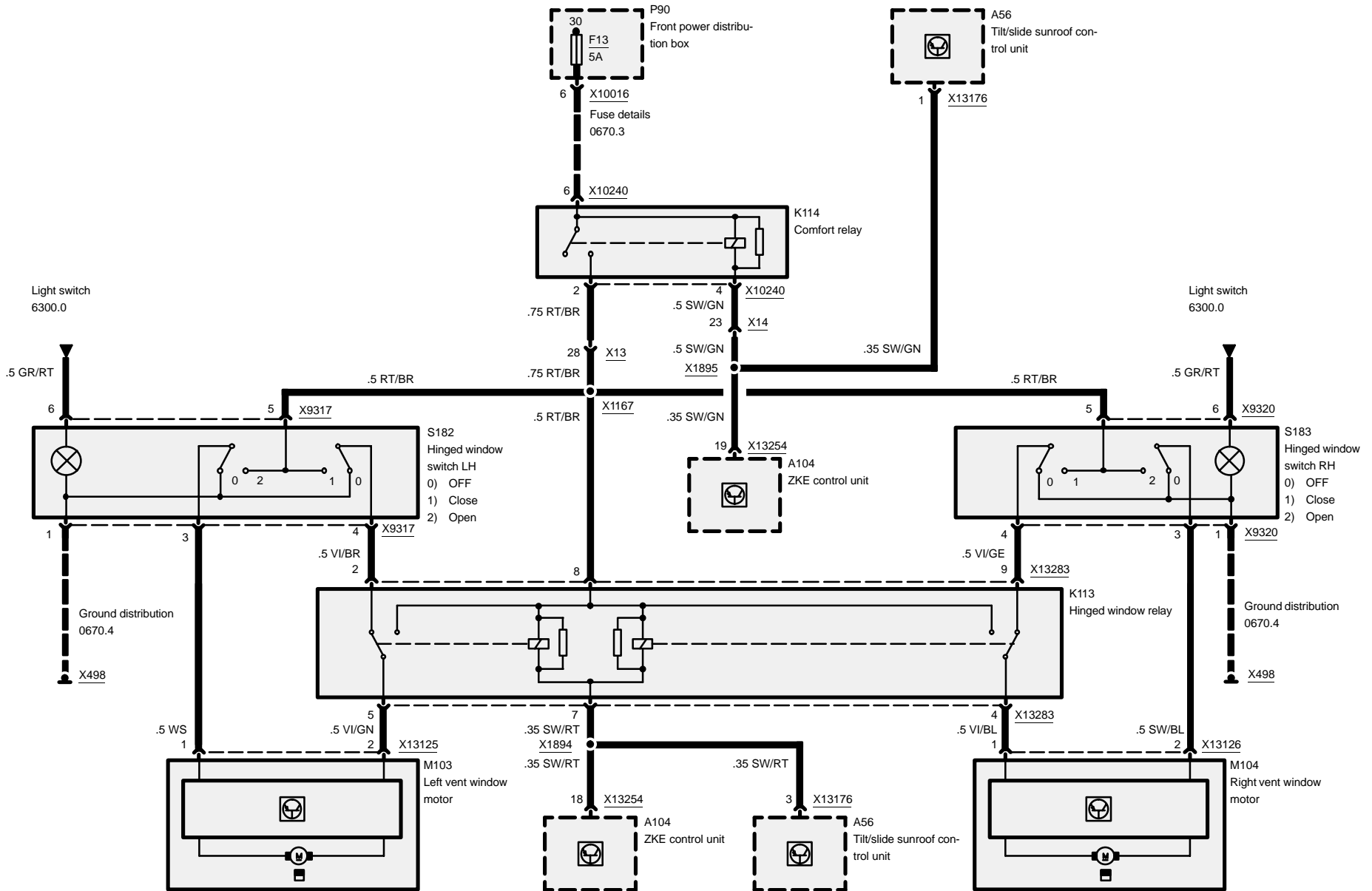






# Power windows (ZKE/FH)

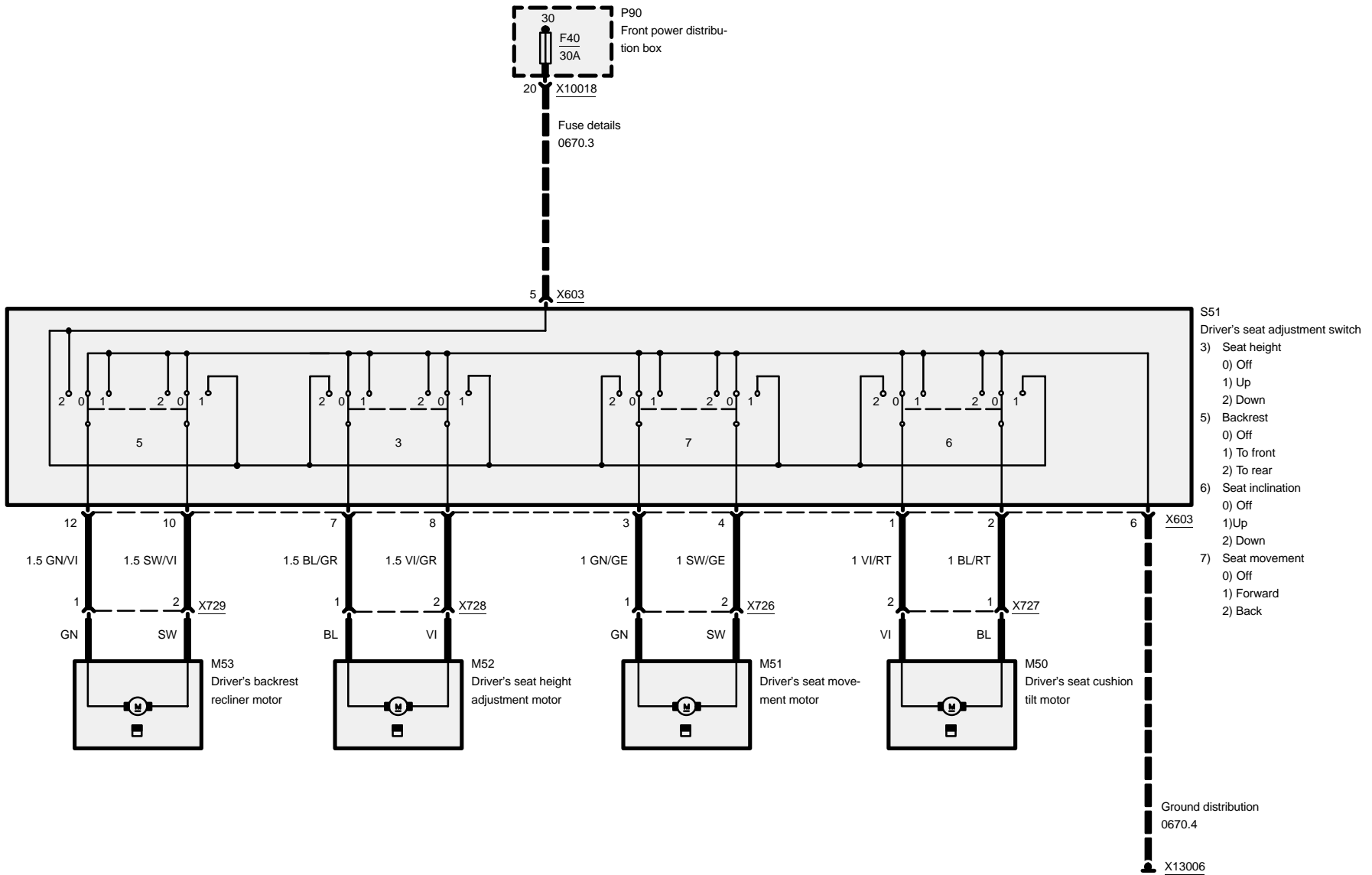
## Power vent window – two-door model





# 5200.2 Electric seat adjustment and lumbar support

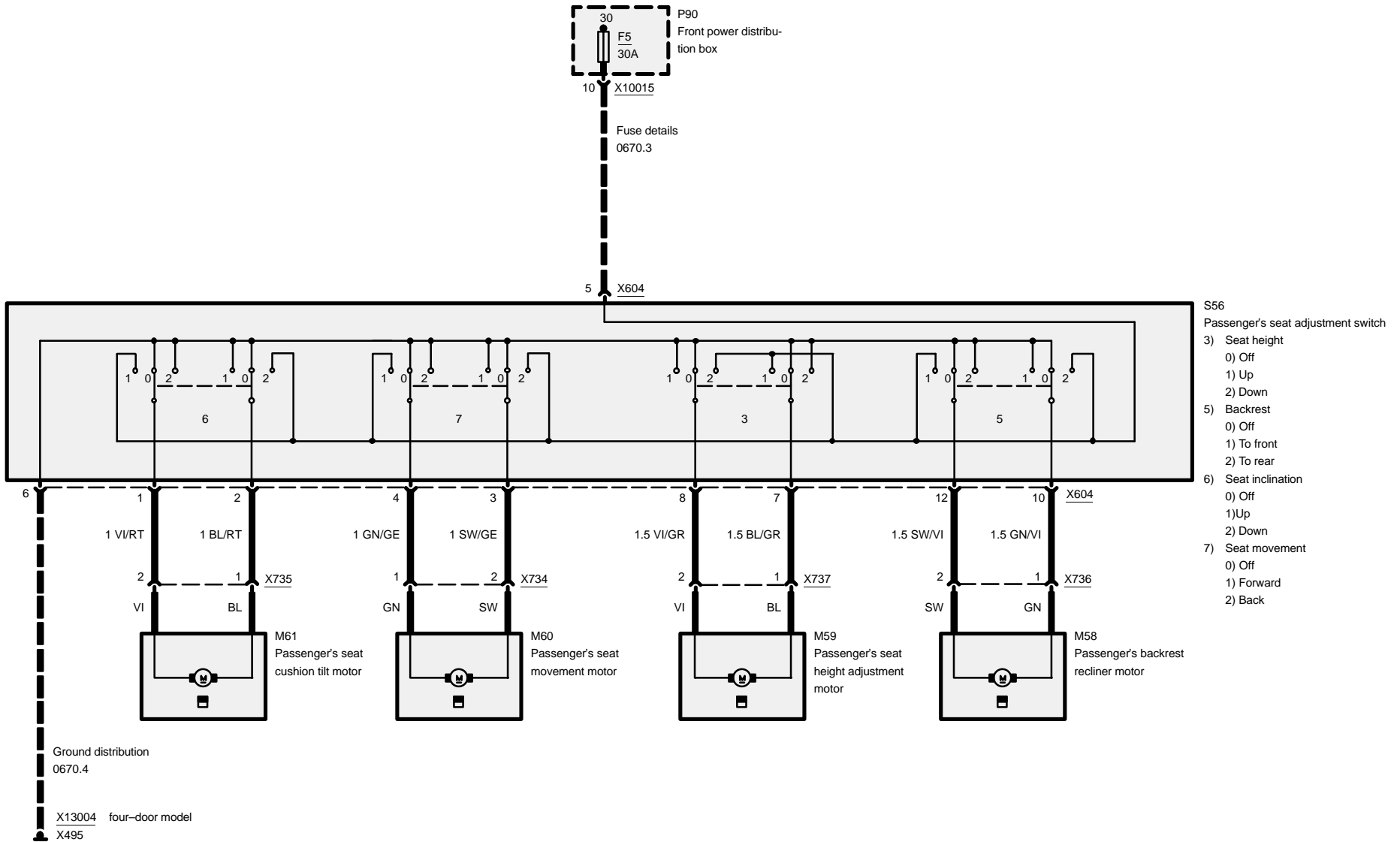
## Driver's seat





# Electric seat adjustment and lumbar support

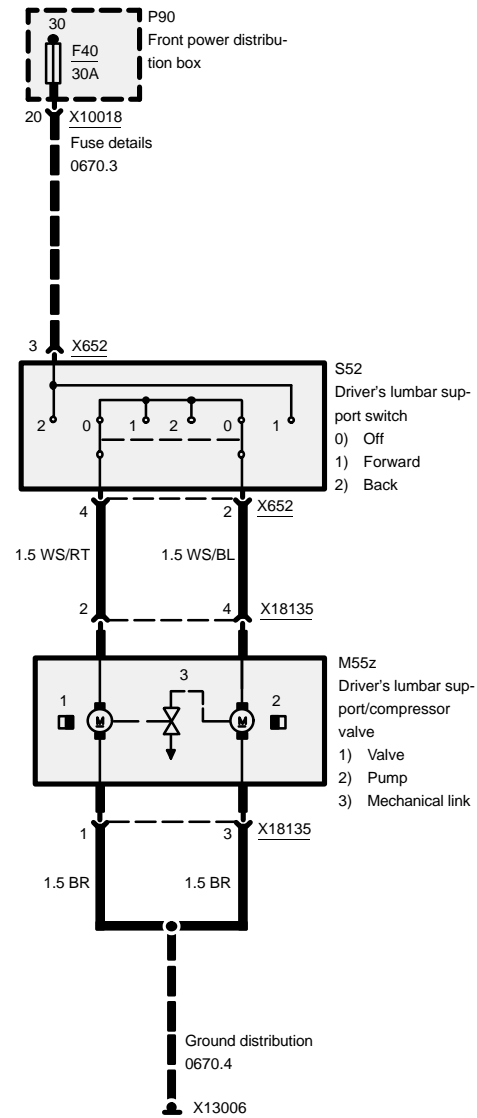
## Passenger's seat





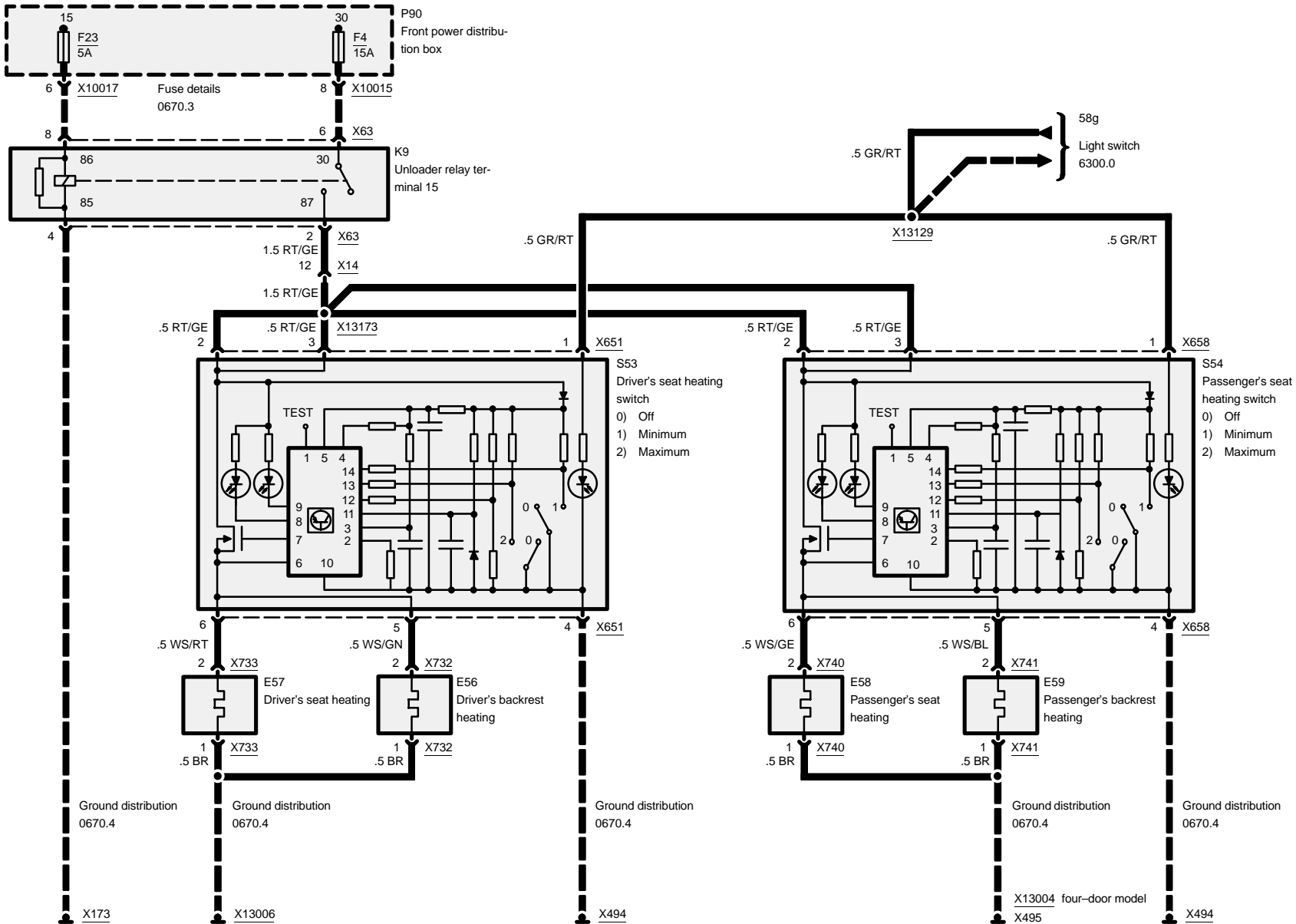
# Electric seat adjustment and lumbar support

## Driver's lumbar support





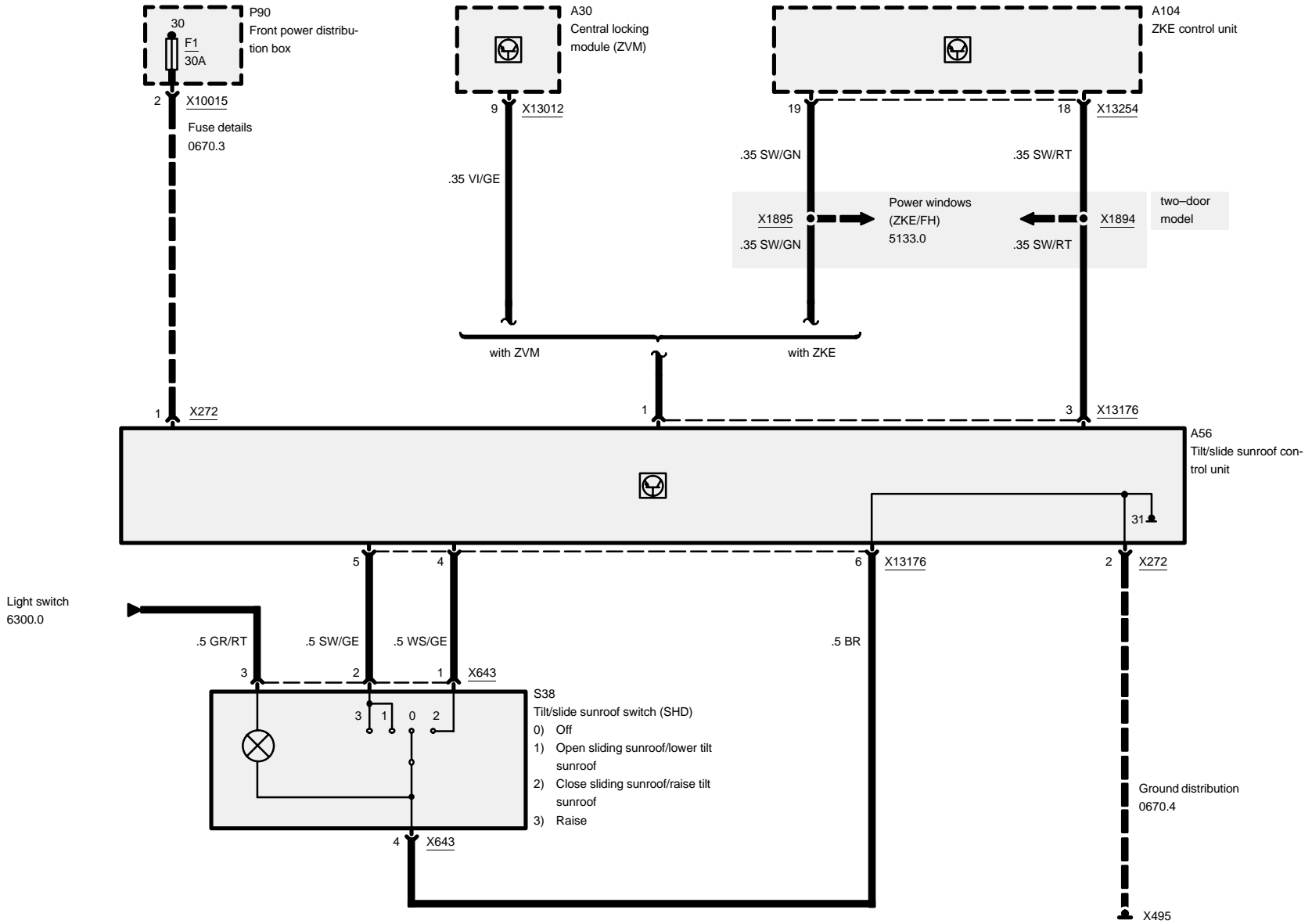
# 5203.0 Heated seats

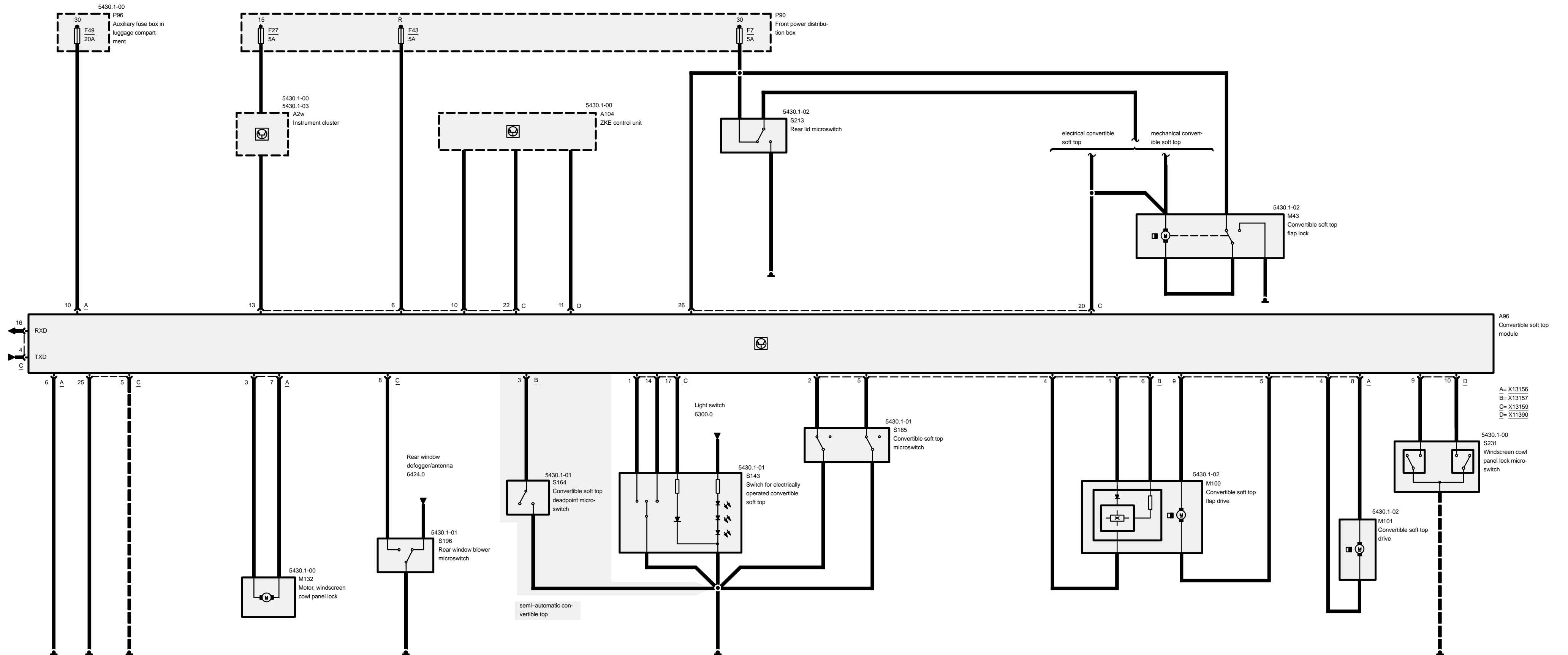


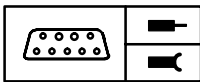
X13004 four-door model  
X495



# 5410.1 Power tilt/slide sunroof (SHD)







## Pin assignments

A=X13156	10-pin, black
B=X13157	6-pin, black
C=X13159	26-pin, black
D=X11390	12-pin, black

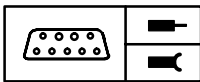
### X13156

Pin	Type	Description/Function	Connection
1		not used	
2		not used	
3	E/A	Motor activation (MVER R2)	Cowl lock
4	E/A	Motor activation	Convertible top drive
5	E/A	Motor activation	Convertible top flap drive
6	M	Ground	Ground connection
7	E/A	Motor activation (MVER R1)	Cowl lock
8	E/A	Motor activation	Convertible top drive
9	E/A	Motor activation	Convertible top lid drive
10	E	Power supply, terminal 30	Fuse 49

### X13157

Pin	Type	Description/Function	Connection
1	A	Positive activation	Position sensor, convertible top lid drive
2	E	Position signal	Convertible top microswitch
3	E	Position signal	Convertible top dead-point microswitch
4	M	Ground signal	Position sensor, convertible top lid drive
5	E	Position signal	Convertible top microswitch
6	E	Position signal	Position sensor, convertible top lid drive

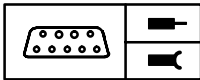




## Pin assignments

### X13159

Pin	Type	Description/Function	Connection
1	E	Open signal	Convertible top switch
2		not used	
3		not used	
4	E/A	TxD diagnostic data link	Diagnostic connector
5	M	Ground signal	Hardtop mount, left
6	E	Power supply, terminal R	Fuse 43
7		not used	
8	E	Signal, convertible top down	Rear window blower microswitch
9		not used	
10	A	Data link, window down	ZKE control unit
11		not used	
12		not used	
13	E	Speedometer signal	Instrument cluster
14	E	Close signal	Convertible top switch
15		not used	
16	A	RxD diagnostic data link	Diagnostic connector
17	A	LED	Switch, electric convertible top
18		not used	
19		not used	
20	E	Signal, trunk lid	Rear lid microswitch
21		not used	
22	A	Data link, window open	ZKE control unit
23		not used	
24		not used	
25	M	Ground	Ground connection
26	E	Power supply, terminal 30	Fuse 7



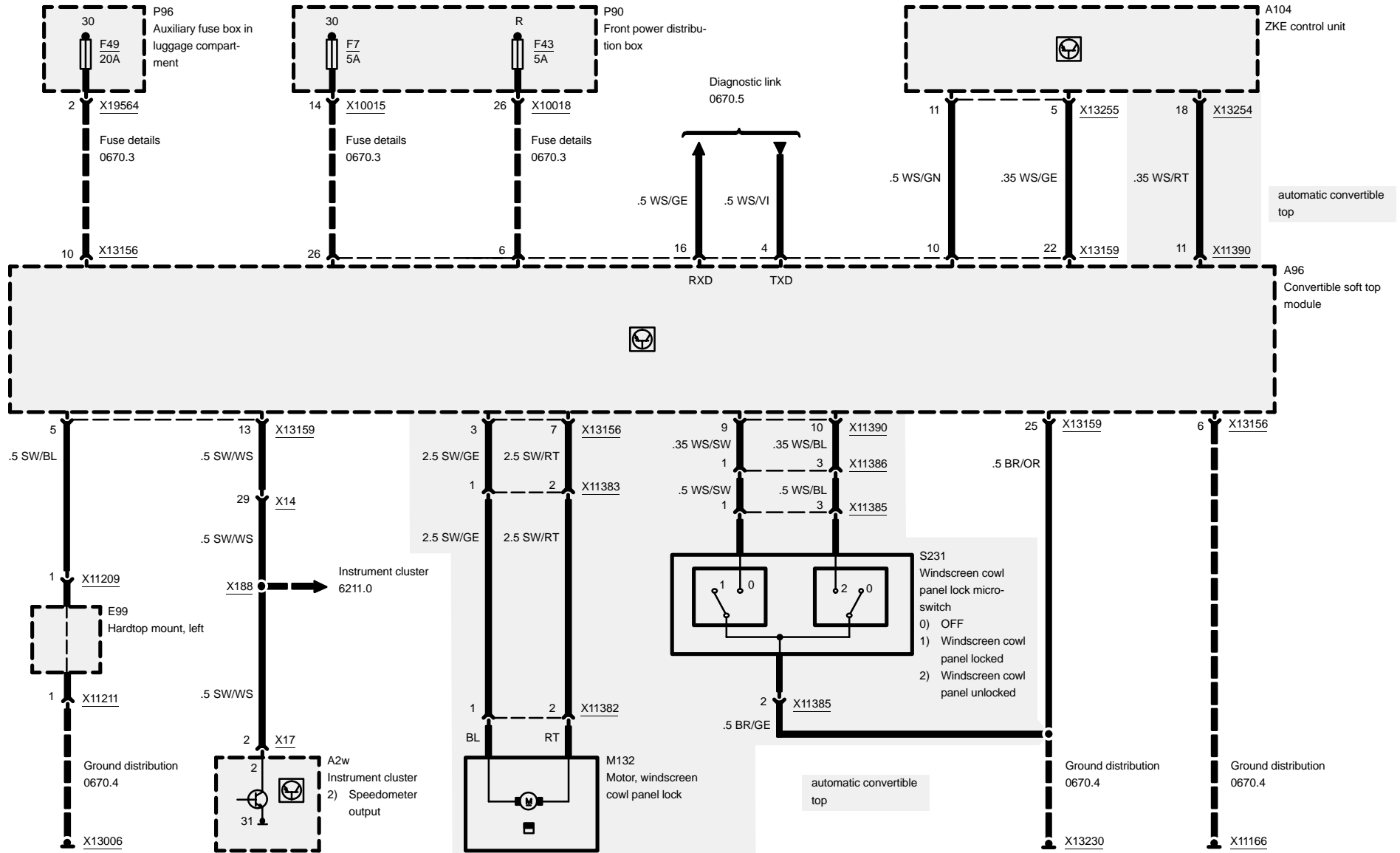
## Pin assignments

### X11390

Pin	Type	Description/Function	Connection
1		not used	
2		not used	
3		not used	
4		not used	
5		not used	
6		not used	
7		not used	
8		not used	
9	E/A	Lock cowl	Switch, cowl lock
10	E/A	Open cowl	Switch, cowl open
11	E/A	Convenience locking	ZKE control unit
12		not used	

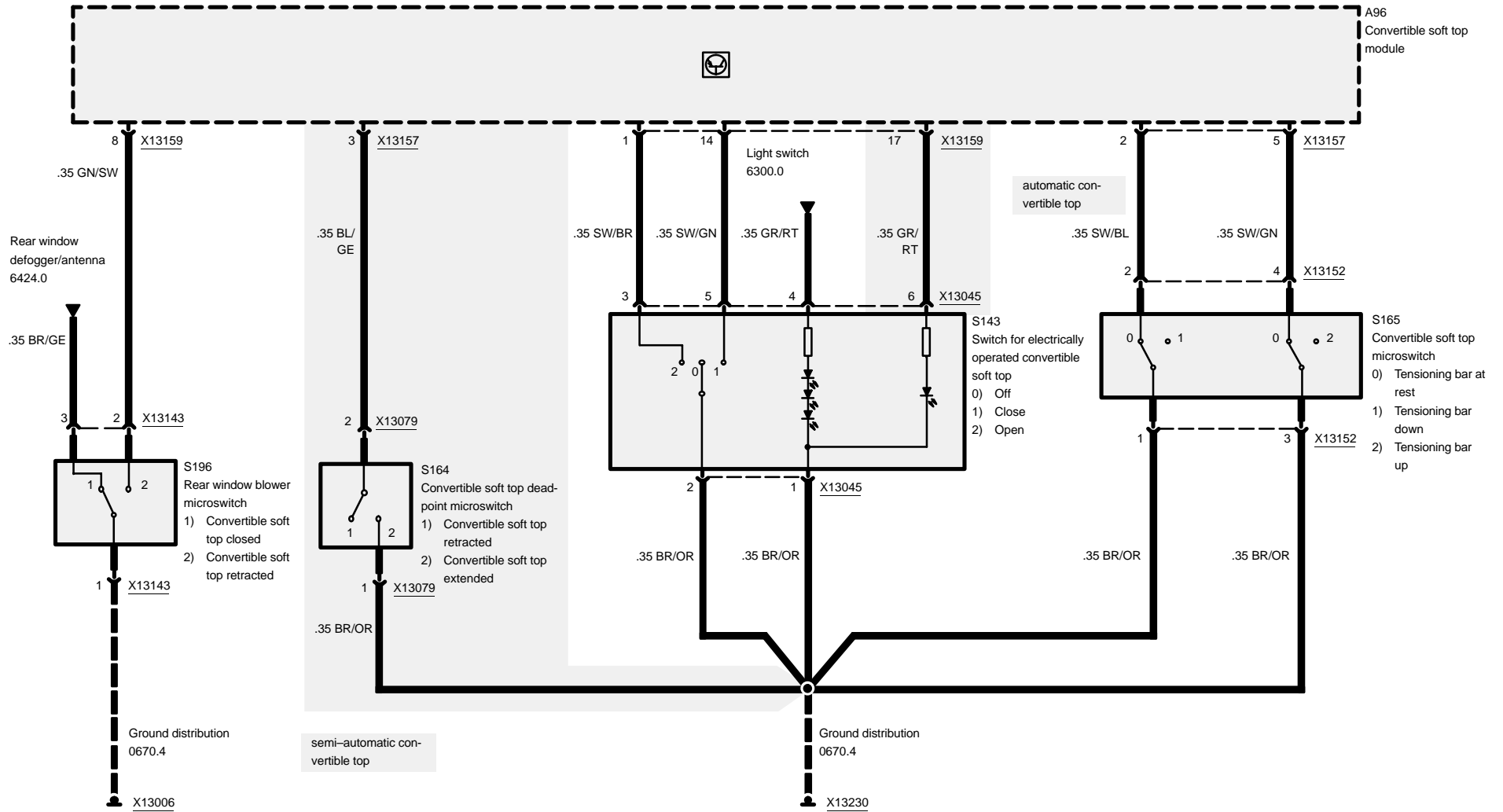


# Electrical convertible soft top



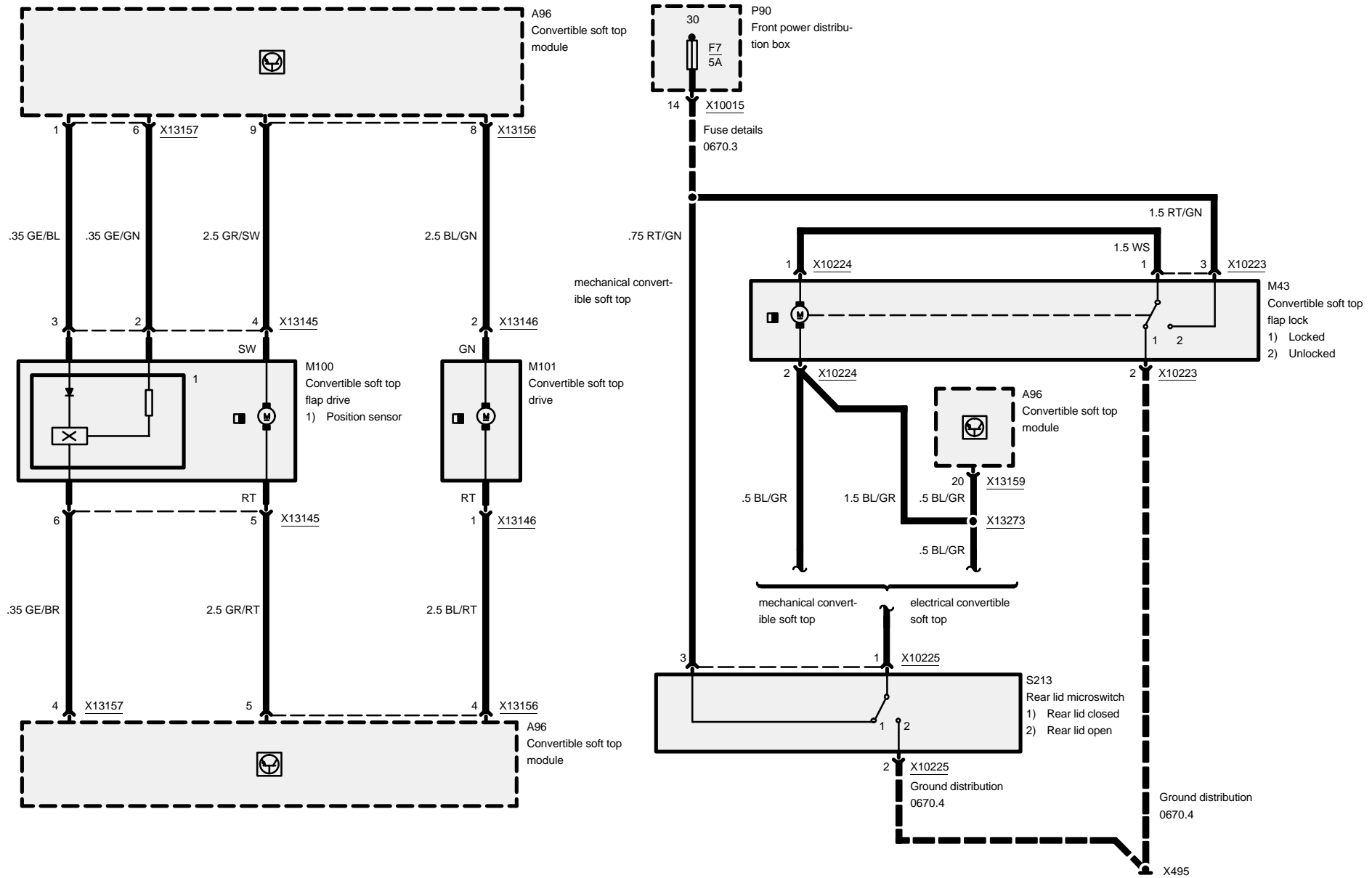


# Electrical convertible soft top





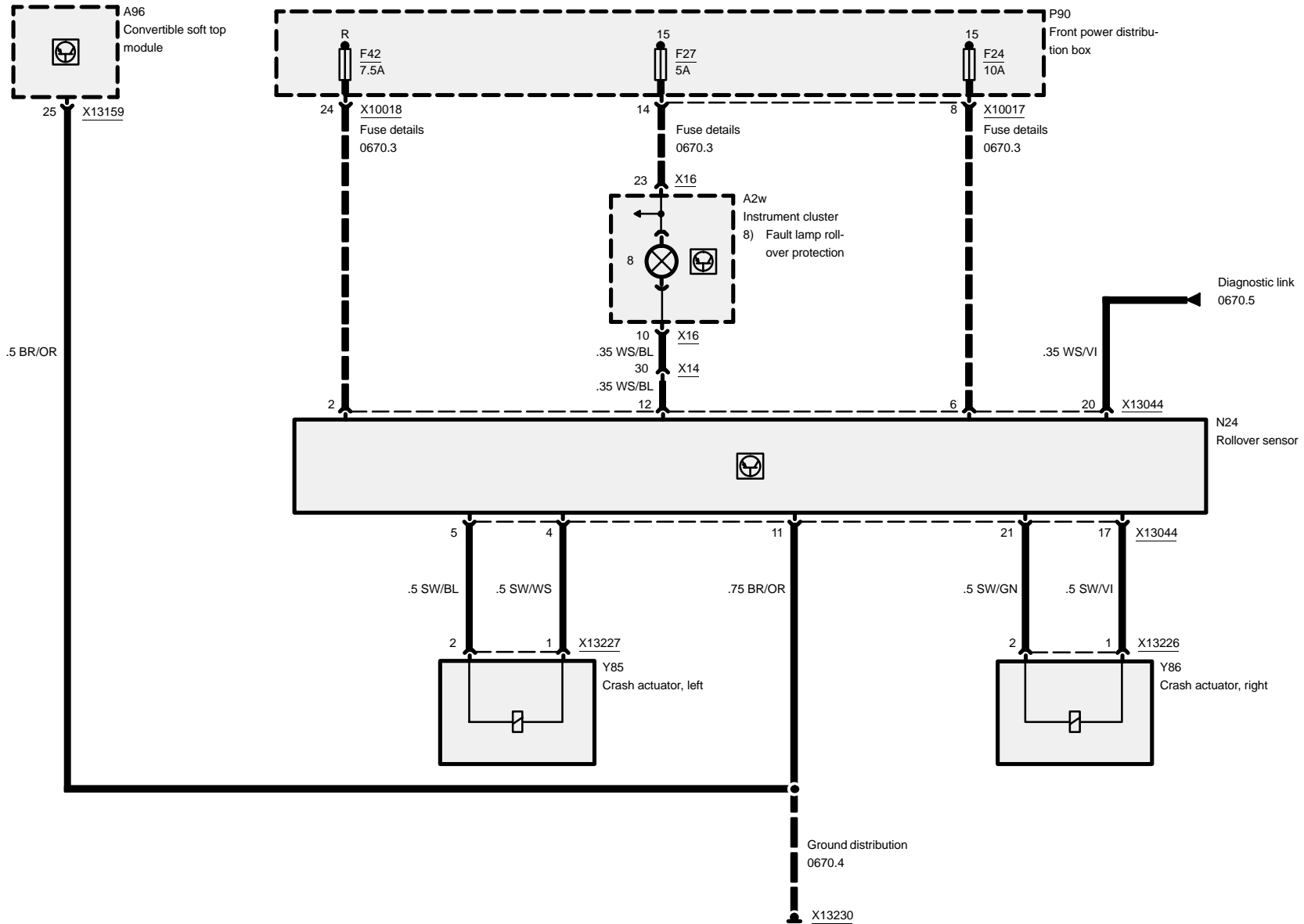
# Electrical convertible soft top





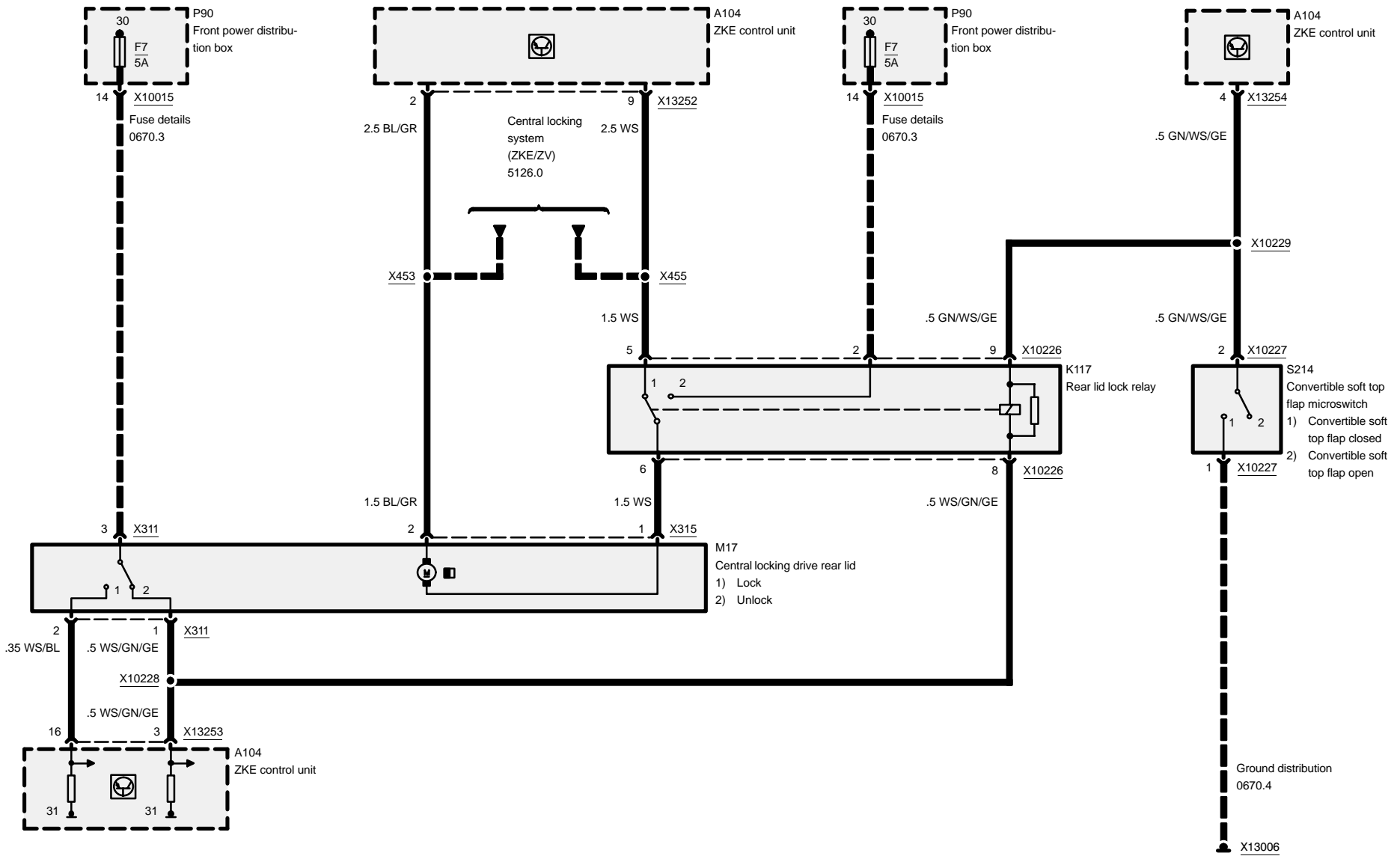
# Electrical convertible soft top

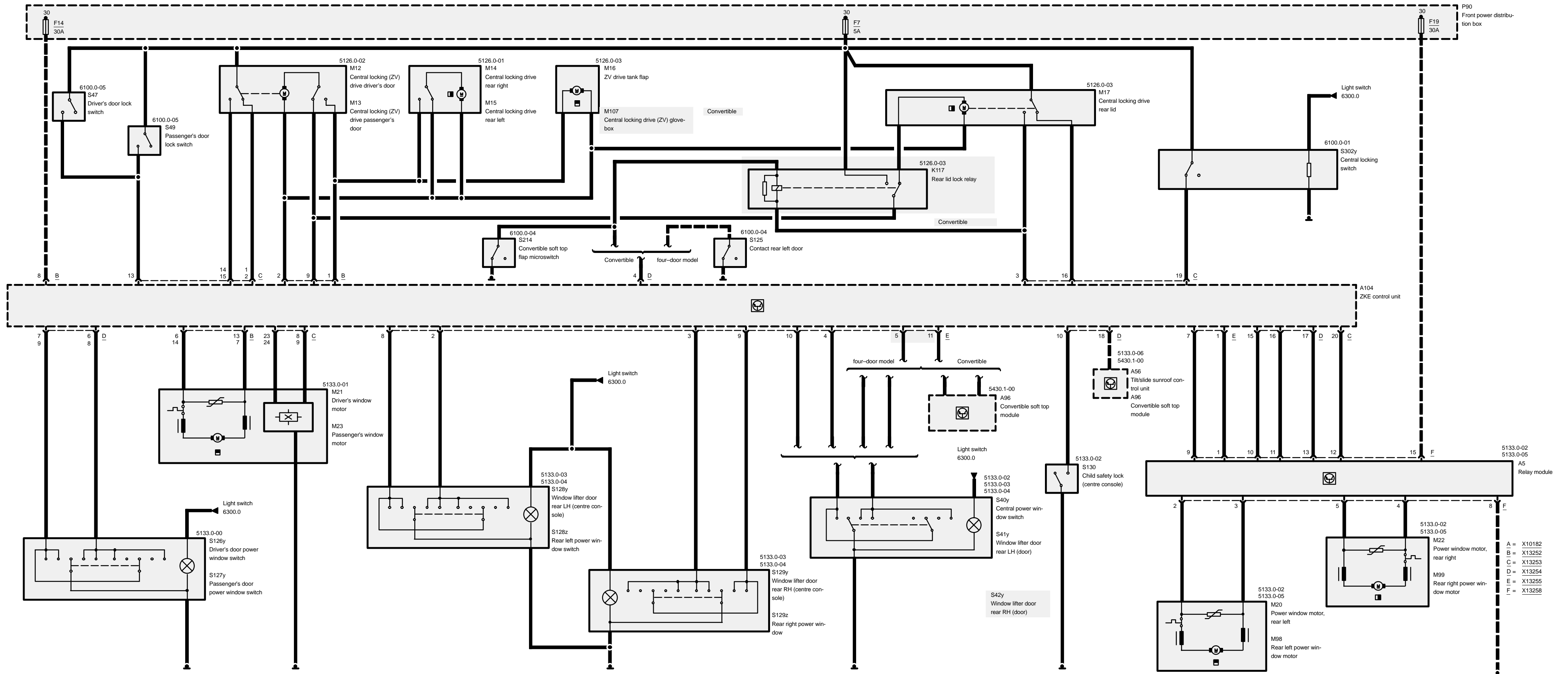
## Rollover sensor



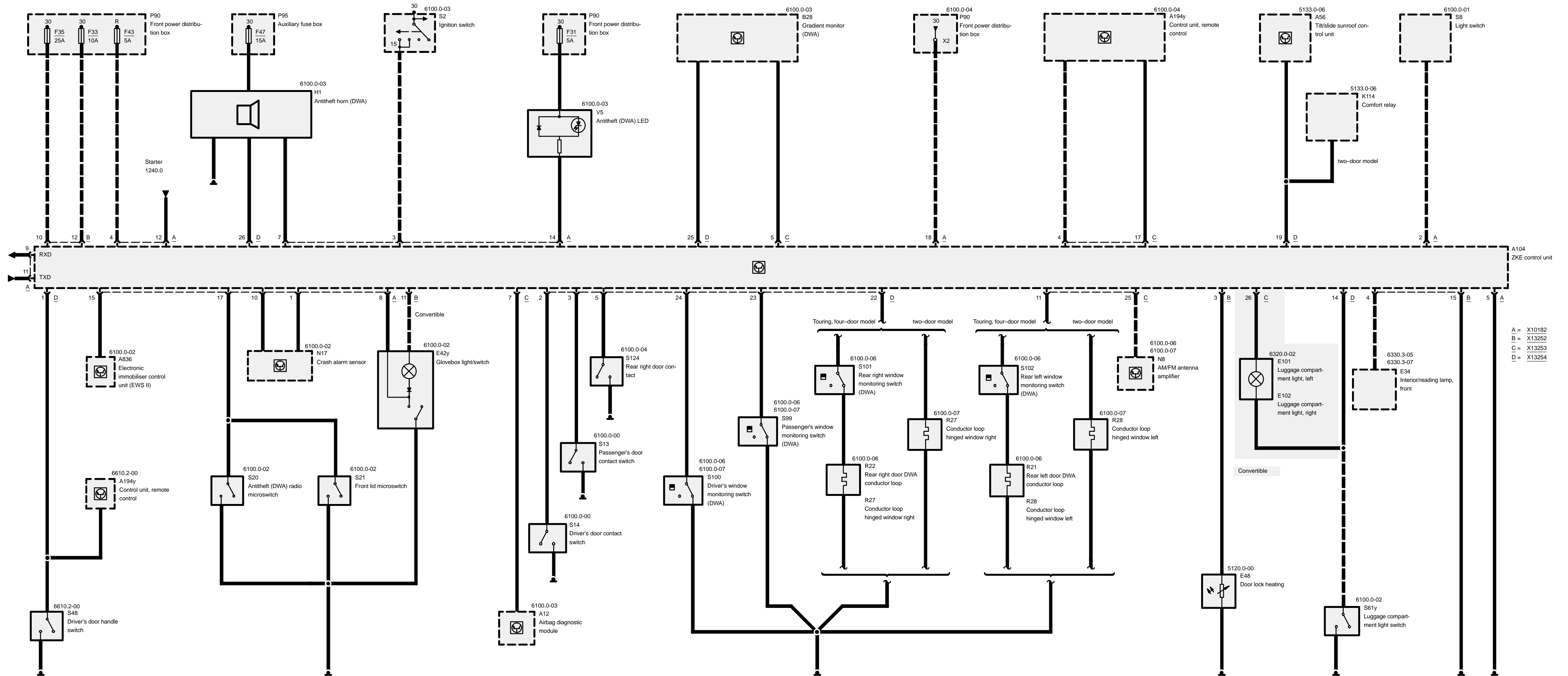


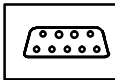
# Electrical convertible soft top









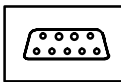


## Pin assignments

A=X10182	18-pin, black
B=X13252	15-pin, black
C=X13253	26-pin, yellow
D=X13254	26-pin, green
E=X13255	12-pin, natural
E=X13258	15-pin, white

### X10182

Pin	Type	Description/Function	Connection
1	A	Hazard warning signal	Crash alarm sensor
2	E	Parking light signal	Light switch
3	E	Terminal, ignition	Ignition switch
4	E	Terminal, radio	Fuse 43
5	M	Ground	Ground connection
6		not used	
7	A	Horn activation	DWA antitheft horn
8	E	Glovebox signal	Glovebox switch
9	A	RxD diagnostic link	Diagnostic connector
10	A	Visual alarm DWA	Crash alarm sensor
11	E/A	TxD diagnostic data link	Diagnostic connector
12	E	Starter signal	Starter
13		not used	
14	A	LED	DWA LED
15	A	Vehicle immobilization	Electronic immobilizer control unit (EWS II)
16		not used	
17	E	DWA signal	Radio/engine hood microswitch
18	E	Power supply, terminal 30	Front power distribution box



## Pin assignments

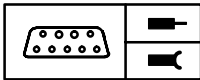
### X13252

Pin	Type	Description/Function	Connection
1	A	Double-lock signal	Central locking drive
2	A	Unlock signal	Central locking drive
3	A	Power supply	Door lock heating
4	A	Interior lights	Reading light
5		not used	
6	A	Open signal	Power window motor, driver's door
7	A	Close signal	Power window motor, passenger's door
8	E	Power supply, front power window	Fuse 14
9	A	Lock signal	Central locking drive
10	E	Power supply, central locking	Fuse 35
11	A	Load cutoff	Glove box/interior lamp
12	E	Power supply, interior lights	Fuse 33
13	A	Close signal	Power window motor, driver's door
14	A	Open signal	Power window motor, passenger's door
15	M	Ground	Ground connection

### X13253

Pin	Type	Description/Function	Connection
1	E	Pin contact, unlock	Central locking drive, driver's door
2	E	Pin contact, unlock	Central locking drive, passenger's door
3	E	Pin contact, unlock	Central locking drive, trunk lid
4	E	Unlocking	Control unit remote control
5	E	Pitch signal	Pitch sensor
6		not used	
7	E	Crash pulse	Impact switch
8	E	Position pulse A	Power window motor, driver's door
9	E	Position pulse A	Power window motor, passenger's door
10		not used	
11	E	Window monitor	Window contact, rear left

E = Input, A = Output, M = Ground



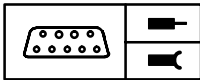
## Pin assignments

Pin	Type	Description/Function	Connection
12		not used	
13	E	Pin contact, central locking	Lock switch
14	E	Pin contact, lock	Central locking drive, driver's door
15	E	Pin contact, lock	Central locking drive, passenger's door
16	E	Pin contact, lock	Central locking drive, trunk lid
17	E	Locking	Control unit remote control
18		not used	
19	E	Central locking	Central locking system switch
20	A	Closing pulse, rear left window	Relay module
21		not used	
22		not used	
23	A	Position sensor	Power window motor, driver's door
24	A	Position sensor	Power window motor, passenger's door
25	E	Rear window monitor	Antenna amplifier
26	A	Positive activation	Luggage compartment light

### X13254

Pin	Type	Description/Function	Connection
1	E	Door handle contact	Microswitch on door handle
2	E	Driver's door	Door contact switch
3	E	Front passenger's door	Door contact switch
4	E	4-door: rear left door Convertible: convertible top lid	Door contact switch Convertible top lid microswitch
5	E	Rear right door	Door contact switch
6	E	Open signal	Power window switch, driver's door
7	E	Close signal	Power window switch, driver's door
8	E	Open signal	Power window switch, passenger's door
9	E	Close signal	Power window switch, passenger's door
10	E	Double-lock	Child lock, center console
11		not used	
12		not used	
13		not used	

E = Input, A = Output, M = Ground



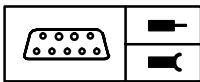
## Pin assignments

Pin	Type	Description/Function	Connection
14	E	Trunk lid contact	Luggage compartment light switch
15	A	Signal, close rear left	Relay module
16	A	Signal, open rear left	Relay module
17	A	Signal, open rear right	Relay module
18	A	Convenience locking	Quartervent relay
19	A	Release, sunroof	Control unit, slide-tilt sunroof
20		not used	
21		not used	
22	E	Window monitor	Window contact, rear right
23	E	Window monitor	Window contact, passenger's door
24	E	Window monitor	Window contact, driver's door
25	A	DWA output	Pitch monitor
26	A	Alarm signal	Antitheft horn (DWA)

### X13255

Pin	Type	Description/Function	Connection
1	E	Power, rear right power window motor	Relay module
2	E	Open signal	Power window switch, rear left
3	E	Open signal	Power window switch, rear right
4	E	Open signal	4-door: power window switch, rear left Convertible: central power window switch
5	E	Close signal	4-door: power window switch, rear right Convertible: convertible top module
6		not used	
7	E	Power, rear left power window motor	Relay module
8	E	Close signal	Power window switch, rear left
9	E	Close signal	Power window switch, rear right
10	E	Close signal	4-door: power window switch, rear left Convertible: central power window switch
11	E	Close signal	4-door: power window switch, rear right Convertible: convertible top module
12		not used	

E = Input, A = Output, M = Ground



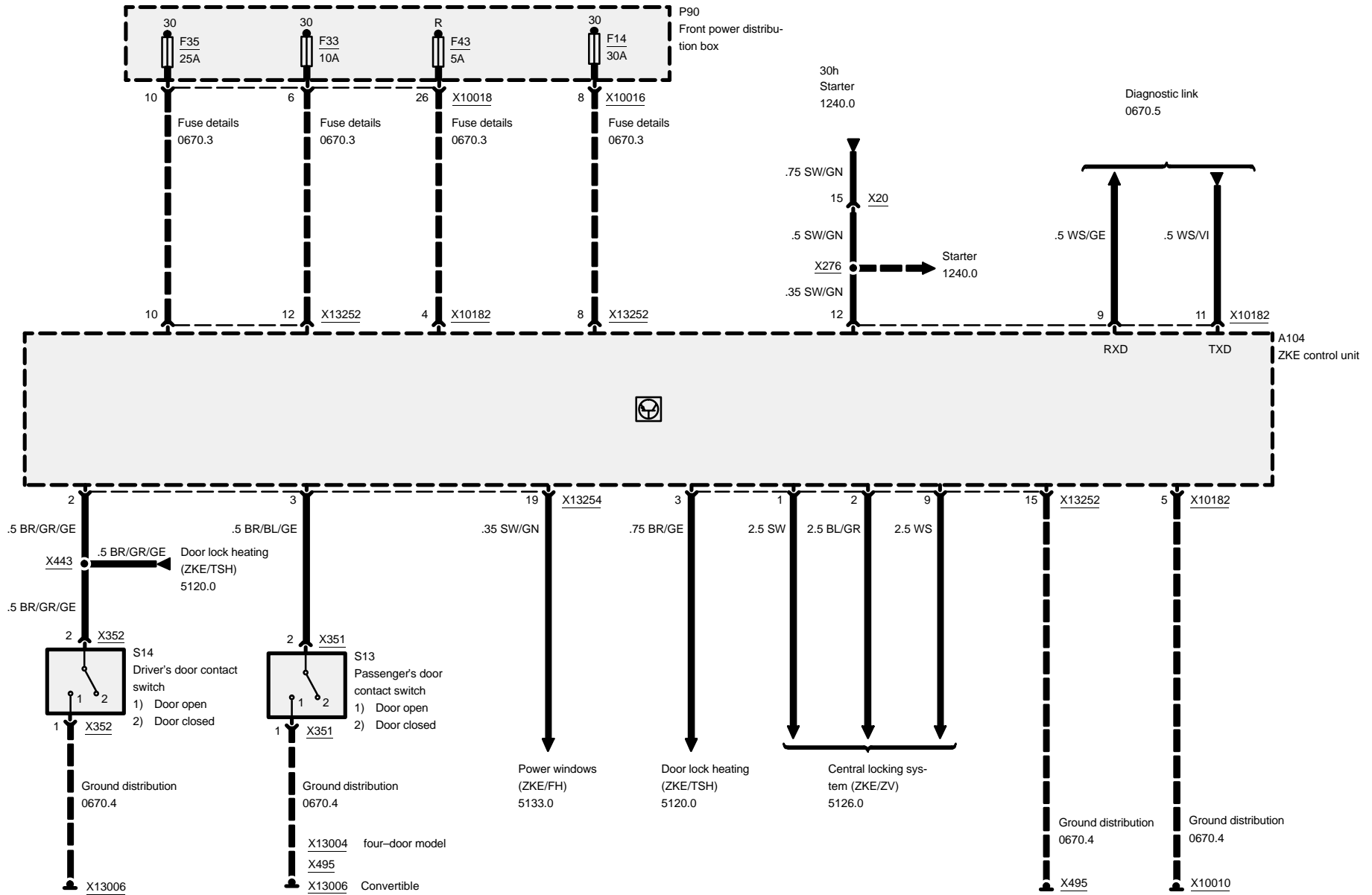
## Pin assignments

### X13258

Pin	Type	Description/Function	Connection
1	A	Power, rear right power window motor	ZKE control unit
2	A	Close signal	Power window motor, rear left
3	A	Open signal	Power window motor, rear left
4	A	Close signal	Power window motor, rear right
5	A	Open signal	Power window motor, rear right
6		not used	
7		not used	
8	M	Ground	Ground connection
9	A	Power, rear left power window motor	ZKE control unit
10	E	Signal, close rear left	ZKE control unit
11	E	Signal, open rear left	ZKE control unit
12	E	Signal, close rear right	ZKE control unit
13	E	Signal, open rear right	ZKE control unit
14		not used	
15	E	Power supply, terminal 30	Fuse 19

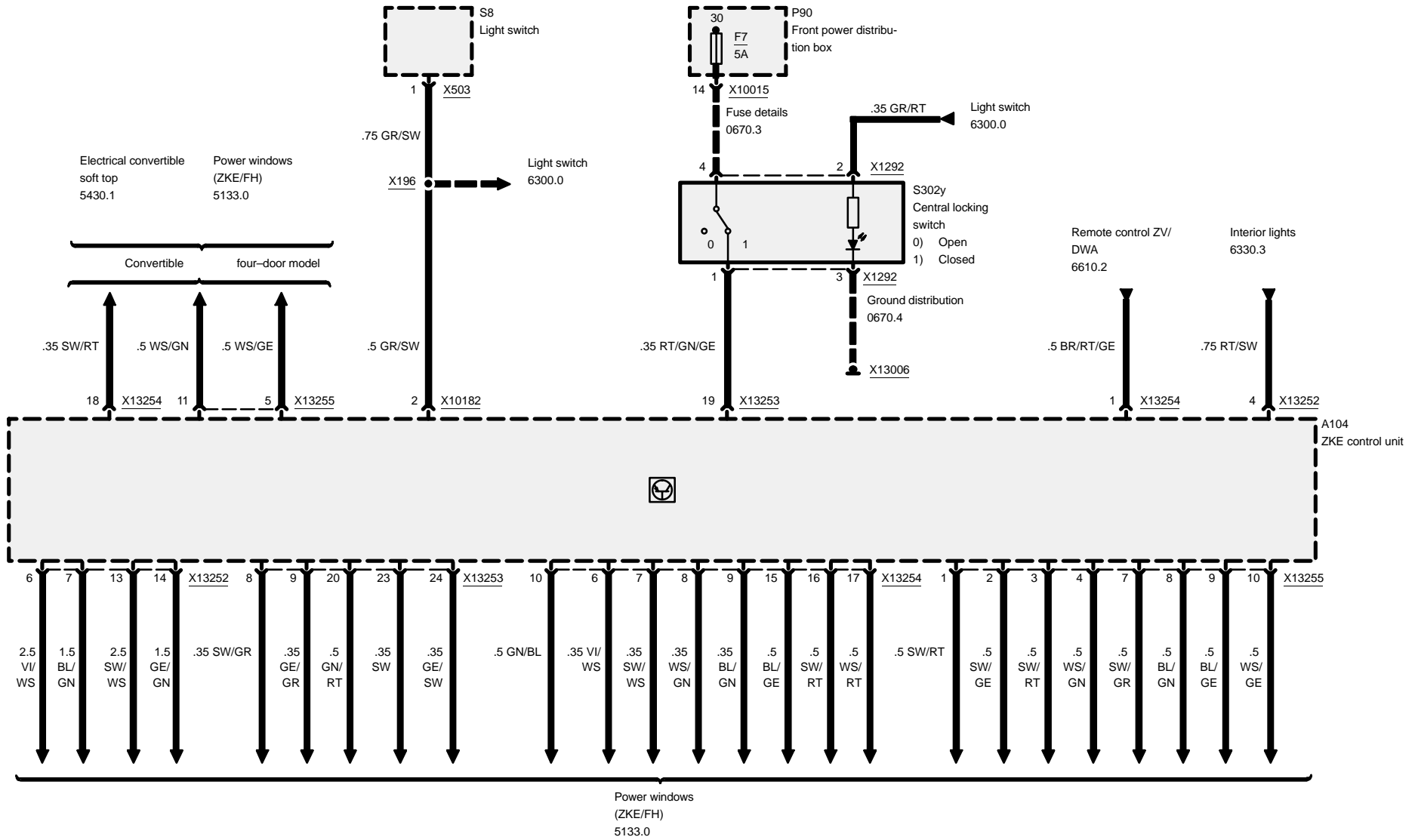


# Central body electronics (ZKE IV)





# Central body electronics (ZKE IV)

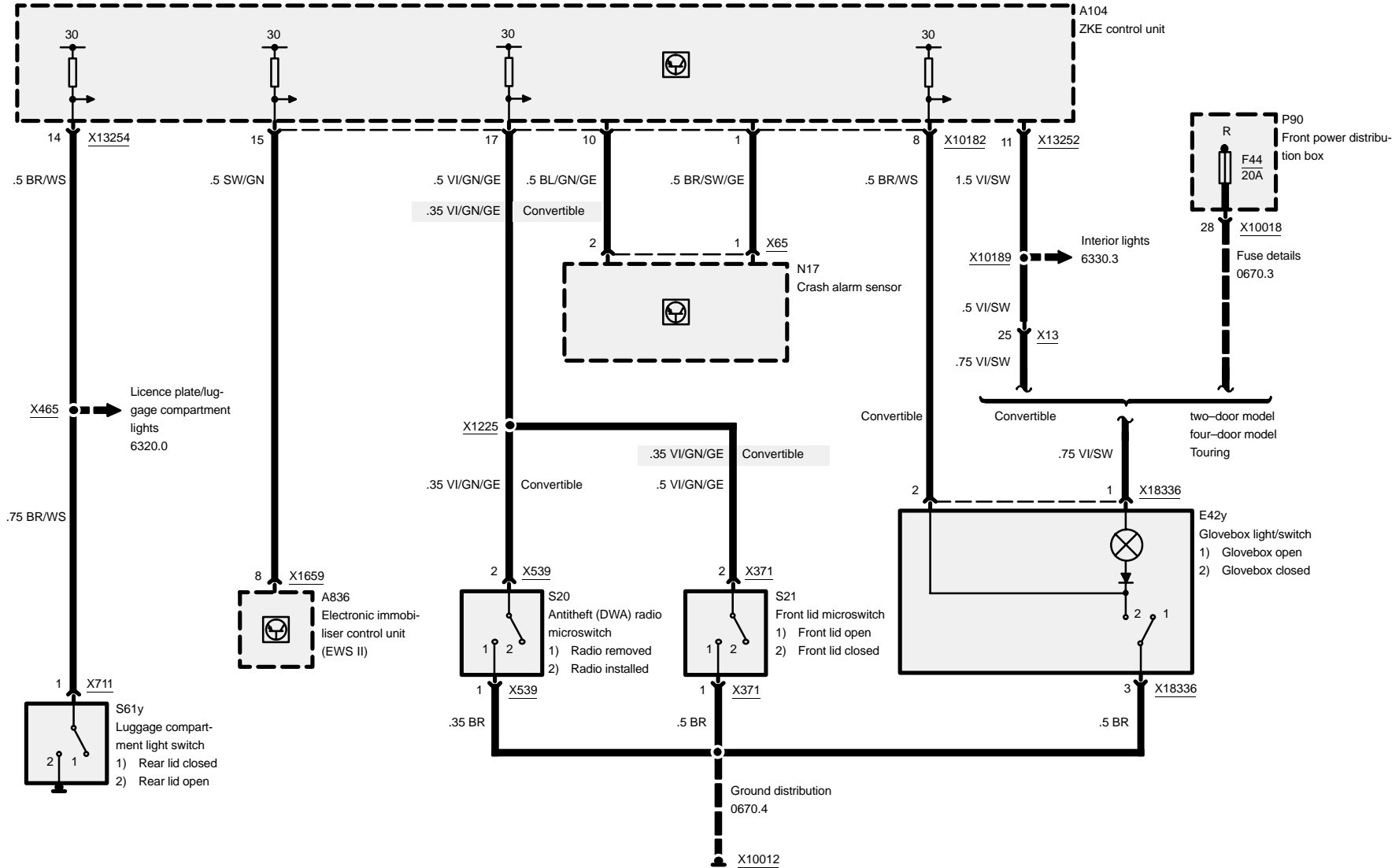






# Central body electronics (ZKE IV)

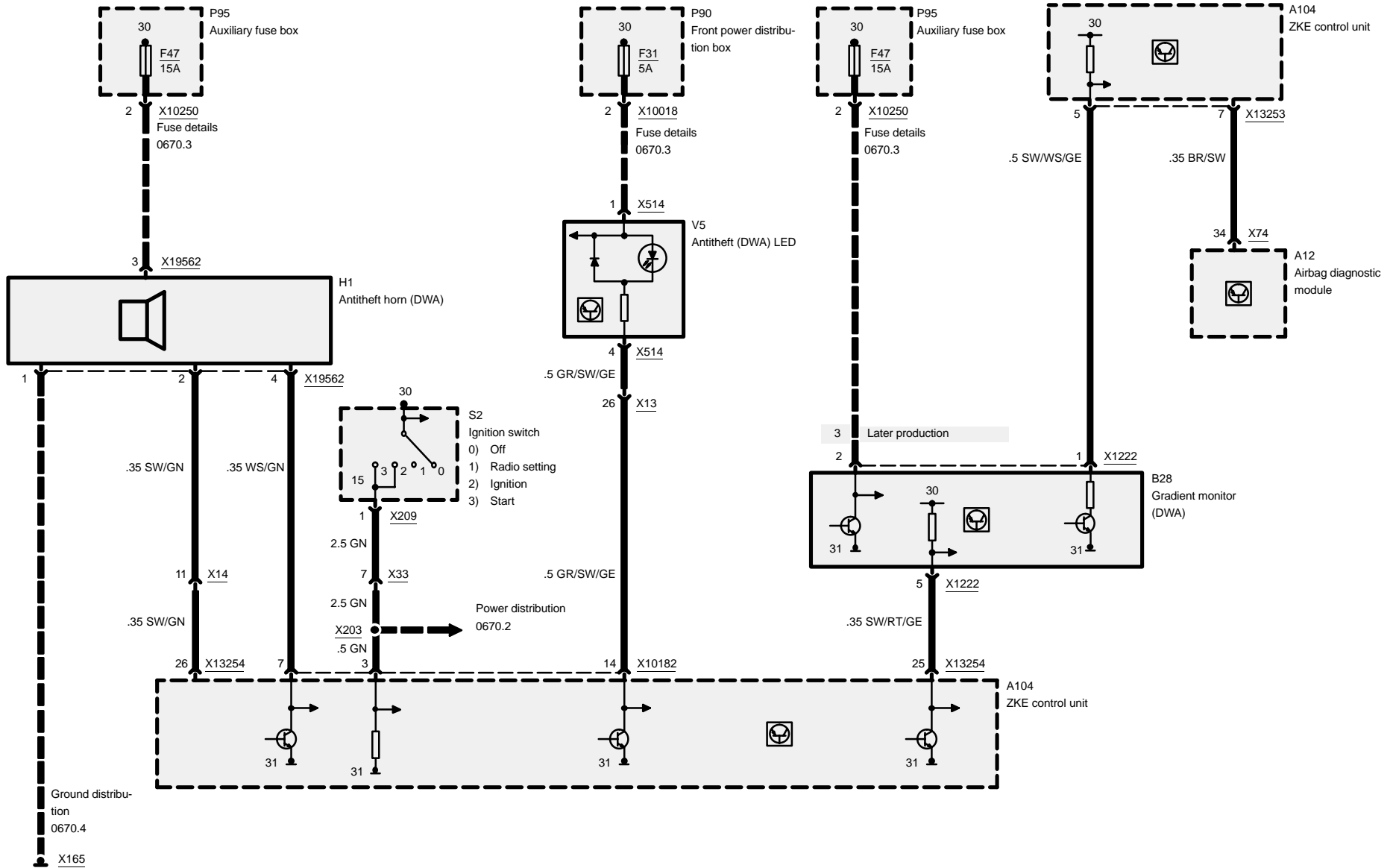
## DWA, immobilising device, radio, engine hood, glove compartment





# Central body electronics (ZKE IV)

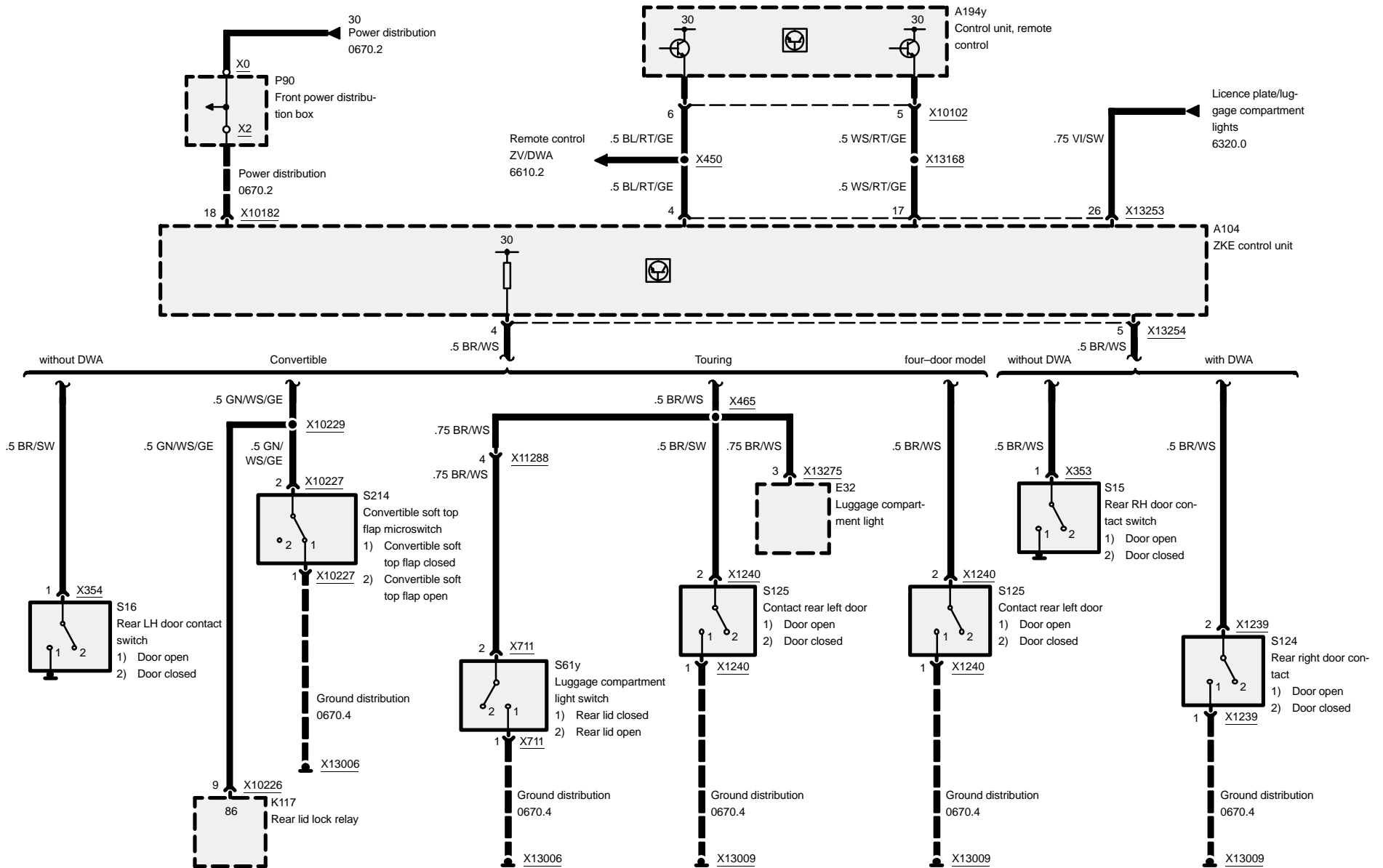
## DWA, tilt monitor, alarm horn





# Central body electronics (ZKE IV)

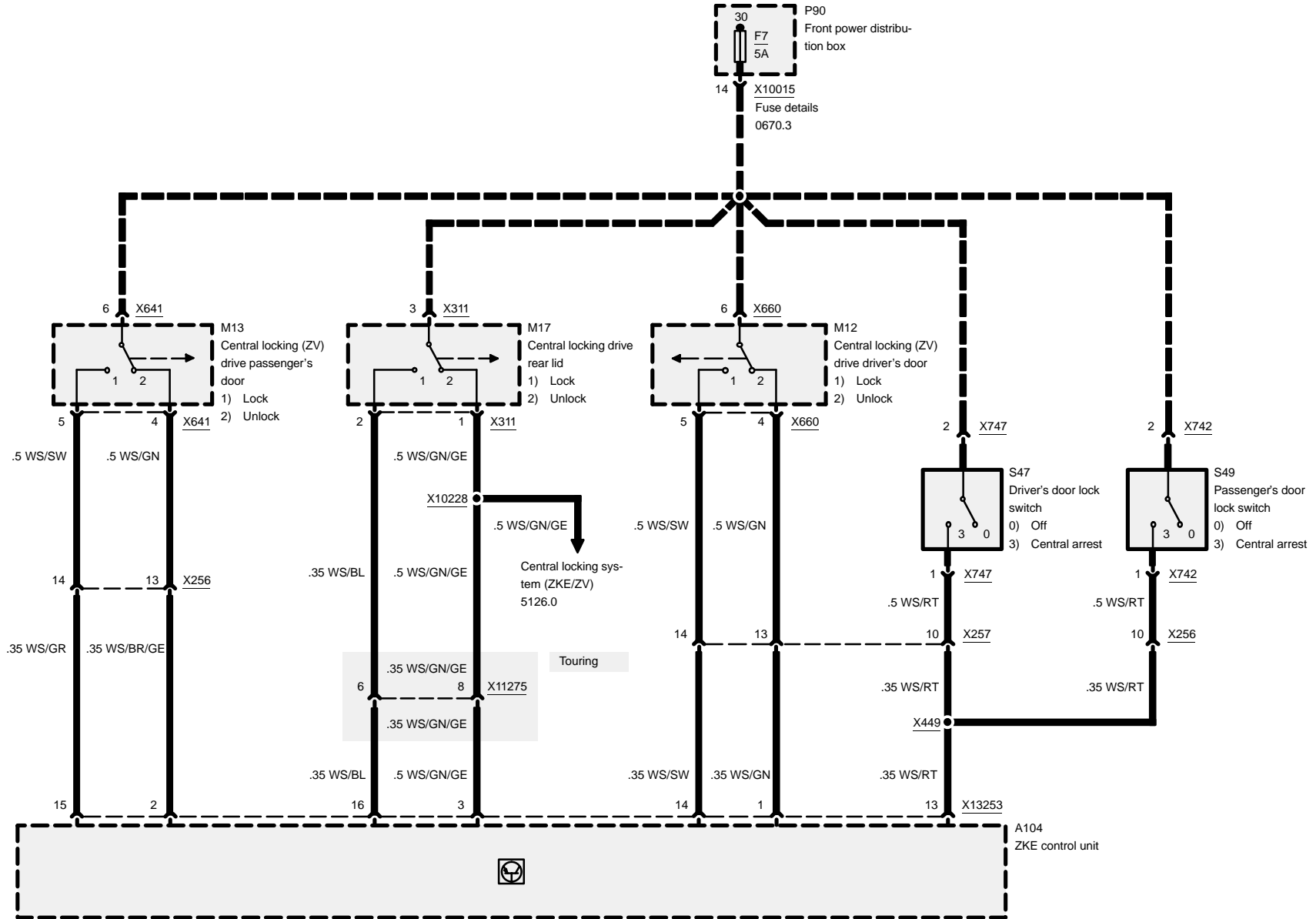
## DWA, current, door contacts





# Central body electronics (ZKE IV)

## DWA input signal rear lid, driver's door and front passenger's door

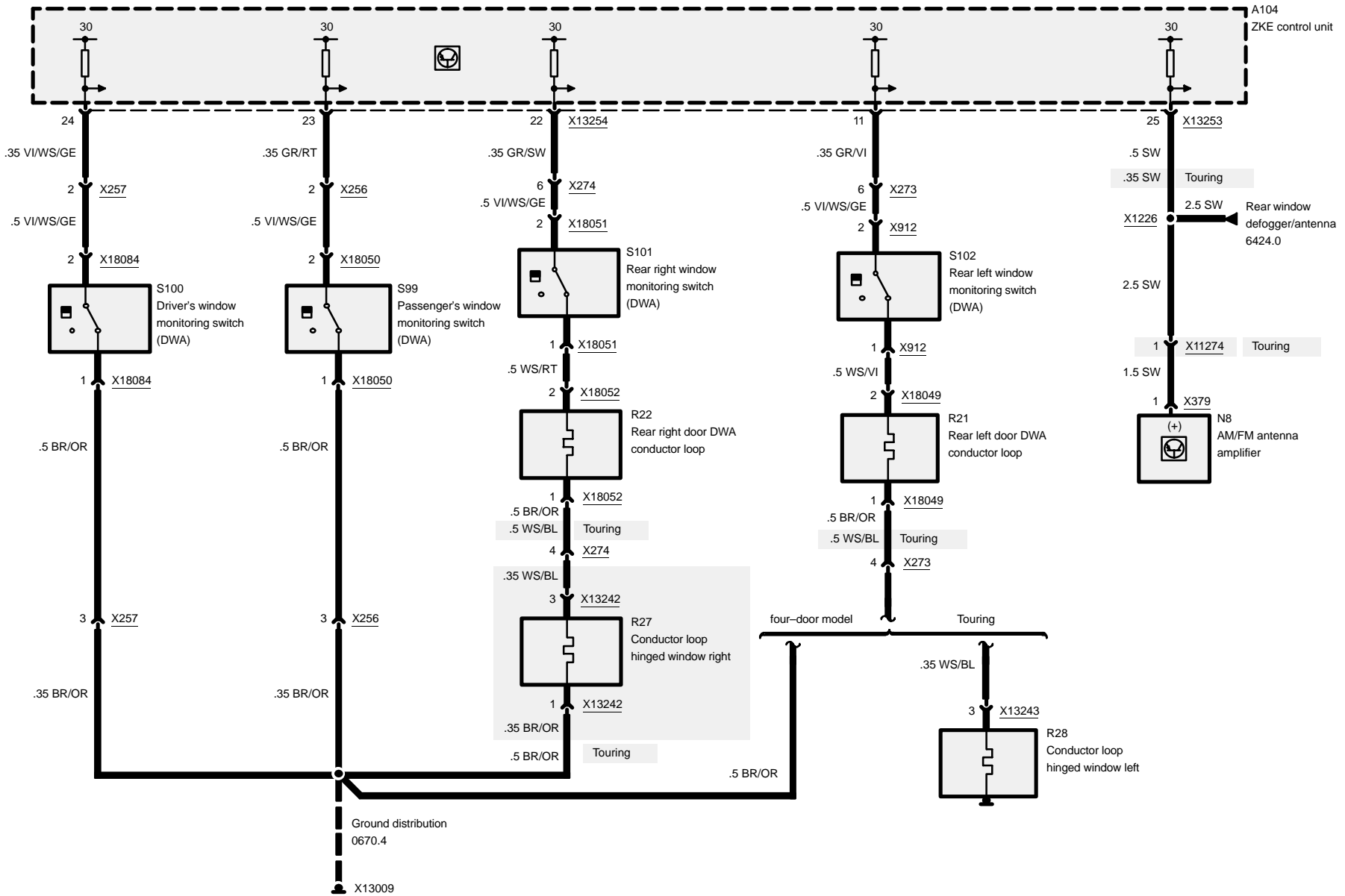




# Central body electronics (ZKE IV)

## Four-door model, Touring

### DWA, window security

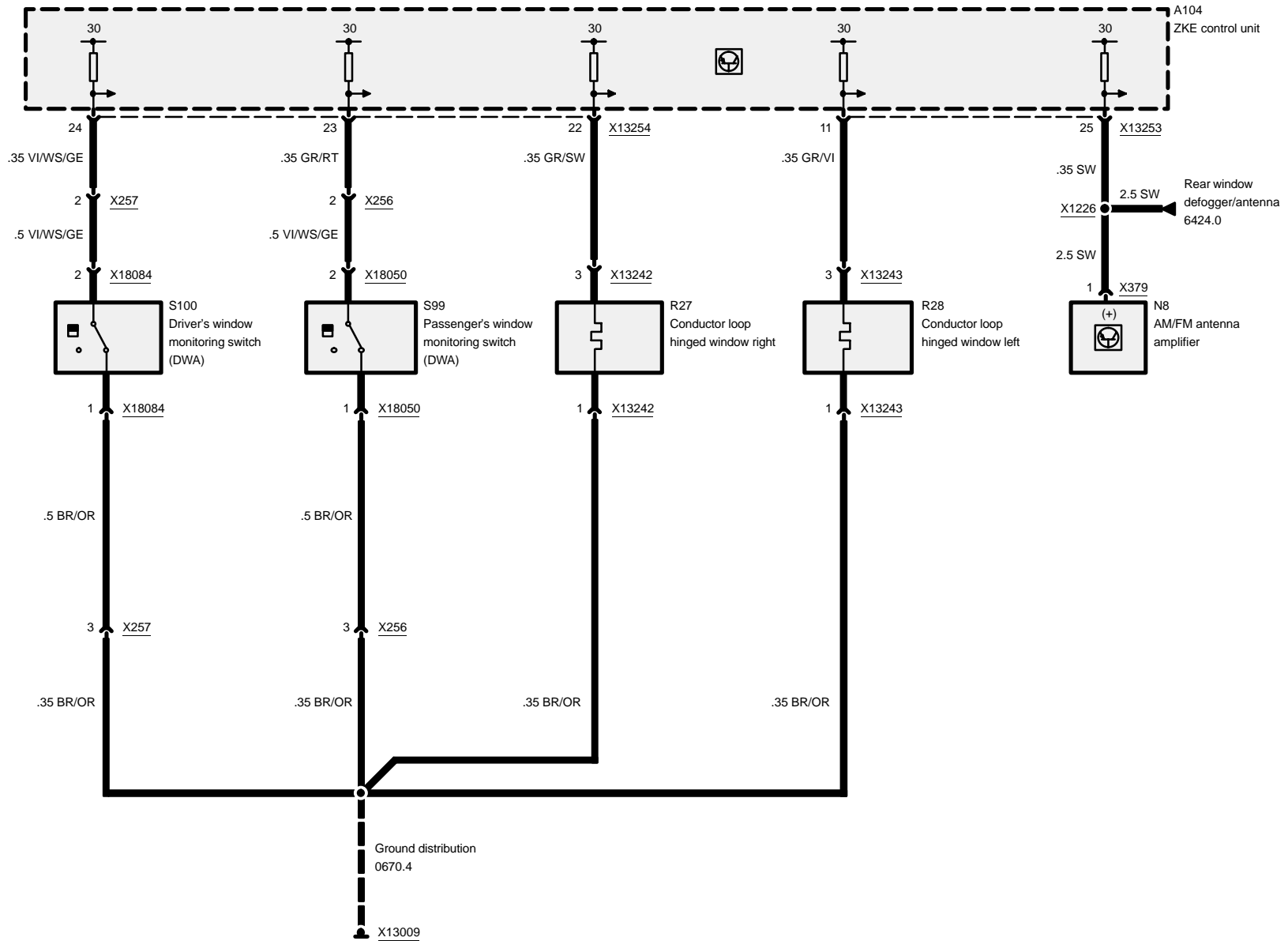




# Central body electronics (ZKE IV)

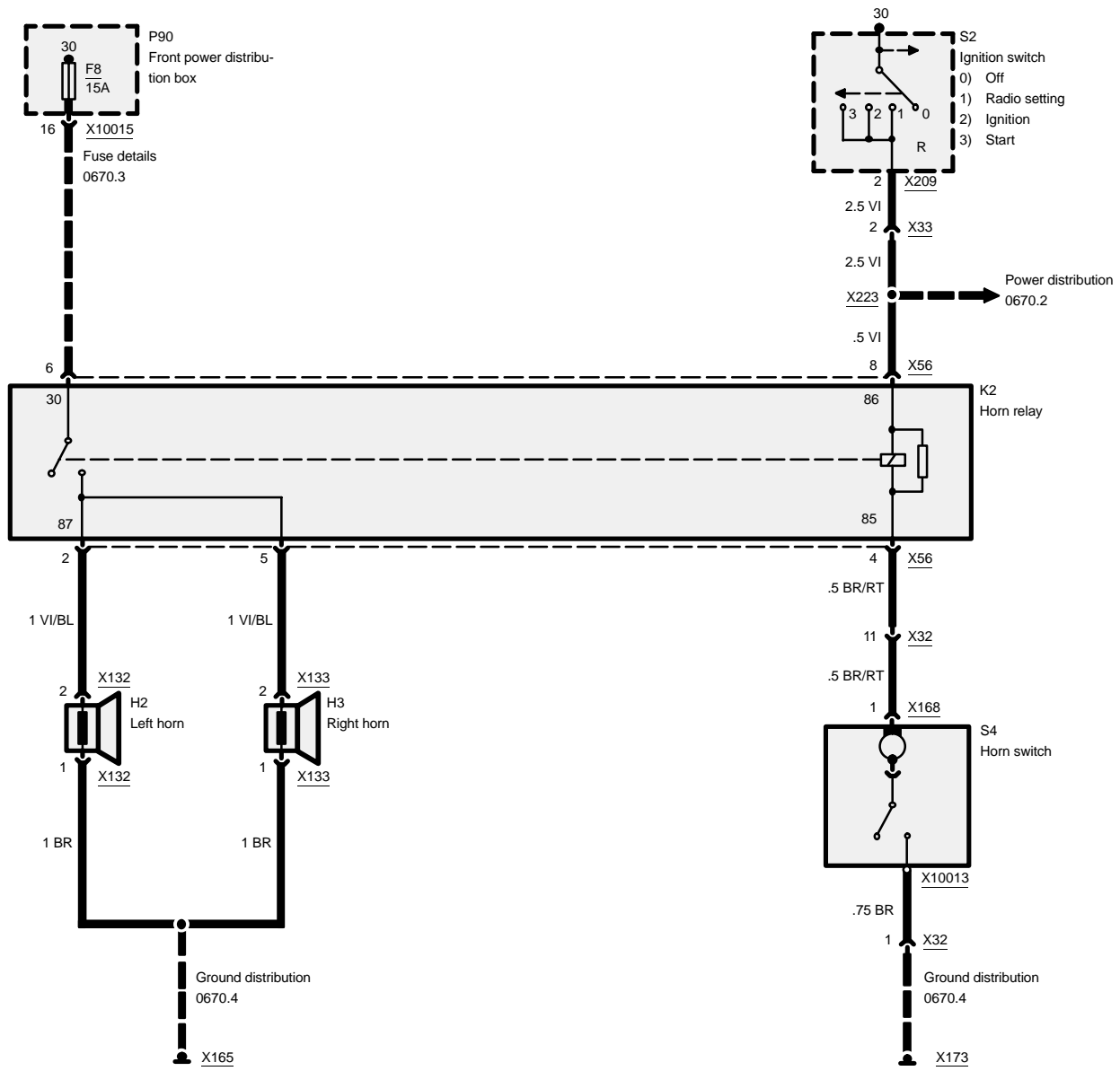
Two-door model

## DWA, window security



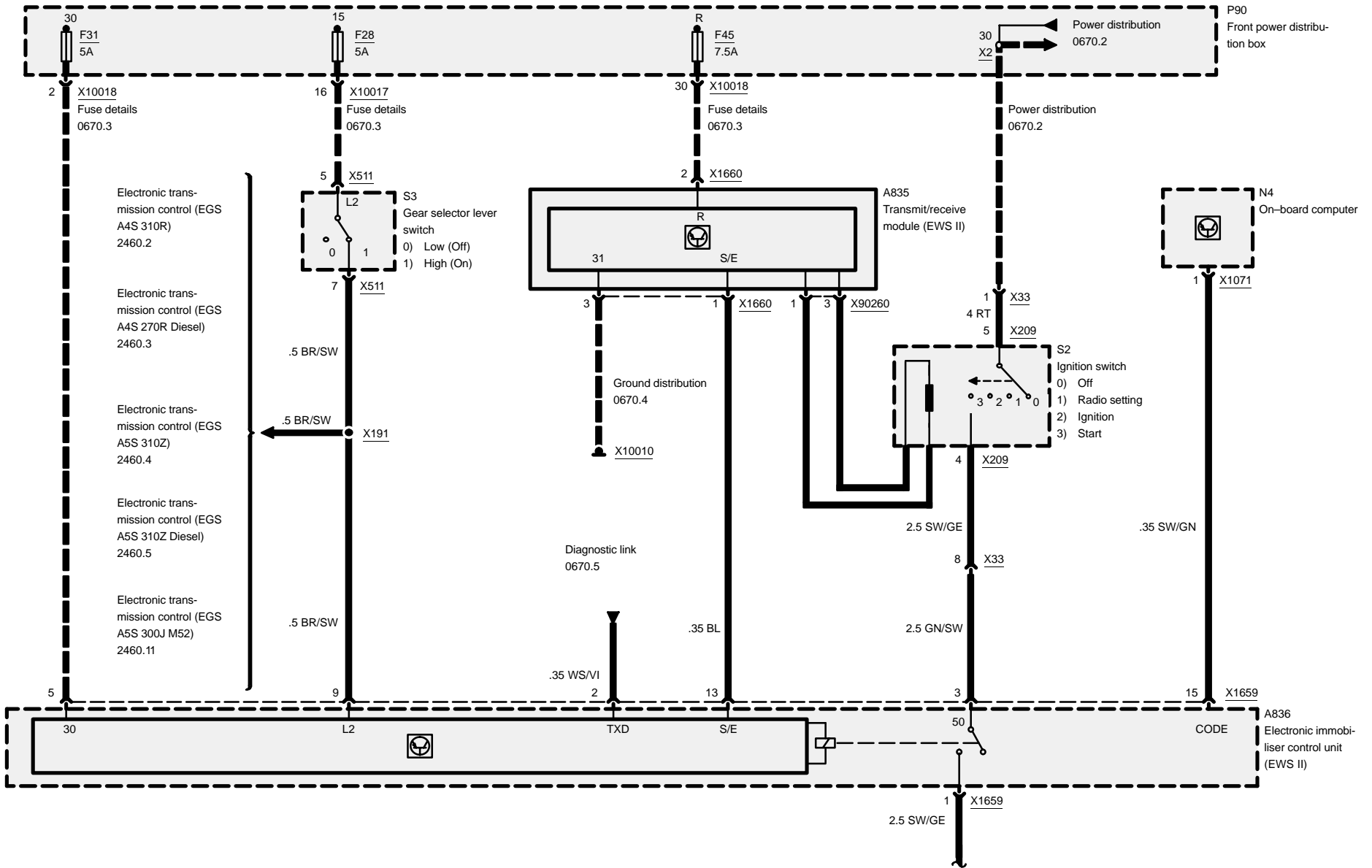


# 6133.0 Horn

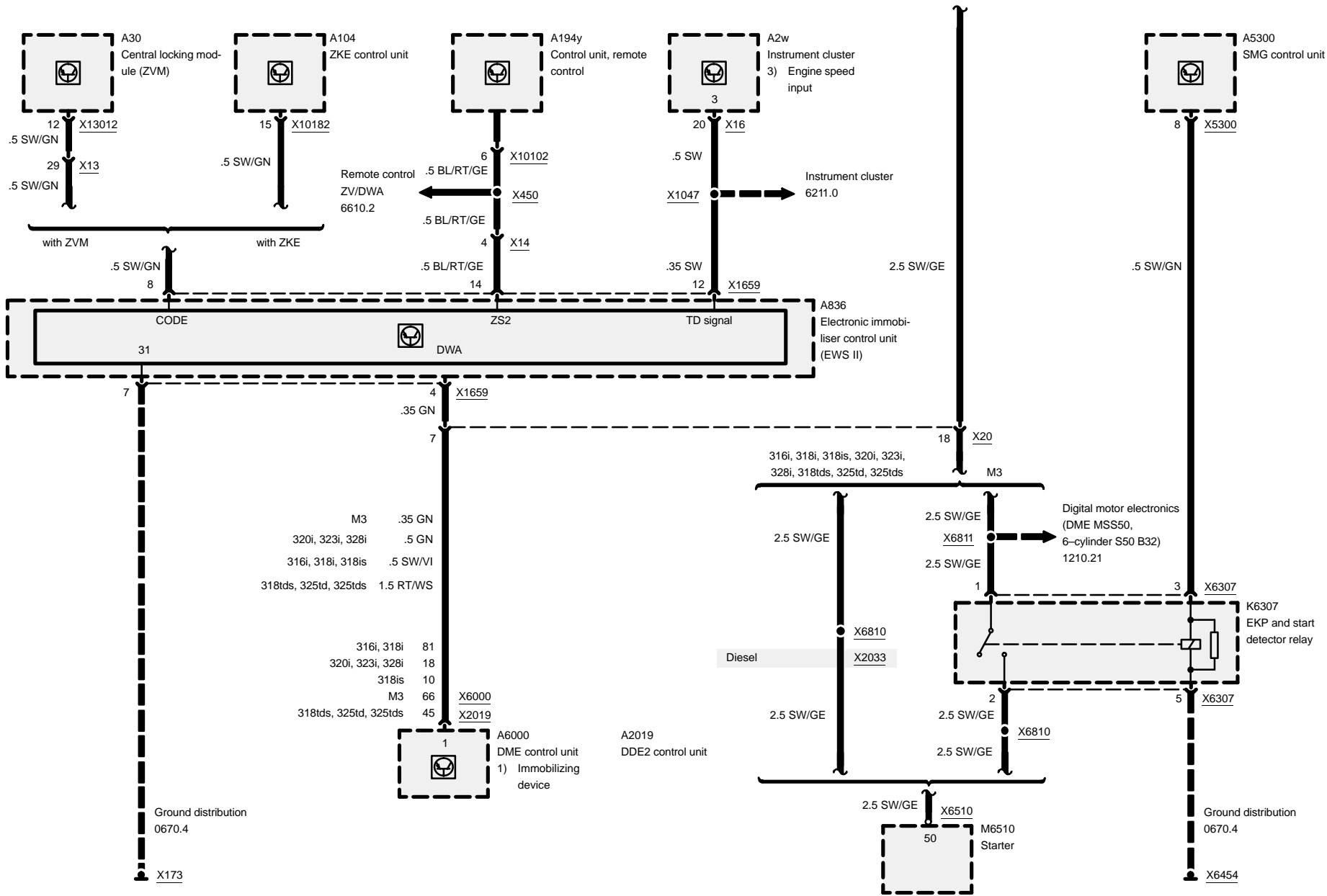




# 6135.0 Electronic immobiliser (EWS II)



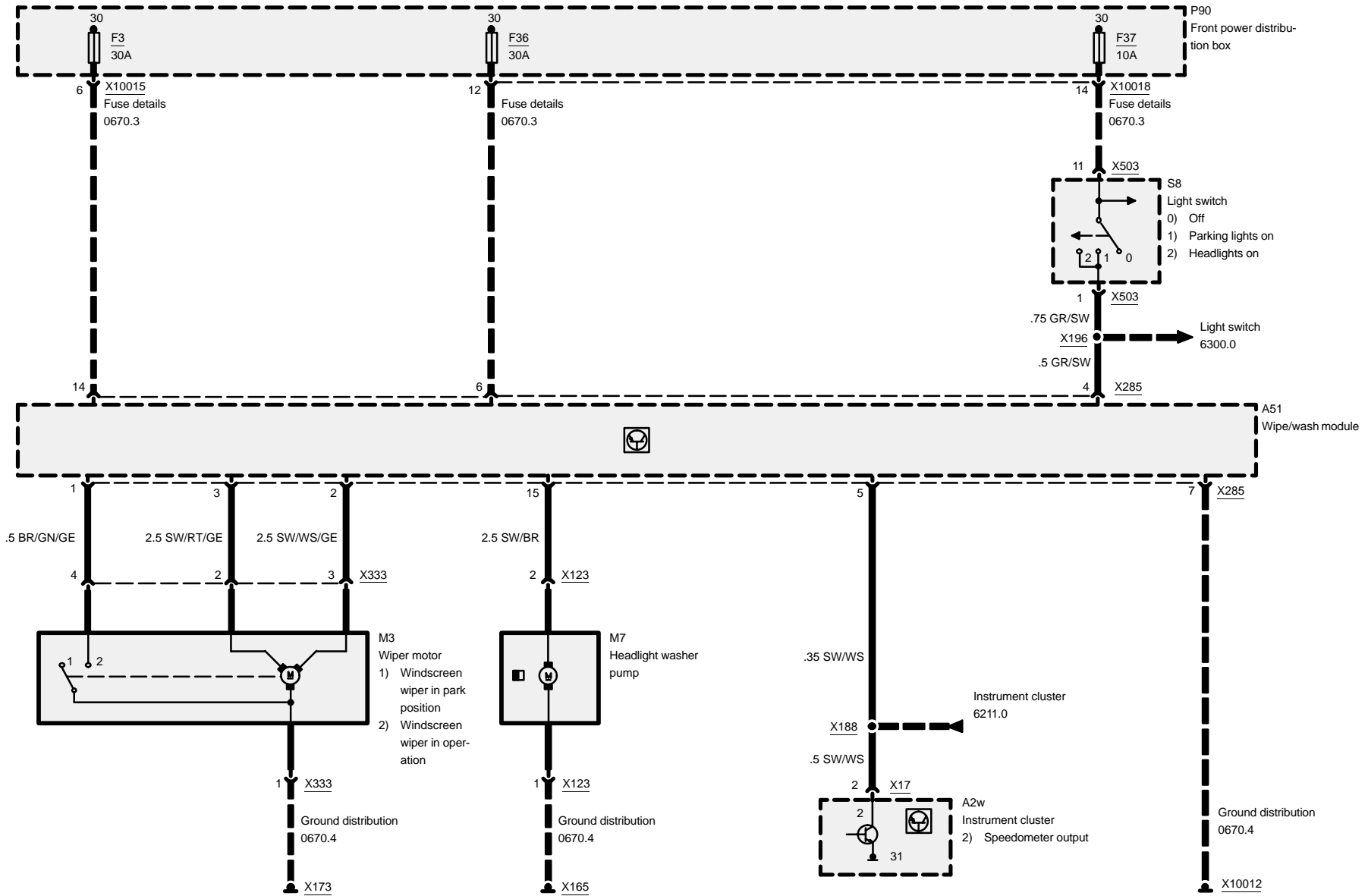






# 6160.1 Wipe/wash module (WWM)

## Wiper - High

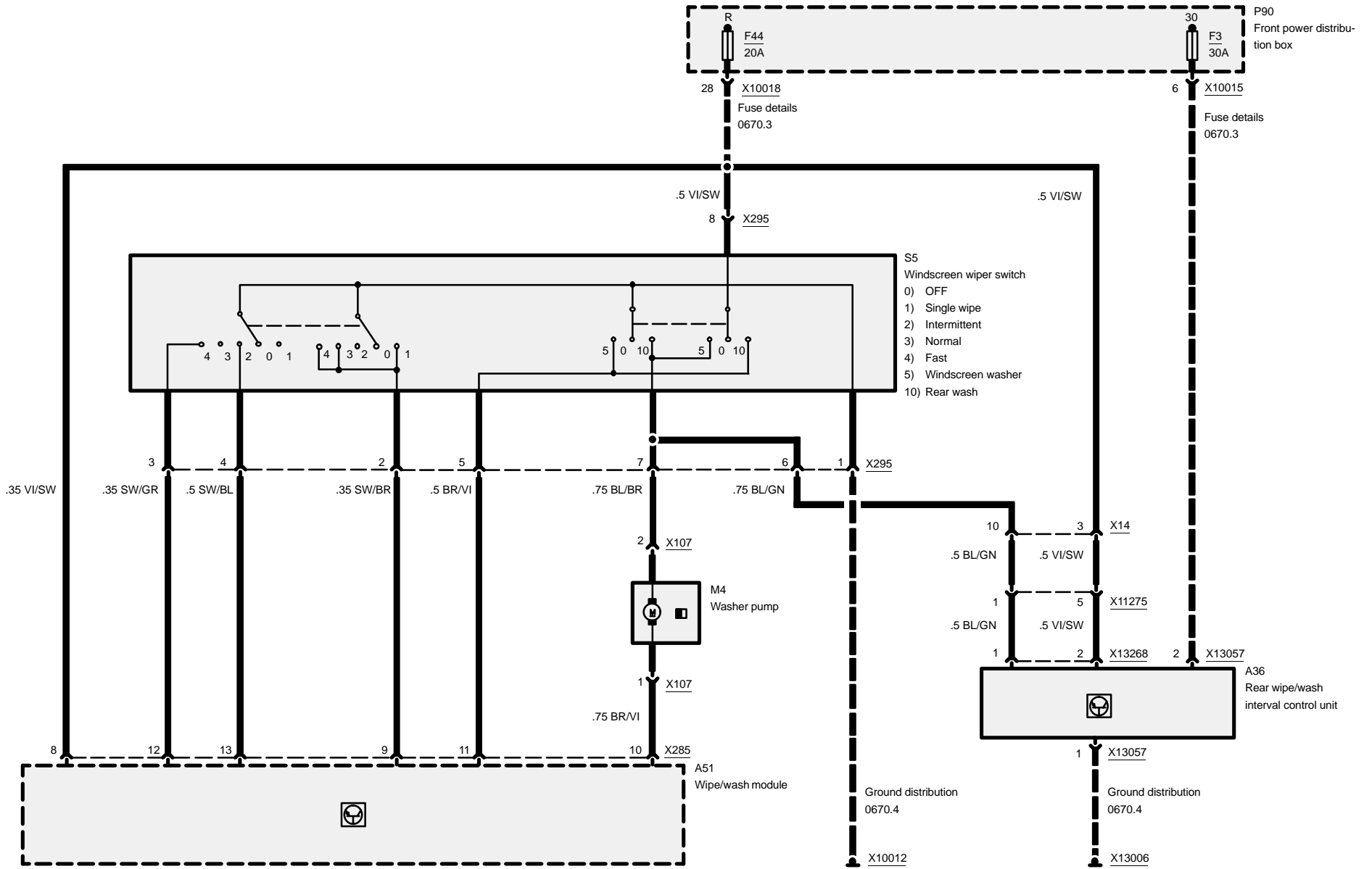




# Wipe/wash module (WWM)

## Washer, rear washer – High

Touring



05/99

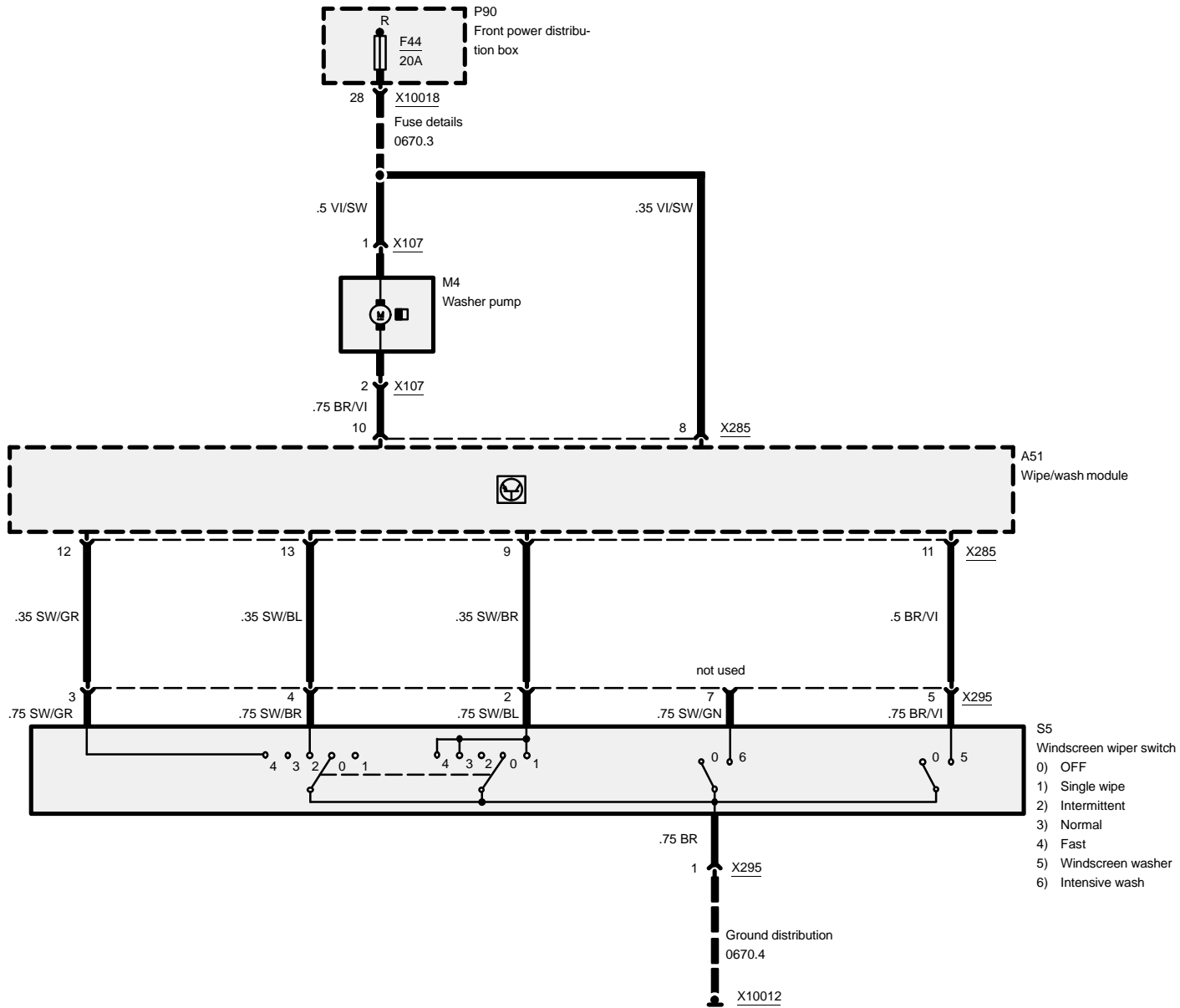
6160.1-01

1998



# Wipe/wash module (WWM)

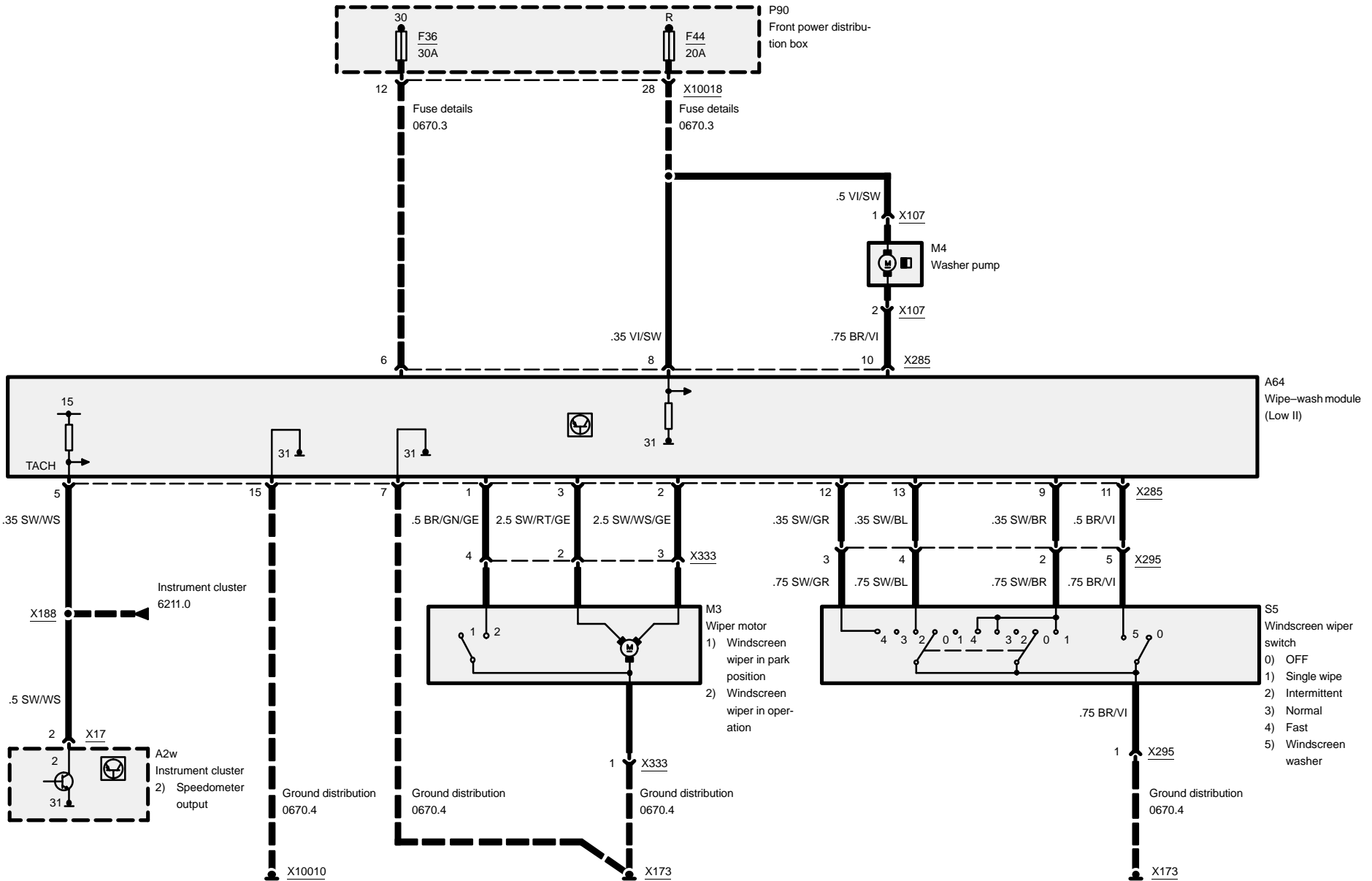
## Washer – High





# Wipe/wash module (WWM)

## Washer – Low

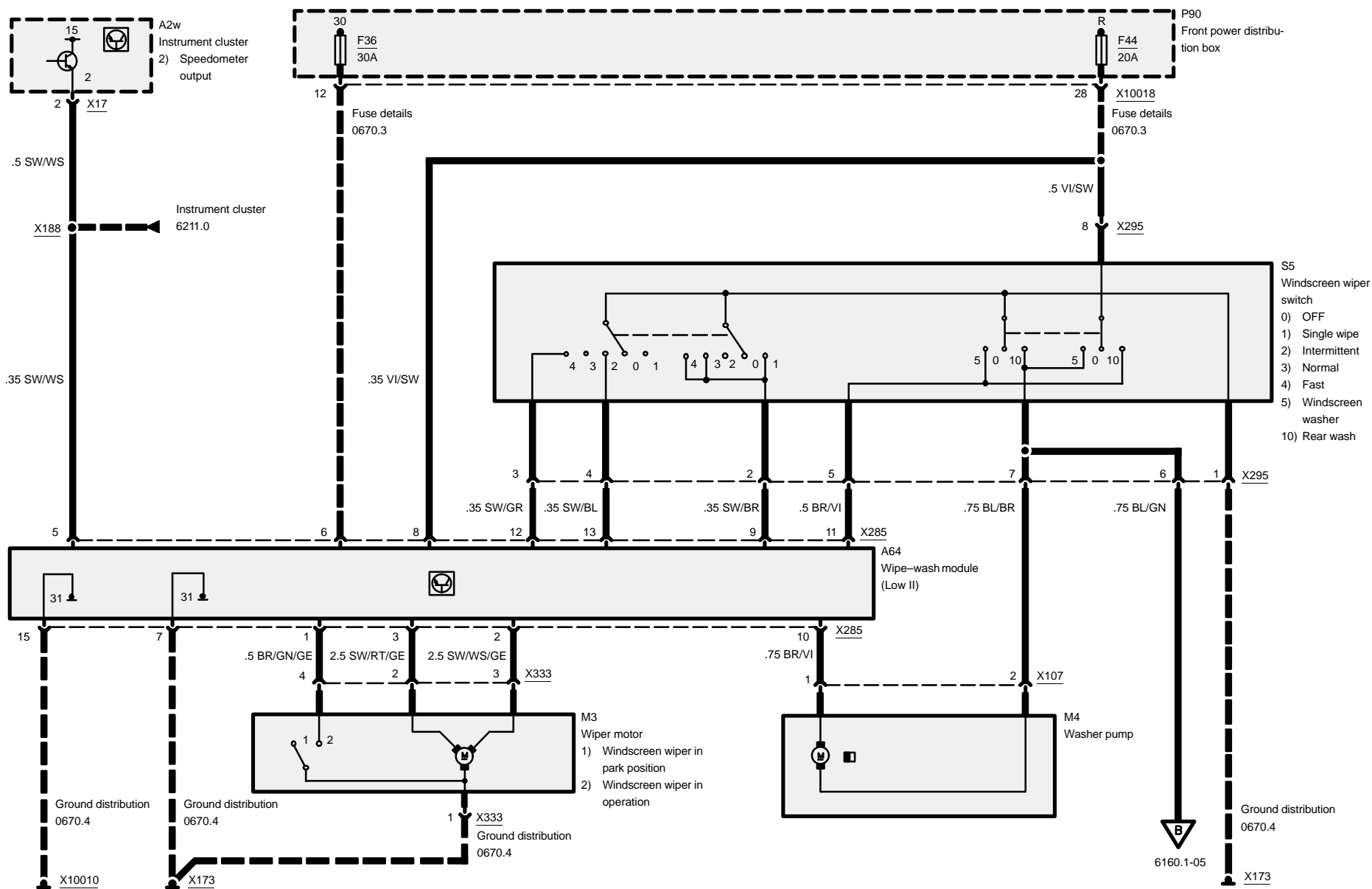




# Wipe/wash module (WWM)

## Washer – Low

# Touring

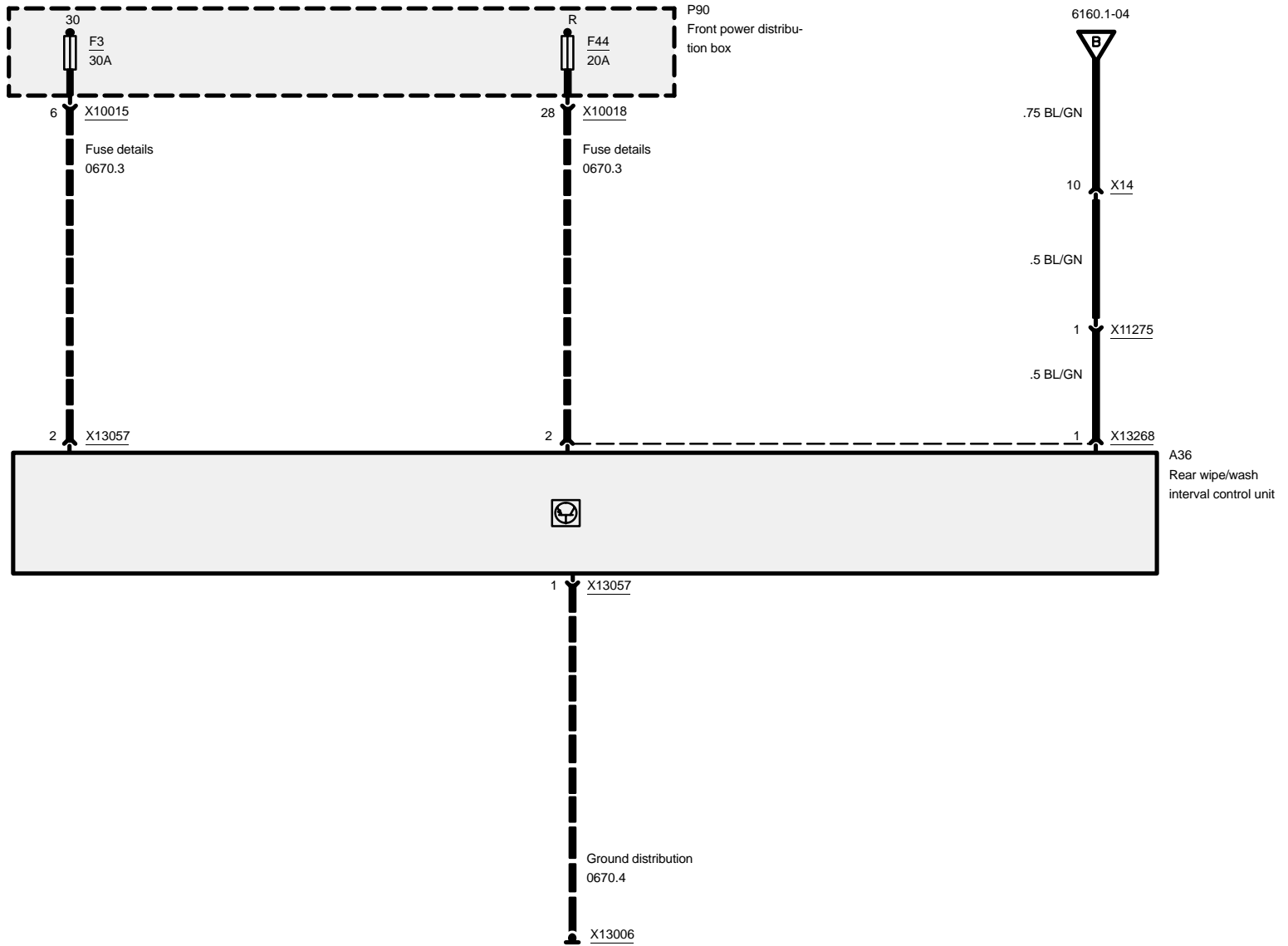




# Wipe/wash module (WWM)

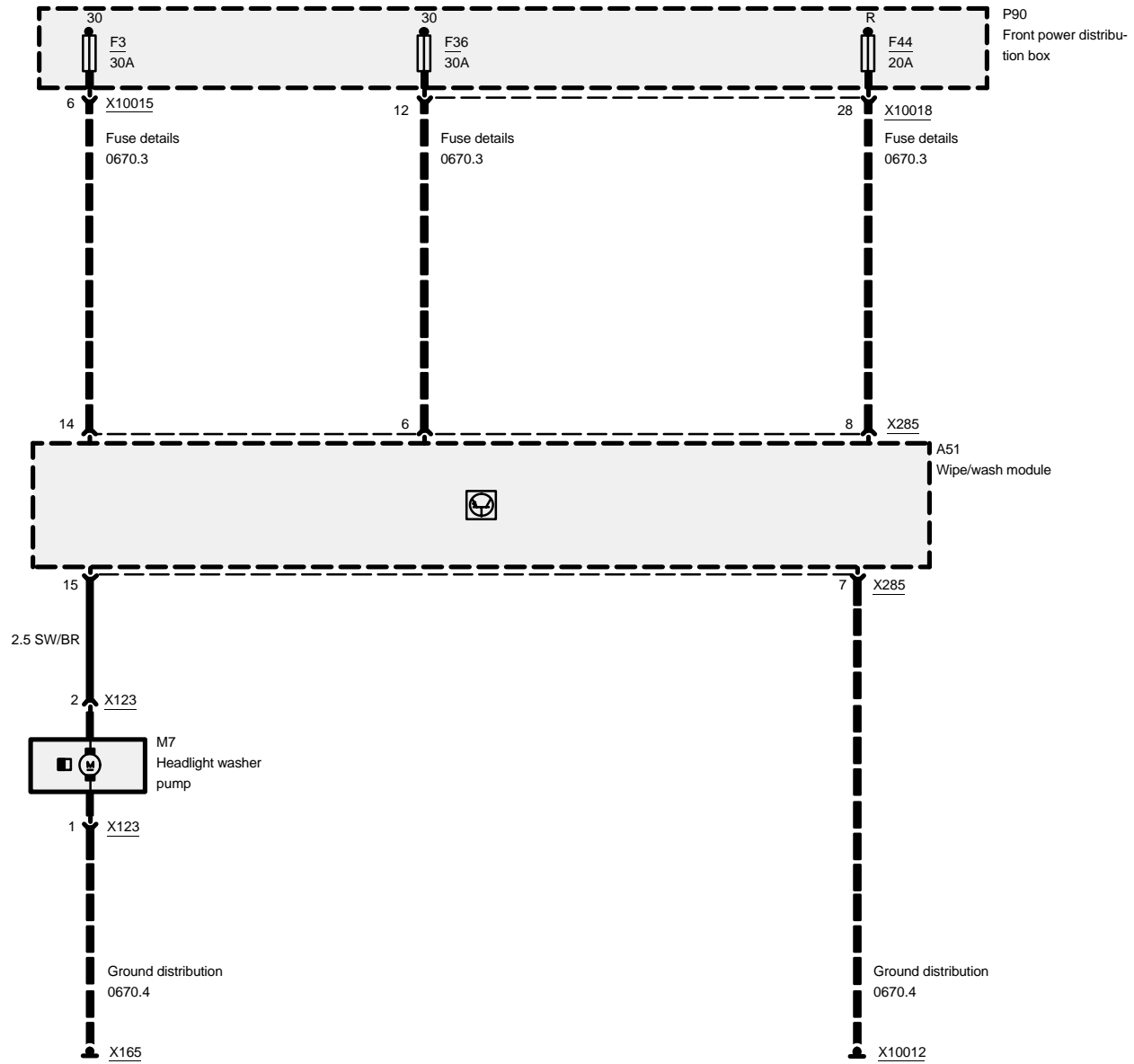
## Washer – Low

Touring





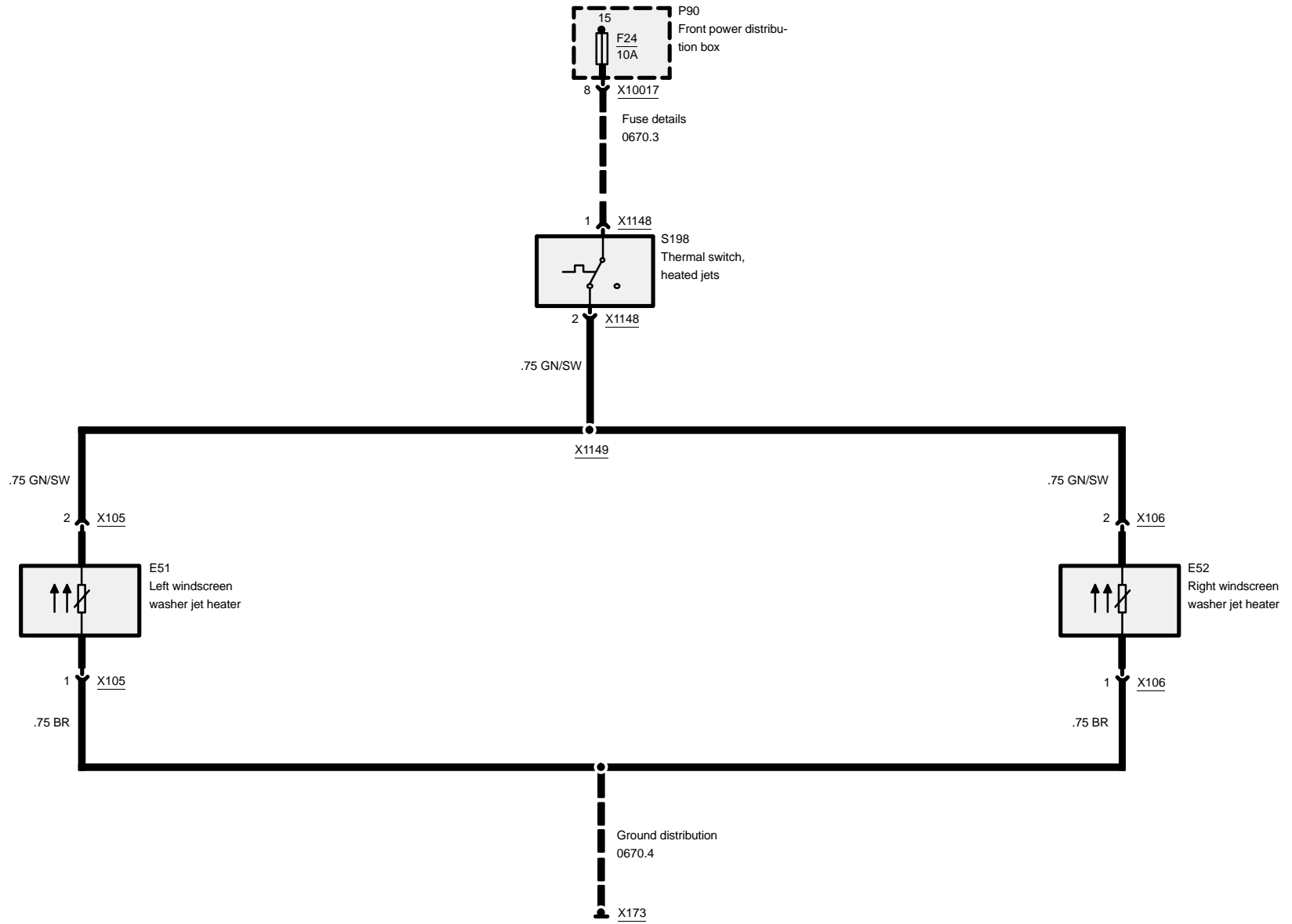
# 6167.1 Headlight washer system (SRA)

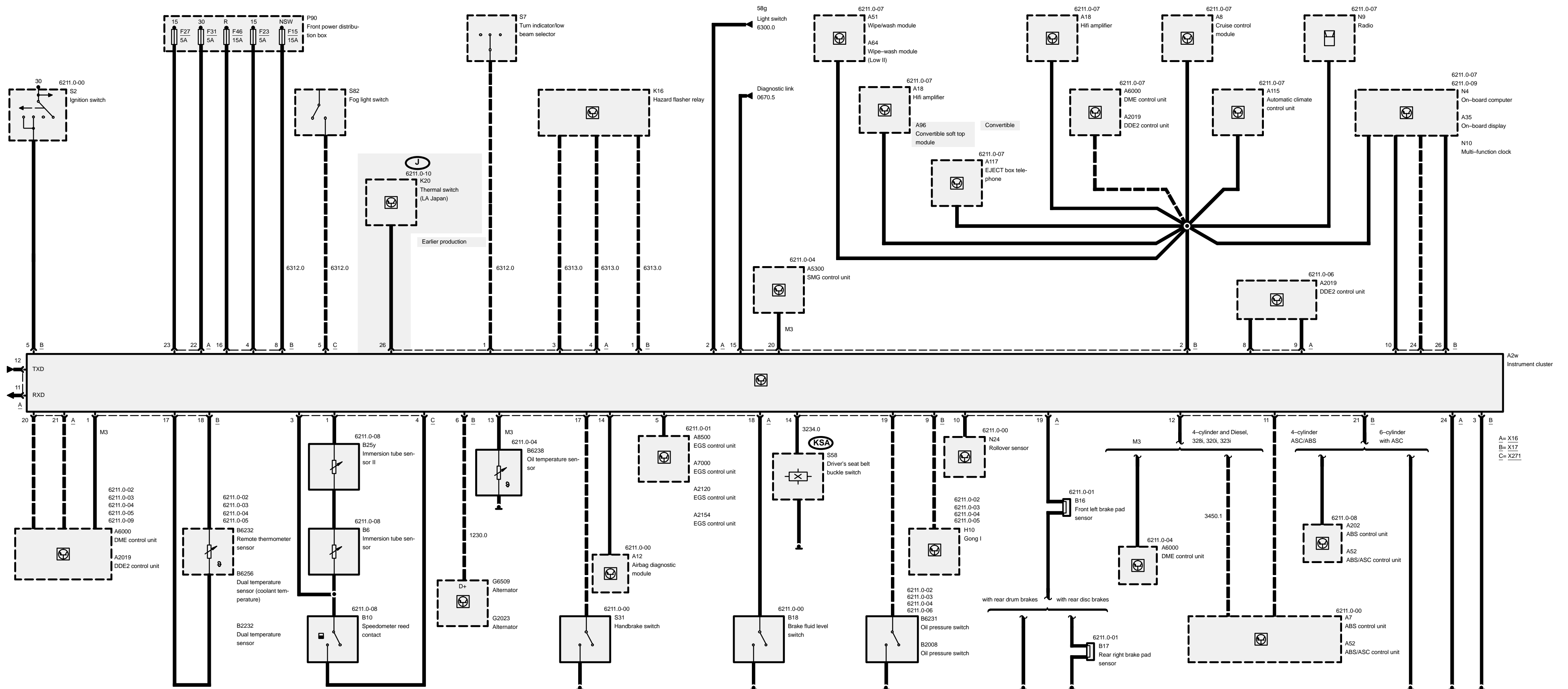


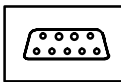




# 6169.0 Windscreen washer jet heaters







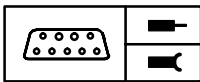
## Pin assignments

A=X16	26-pin, white
B=X17	26-pin, blue
C=X271	12-pin, black

### X16

Pin	Type	Description/Function	Connection
1	E	Indicator light, high beam	Low beam switch
2	E	Terminal 58g, instrument panel lights	Dimmer
3	E	Indicator lamp, turn signal indicator, right	Hazard warning light relay
4	E	Indicator lamp, turn signal indicator, left	Hazard warning light relay
5	E	Warning light, EGS fault, information signal, ATF temperature	EGS control unit
6		not used	
7		not used	
8	E	Fault lamp, DDE fault	DDE control unit
9	E	Preheating lamp (diesel engines)	DDE control unit
10	E	Fault lamp, rollover protection	Convertible soft top module
11	A	Diagnosis	RxD diagnostic socket
12	E/A	Diagnosis	TxD diagnostic socket
13	E	Oil temperature gauge	Oil temperature sensor
14	E	Warning light, airbag	Airbag control unit
15		not used	
16		not used	
17	E	Warning light, handbrake	Handbrake switch
18	E	Warning light, brake fluid	Brake fluid level switch
19	E	Warning lamp, brake pad wear	Brake pad sensor, front left
20	E	TD signal (engine speed signal)	Engine control unit (DME/DDE)
21	E	Fuel consumption signal	TI signal, DME control unit, TQ signal, DDE control unit
22	E	Terminal 30	Front power distribution box
23	E	Terminal 15/Power supply for indicator and warning lights	Front power distribution box
24	M	Terminal 31/Ground for instrument cluster electronics	Ground

E = Input, A = Output, M = Ground



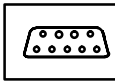
## Pin assignments

Pin	Type	Description/Function	Connection
25		not used	
26	E	Warning light, catalytic converter overtemperature	Thermo switch

### X17

Pin	Type	Description/Function	Connection
1	E	Indicator lamp, trailer turn signal indicator	Hazard warning relay/Oil level M3
2	A	Speedometer A-signal	Various control units
3	M	Terminal 31/Ground for indicator and warning lights	Ground
4	E	Terminal 15/Power supply for instrument cluster electronics	Front power distribution box
5	E	Terminal 15/Power supply for battery charge indicator	Ignition and starting switch
6	E	Terminal 61/Ground for battery charge indicator	Alternator
7		not used	
8	E	Indicator lamp, front fog light	Front power distribution box
9	A	Acoustics output/acoustic warning signal	Acoustic sensor (gong)
10	A	Information signal, tank contents	On-board computer
11	E	Warning lamp, antilock brake system (ABS)	ABS control unit
12	E	Signal, upshift	DME control unit (M3)
12	E	Warning lamp, anti-slip control (ASC)	ASC control unit
13		not used	
14	E	Warning light/seat belt warning	Seat belt contact (USA, Canada and Gulf countries)
15	E	SIA reset/Reset service interval indicator	Diagnostic socket
16	E	Terminal R	Front power distribution box
17	E	Coolant temperature sensor	Coolant temperature sensor
18	E	Coolant temperature sensor	Coolant temperature sensor
19	E	Warning light, oil pressure	Oil pressure switch
20	E	Fault lamp	SM transmission (M3)
21	A	ABS indicator lamp	ABS control unit
21	M	Terminal 31	Ground (with ASC)
22		not used	

E = Input, A = Output, M = Ground



## Pin assignments

Pin	Type	Description/Function	Connection
23		not used	
24	A	Dimmer signal/brightness information signal for connected control units	On-board computer
25		not used	
26	E	Central indicator lamp/check control	On-board computer

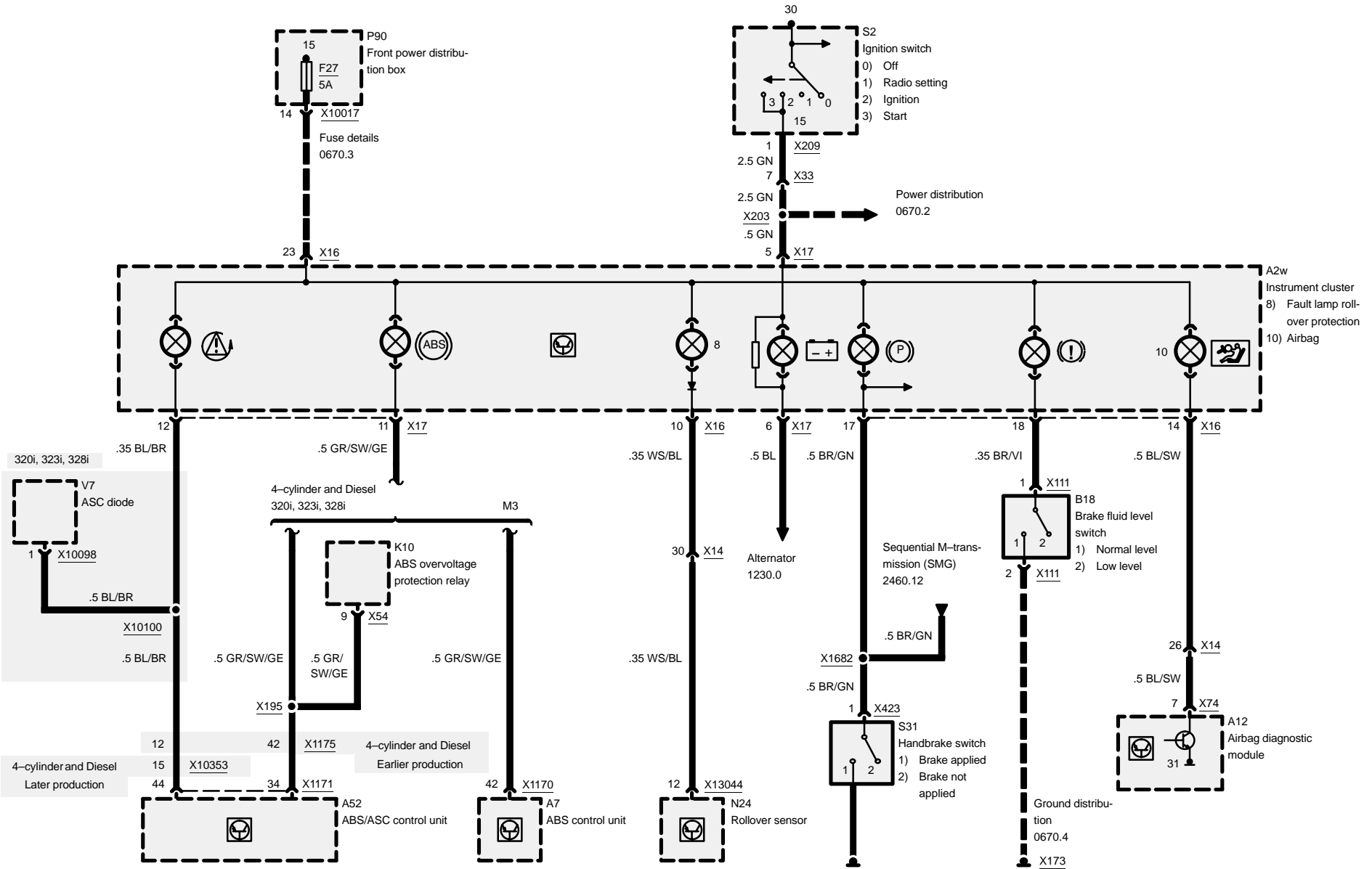
### X271

Pin	Type	Description/Function	Connection
1	A	Fuel tank sensor/fuel level sensor	Fuel tank sensor
2		not used	
3	A	Fuel tank sensor, position signal generator (reed contact)	Ground, terminal 31b
4	E	Position signal TW	Position signal generator (reed contact)
5	E	Indicator lamp, rear fog light	Rear fog lamp switch
6		not used	
7		not used	
8		not used	
9		not used	
10		not used	
11		not used	
12		not used	



# Instrument cluster

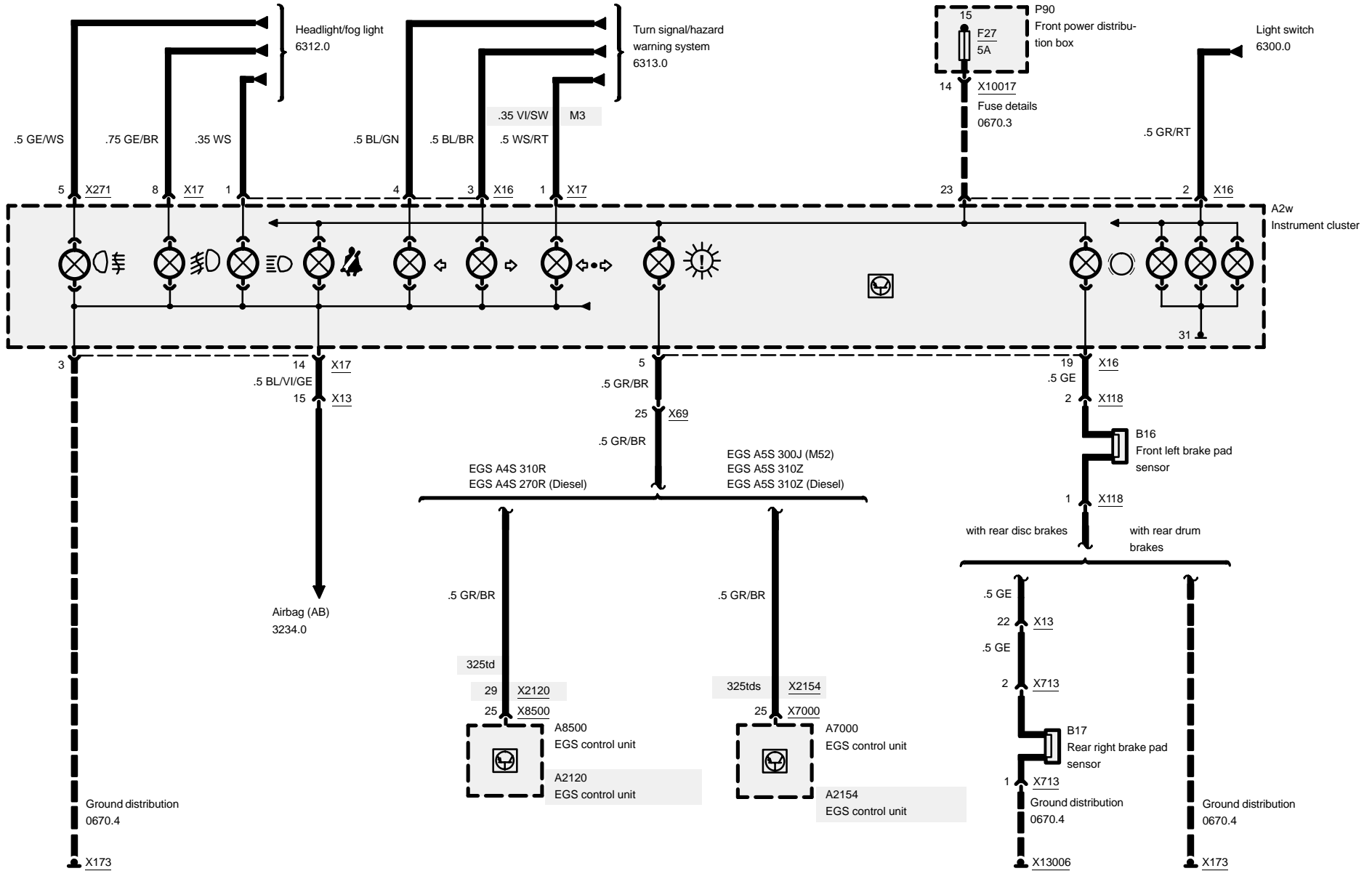
## Instrument cluster gauges





# Instrument cluster

## Instrument cluster gauges

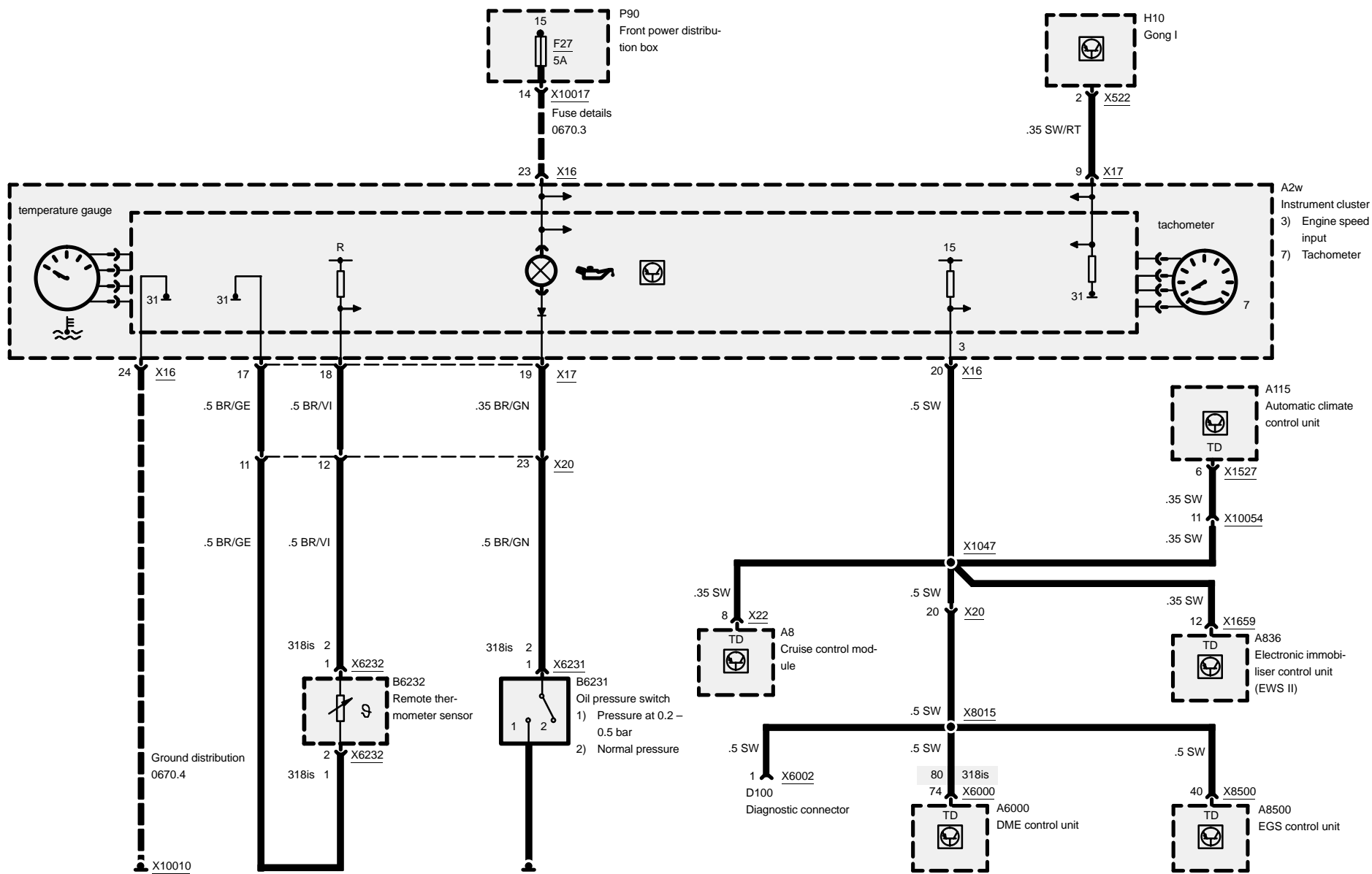




# Instrument cluster

## Instrument cluster gauges

316i, 318i, 318is



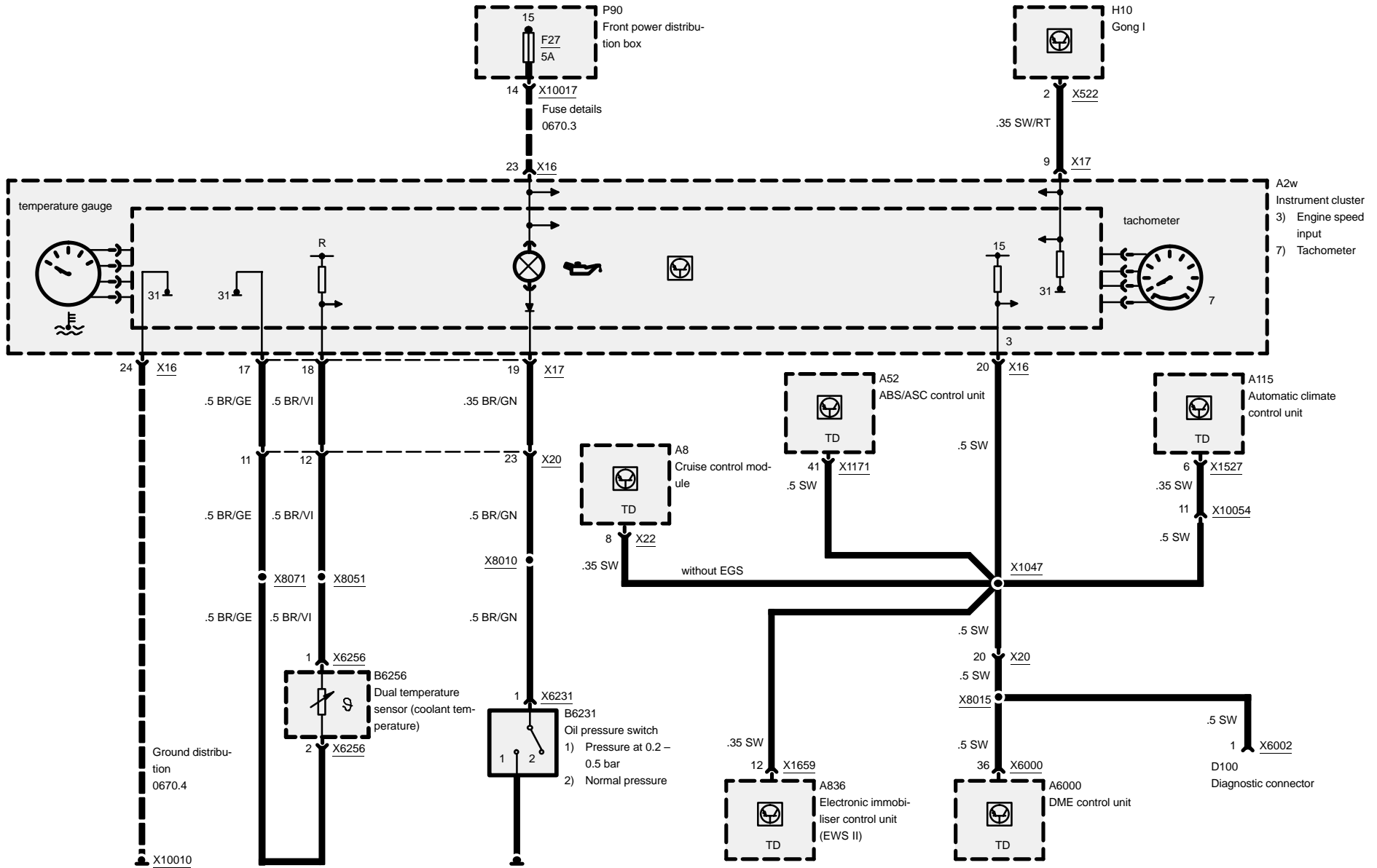




# Instrument cluster

## Instrument cluster gauges

320i, 323i, 328i

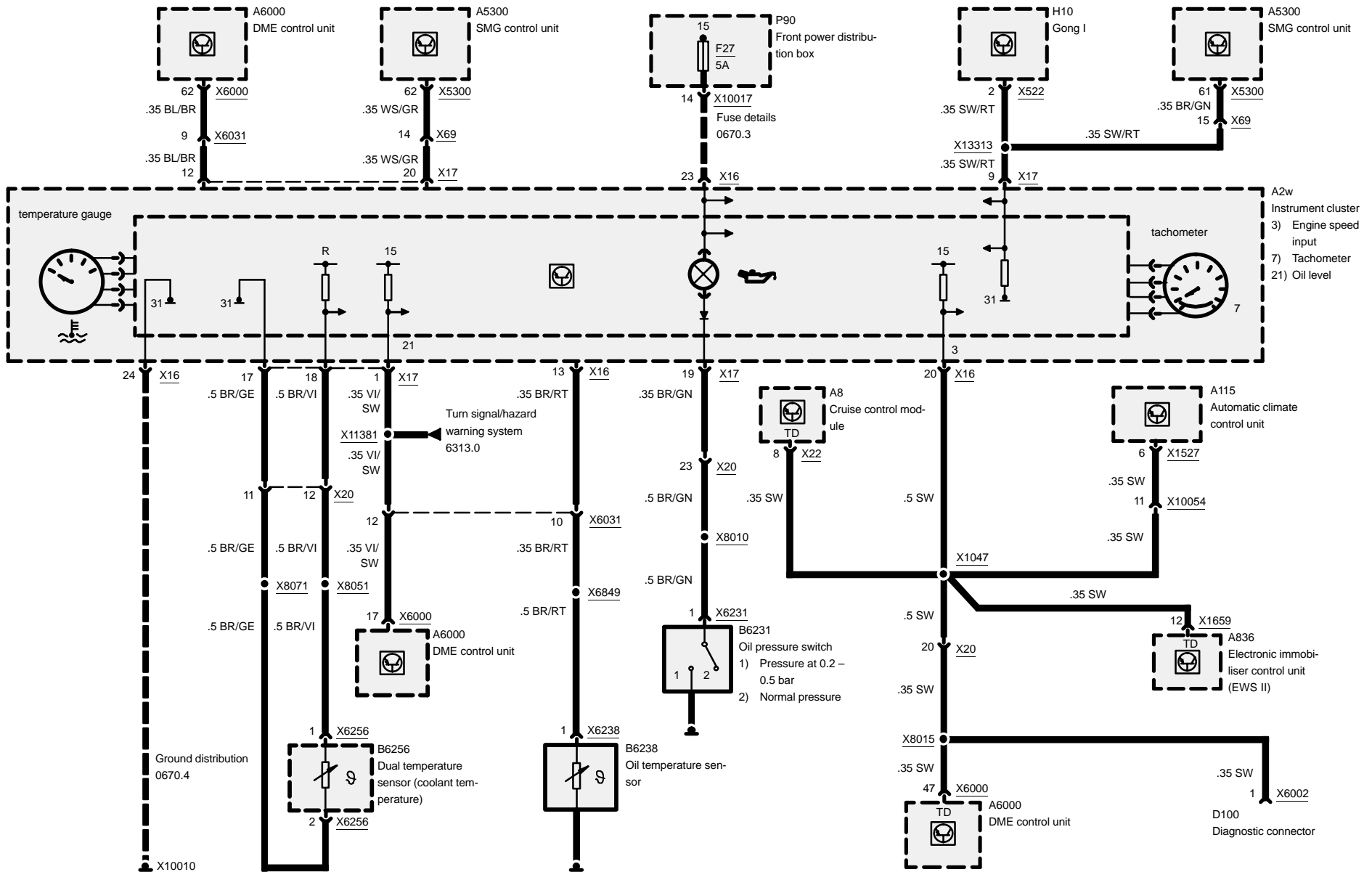




# Instrument cluster

## Instrument cluster gauges

M3

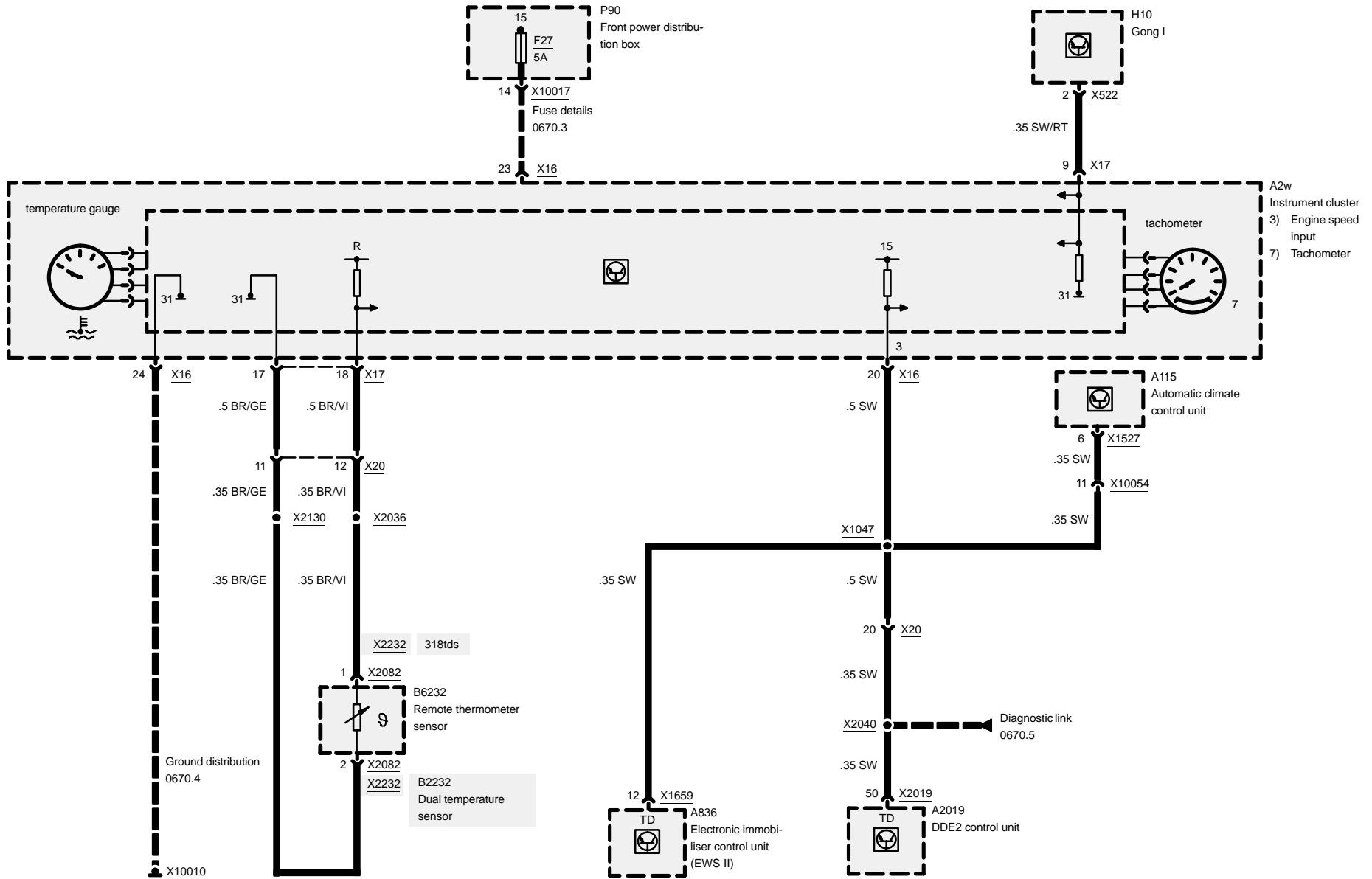




# Instrument cluster

318tds, 325td, 325tds

## Instrument cluster gauges

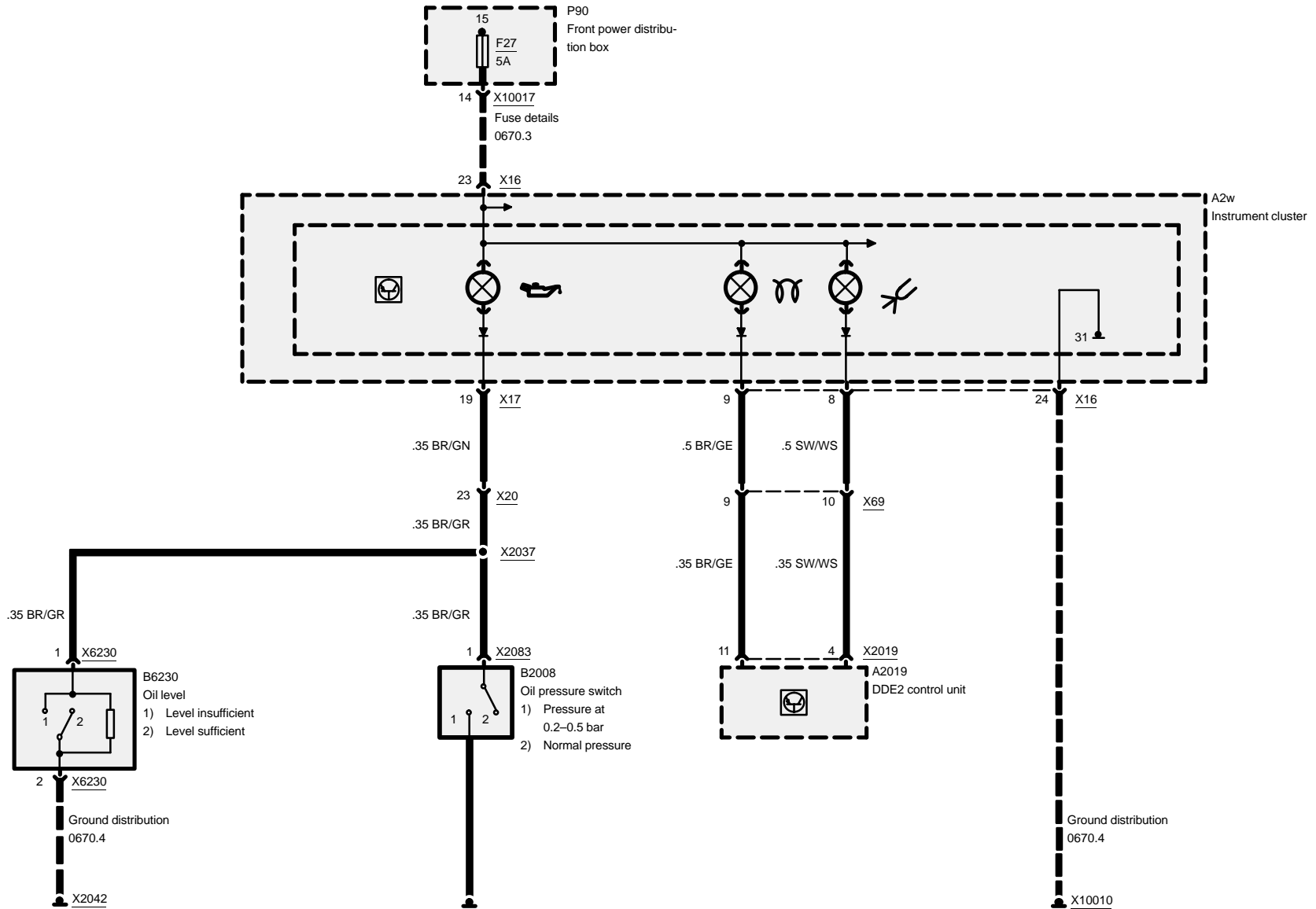




# Instrument cluster

318tds, 325td, 325tds

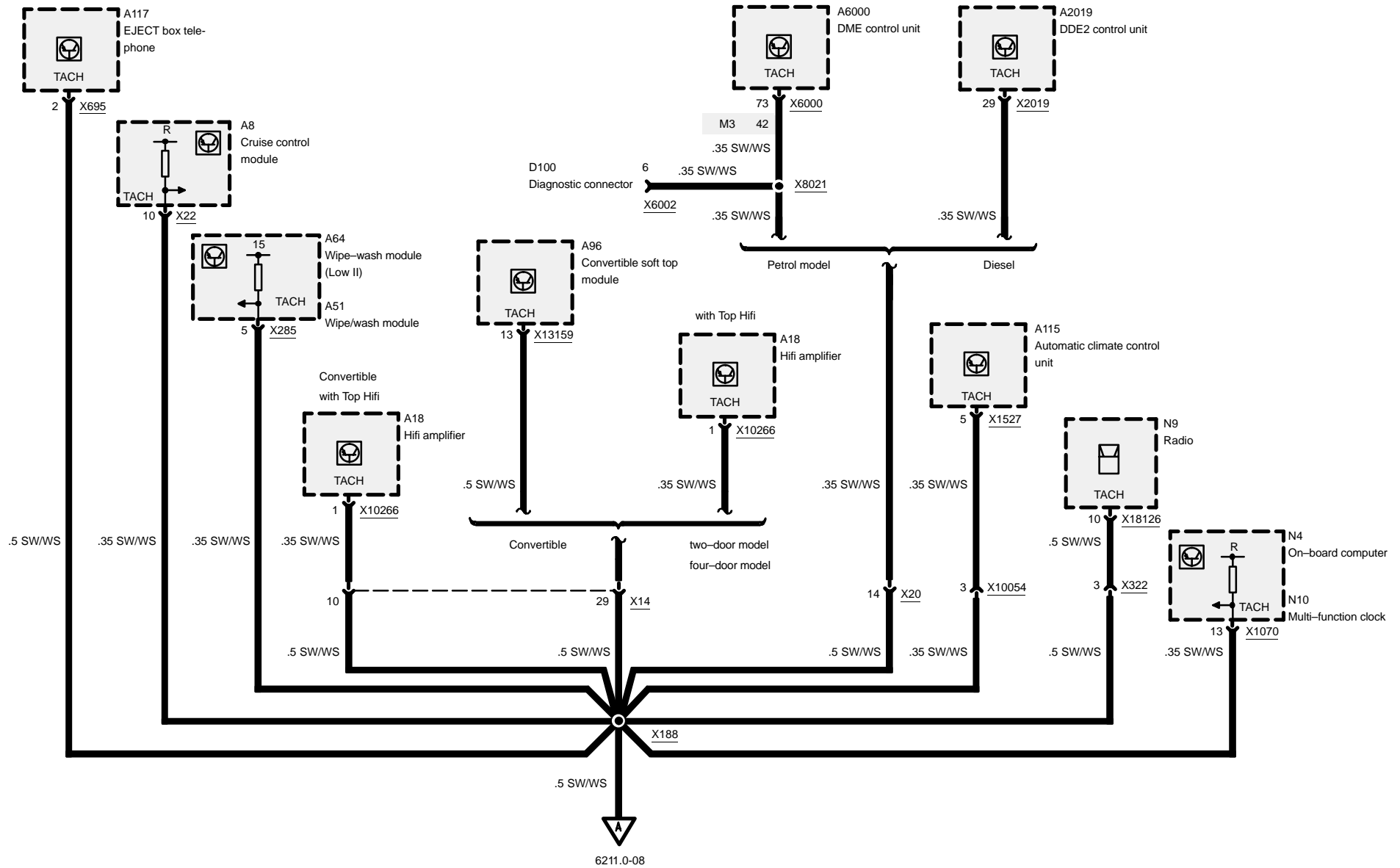
## Instrument cluster gauges





# Instrument cluster

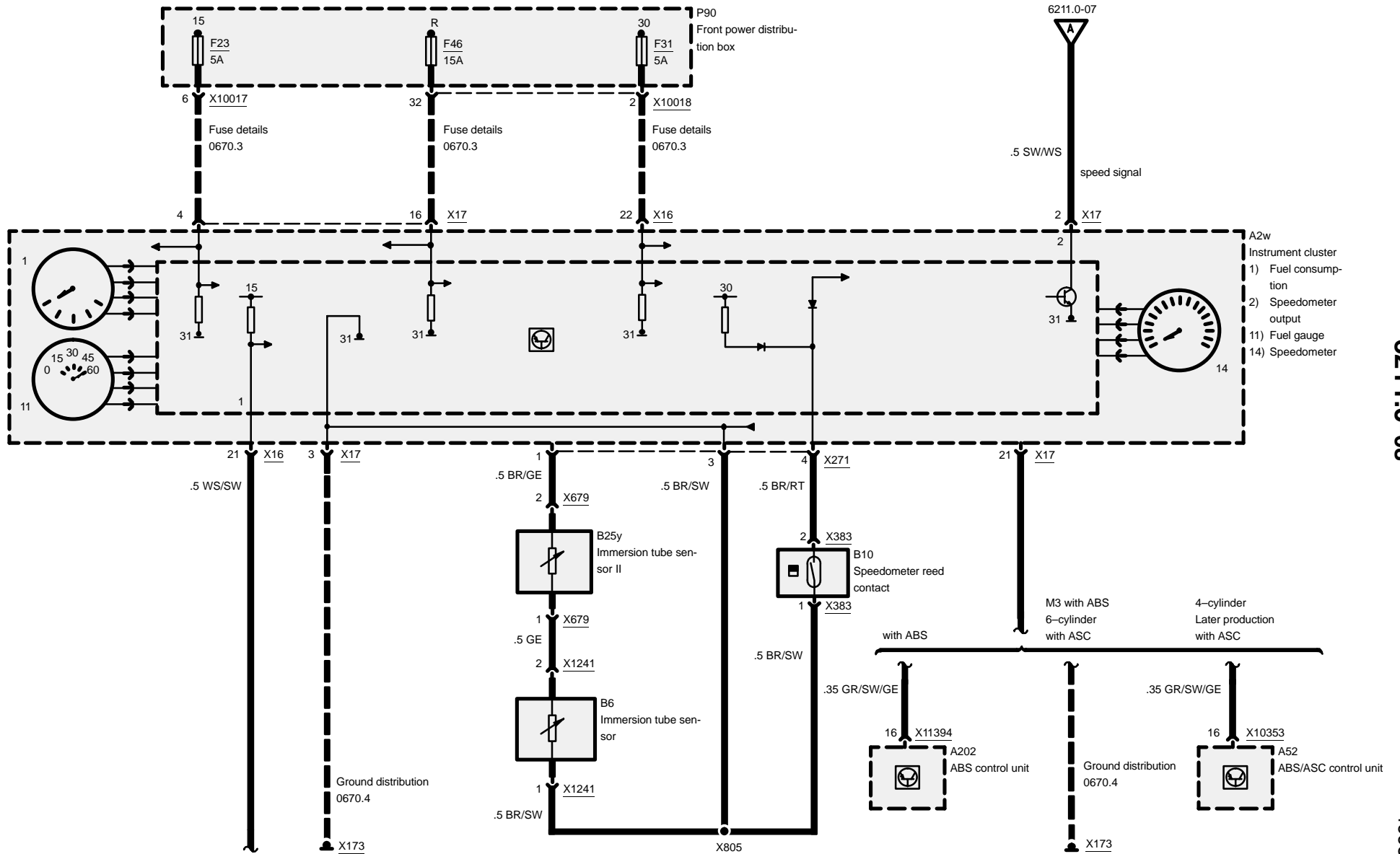
## Speed output signal

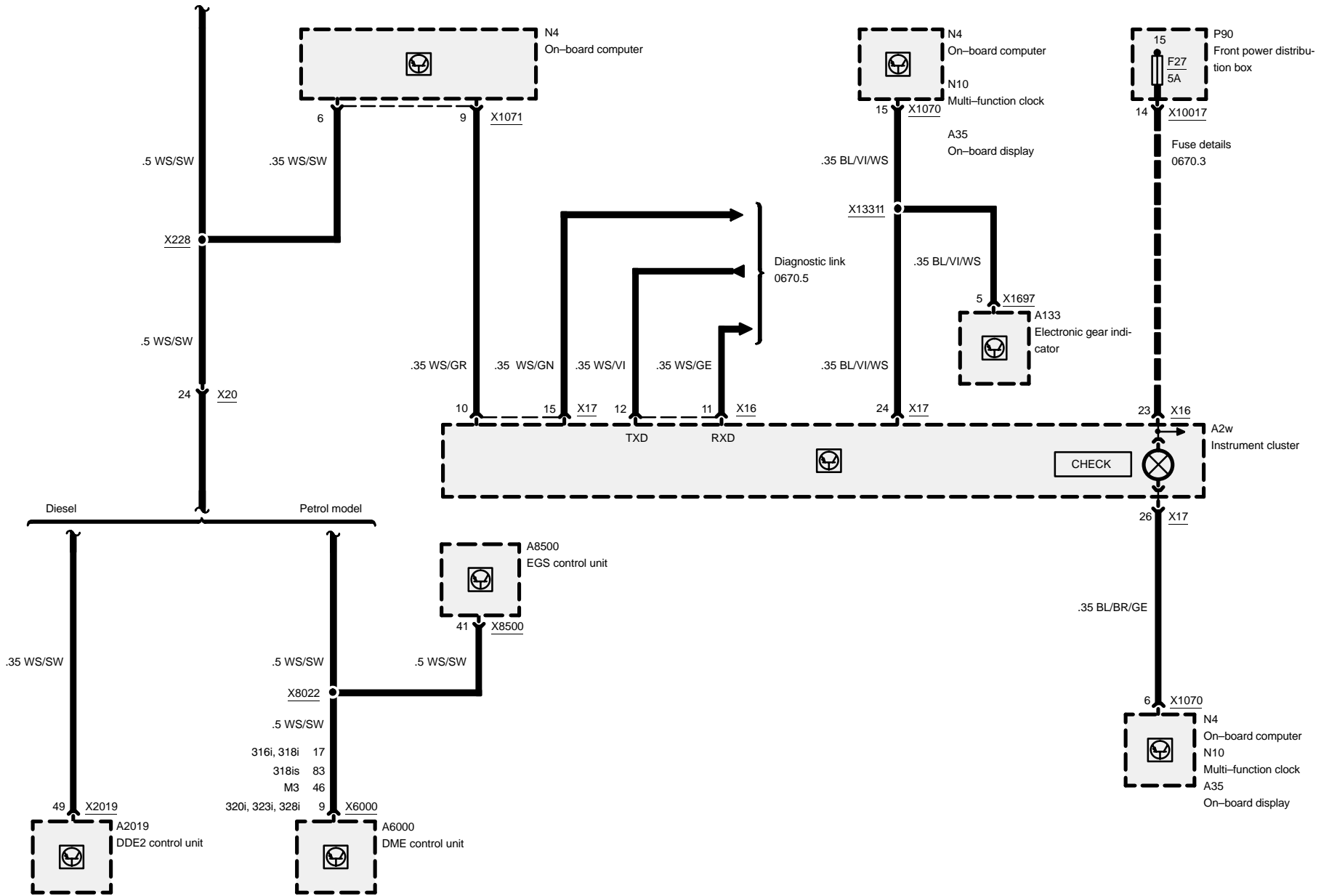




# Instrument cluster

## Instrument cluster gauges

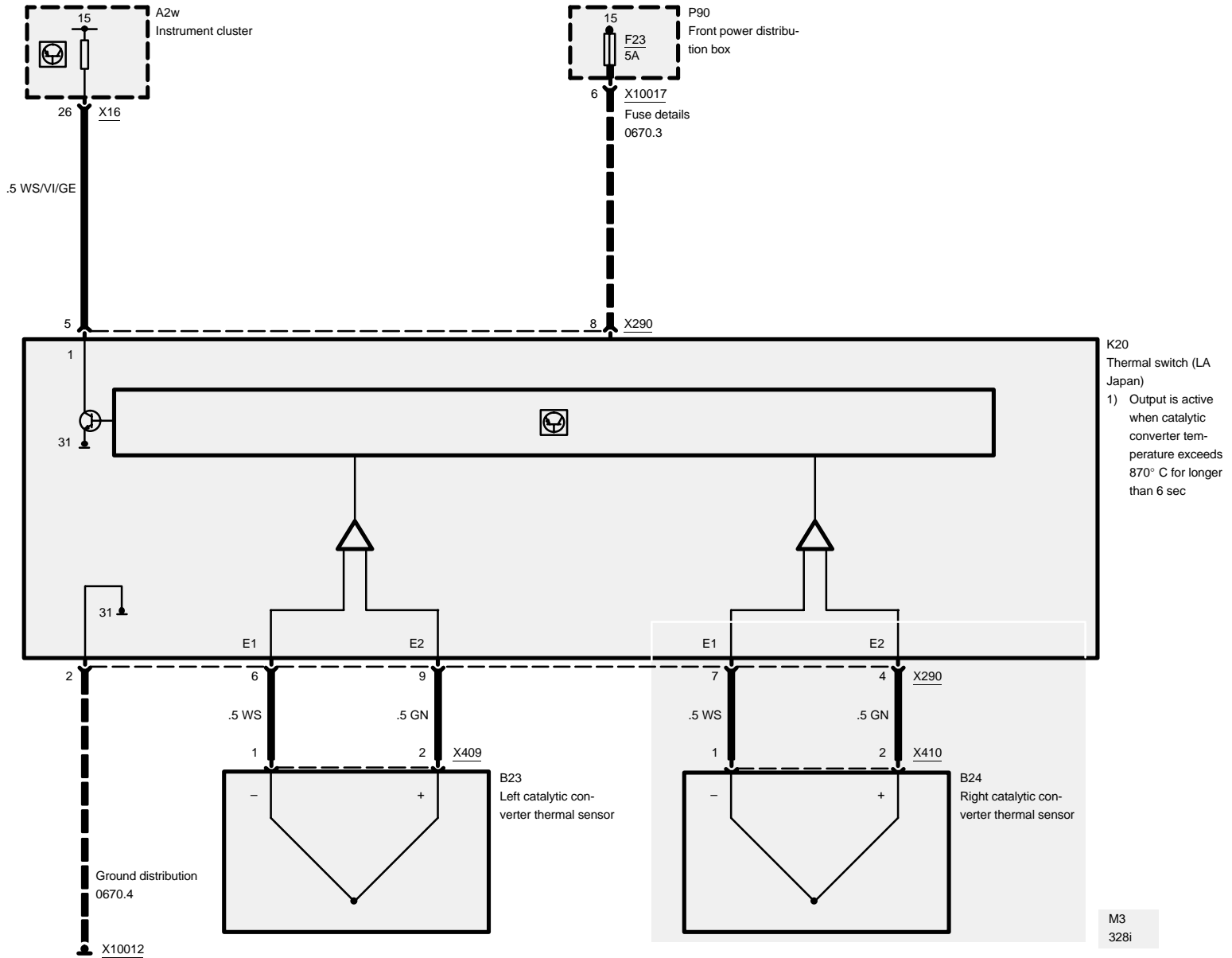






# Instrument cluster

J Earlier production

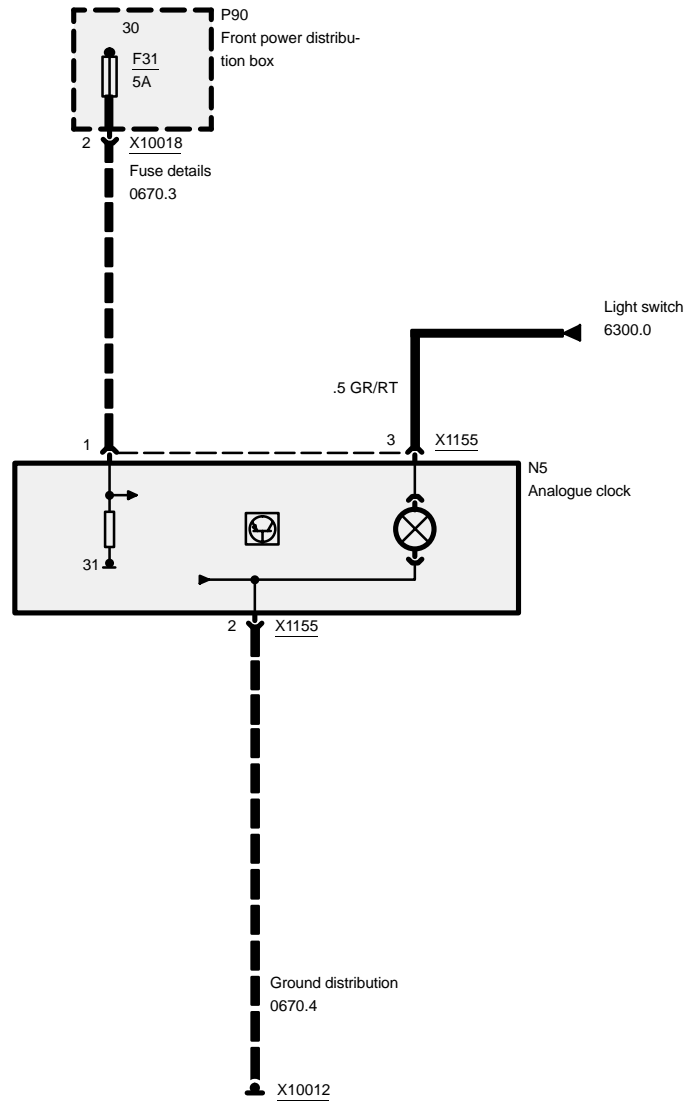


M3 328i



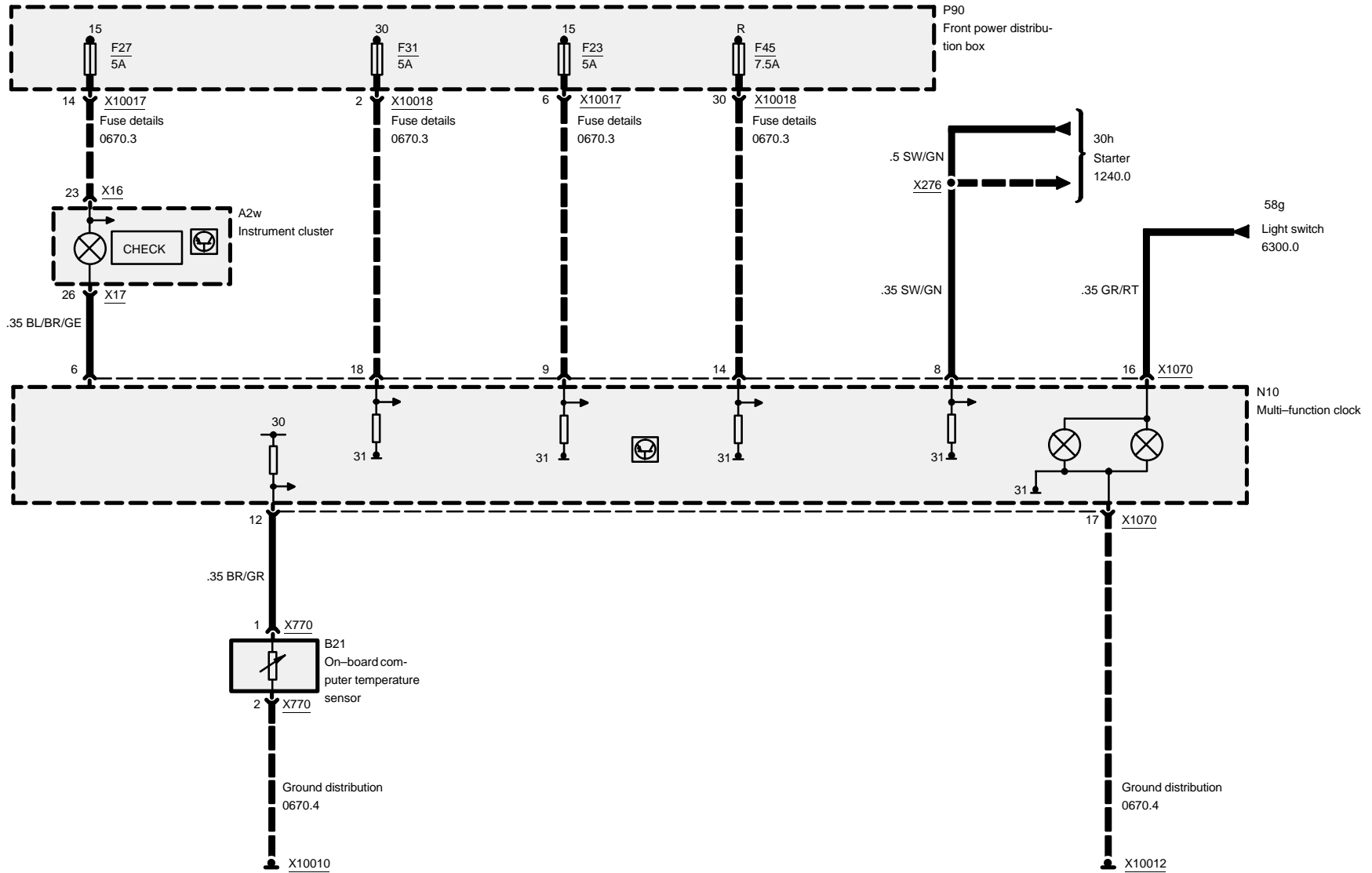


# 6213.1 Analogue clock





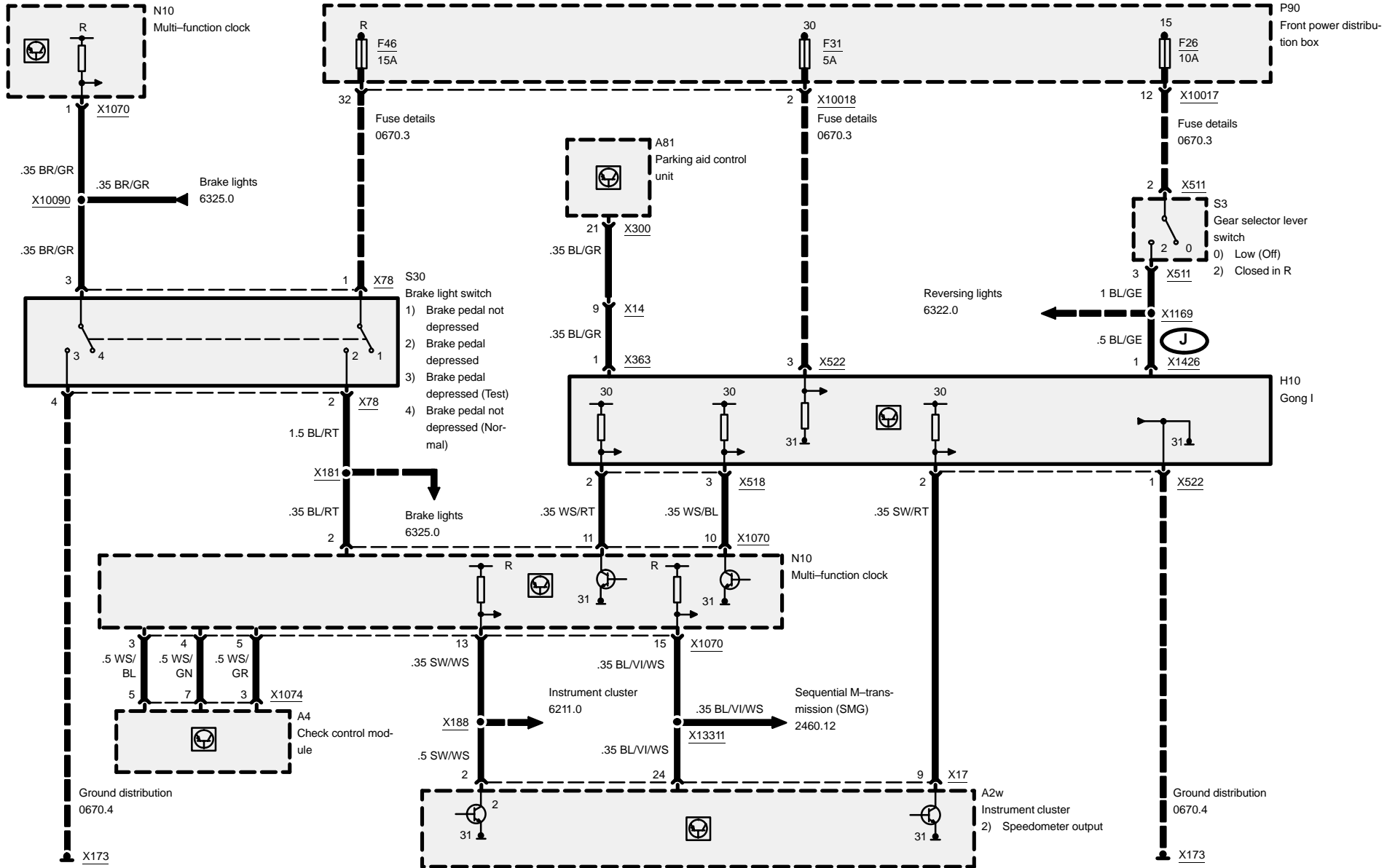
# 6213.2 Multi-function clock





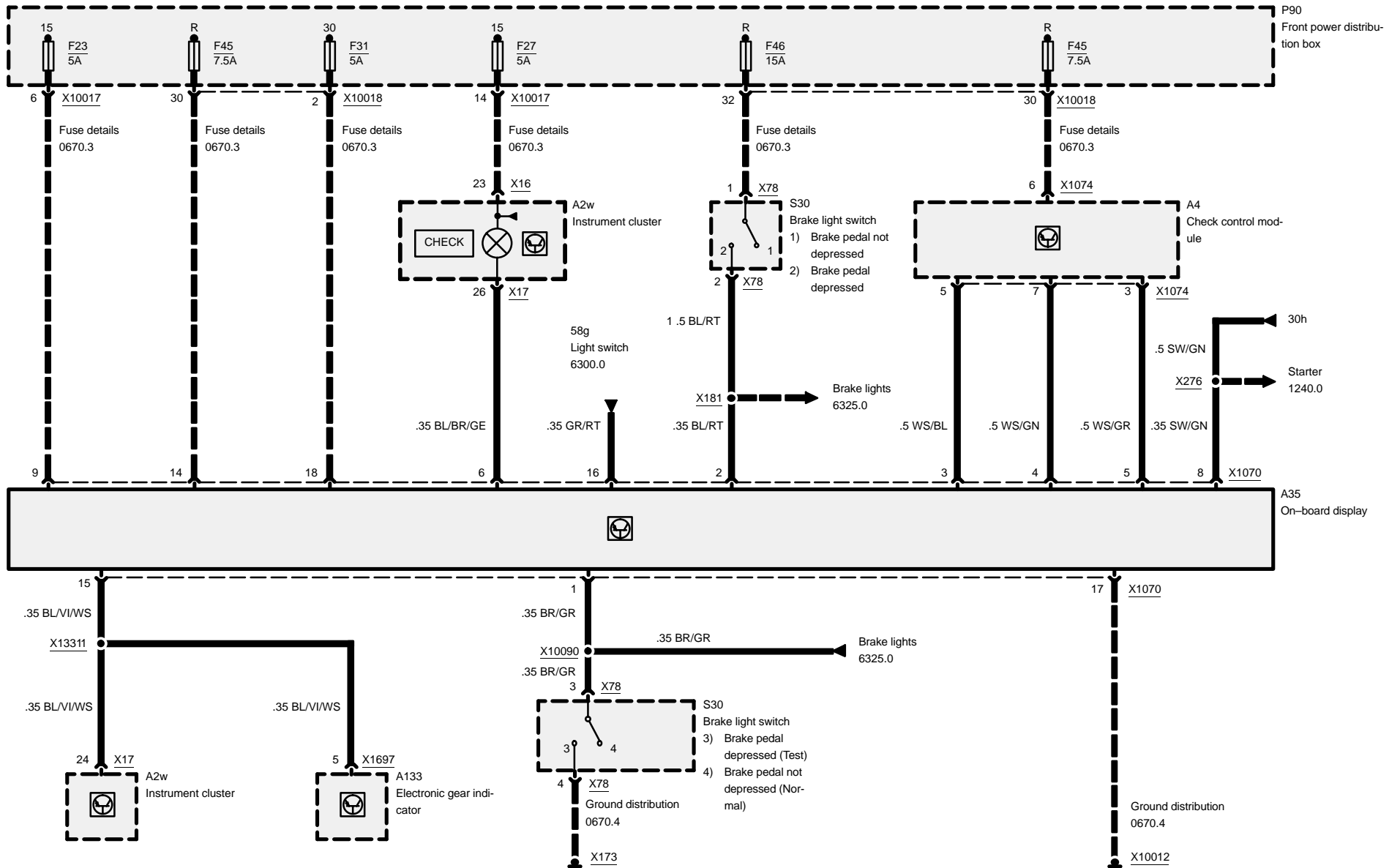
# Multi-function clock

## With CM



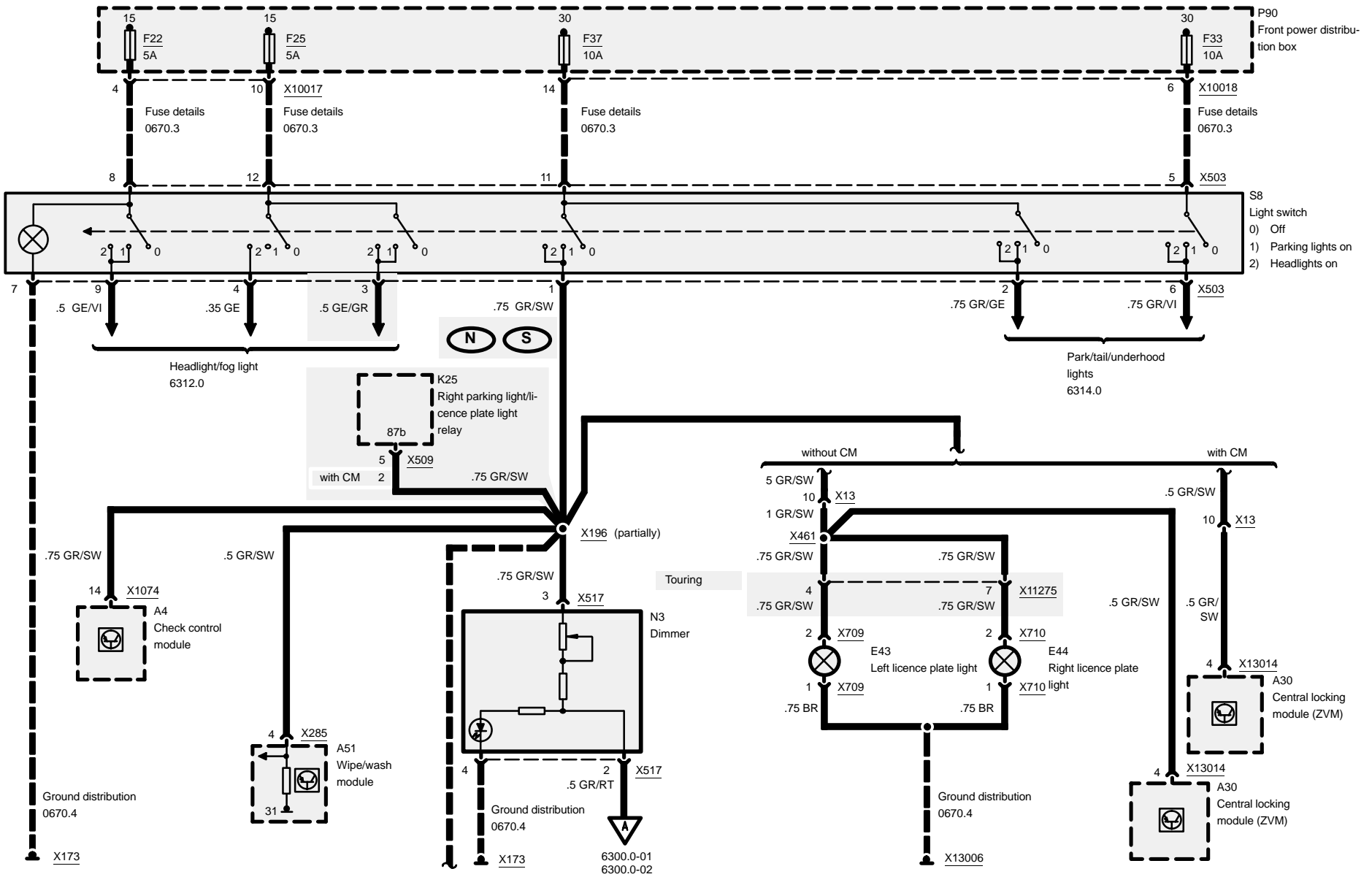


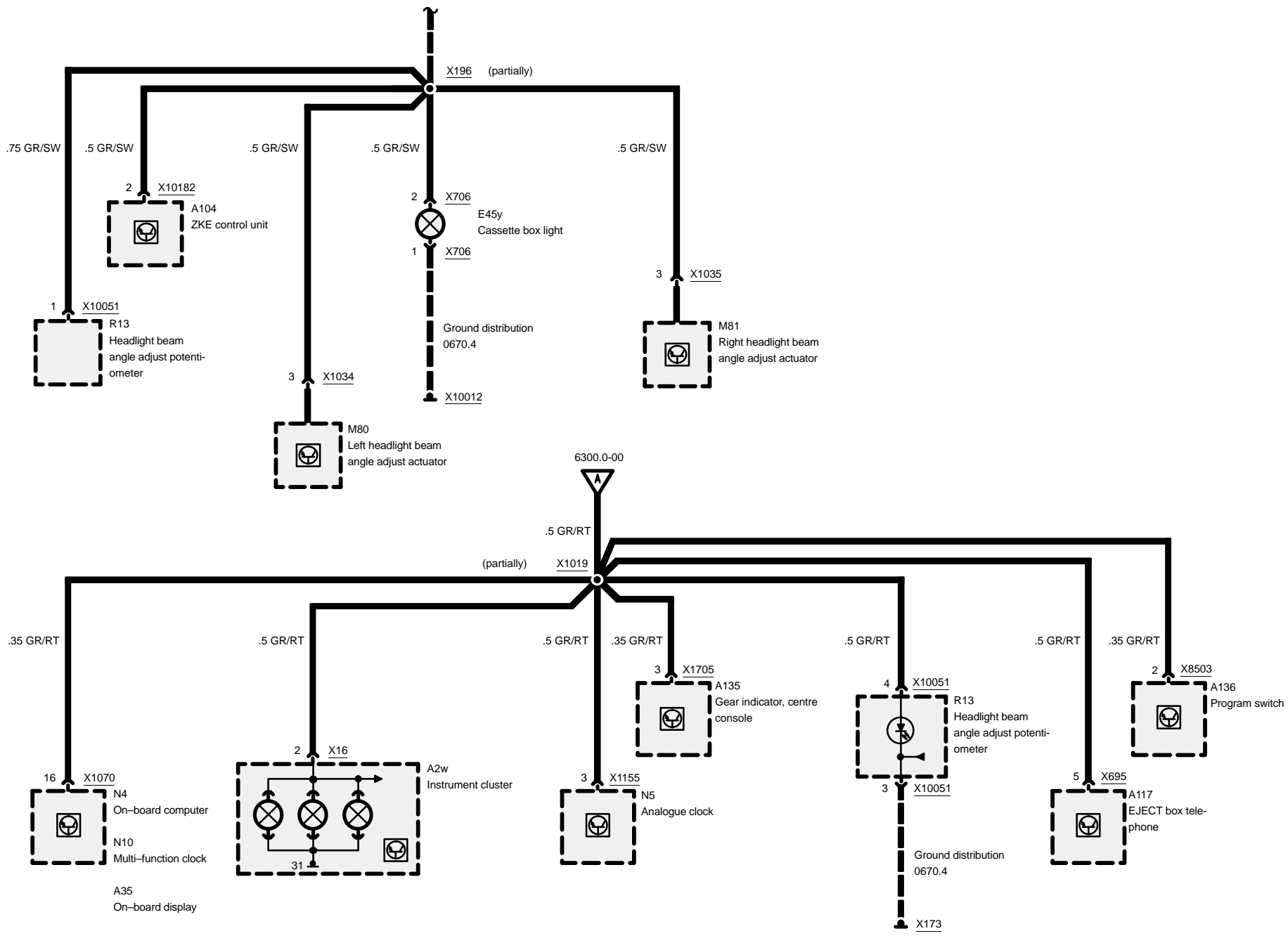
# 6214.0 On-board display





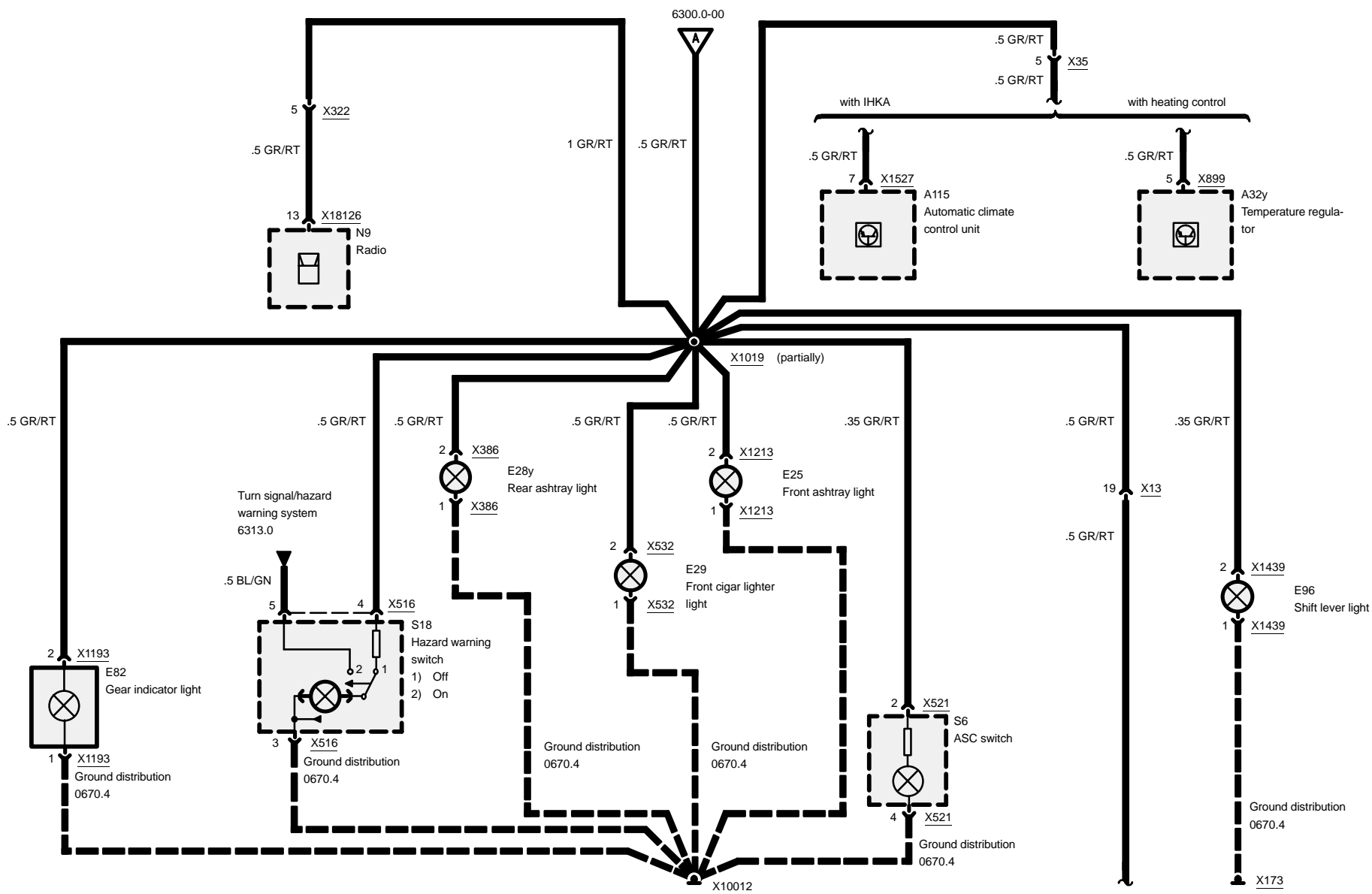
# 6300.0 Light switch







# Light switch

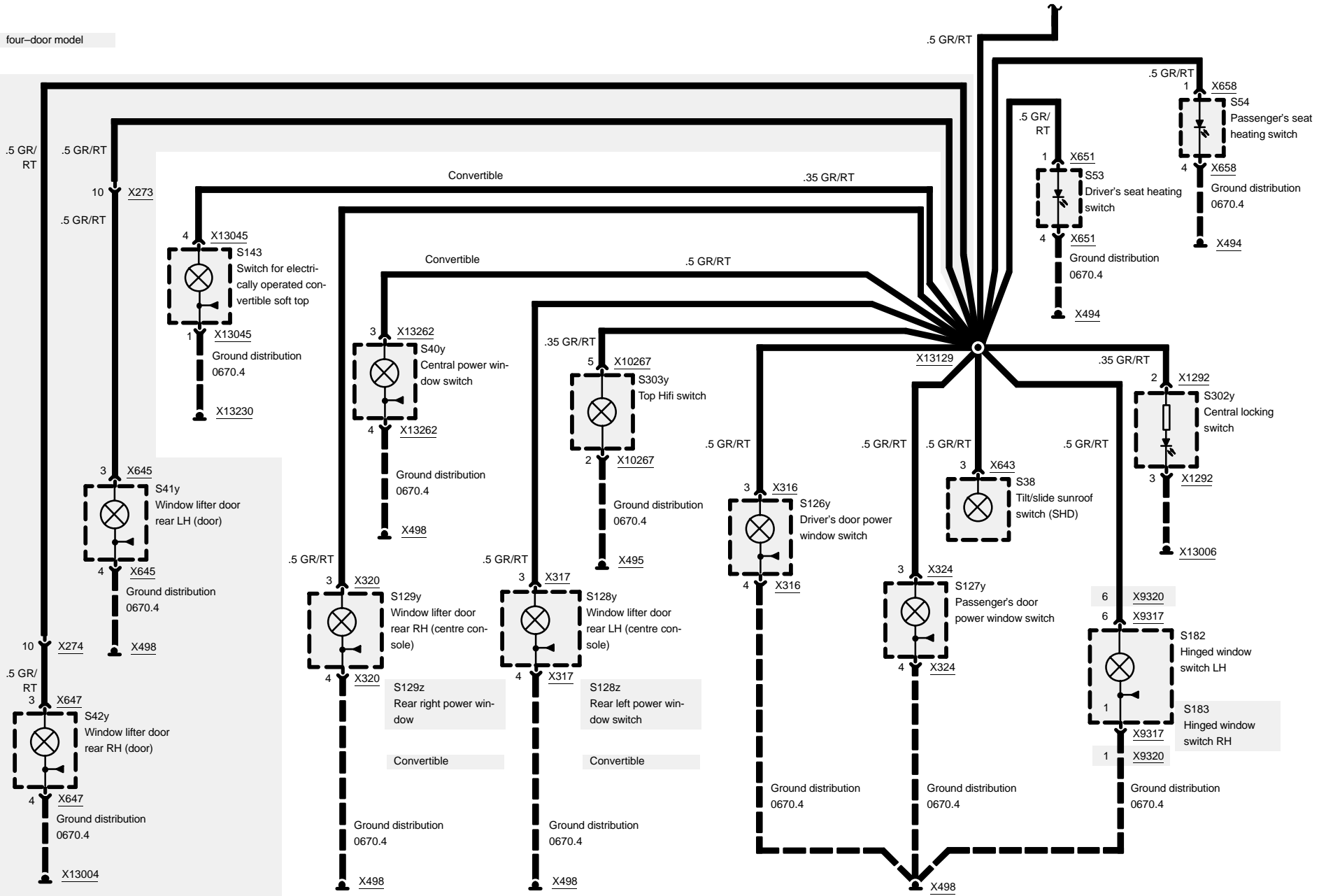


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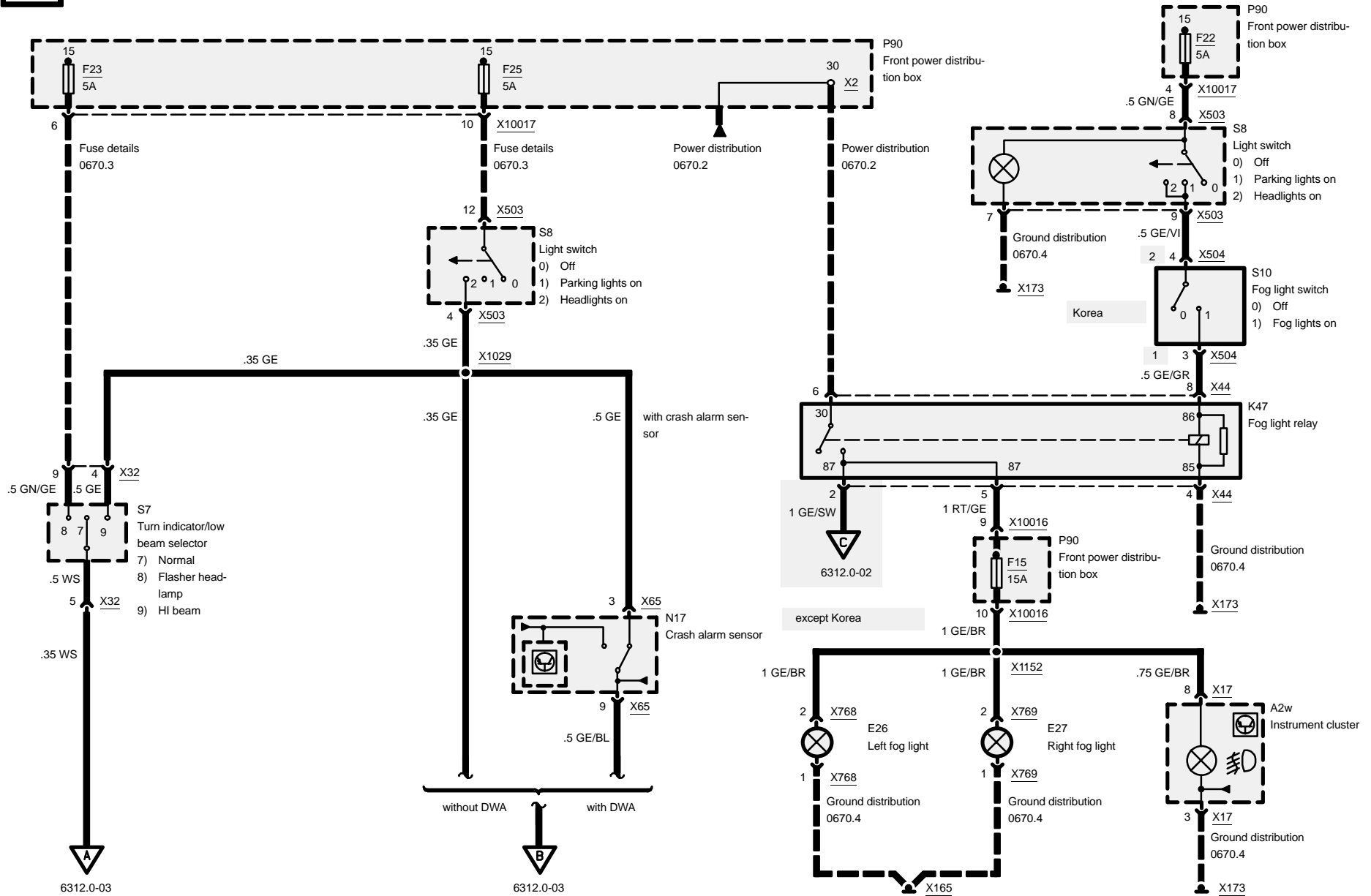
four-door model





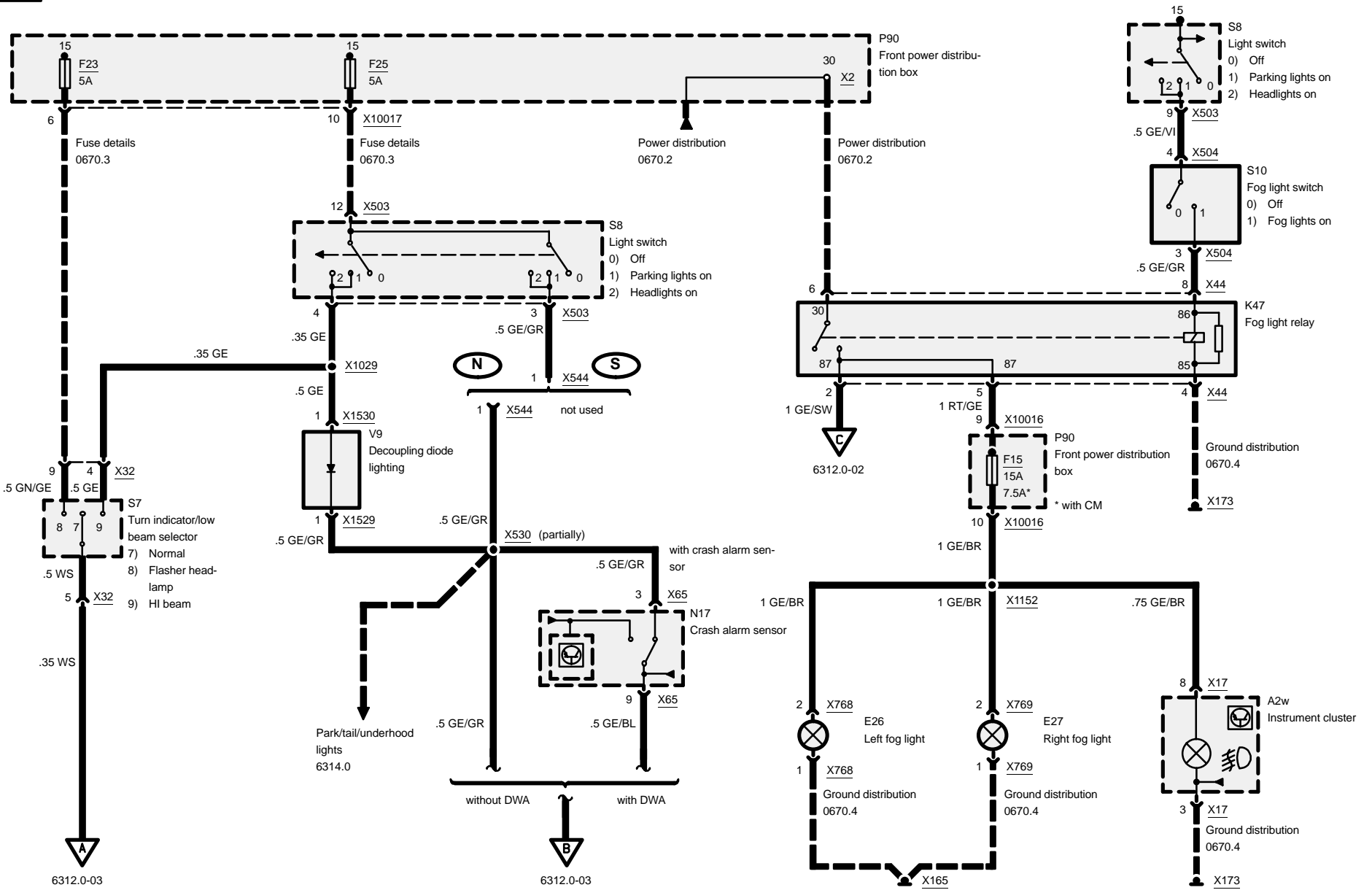


# 6312.0 Headlight/fog light





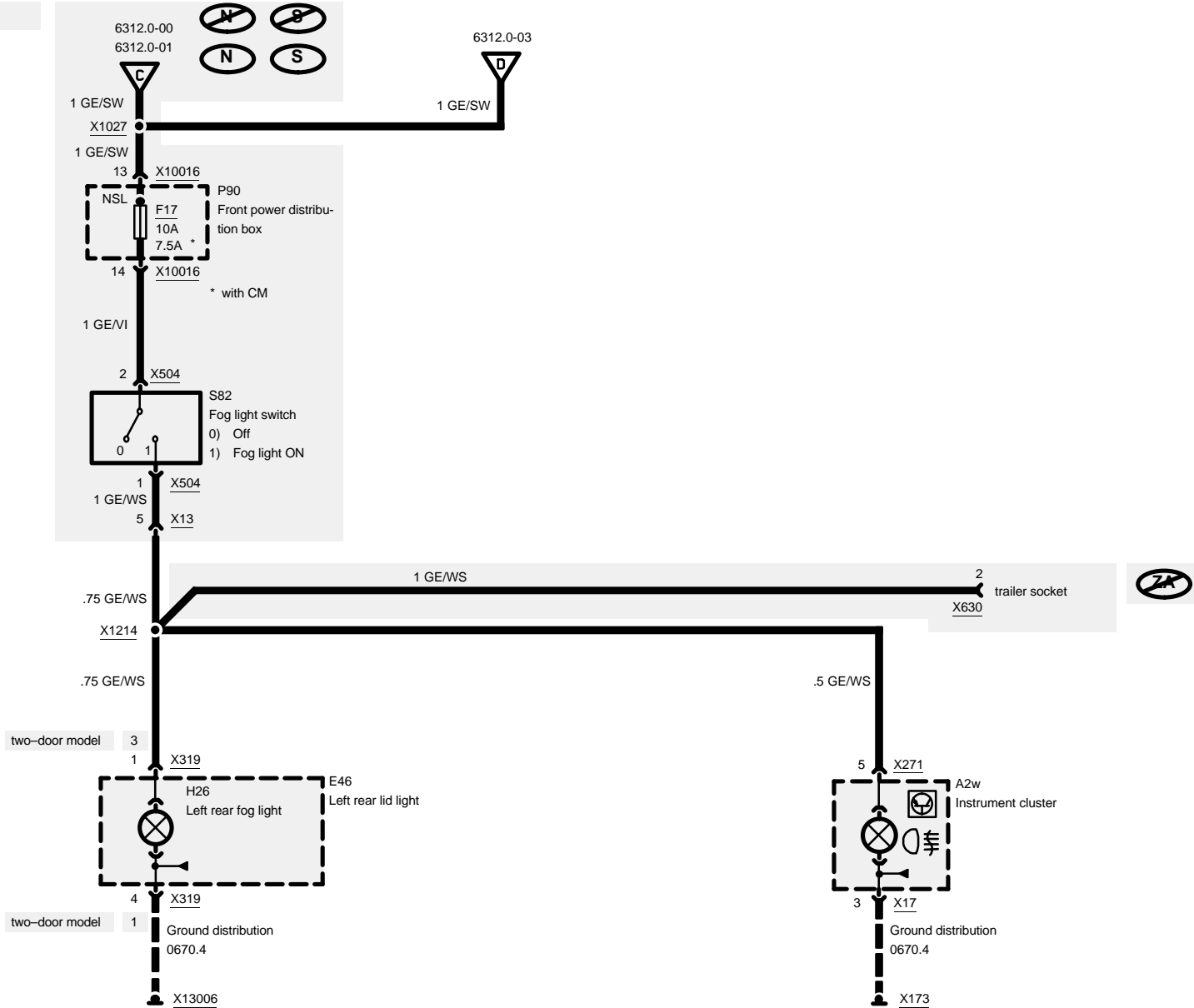
# Headlight/fog light





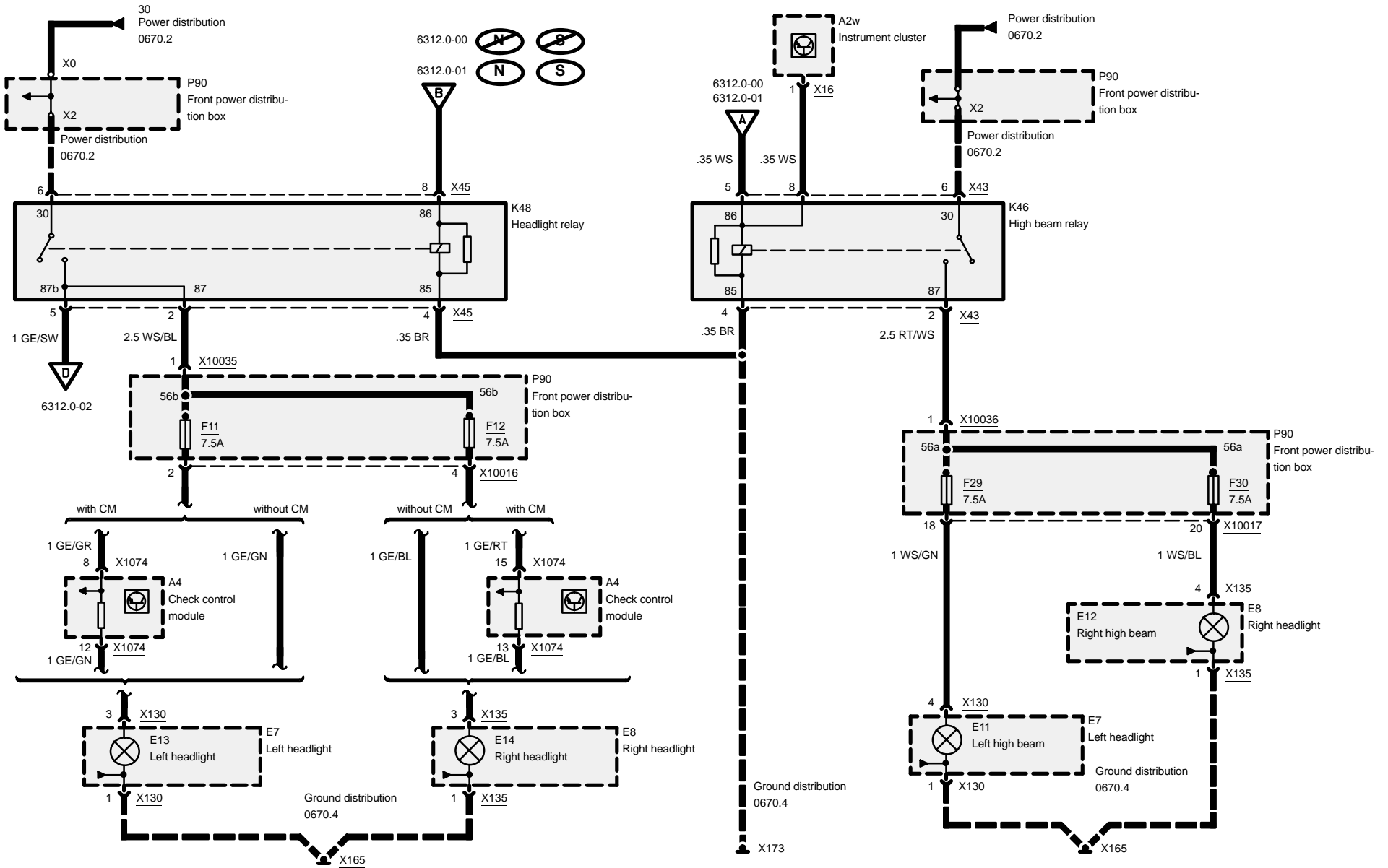
# Headlight/fog light

except Korea





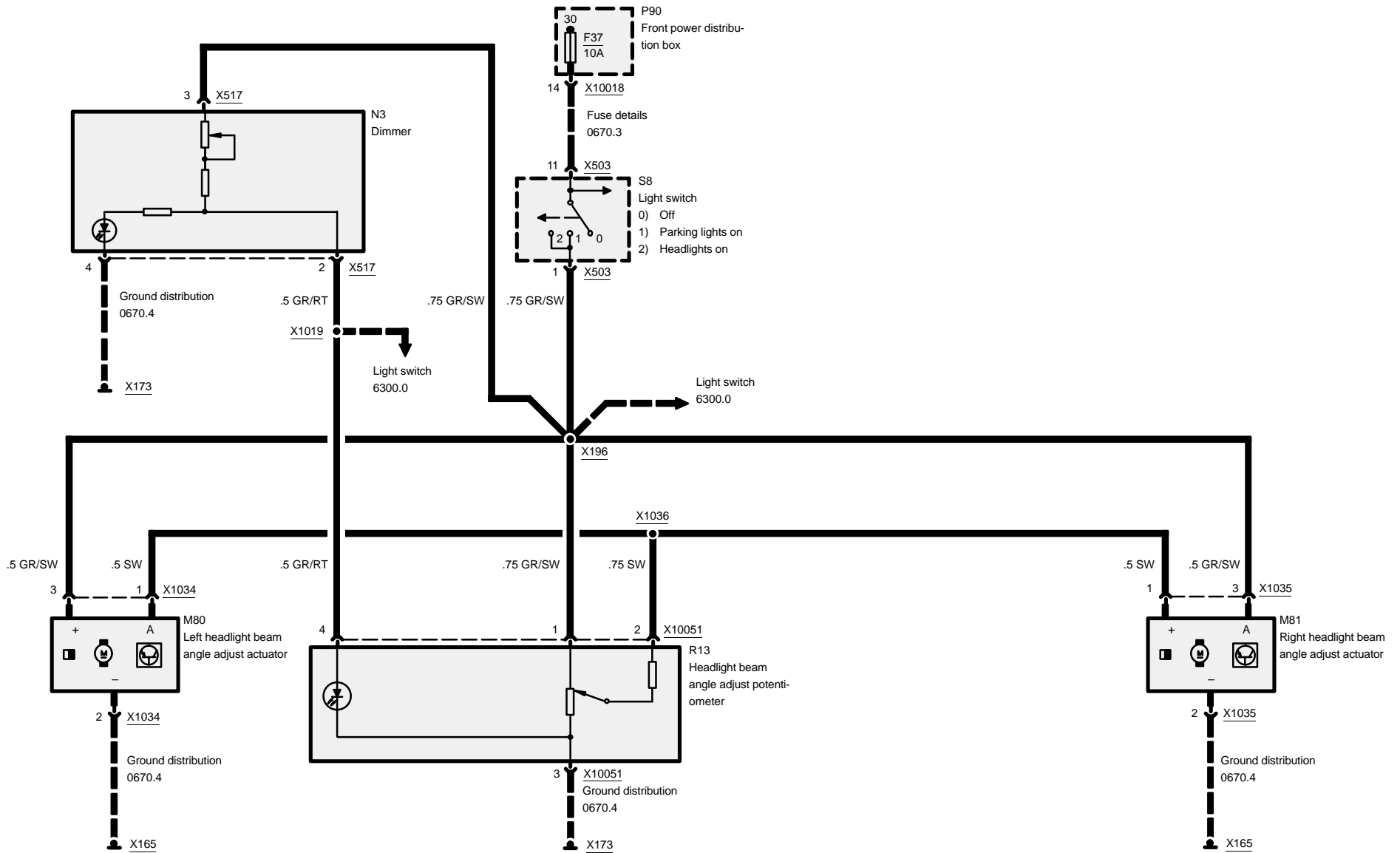
# Headlight/fog light





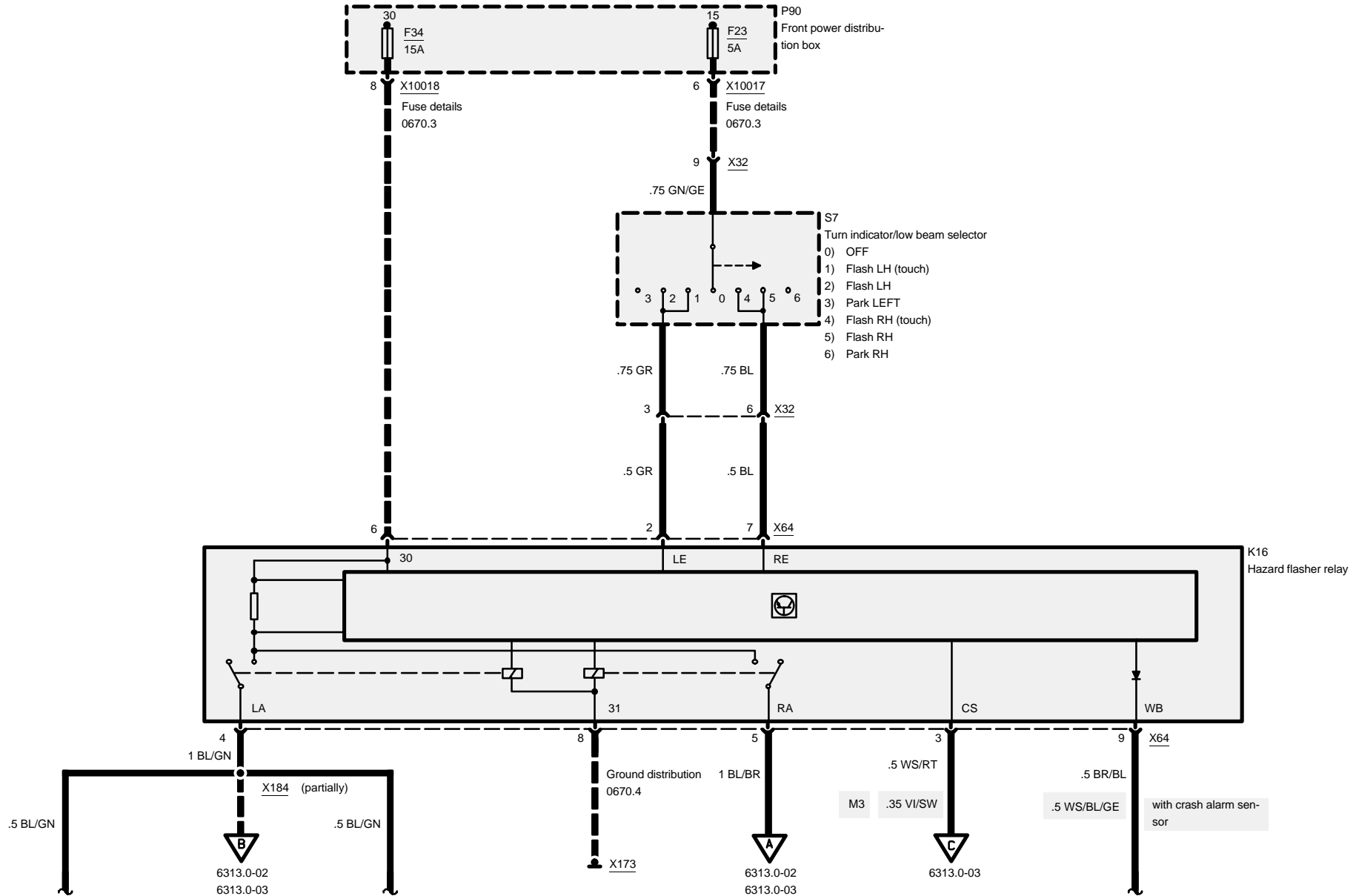
# Headlight/fog light

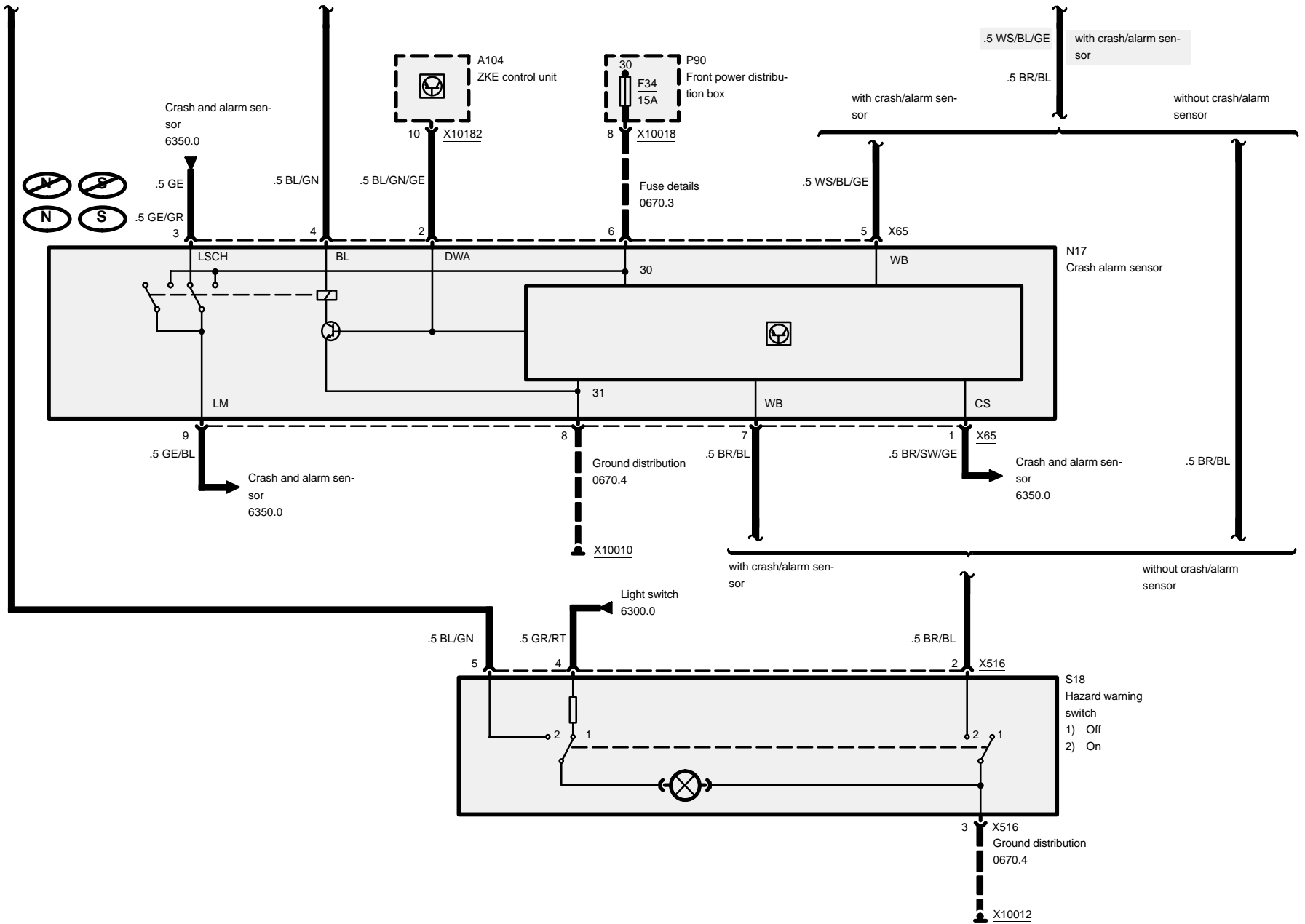
## Headlight range adjustment





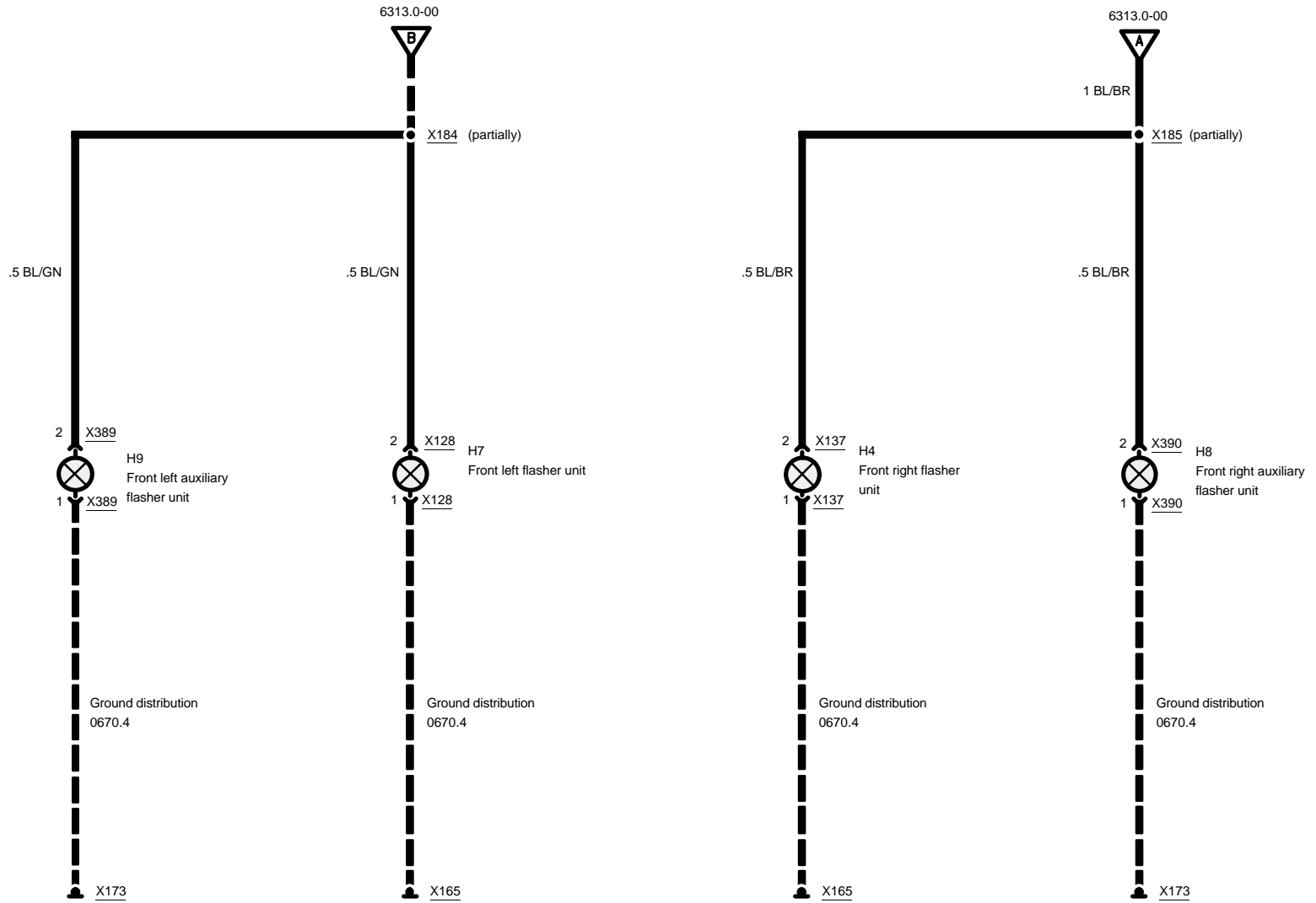
# 6313.0 Turn signal/hazard warning system







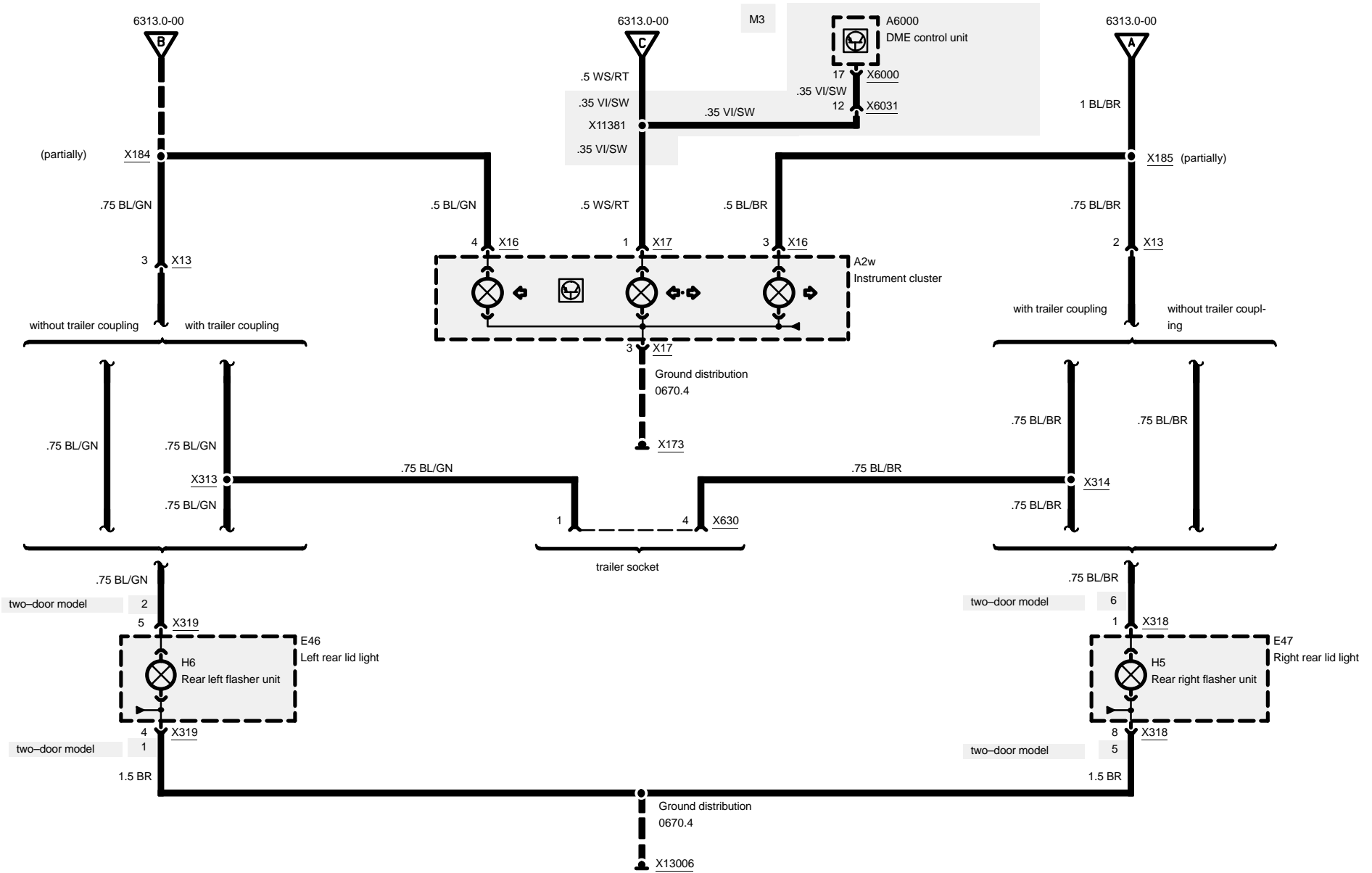
# Turn signal/hazard warning system





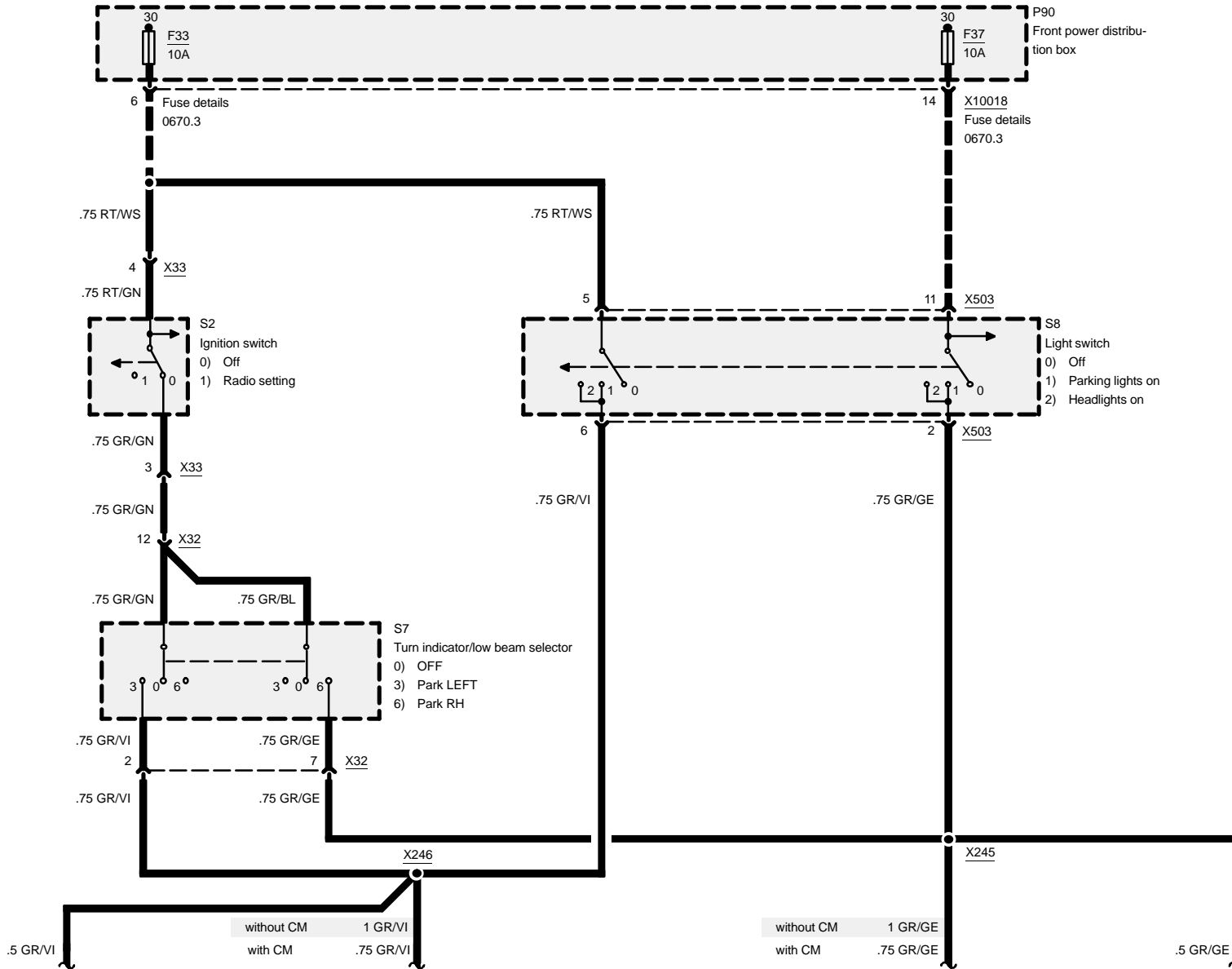


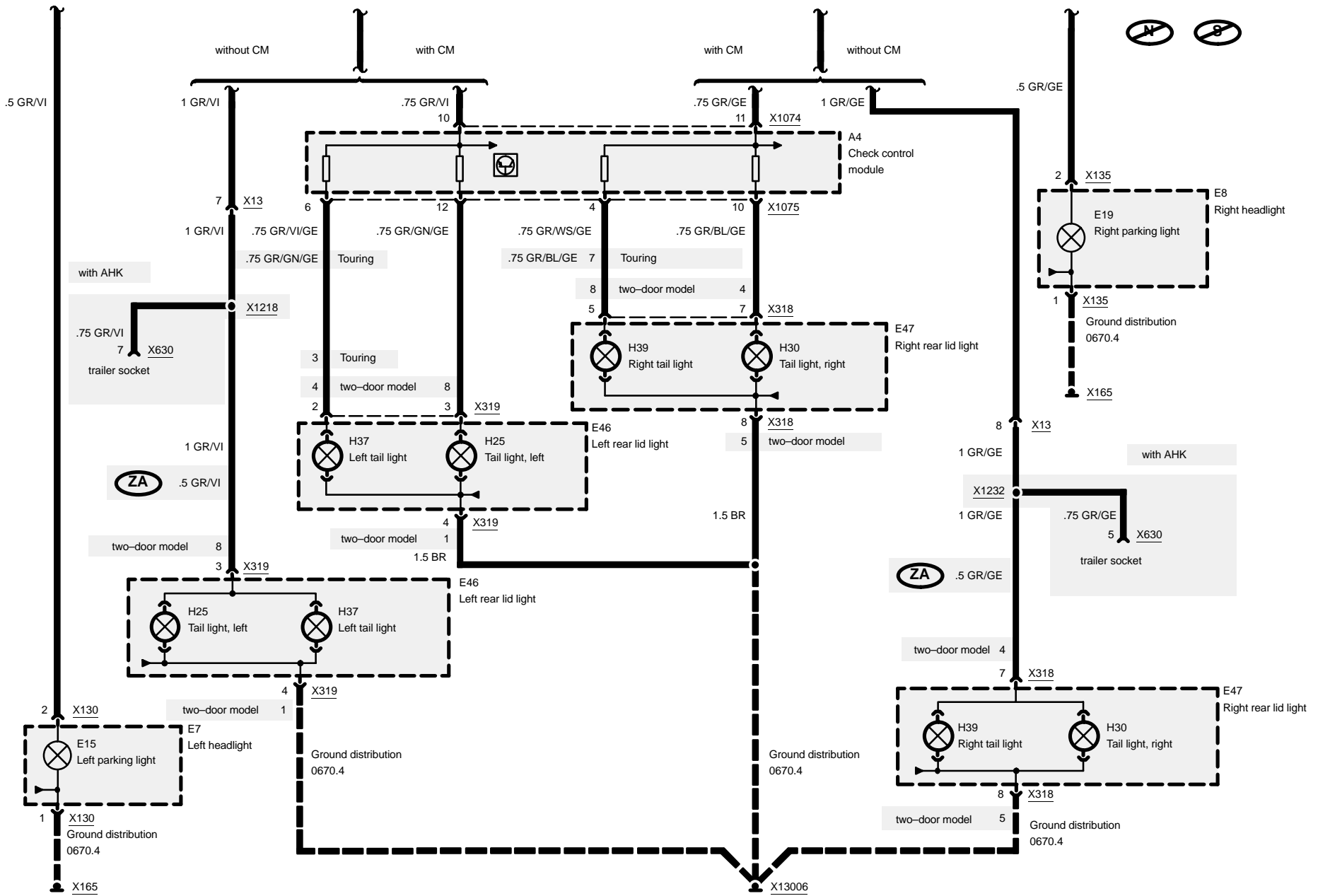
# Turn signal/hazard warning system





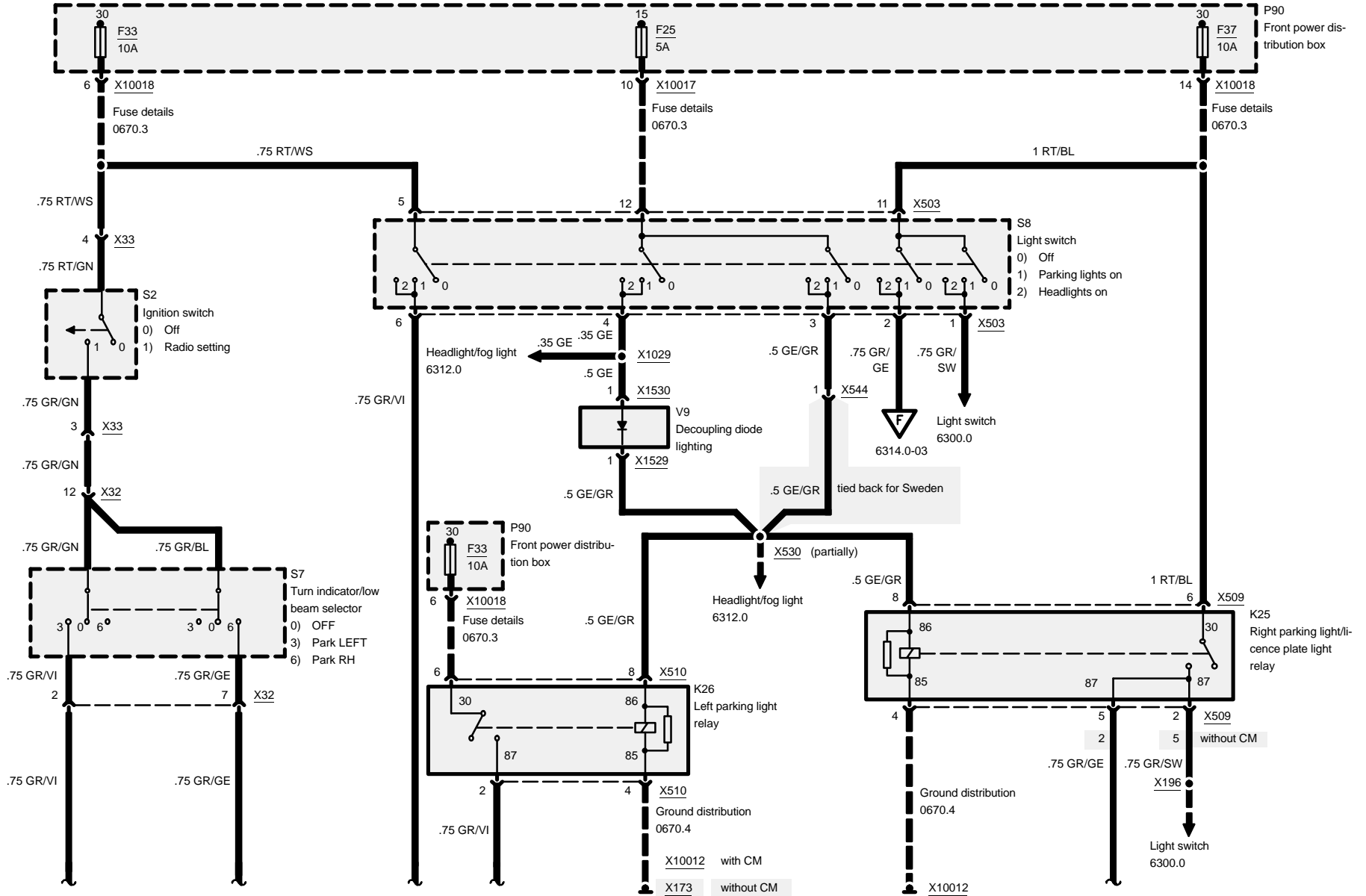
# 6314.0 Park/tail/underhood lights

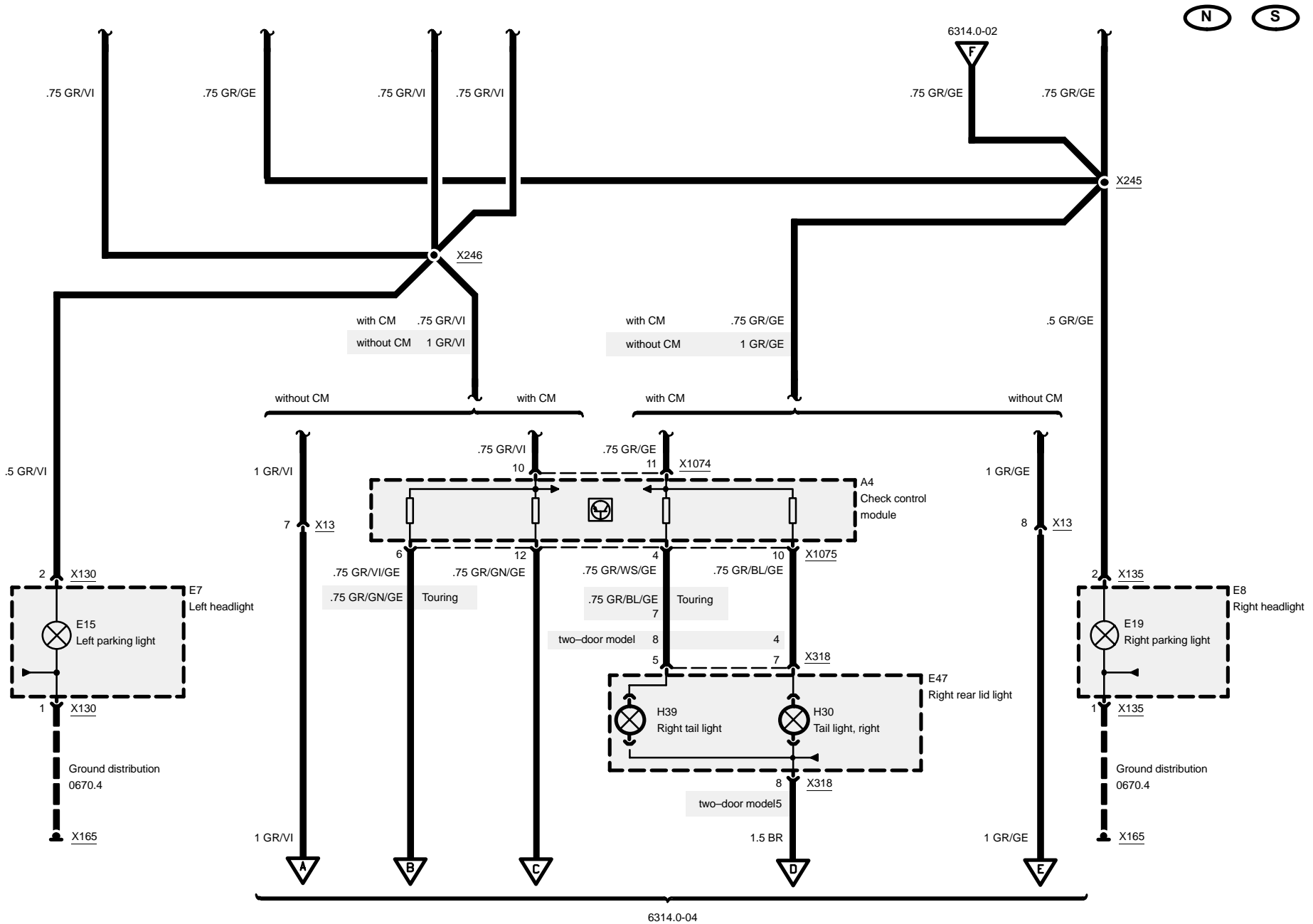






# Park/tail/underhood lights



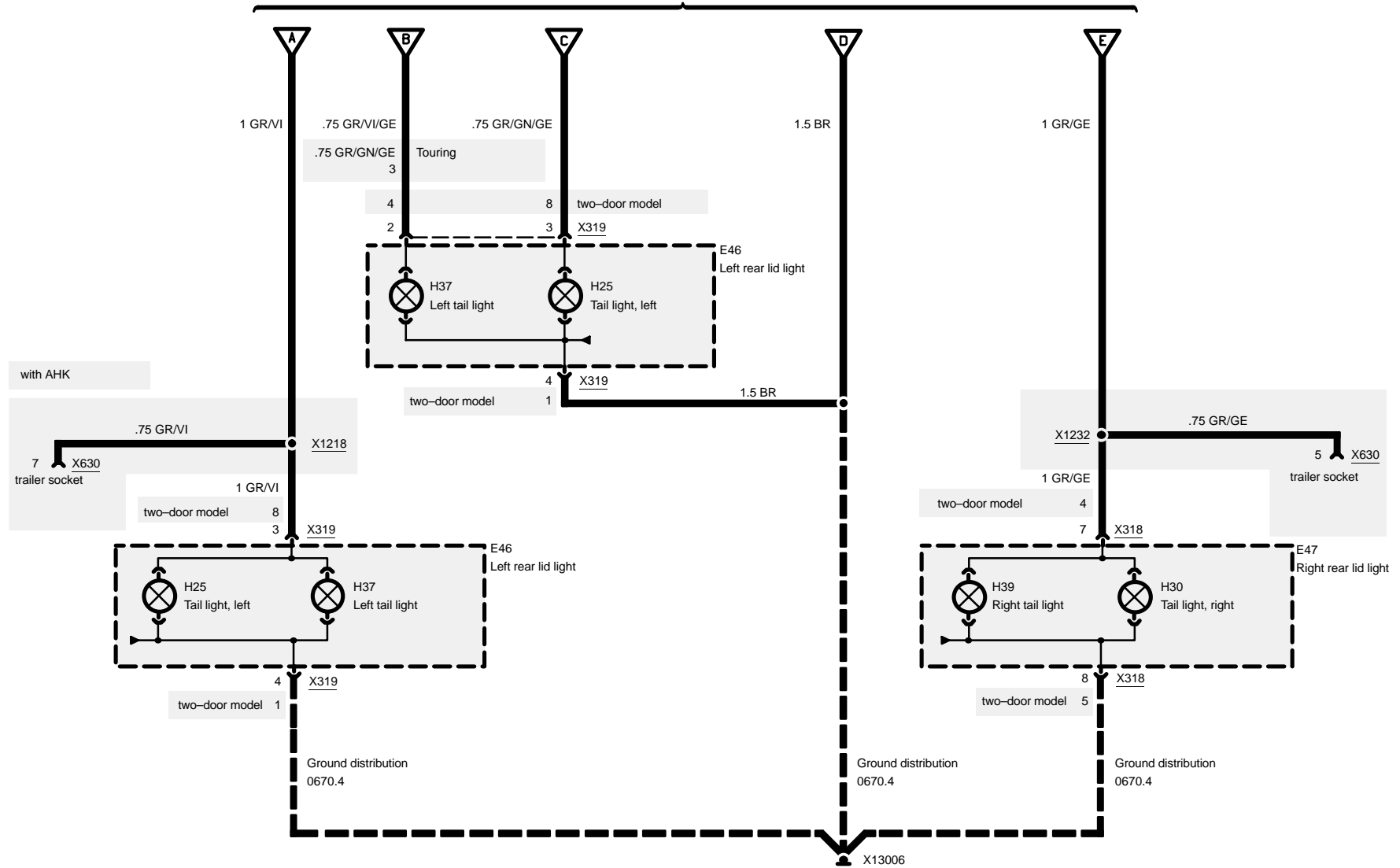




# Park/tail/underhood lights

N S

6314.0-03



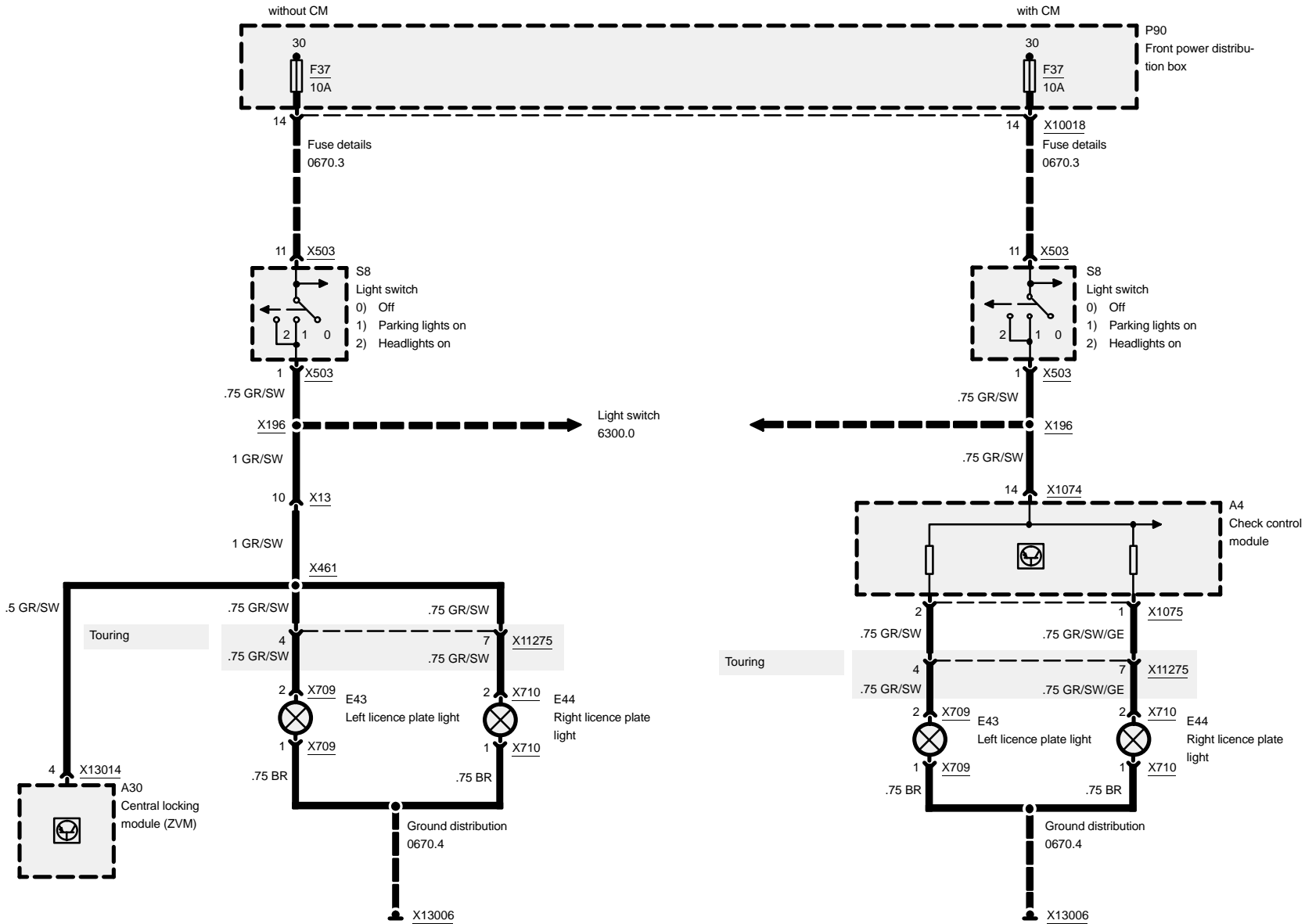
05/99

6314.0-04

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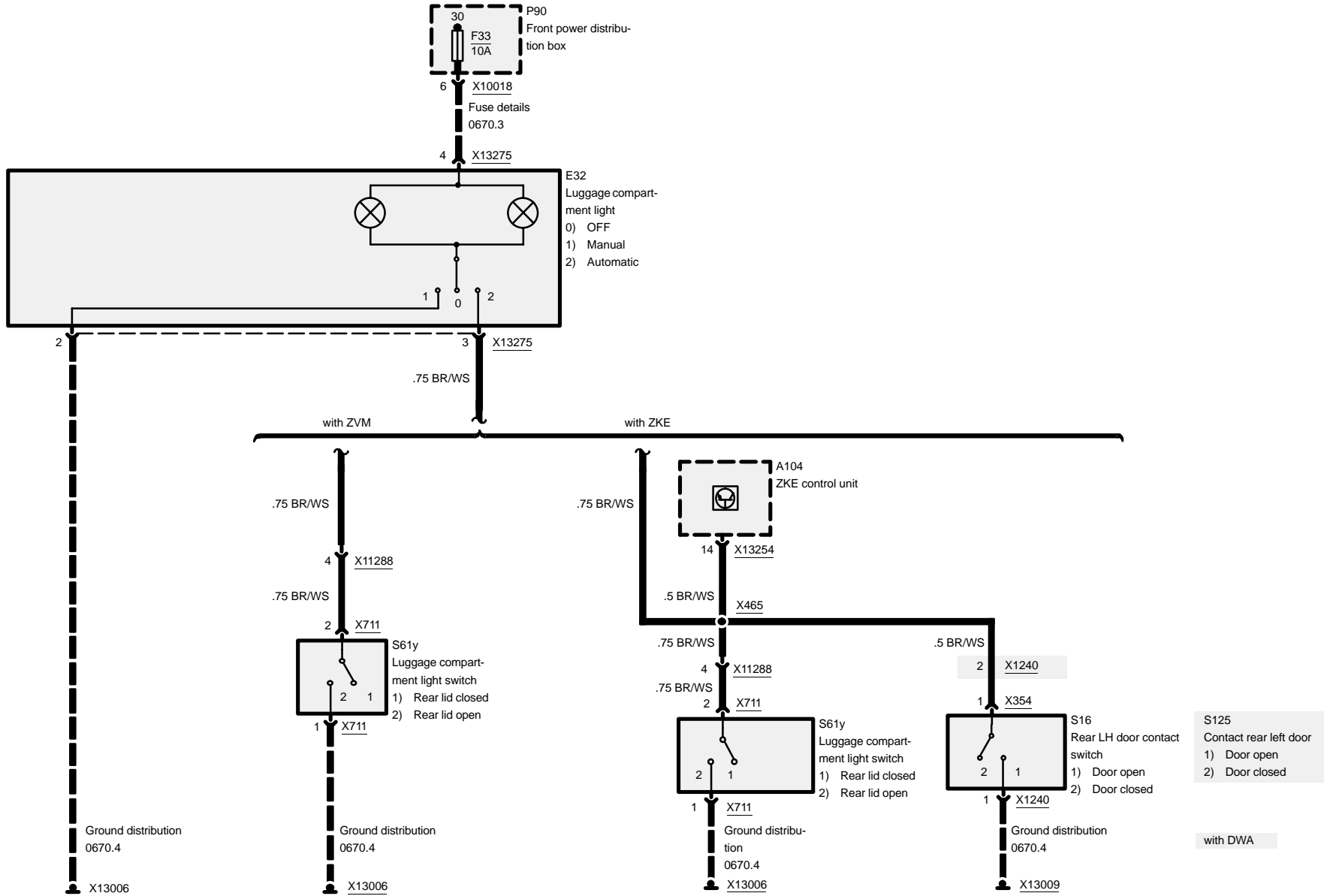
# 6320.0 Licence plate/luggage compartment lights





# Licence plate/luggage compartment lights

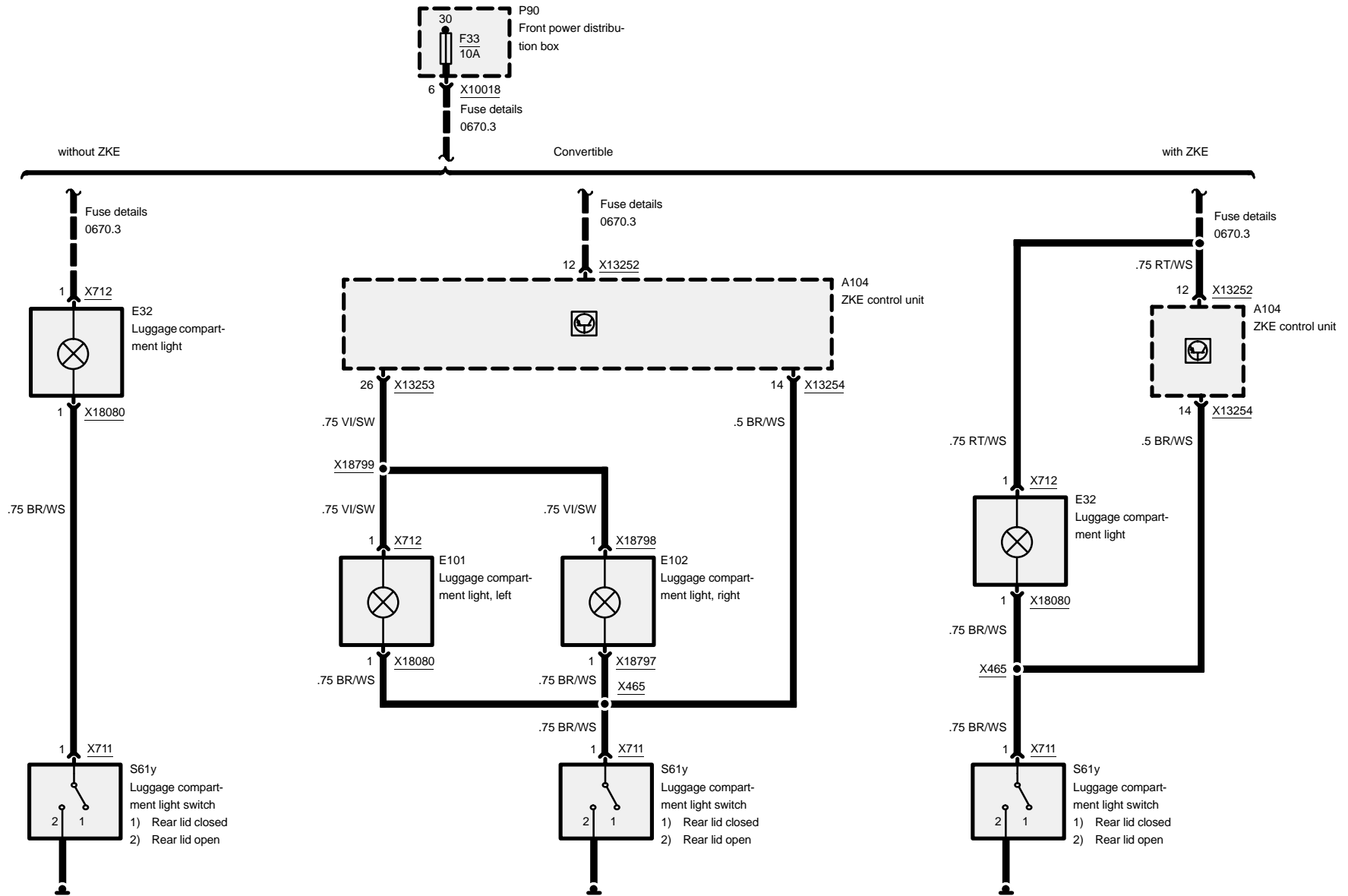
## Touring





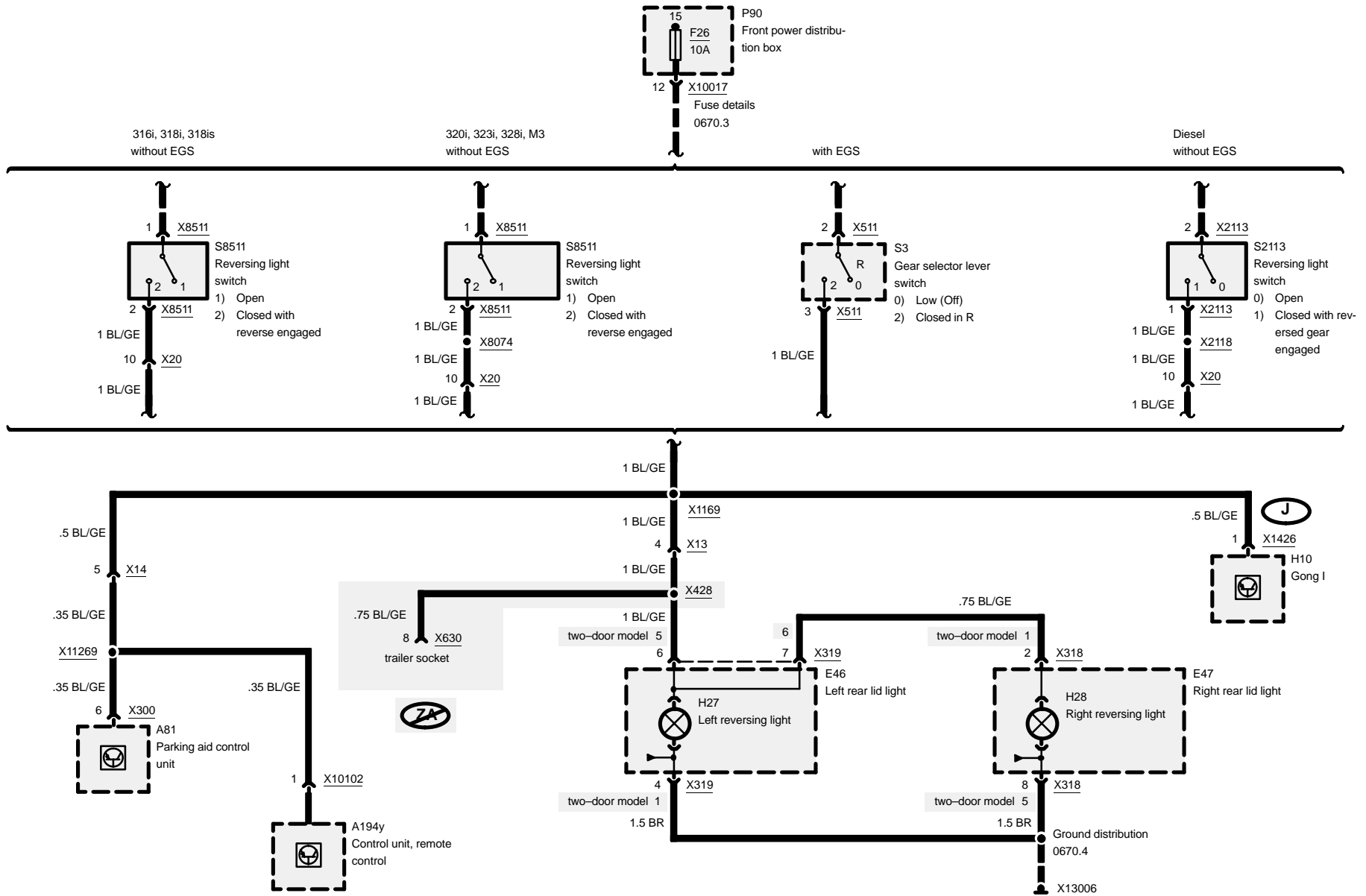


# Licence plate/luggage compartment lights





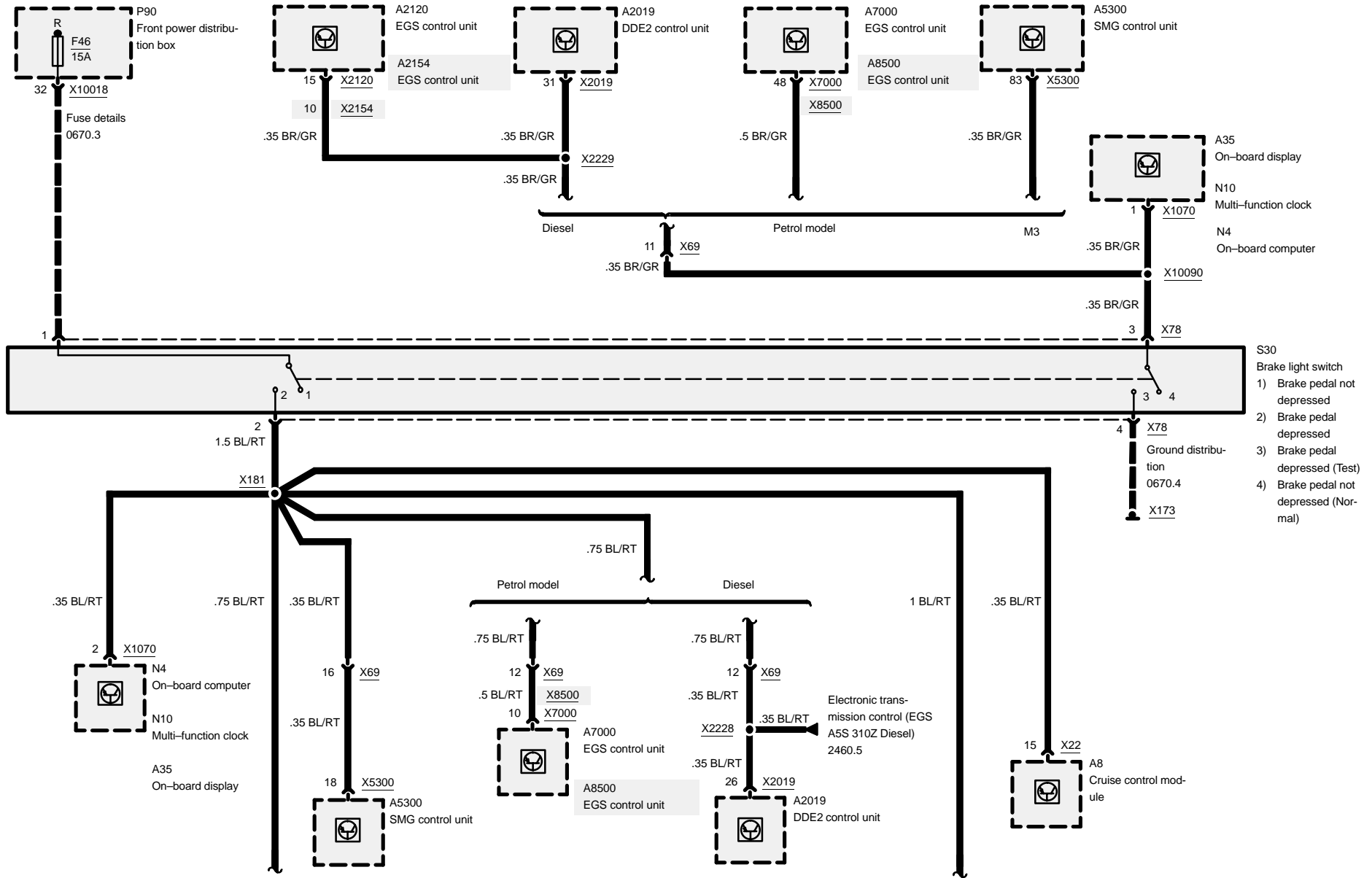
# 6322.0 Reversing lights

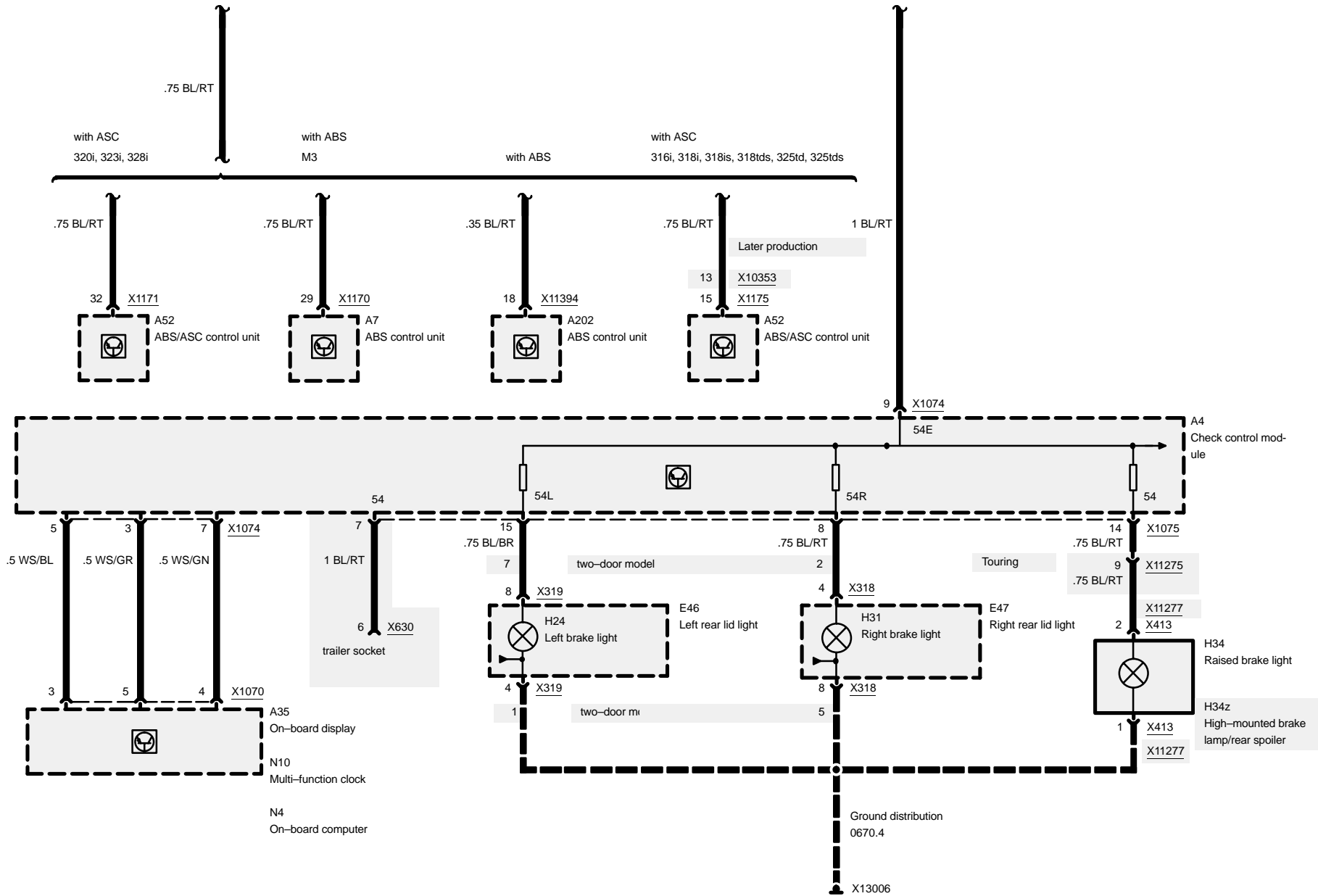




# 6325.0 Brake lights

With CM

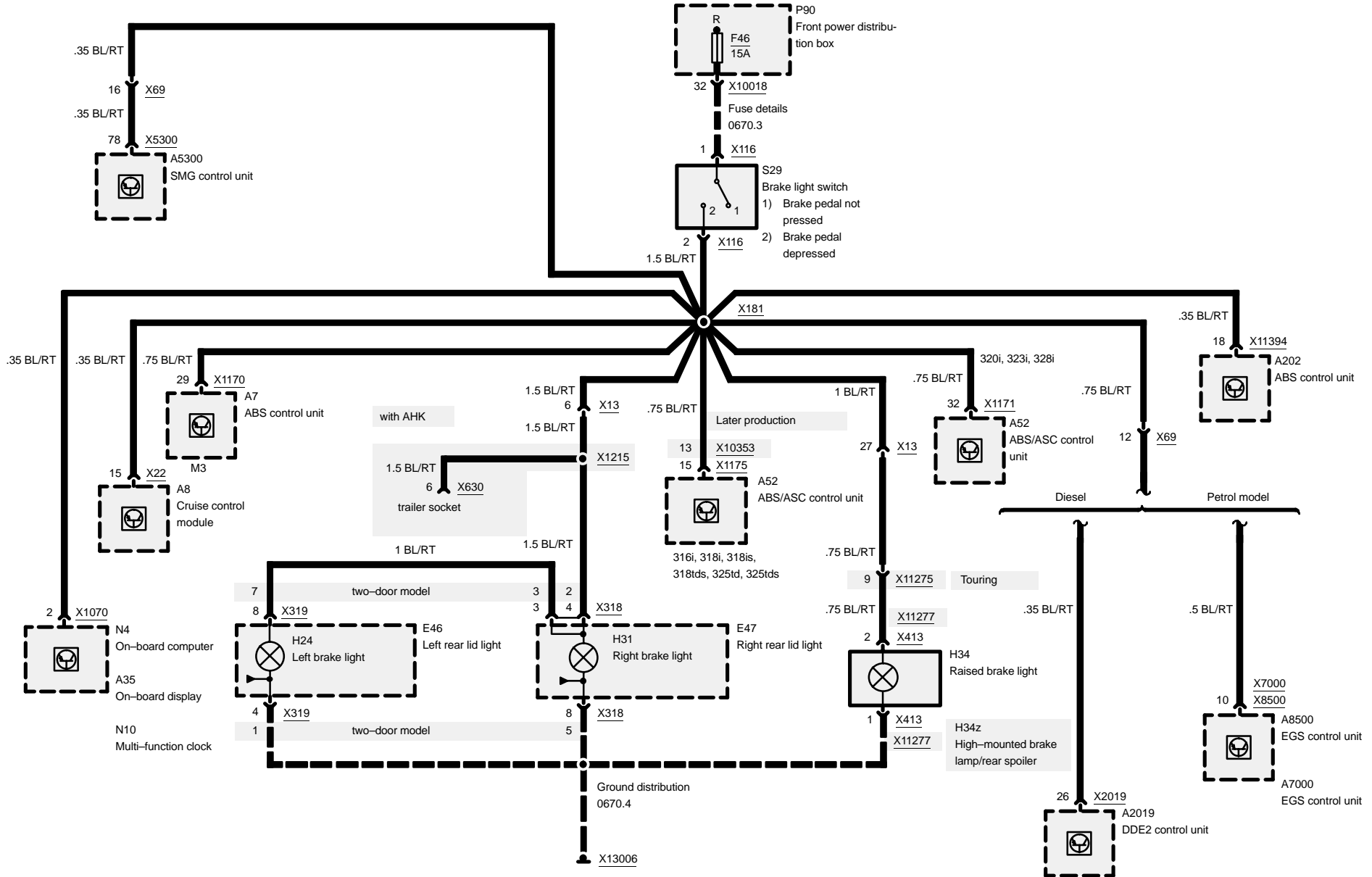






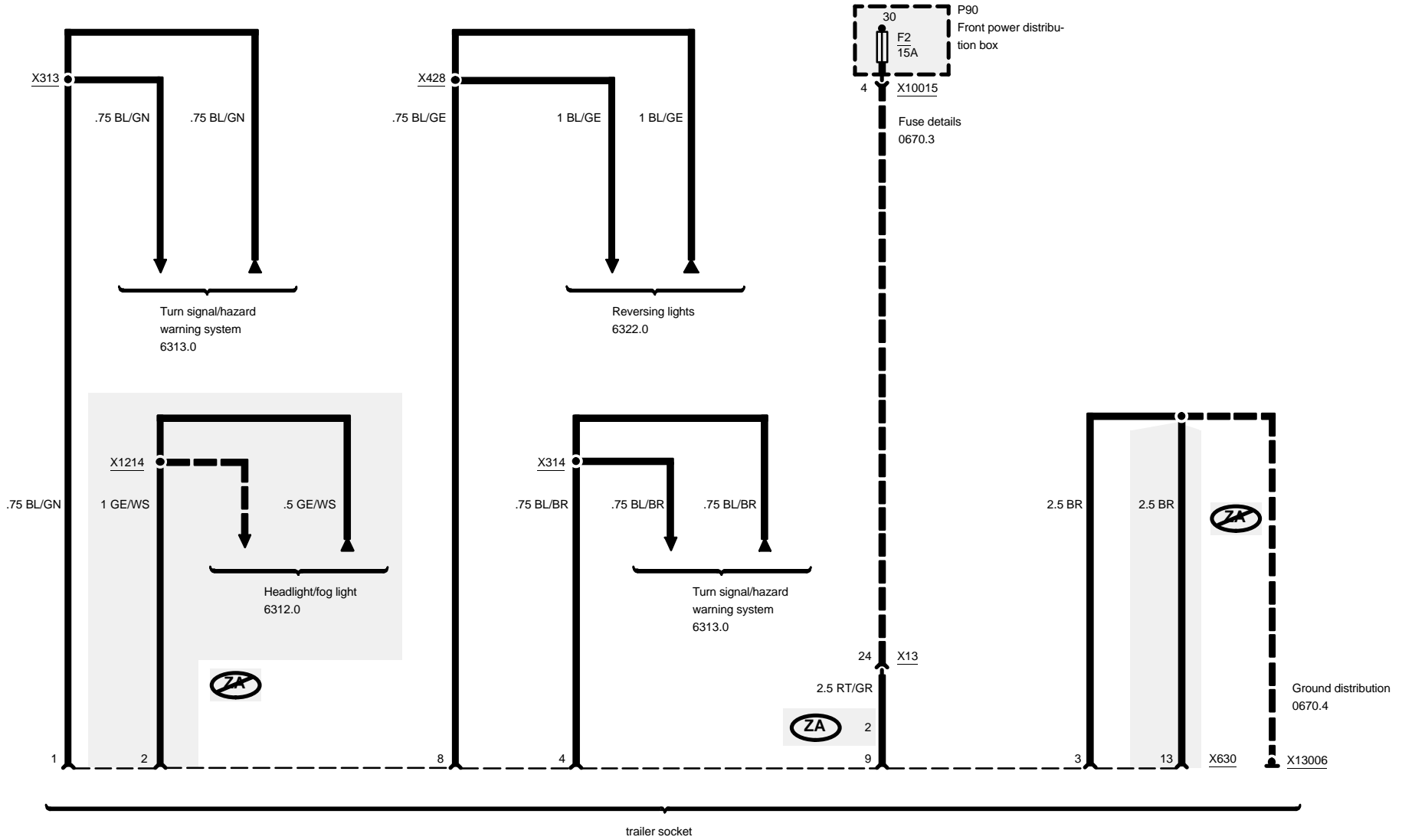
# Brake lights

## Without CM



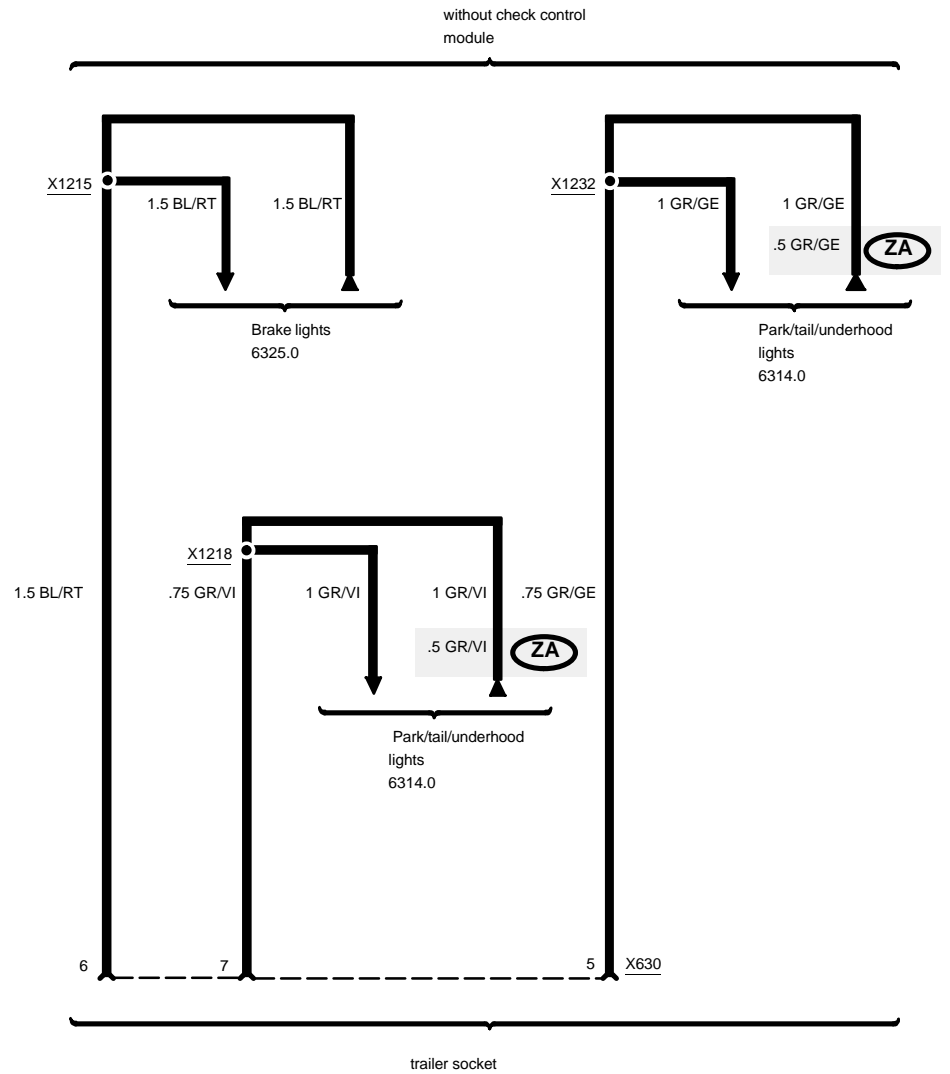
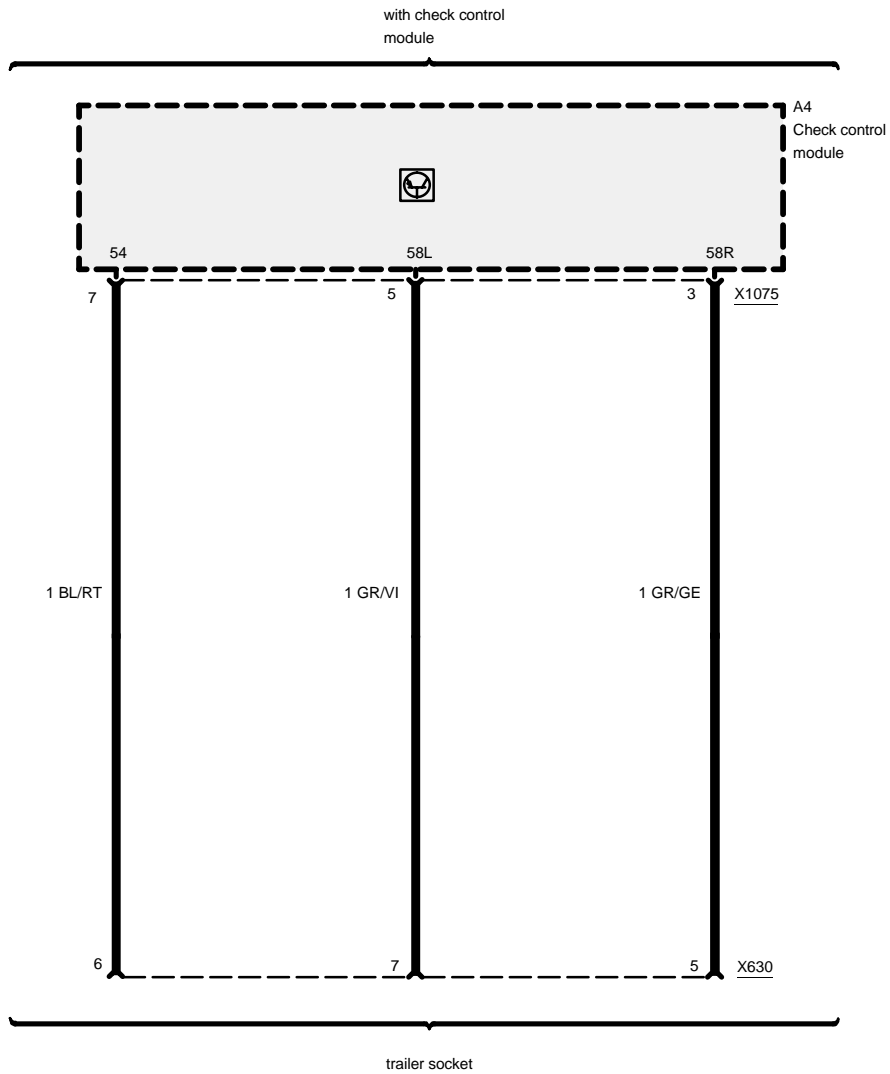


# 6328.1 Trailer coupling





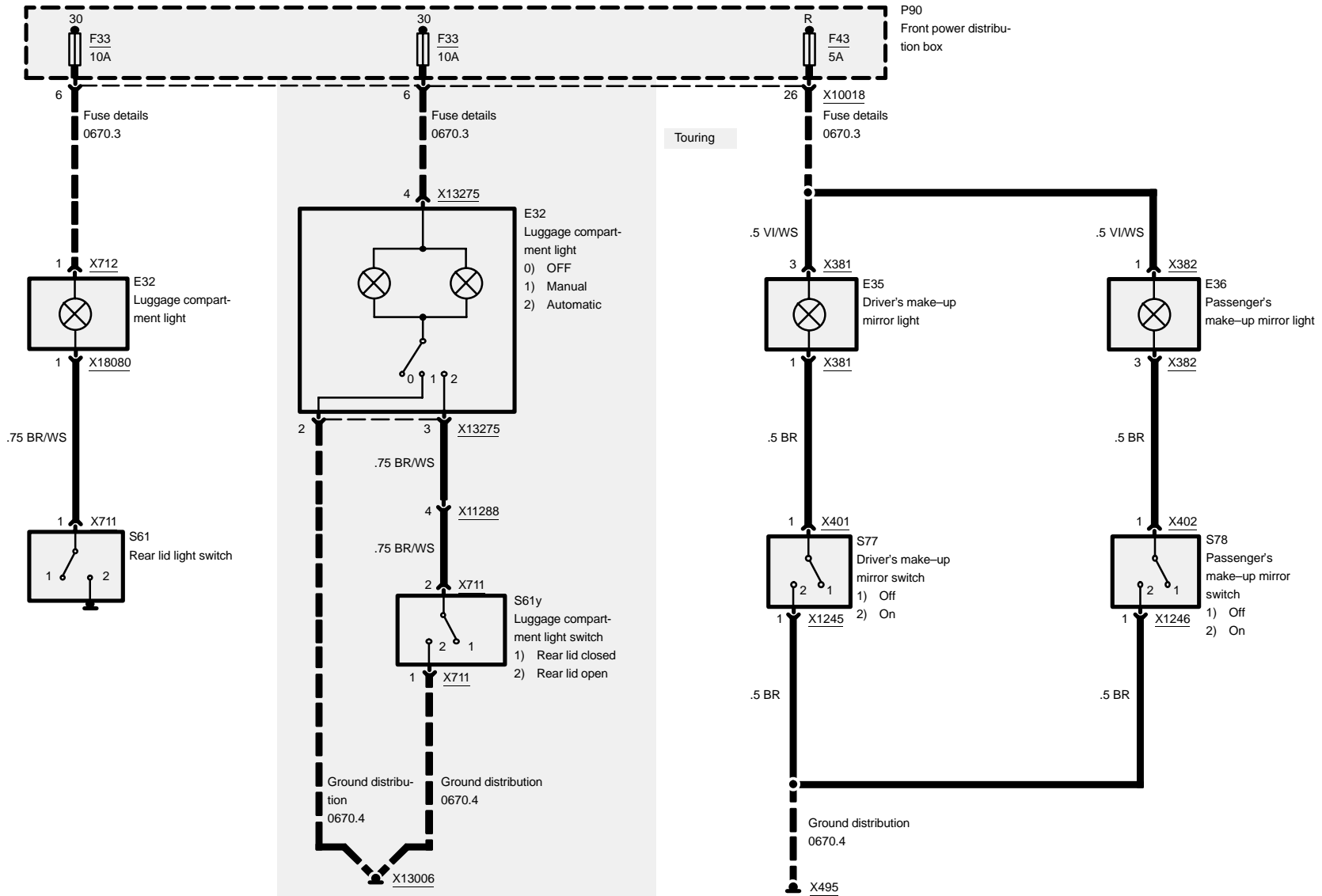
# Trailer coupling





# 6330.3 Interior lights

With ZVM





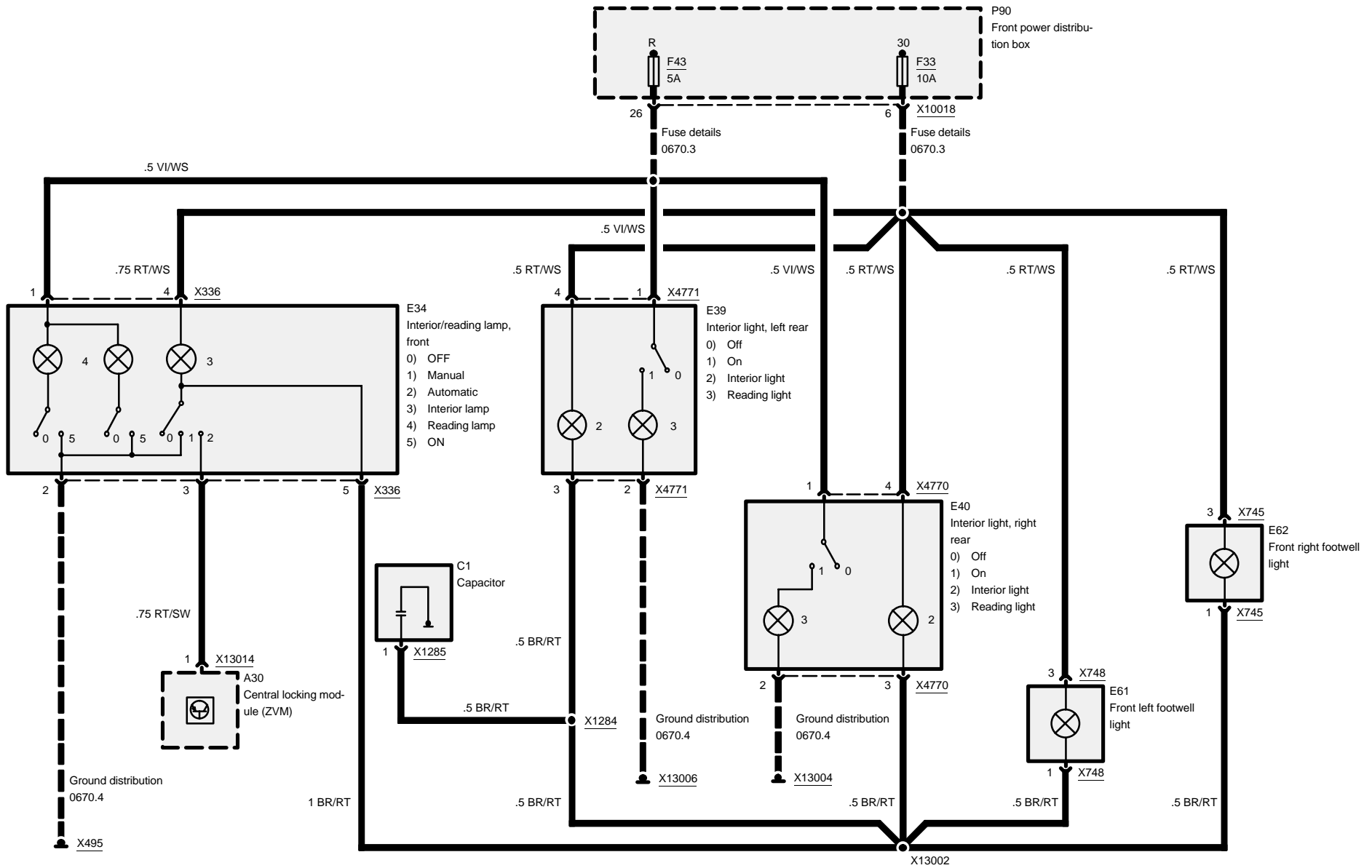




# Interior lights

Four-door model

## Interior light with reading light rear and footwell light, with ZVM

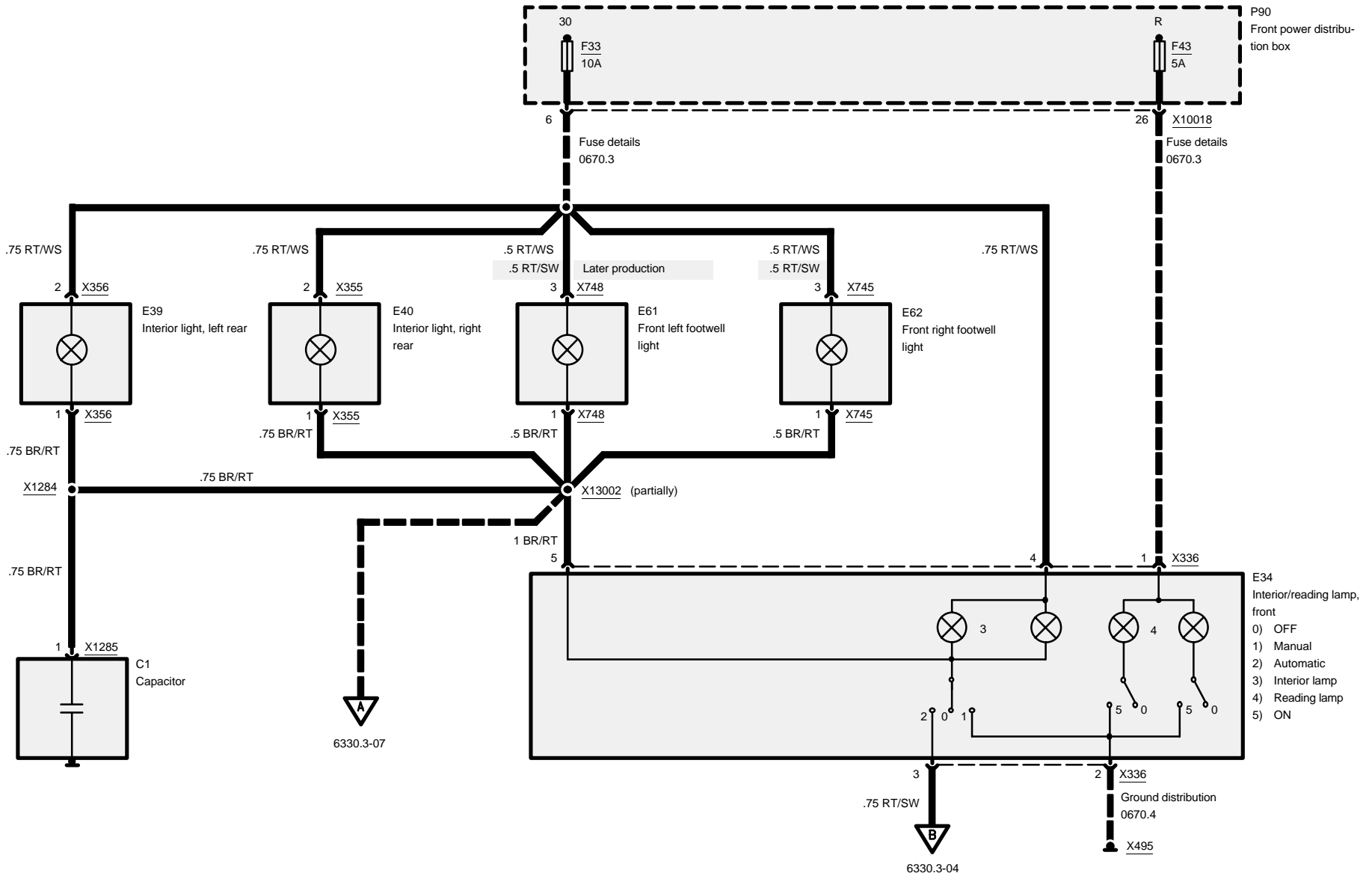




# Interior lights

# Touring

## Interior light/footwell light

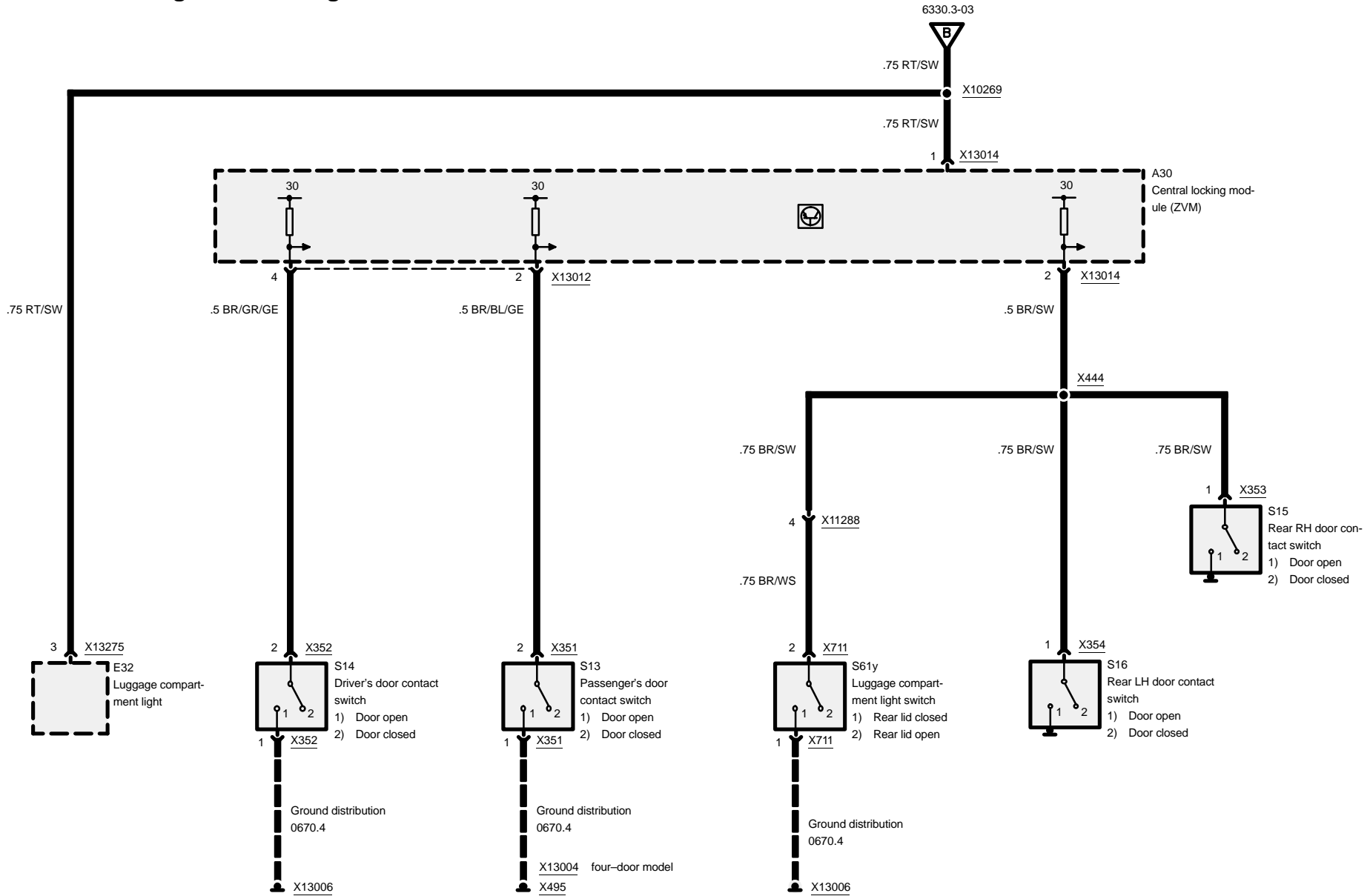




# Interior lights

## Interior light/footwell light

# Touring

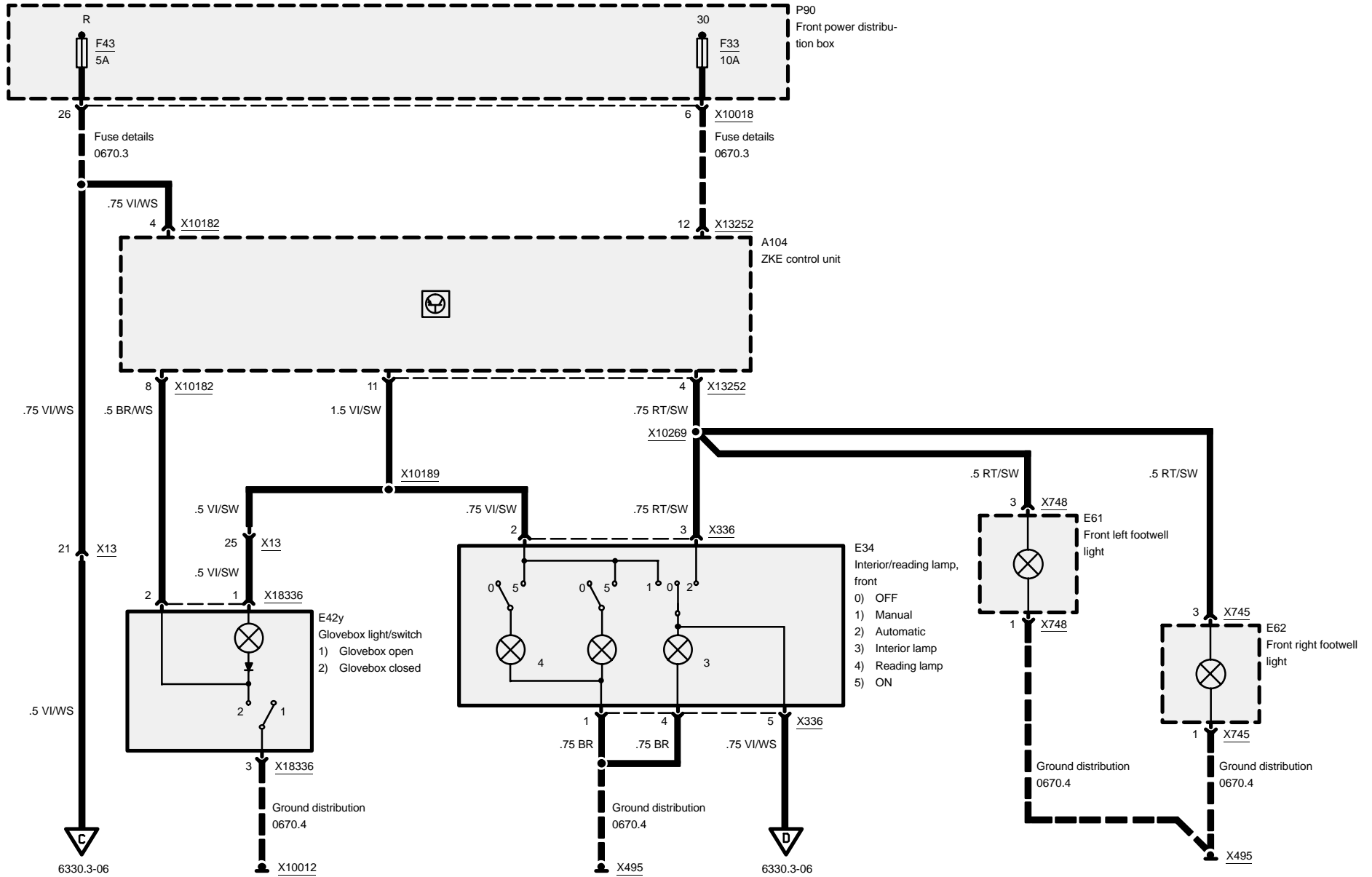




# Interior lights

## With ZKE

### Convertible

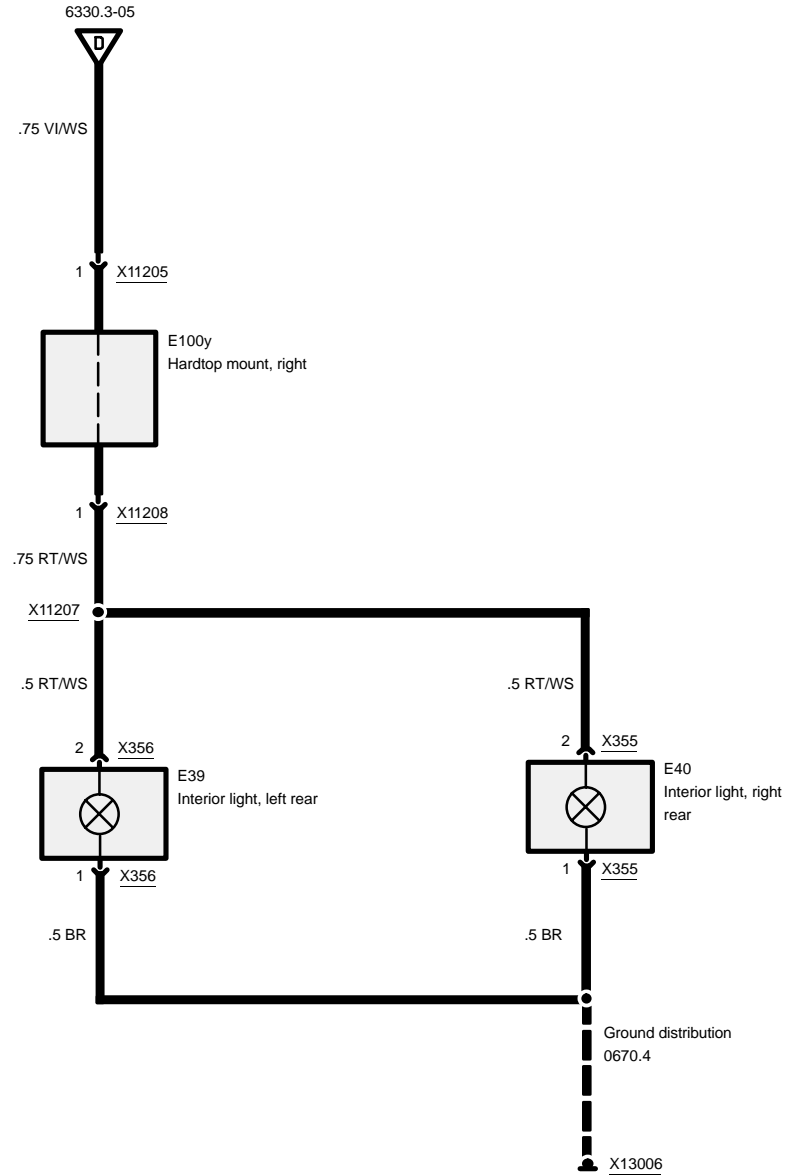
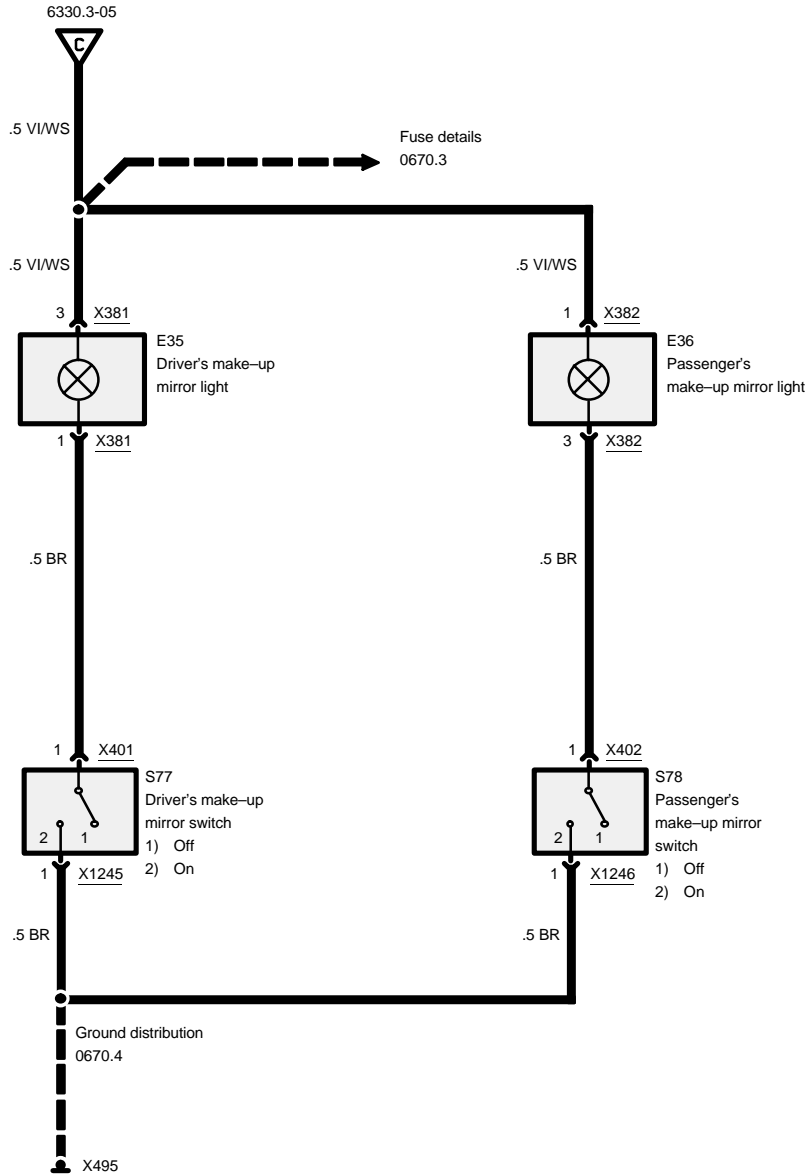




# Interior lights

With ZKE

Convertible

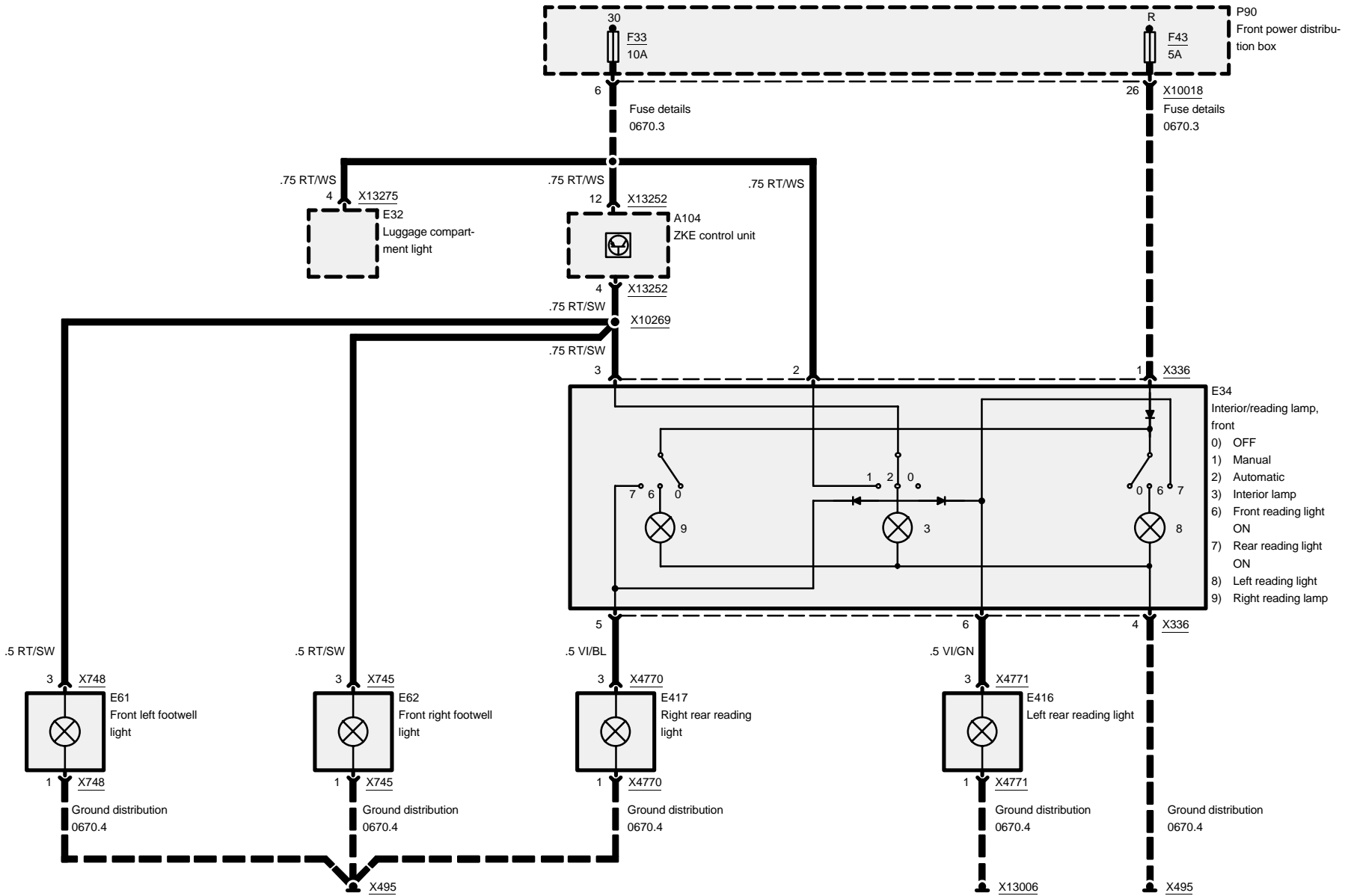




# Interior lights

With ZKE

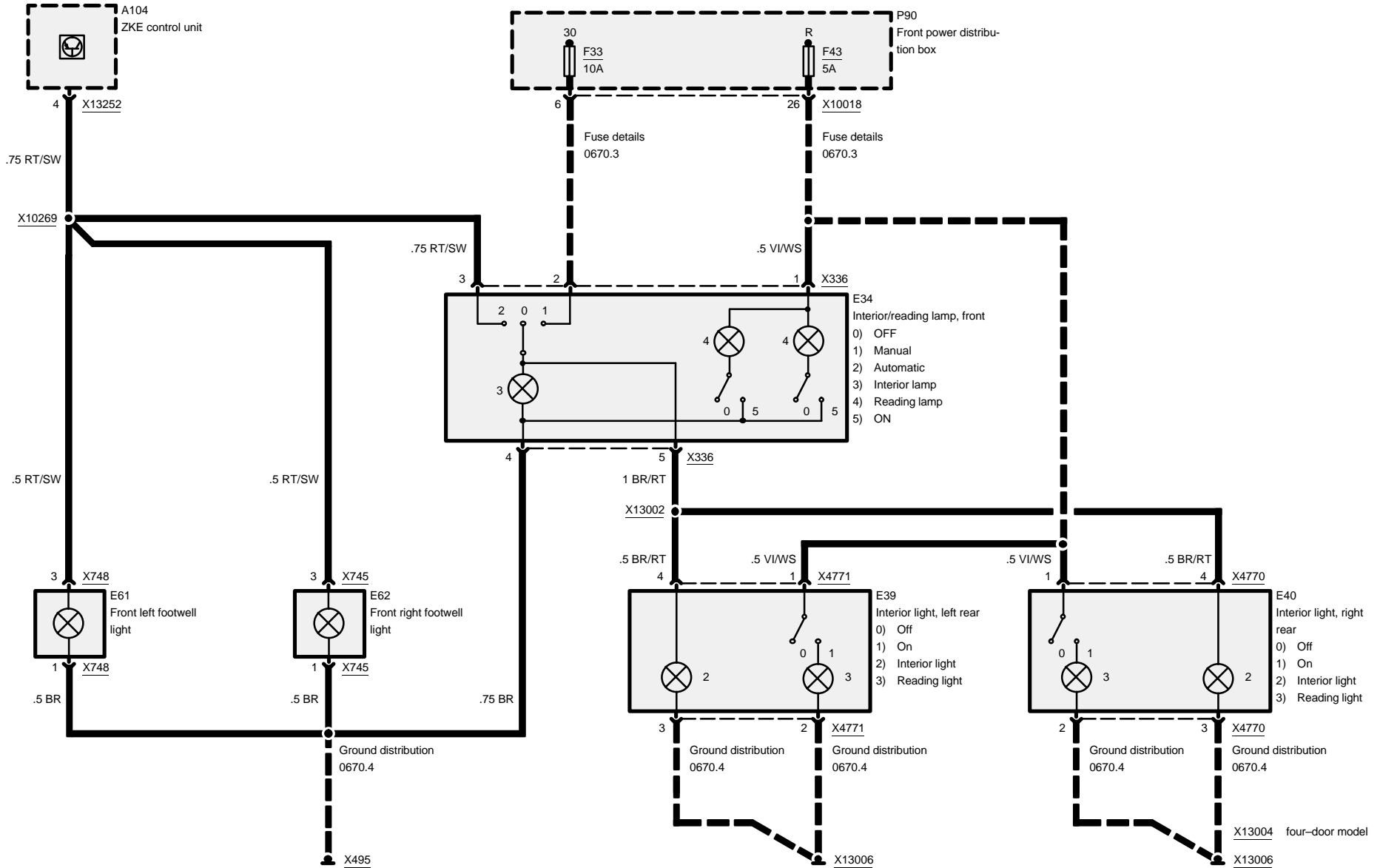
Touring





# Interior lights

## Interior light/reading light, with ZKE

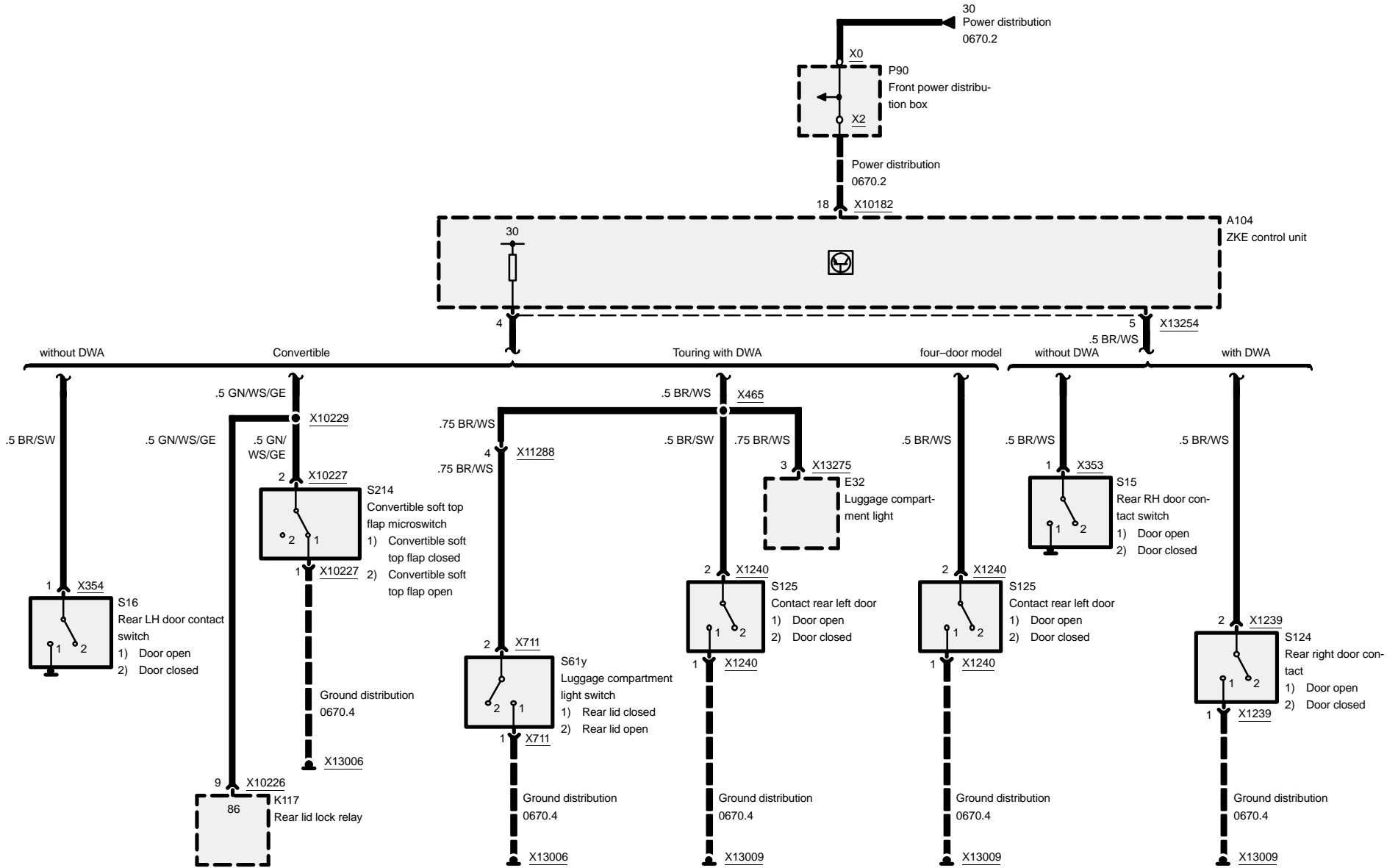






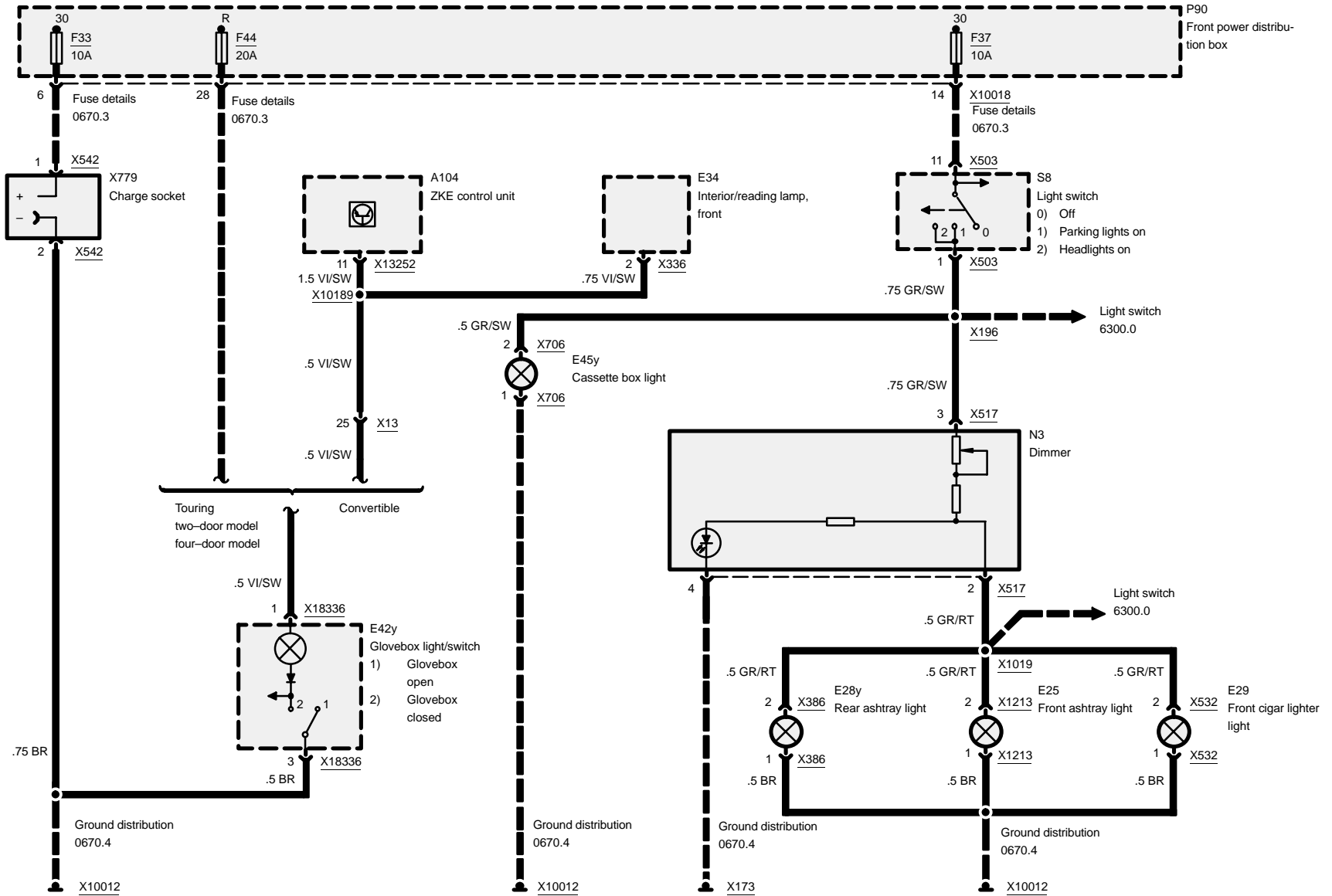
# Interior lights

## DWA, current, door contacts





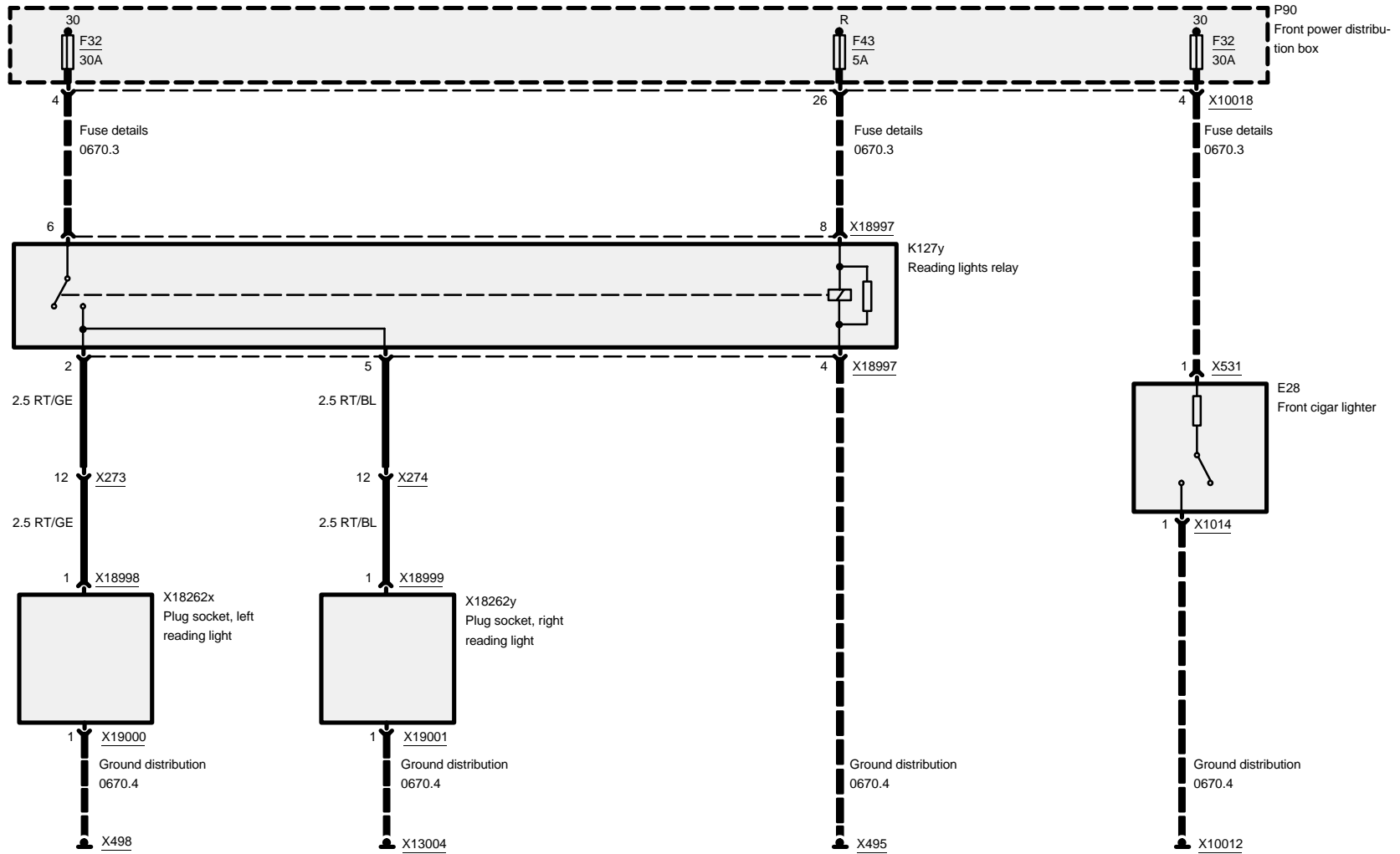
# 6332.0 Interior



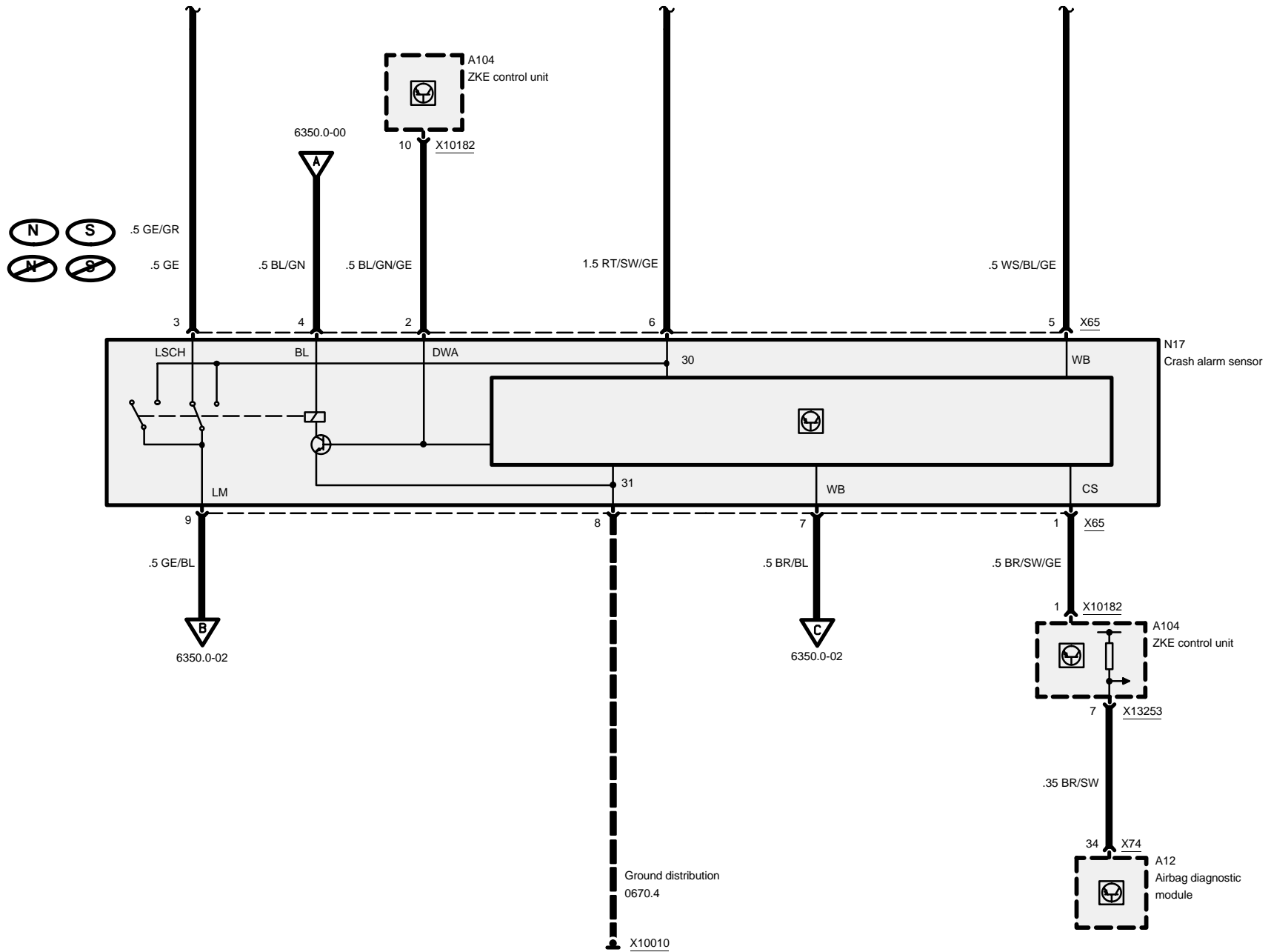


# Interior

## Family package

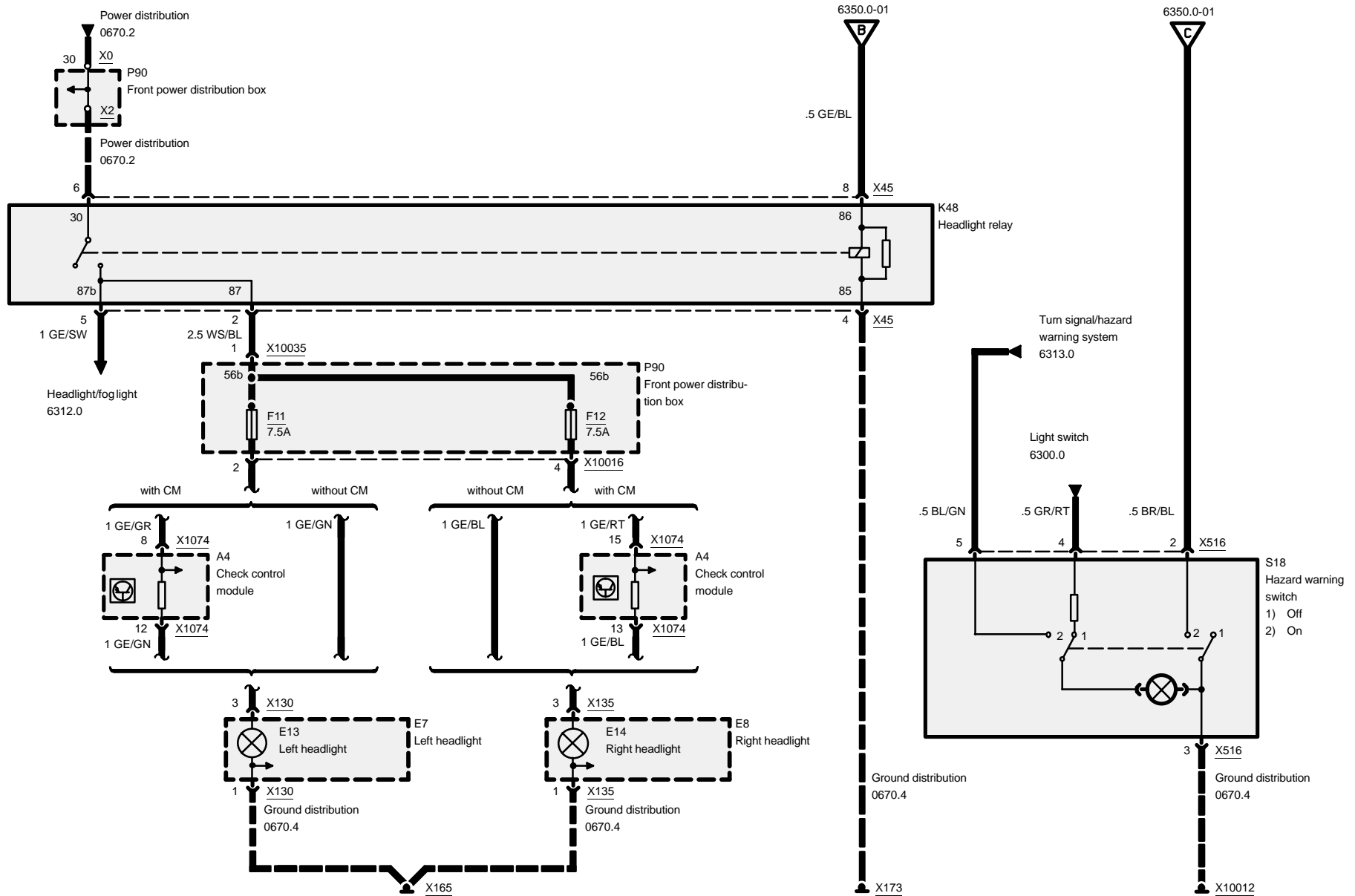






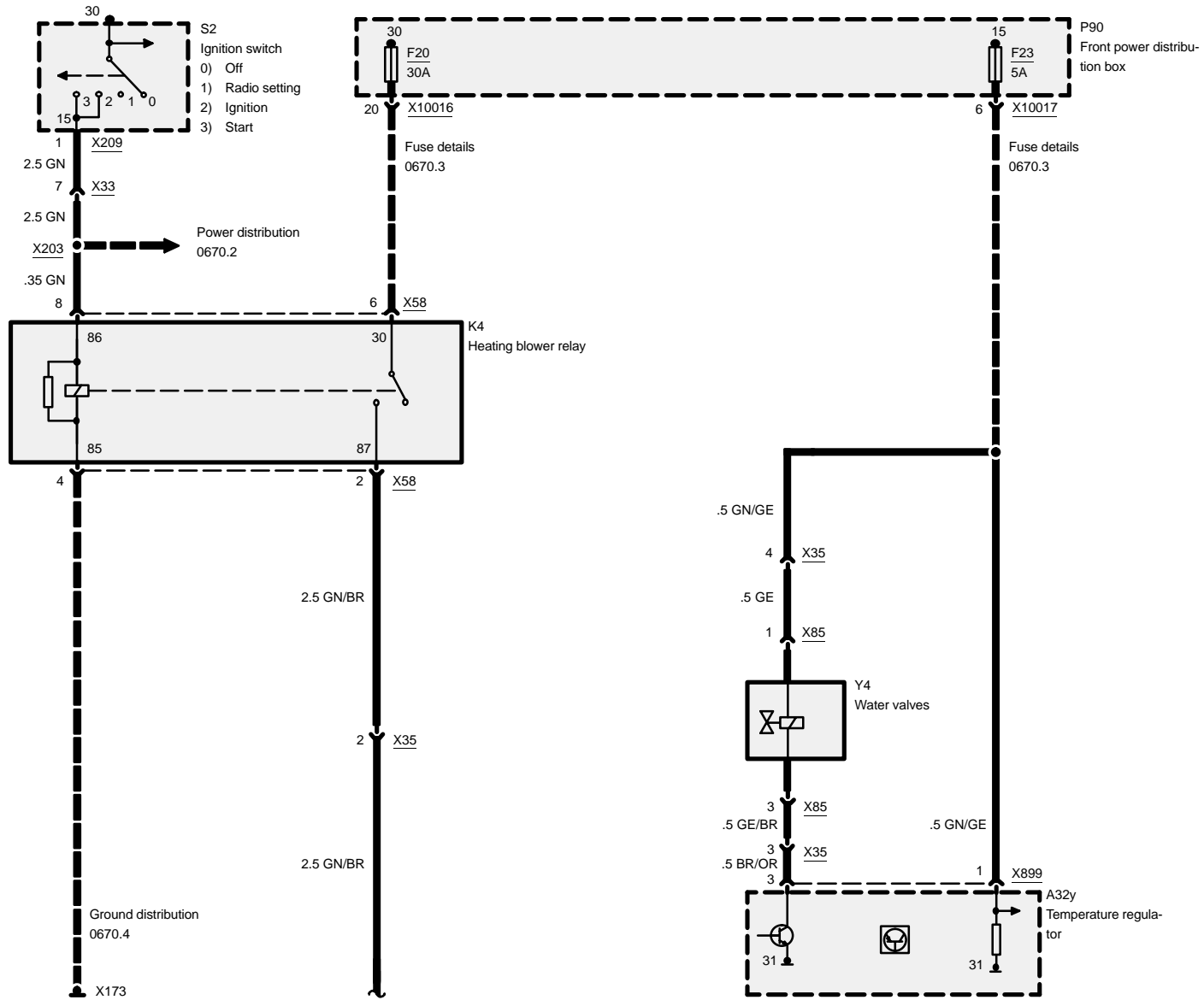


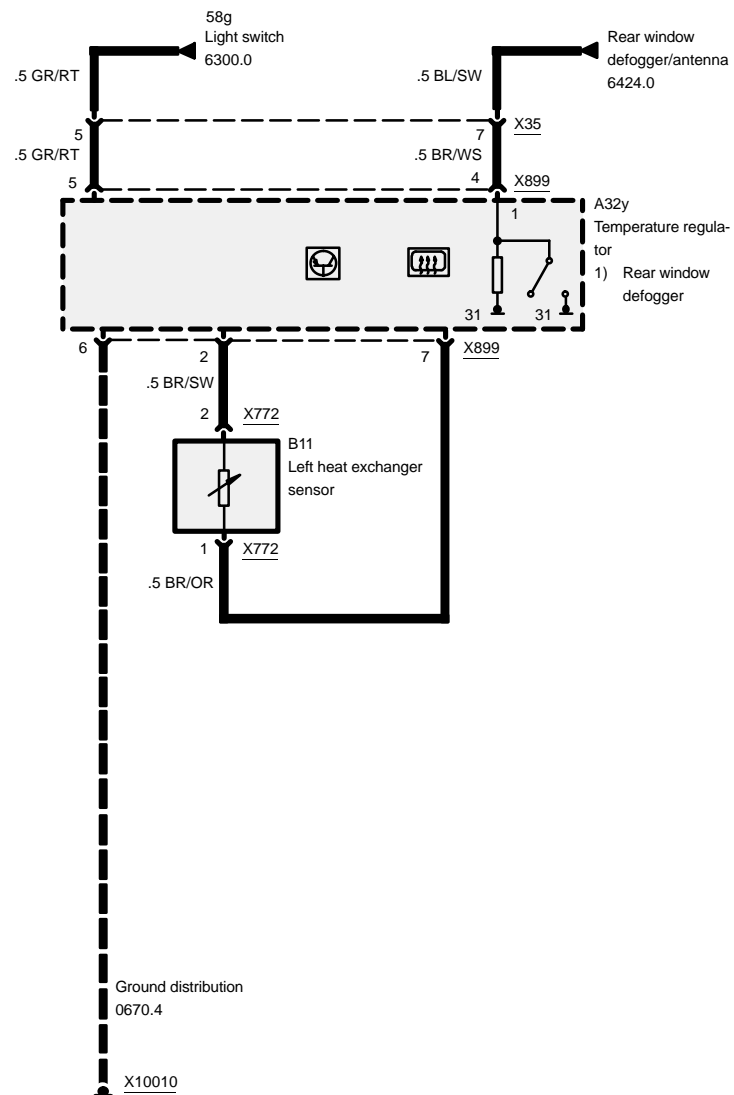
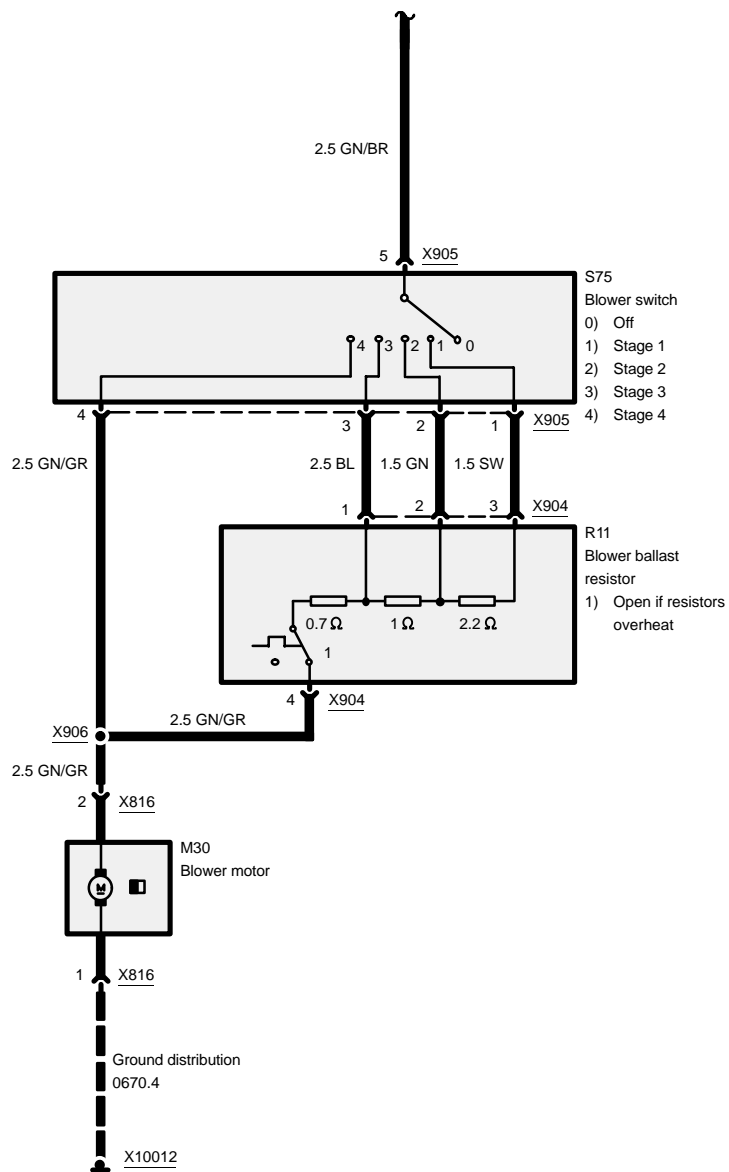
# Crash and alarm sensor





# 6410.5 Automatic heating control (HR)

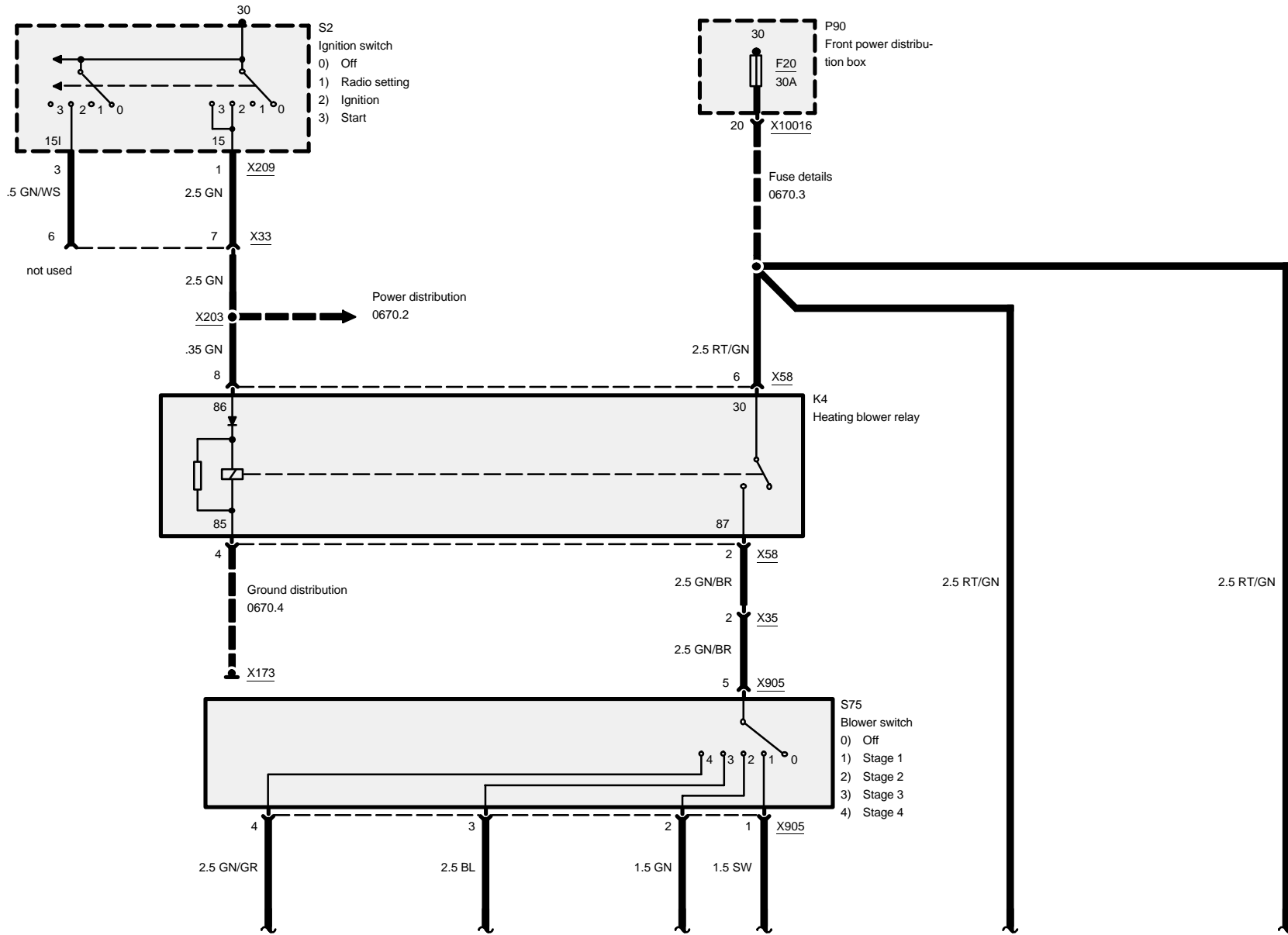


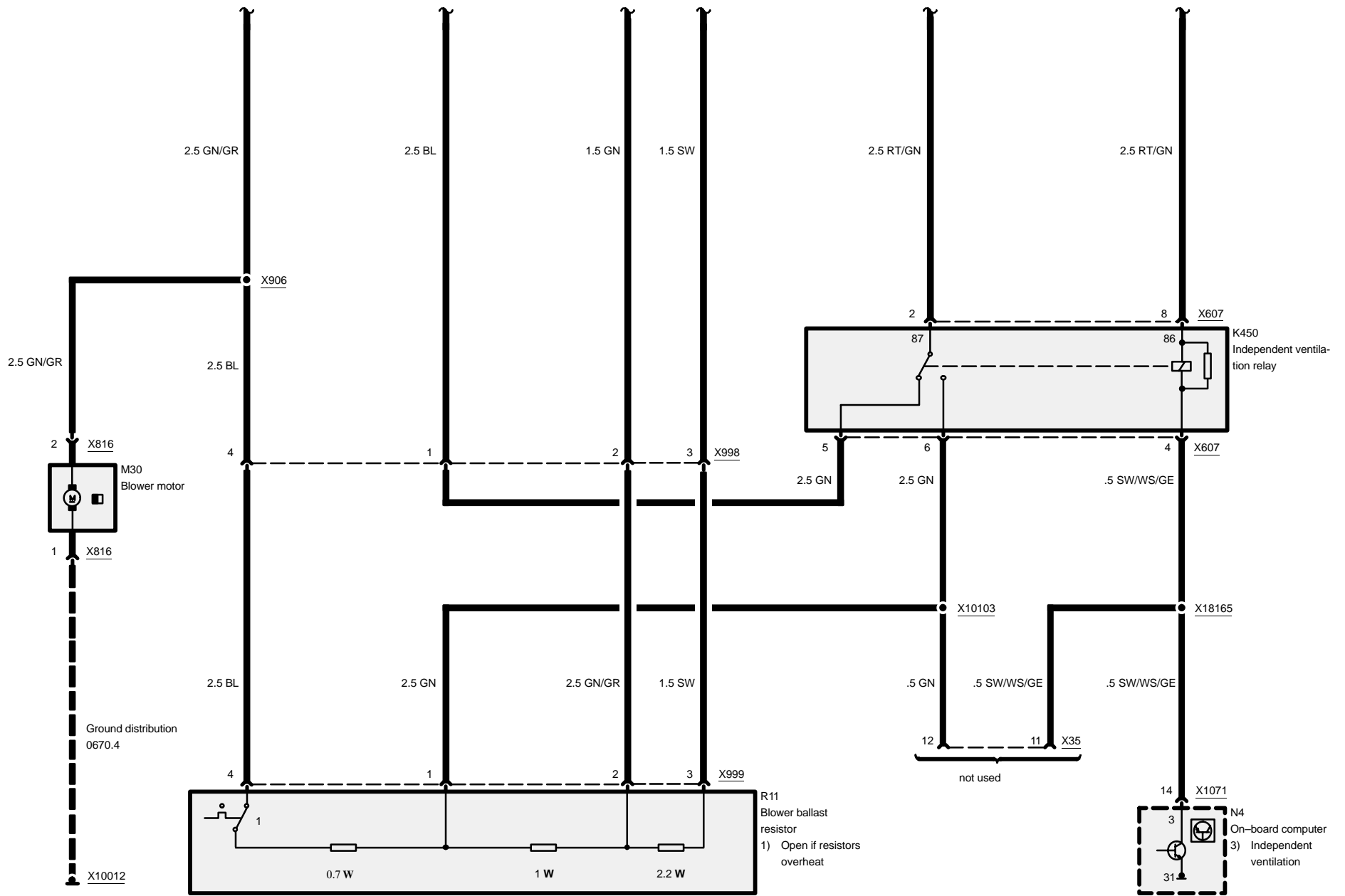






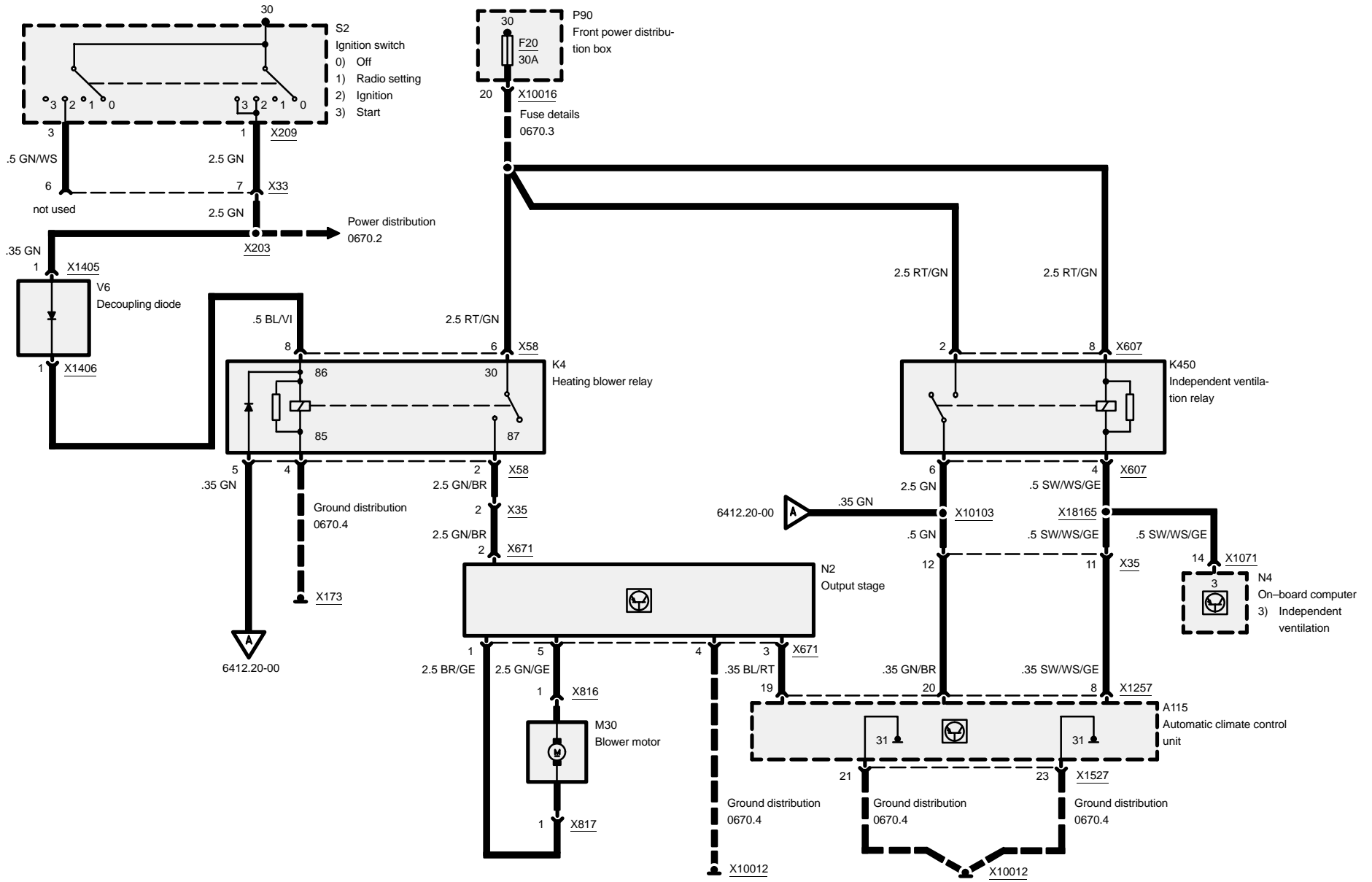
# 6412.10 Independent ventilation with HR





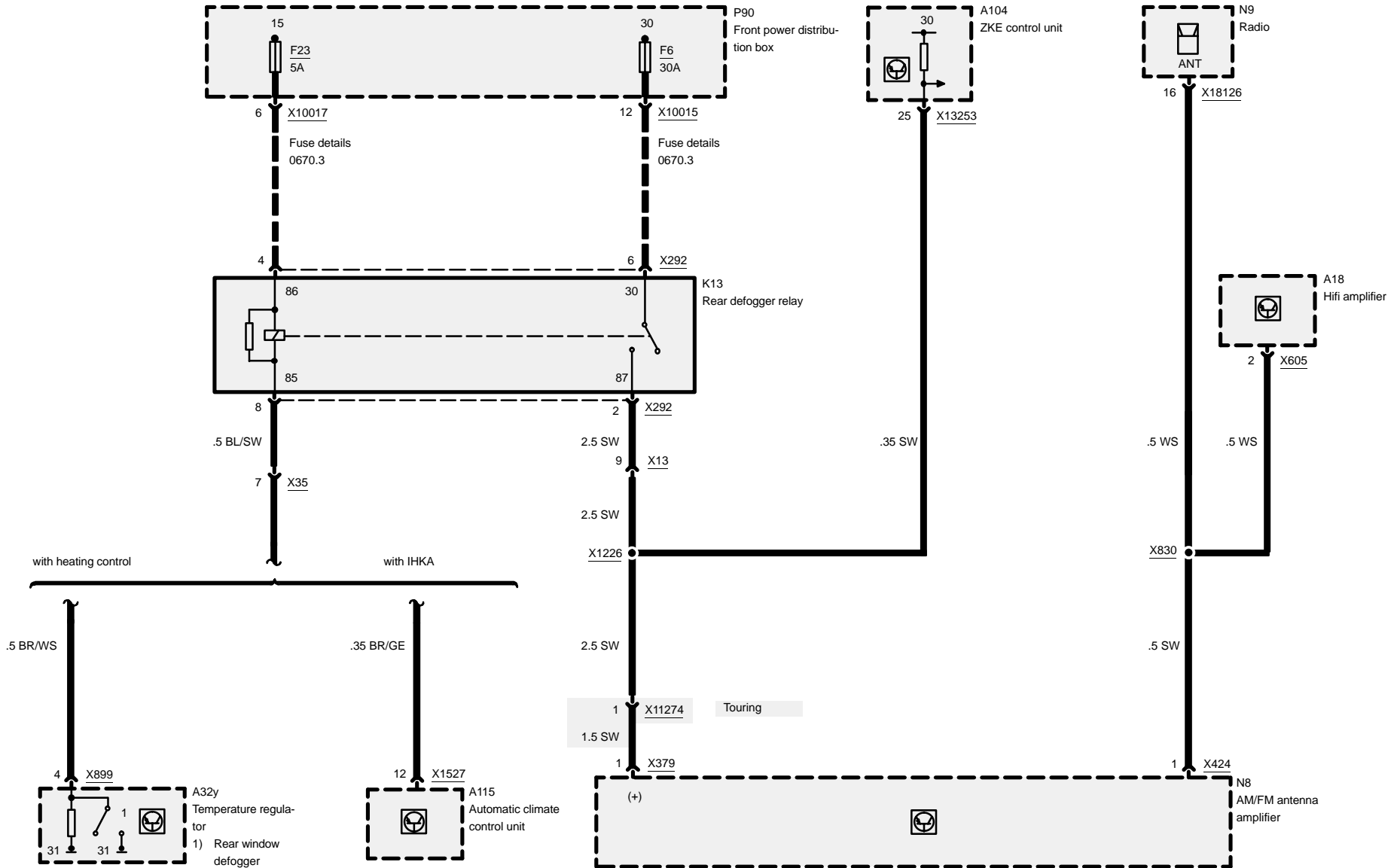


# 6412.20 Independent ventilation with IHKA E36





# 6424.0 Rear window defogger/antenna

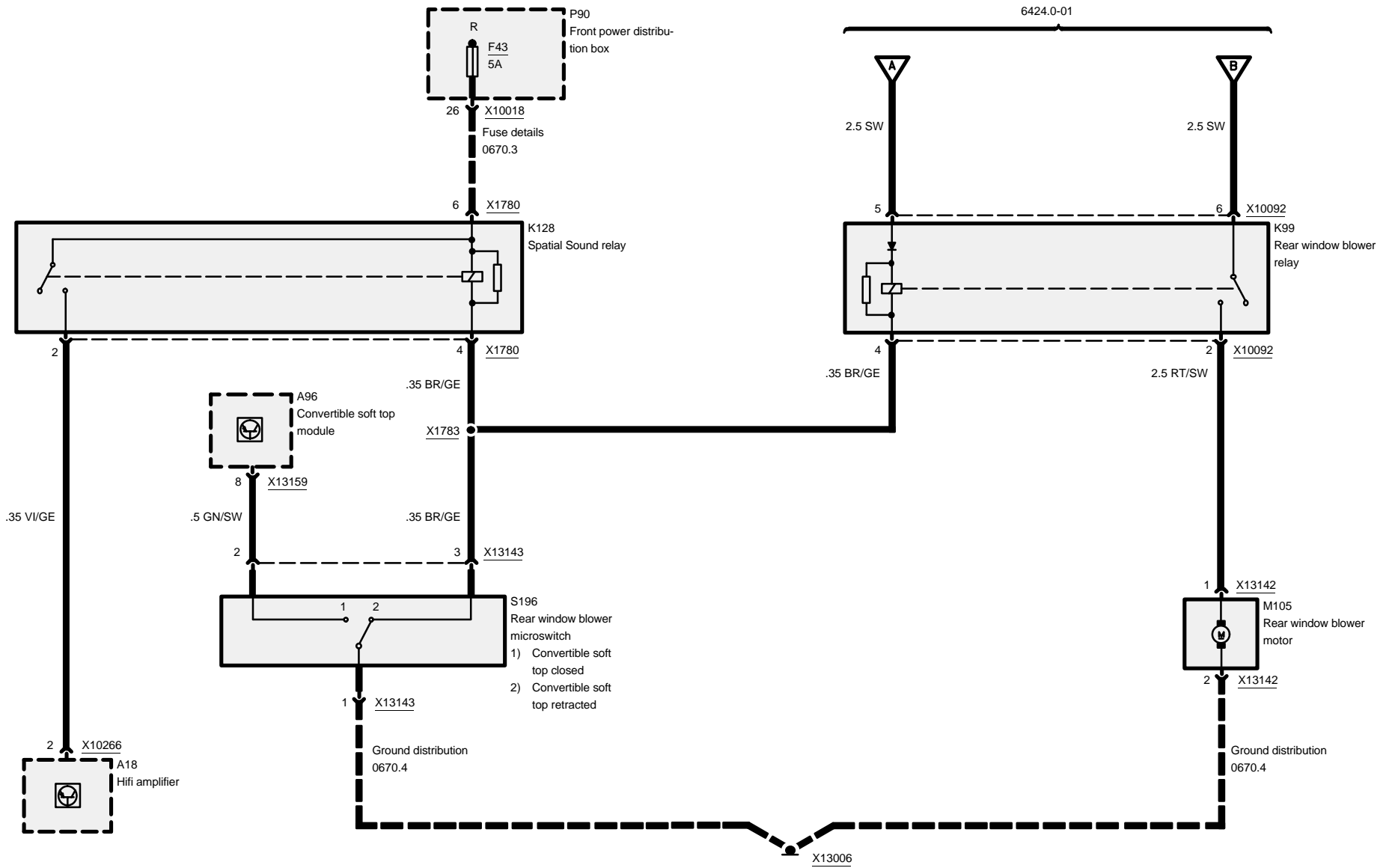






# Rear window defogger/antenna

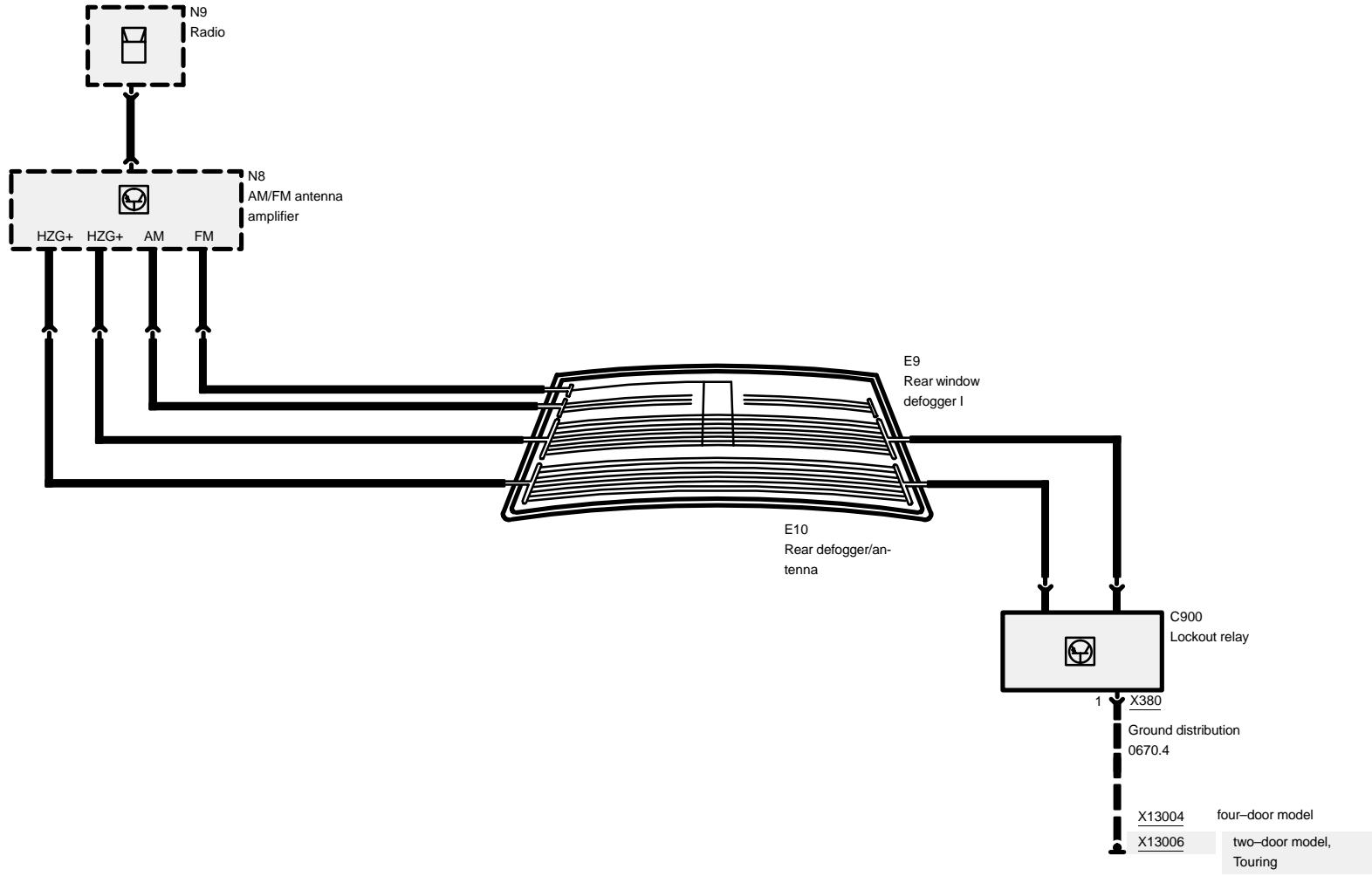
## Convertible

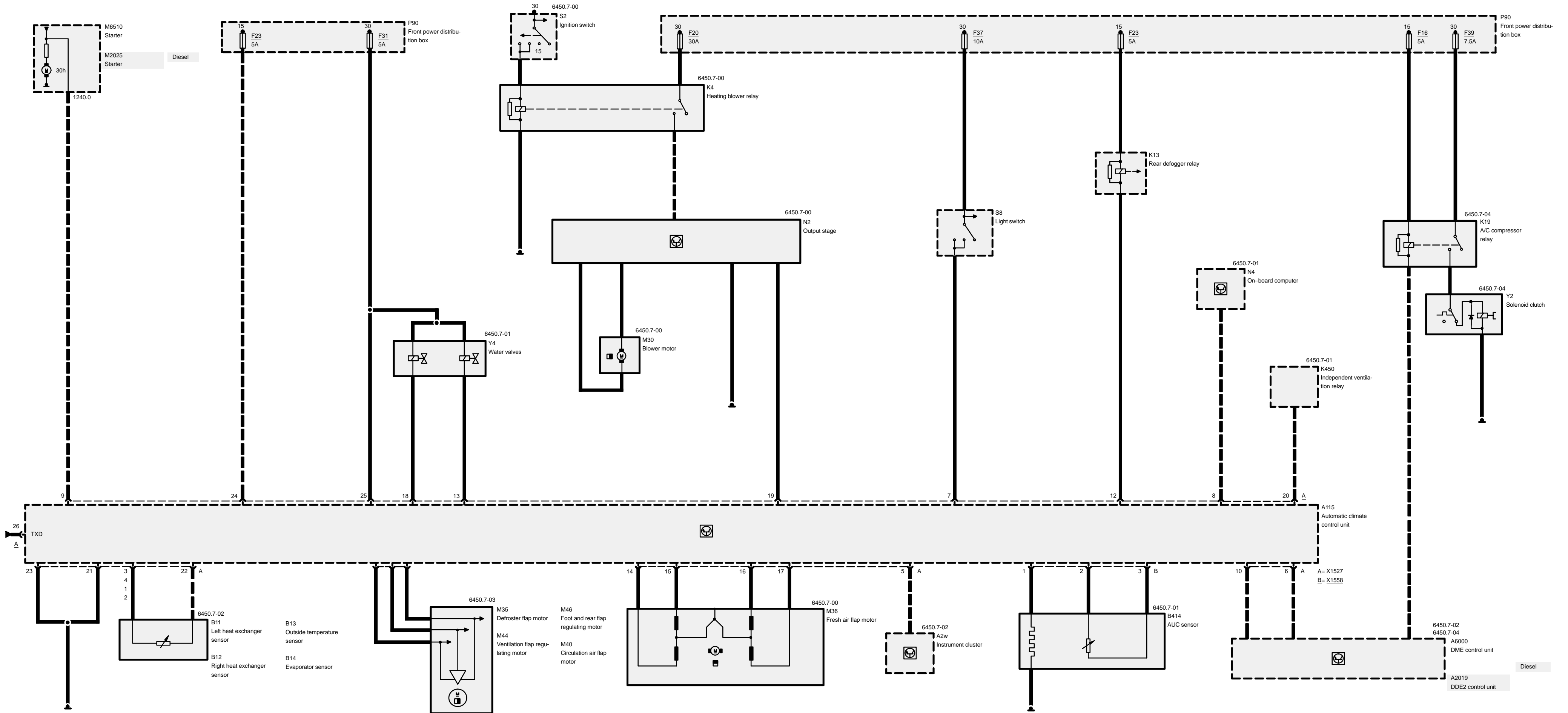




# Rear window defogger/antenna

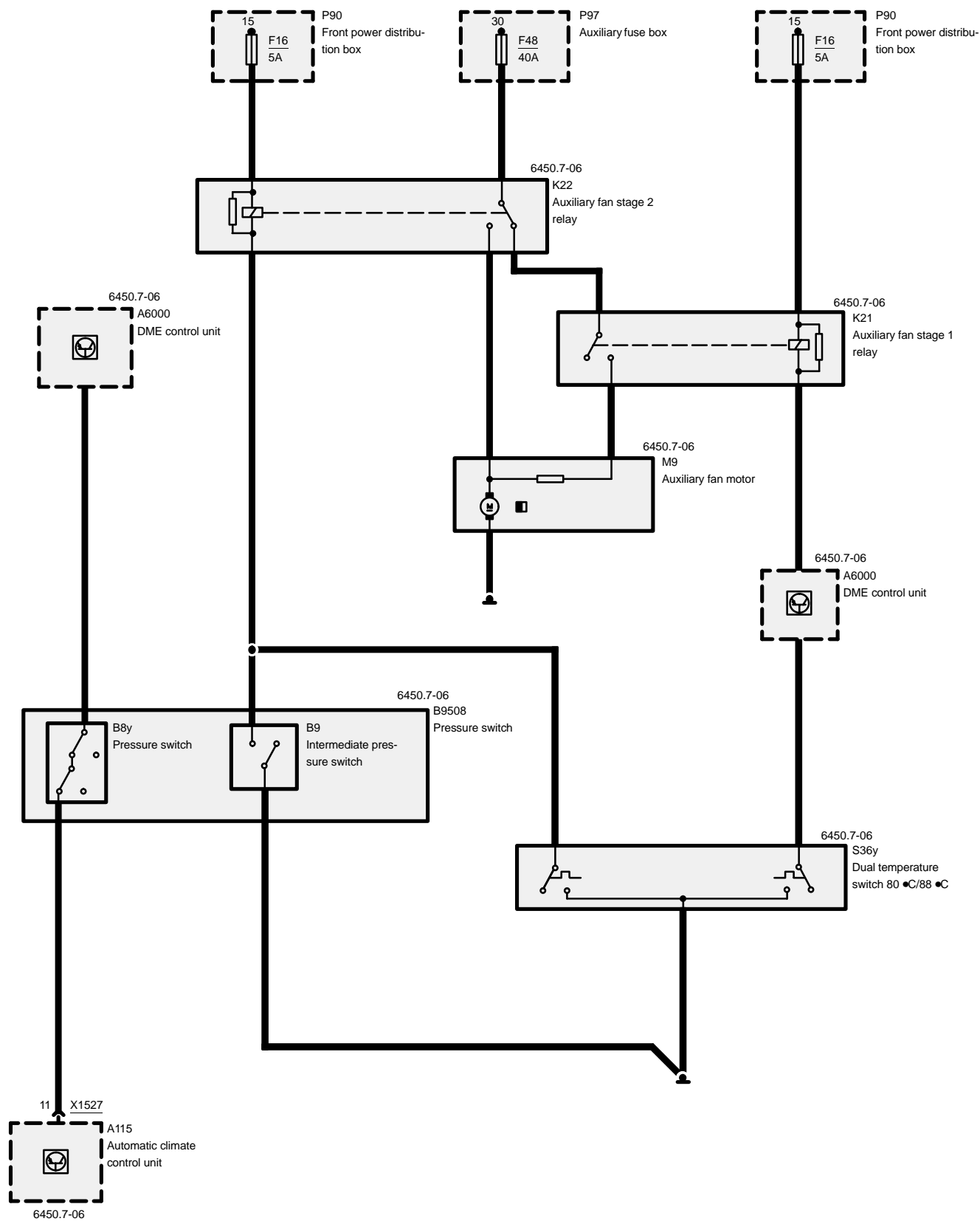
## Rear window antenna



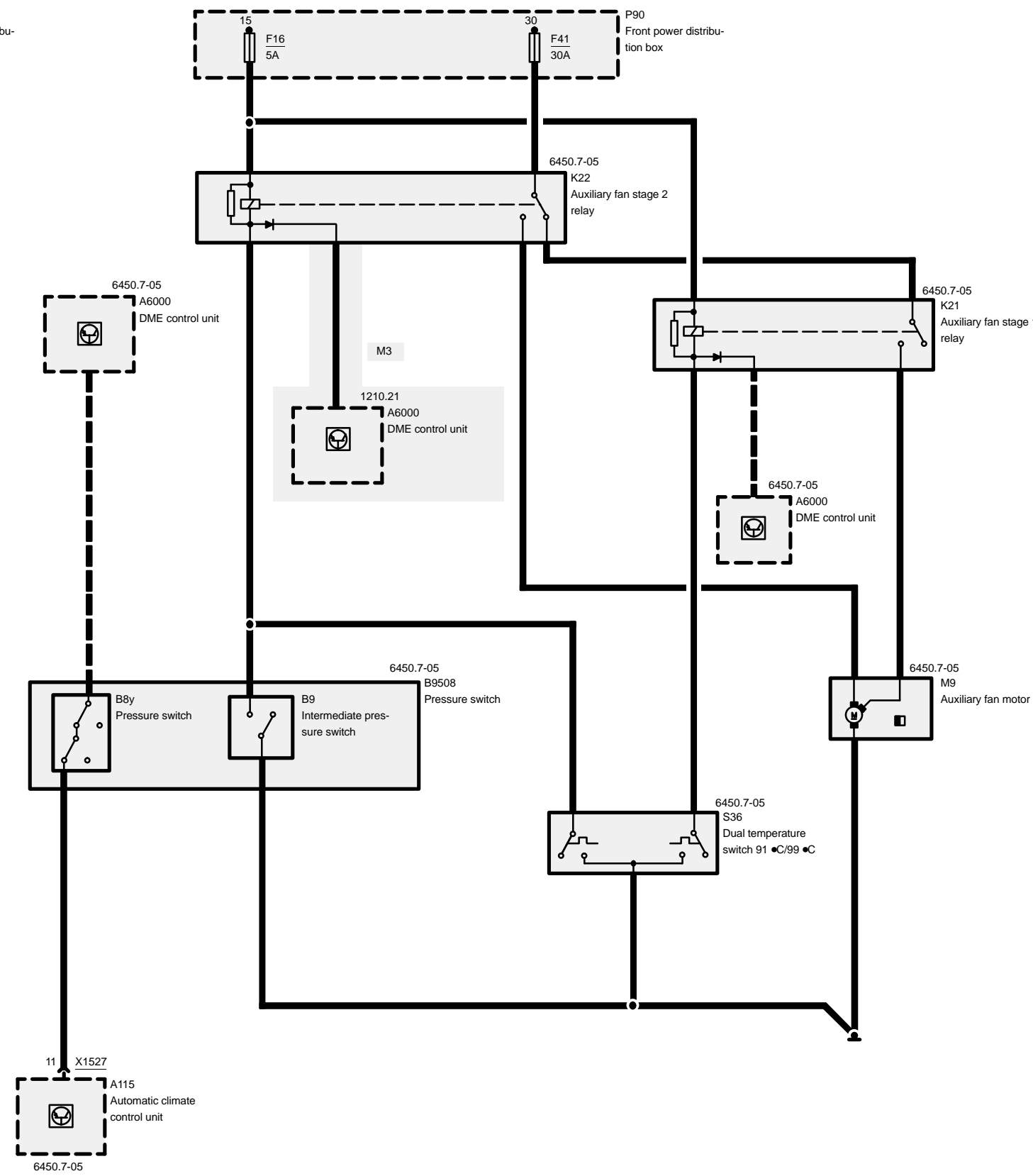




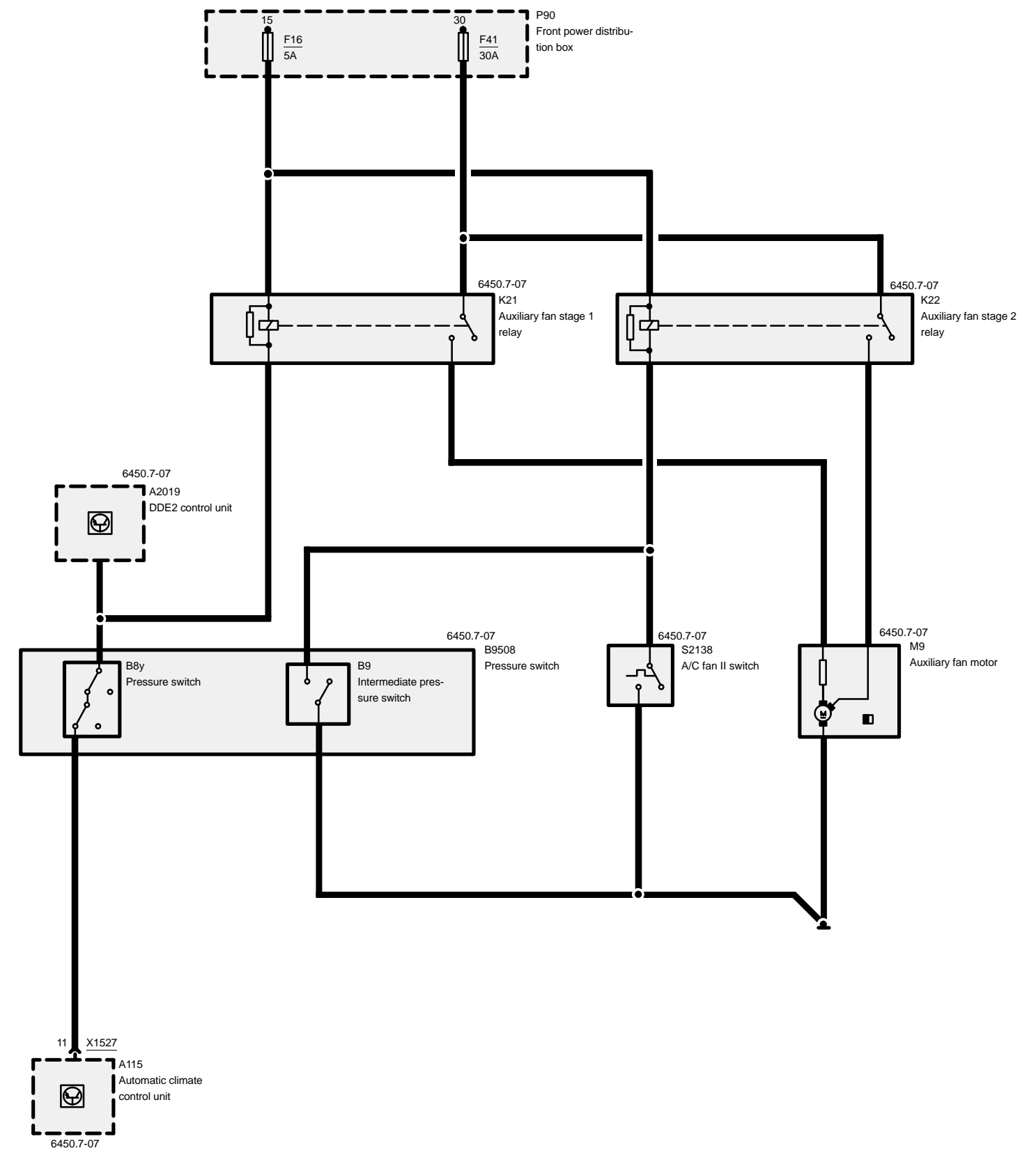
**Automatic climate control (IHKA E36)**  
**Auxiliary fan – 4-cylinder Petrol engine**

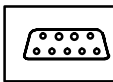


**Auxiliary fan – 6-cylinder Petrol engine**



**Auxiliary fan – Diesel engine**

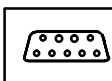




## Pin assignments

### X1527

Pin	Type	Description/Function	Connection
1	E	Outside temperature	Outside temperature sensor
2	E	Evaporator temperature	Evaporator sensor
3	E	Heater temperature, left	Heater sensor, left
4	E	Heater temperature, right	Heater sensor, right
5	E	Road speed signal (speedometer A-signal)	Instrument cluster
6	E	Speed signal (TD signal)	DME control unit
7	E	Lighting input	Lights
8	A	Output signal	On-board computer
9	E	Terminal 50	Starter
10	A	Speed increase	DME control unit
11	A	Activation, A/C compressor	Pressure switch
12	A	Rear window signal	Rear window
13	A	Activation, right water valve	Water valve, right
14	A	Activation, fresh air flap motor	Fresh air flap motor
15	A	Activation, fresh air flap motor	Fresh air flap motor
16	A	Activation, fresh air flap motor	Fresh air flap motor
17	A	Activation, fresh air flap motor	Fresh air flap motor
18	A	Activation, left water valve	Water valve, left
19	A	Air conditioning fan drive	Output stage, A/C fan
20	E	Independent ventilation	Relay box
21	M	Component ground	Control unit, IHKA
22	M	Component ground	Mixing air actuator
23	M	Component ground	Control unit, IHKA
24	E	Terminal 15	Fuse 23
25	E	Terminal 30	Fuse 31
26	E/A	TxD diagnostic link	Diagnostic connector



## Pin assignments

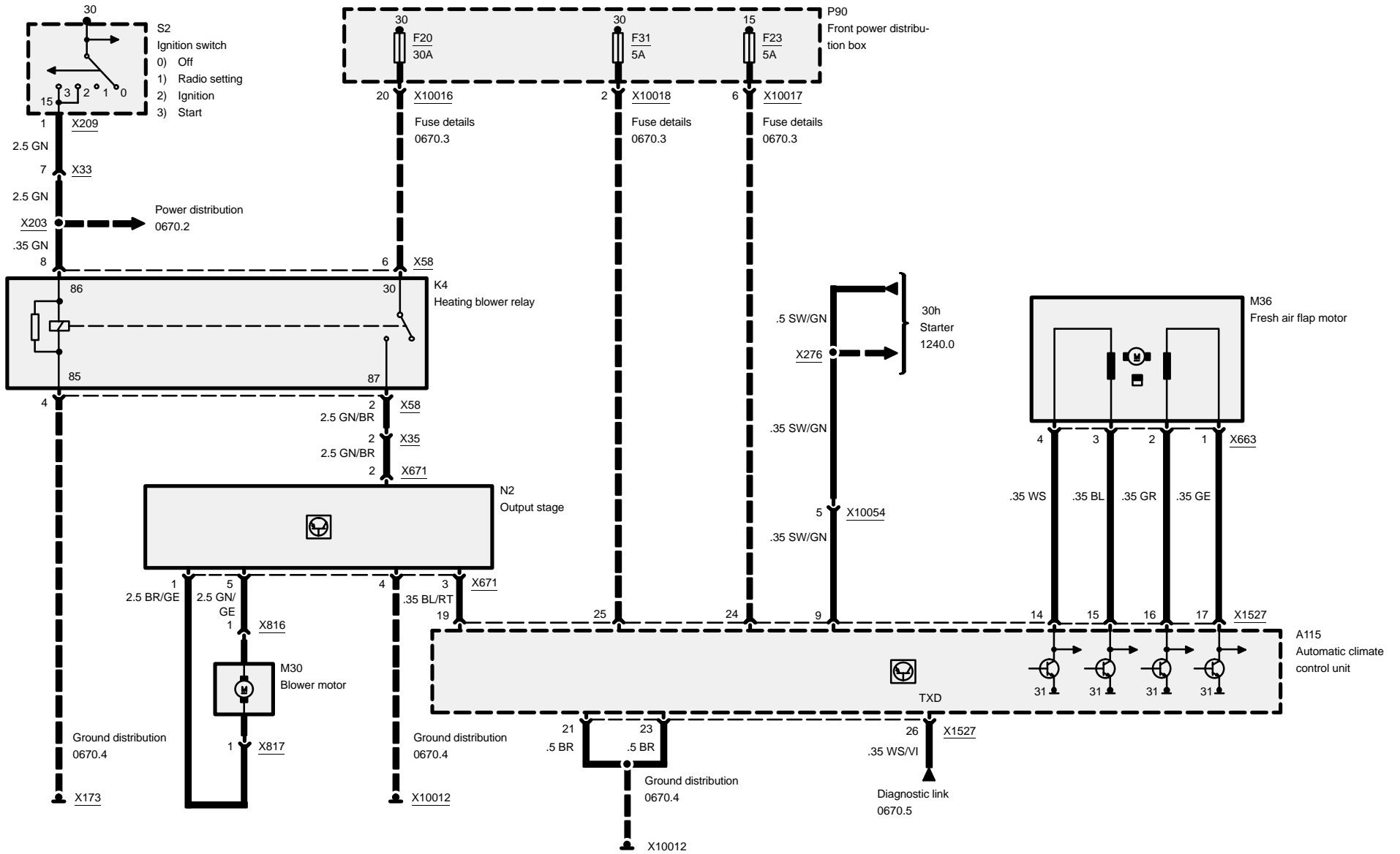
### X1558

Pin	Type	Description/Function	Connection
1	E	Signal, recirculated air	AUC sensor
2	E	Signal, recirculated air	AUC sensor
3	A	Signal, recirculated air	AUC sensor



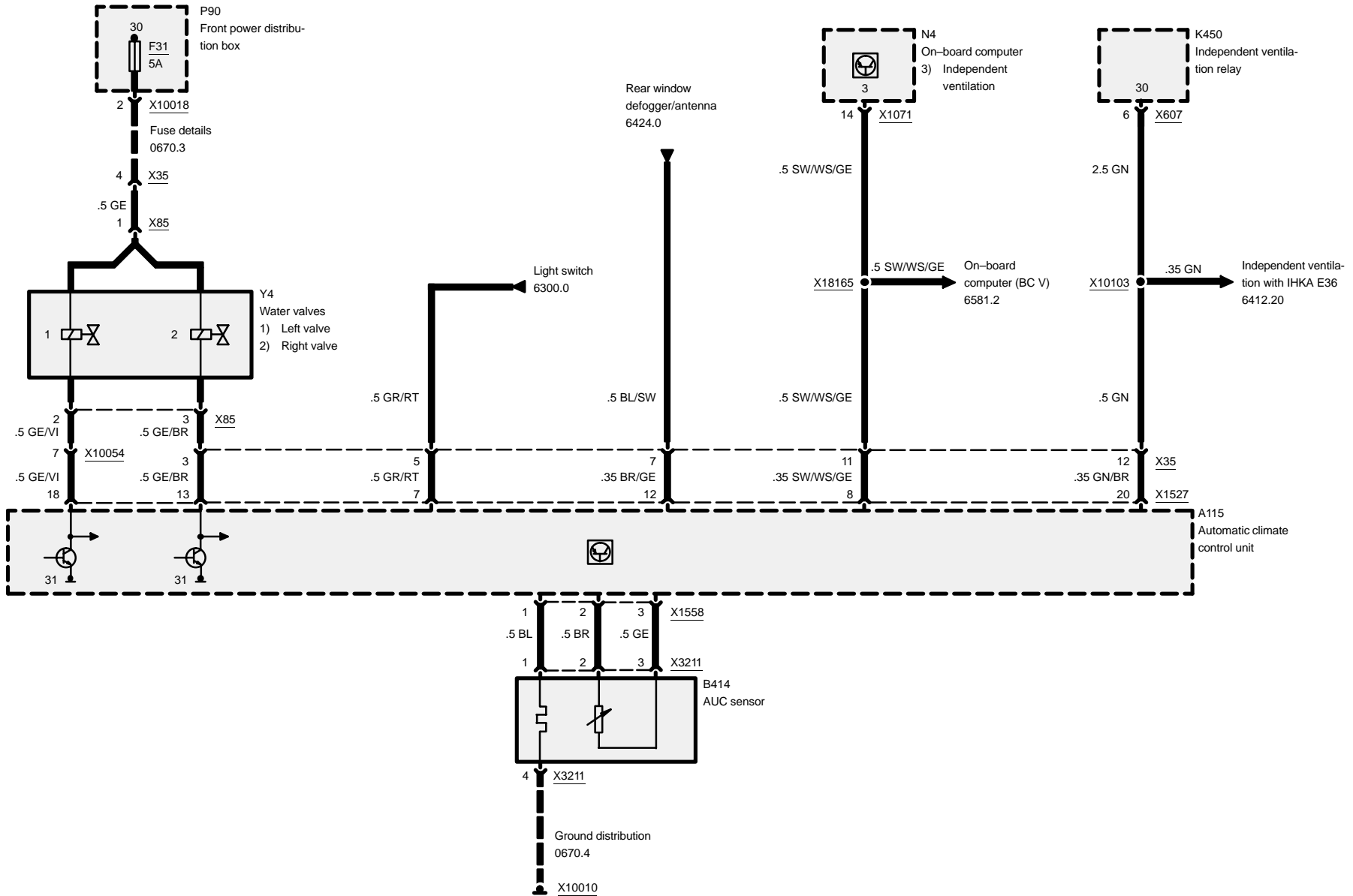
# Automatic climate control (IHKA E36)

## Current, air-flow control





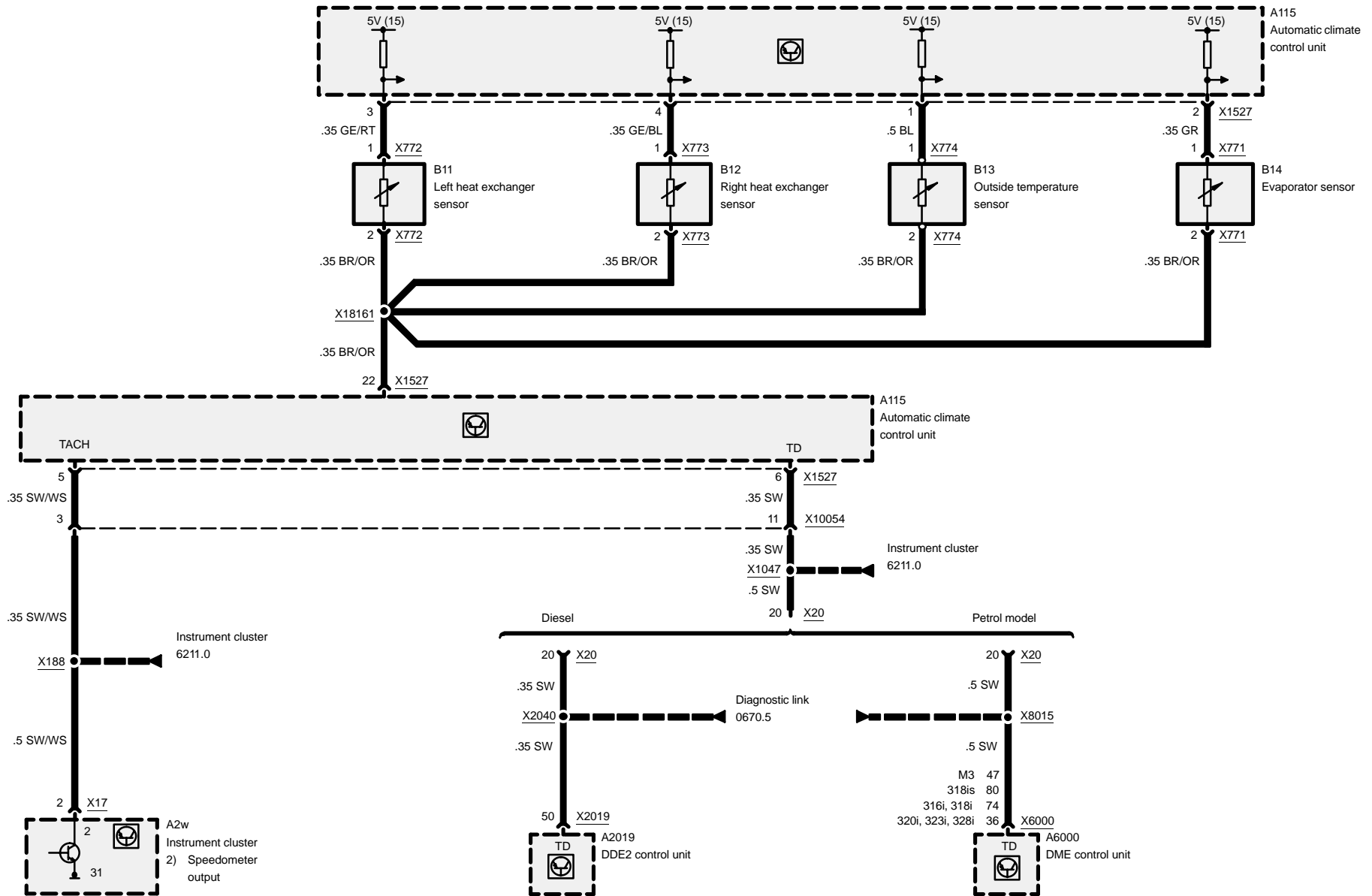
# Automatic climate control (IHKA E36)





# Automatic climate control (IHKA E36)

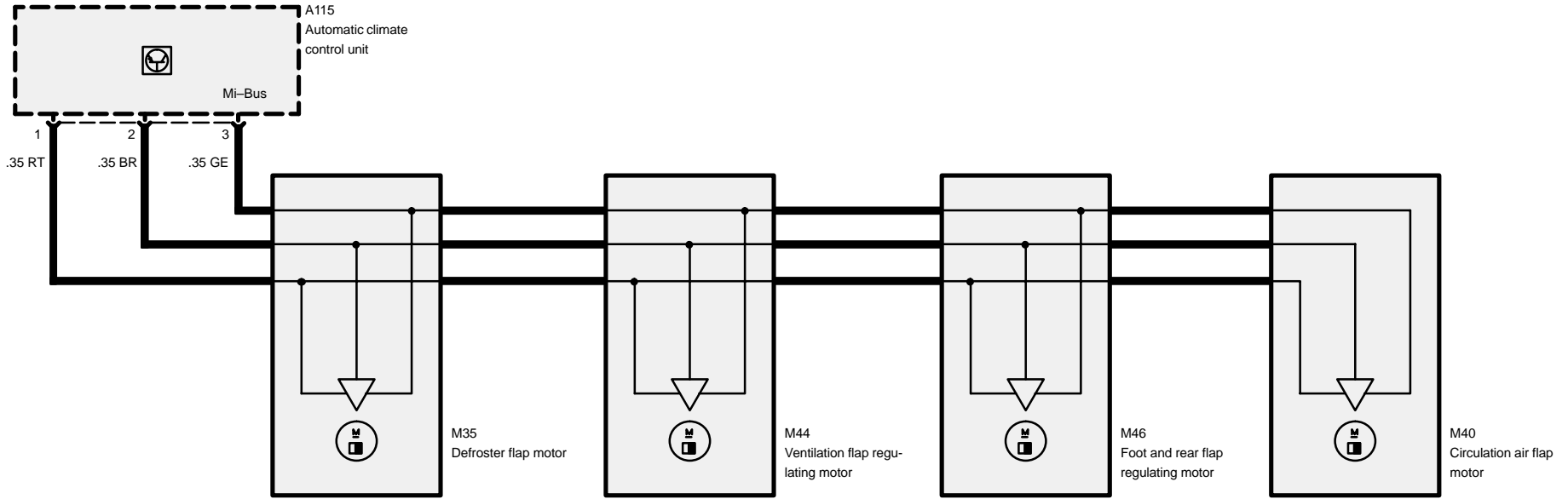
## Temperature control





# Automatic climate control (IHKA E36)

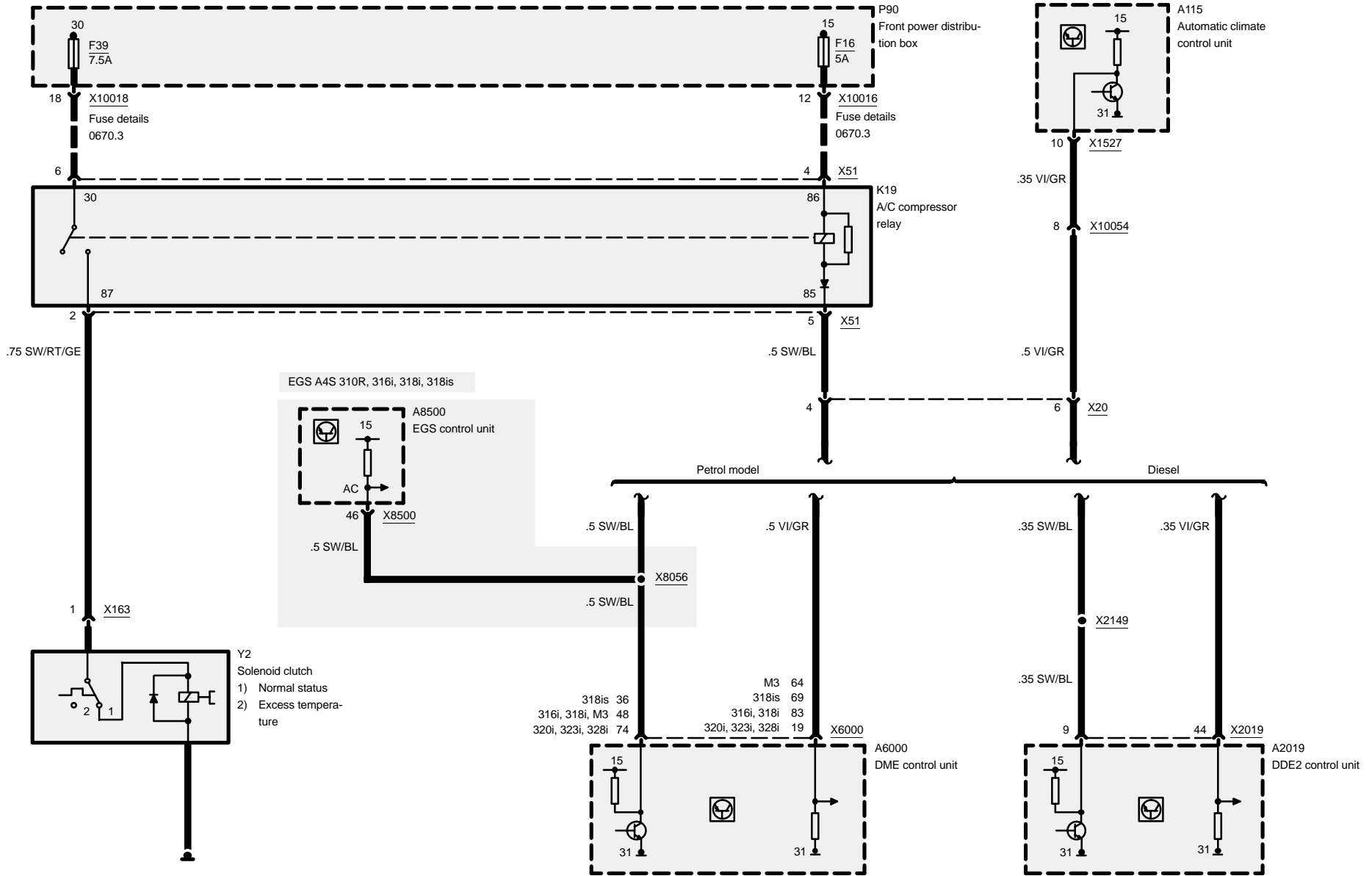
## Air supply





# Automatic climate control (IHKA E36)

## Compressor control

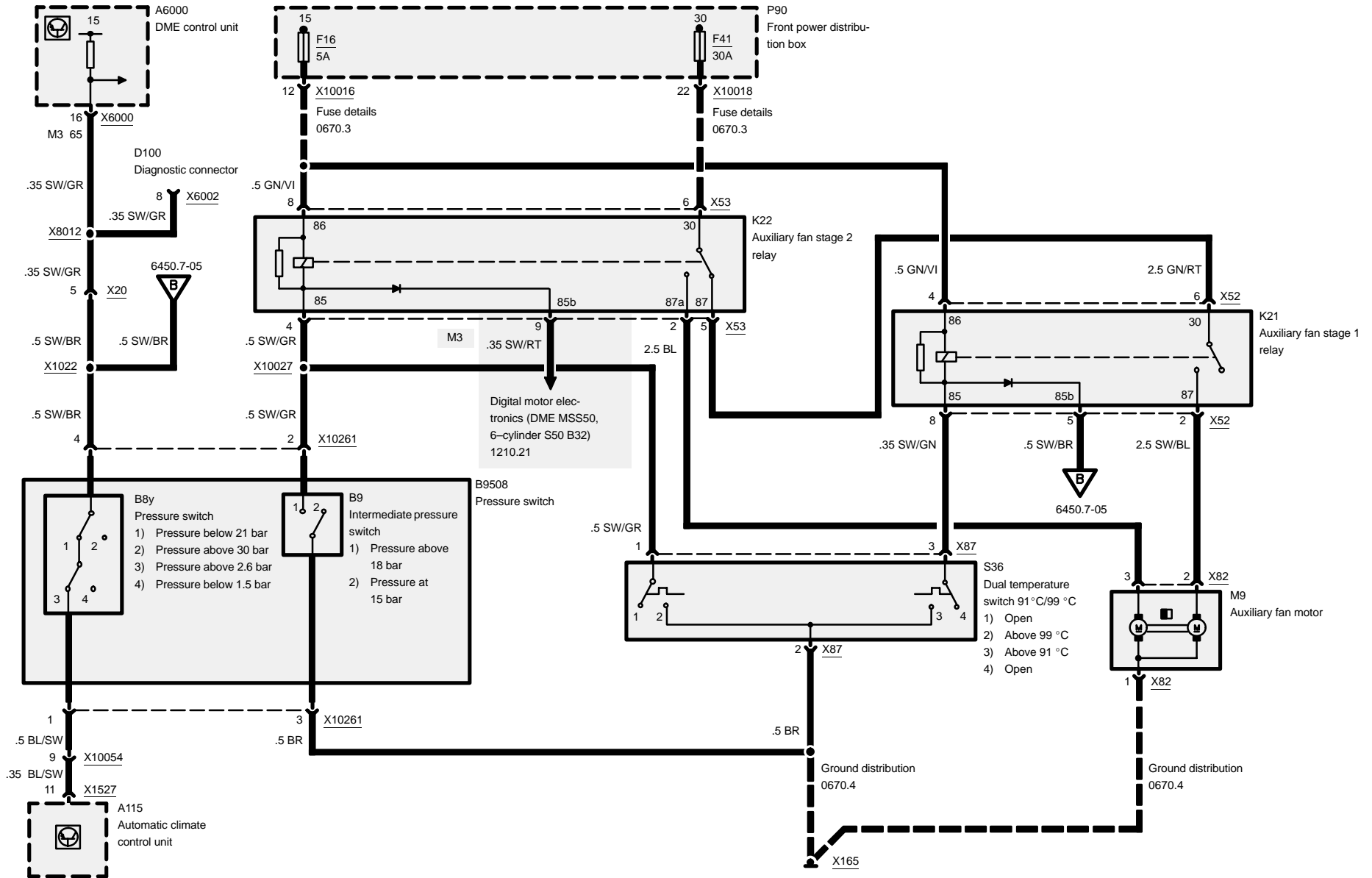






# Automatic climate control (IHKA E36)

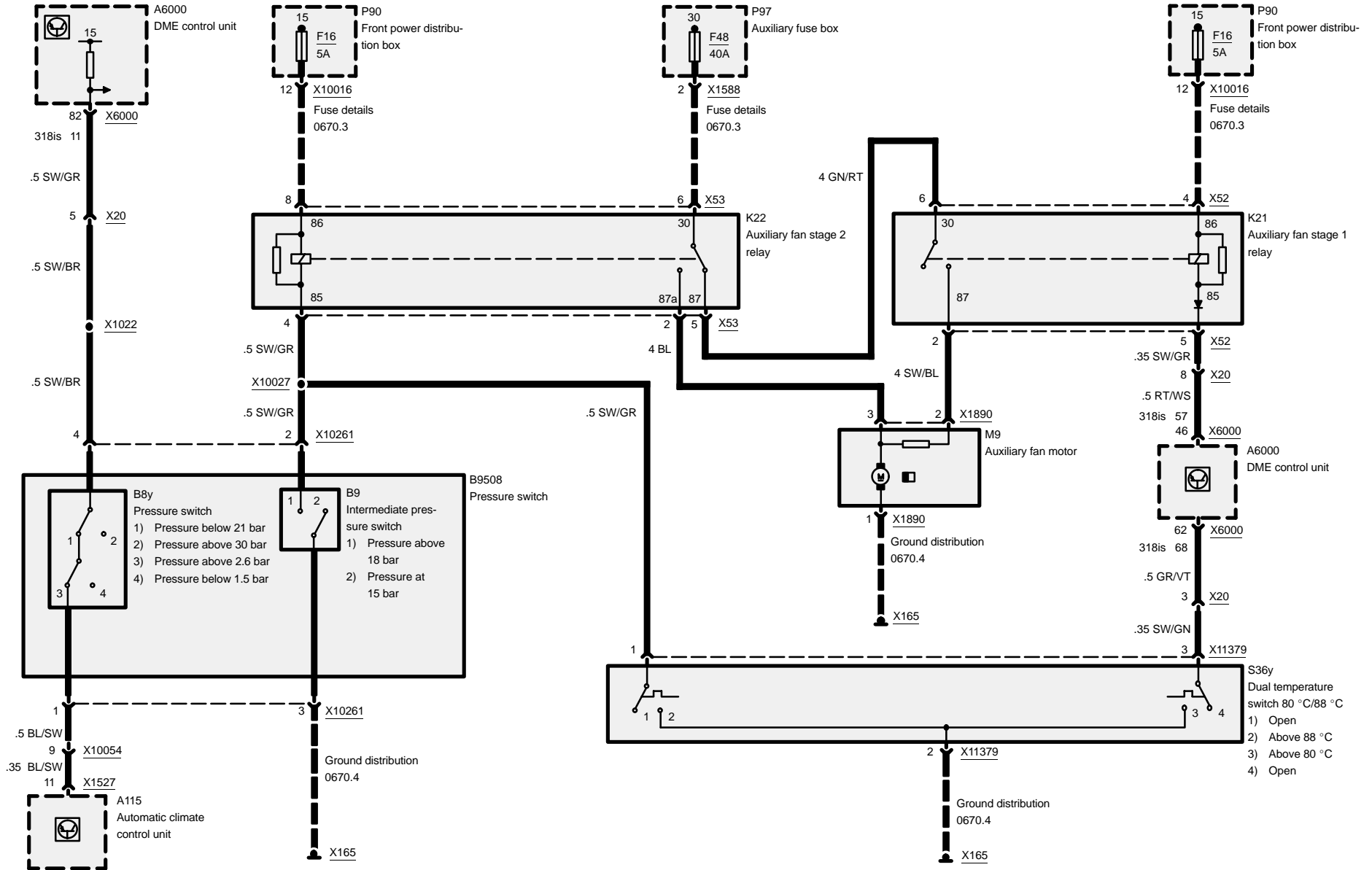
## Auxiliary fan – 6-cylinder Petrol engine





# Automatic climate control (IHKA E36)

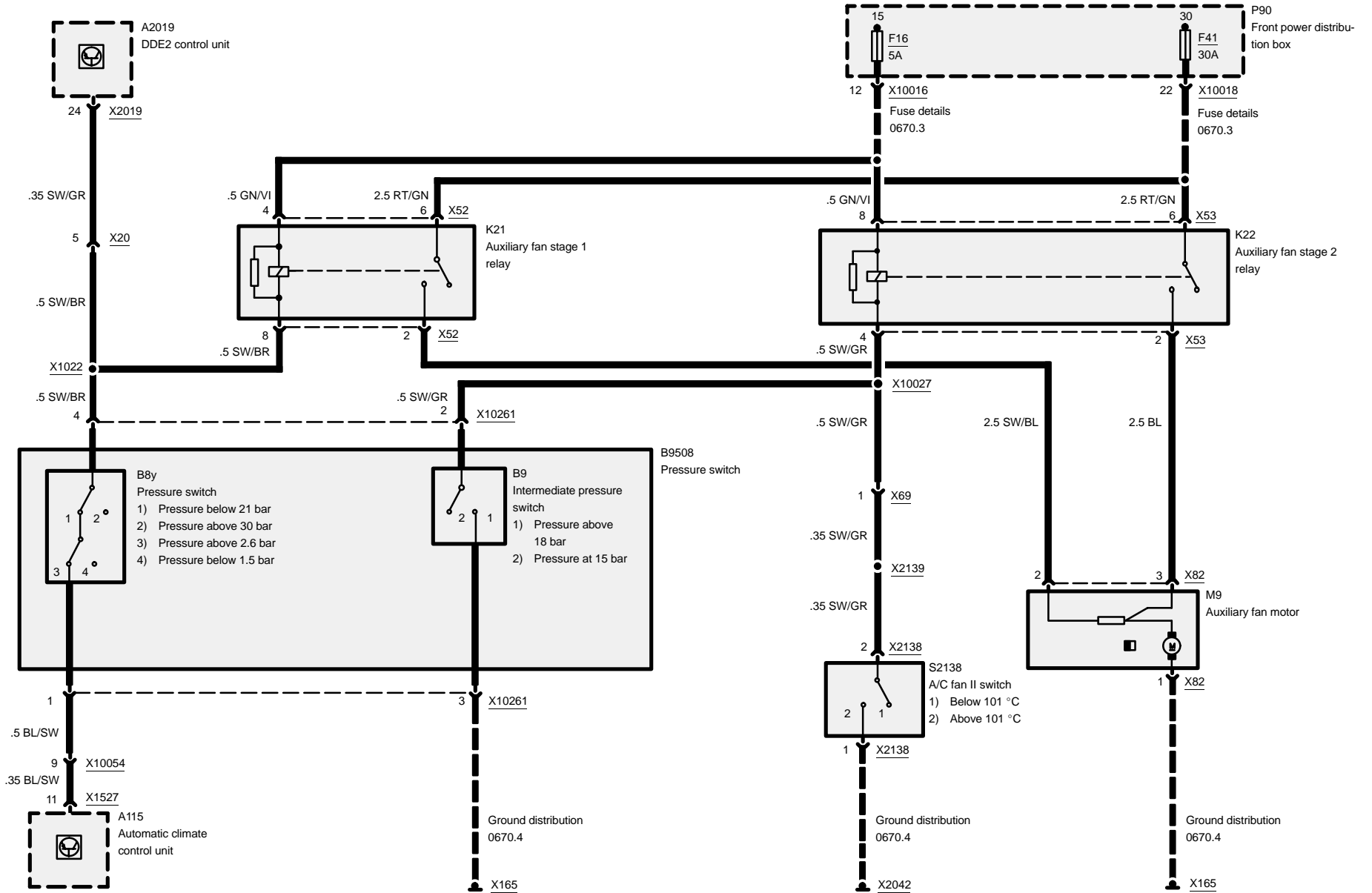
## Auxiliary fan – 4-cylinder Petrol engine





# Automatic climate control (IHKA E36)

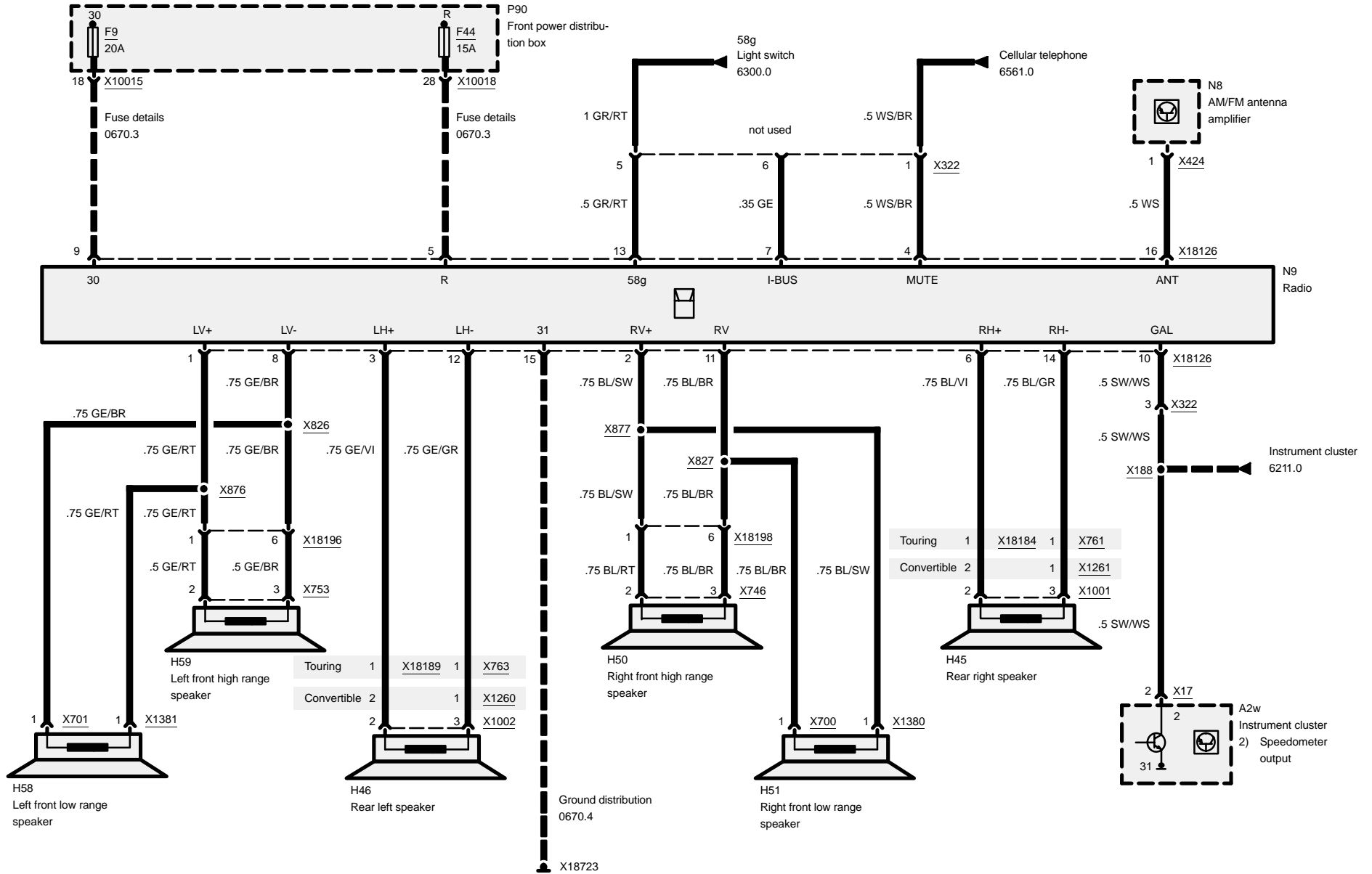
## Auxiliary fan – Diesel engine





# 6510.0 Radio/Stereo

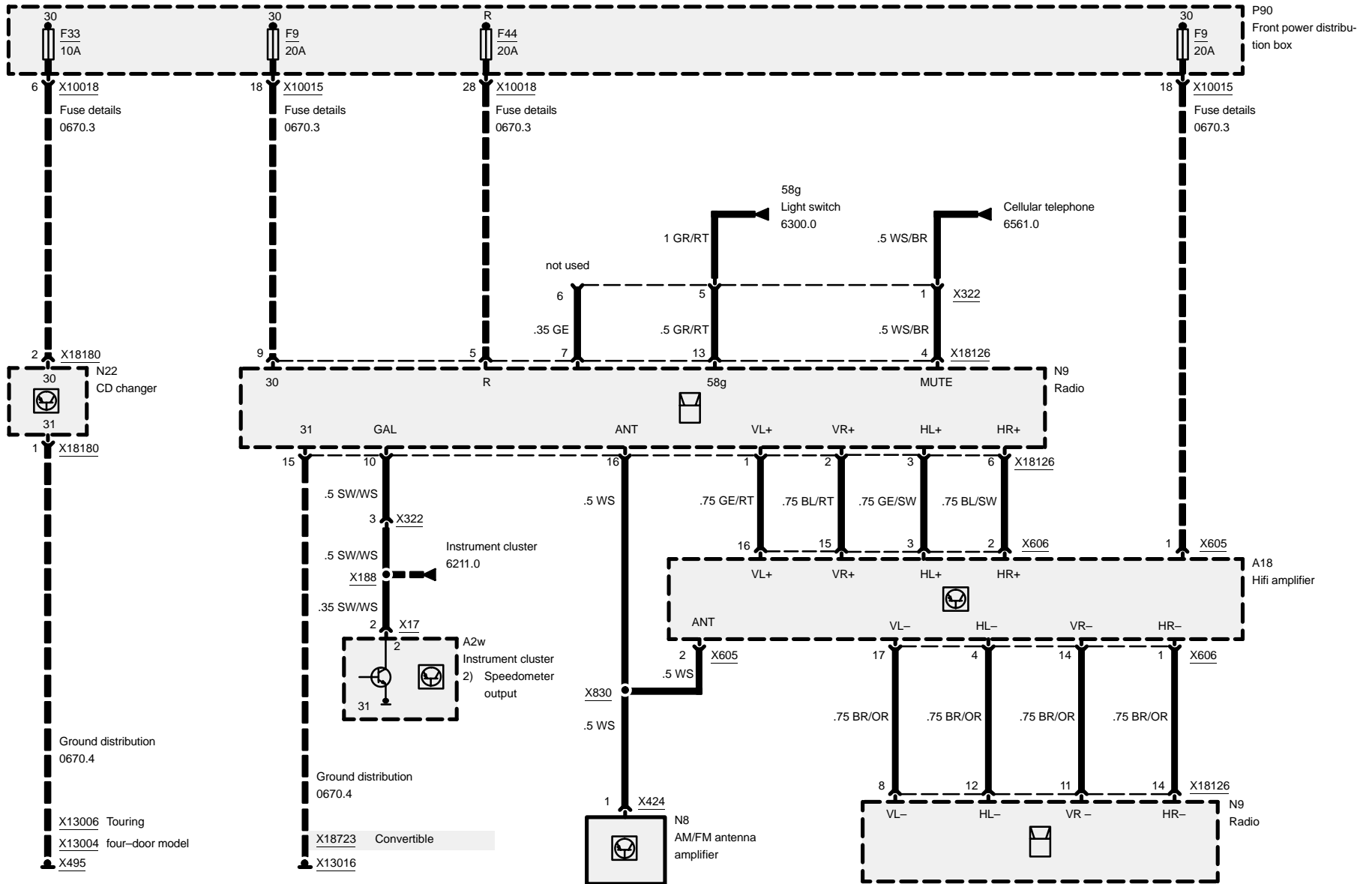
## Stereo, 6-Speaker system





# 6510.1 Radio/HiFi/Top Hifi

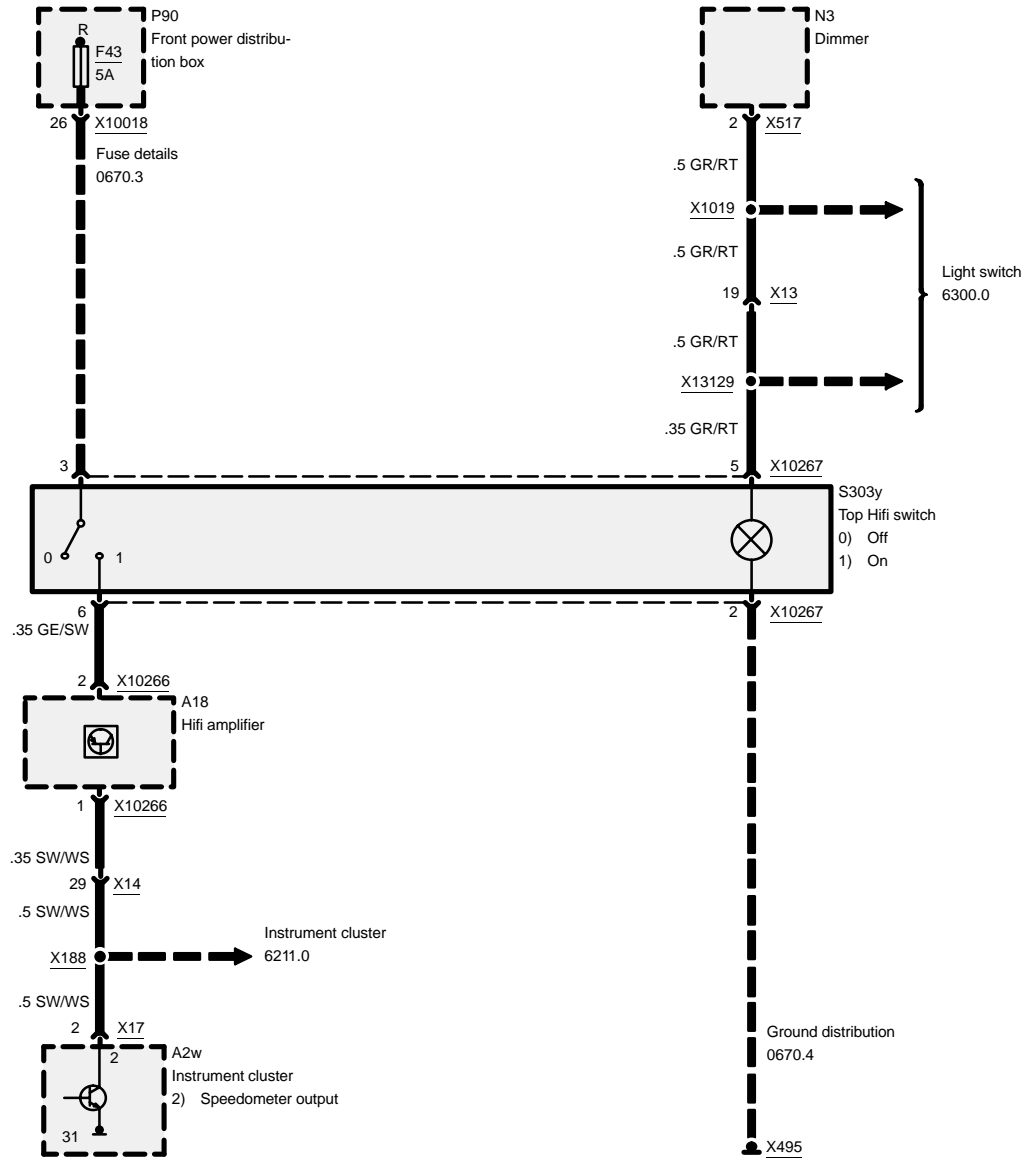
## Hifi, 10-speaker system





# Radio/HiFi/Top Hifi

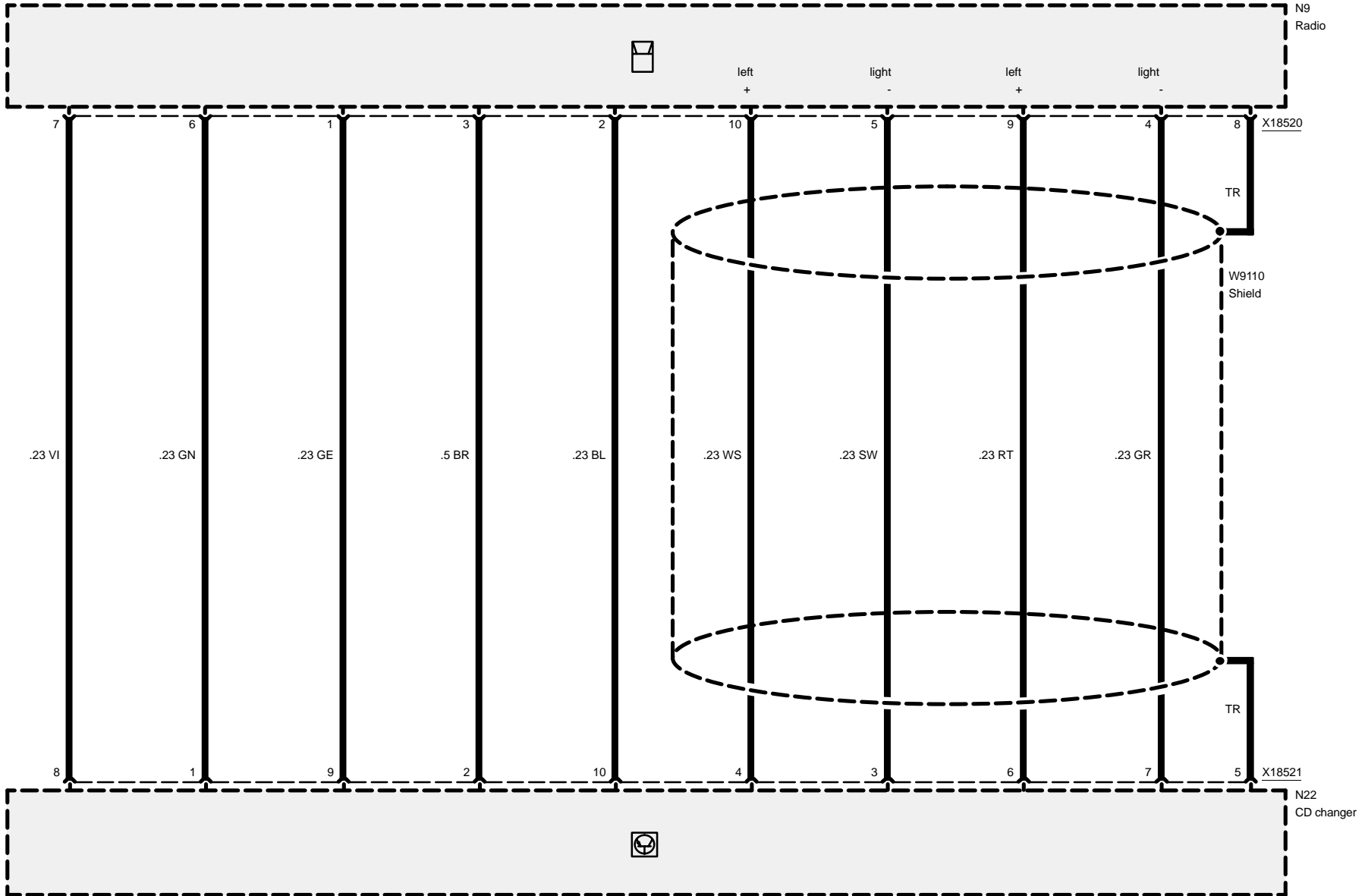
## HiFi, Harman Kardon





# Radio/HiFi/Top Hifi

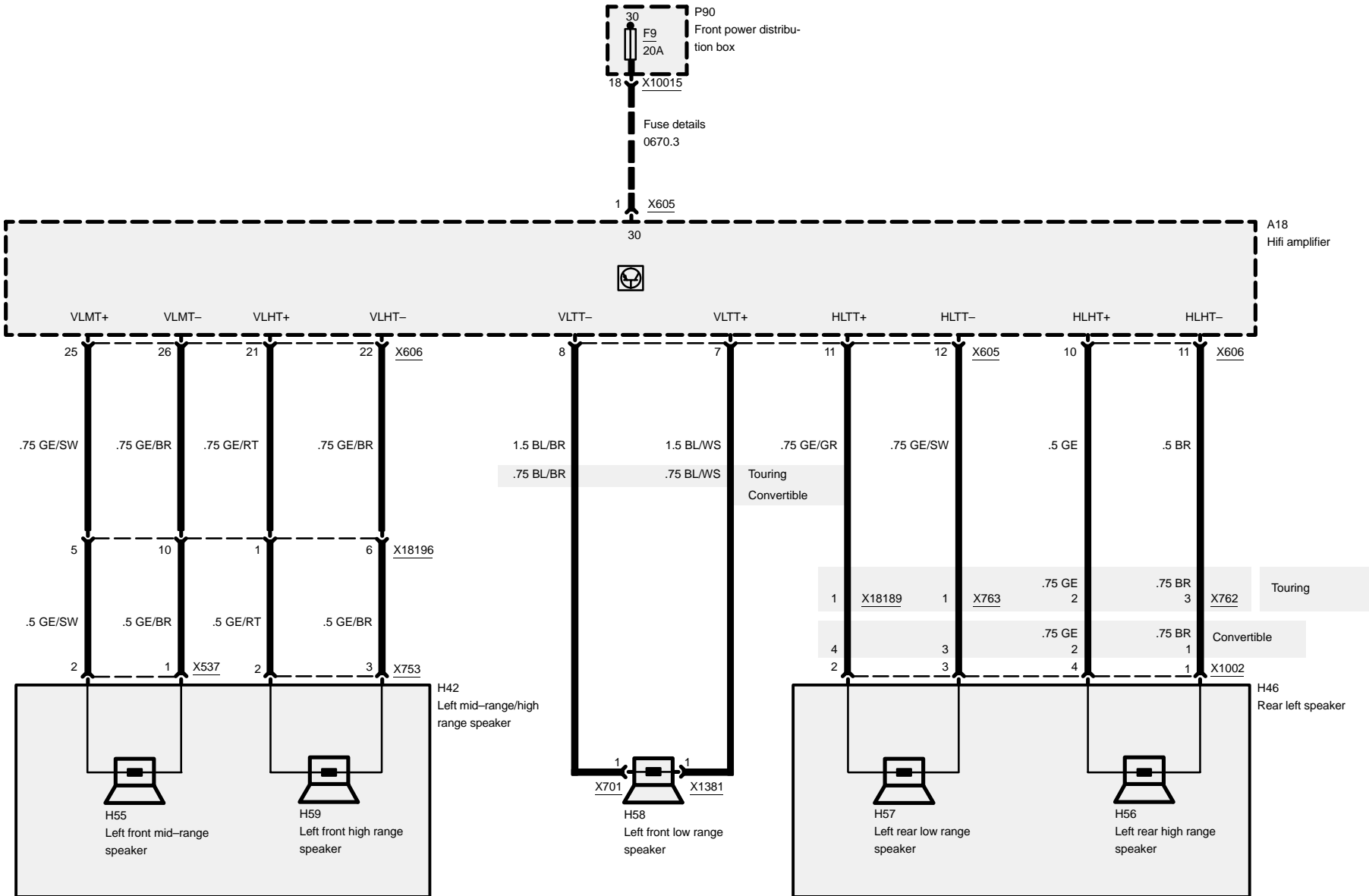
## Hifi, 10-speaker system





# Radio/HiFi/Top Hifi

## Hifi, 10-speaker system

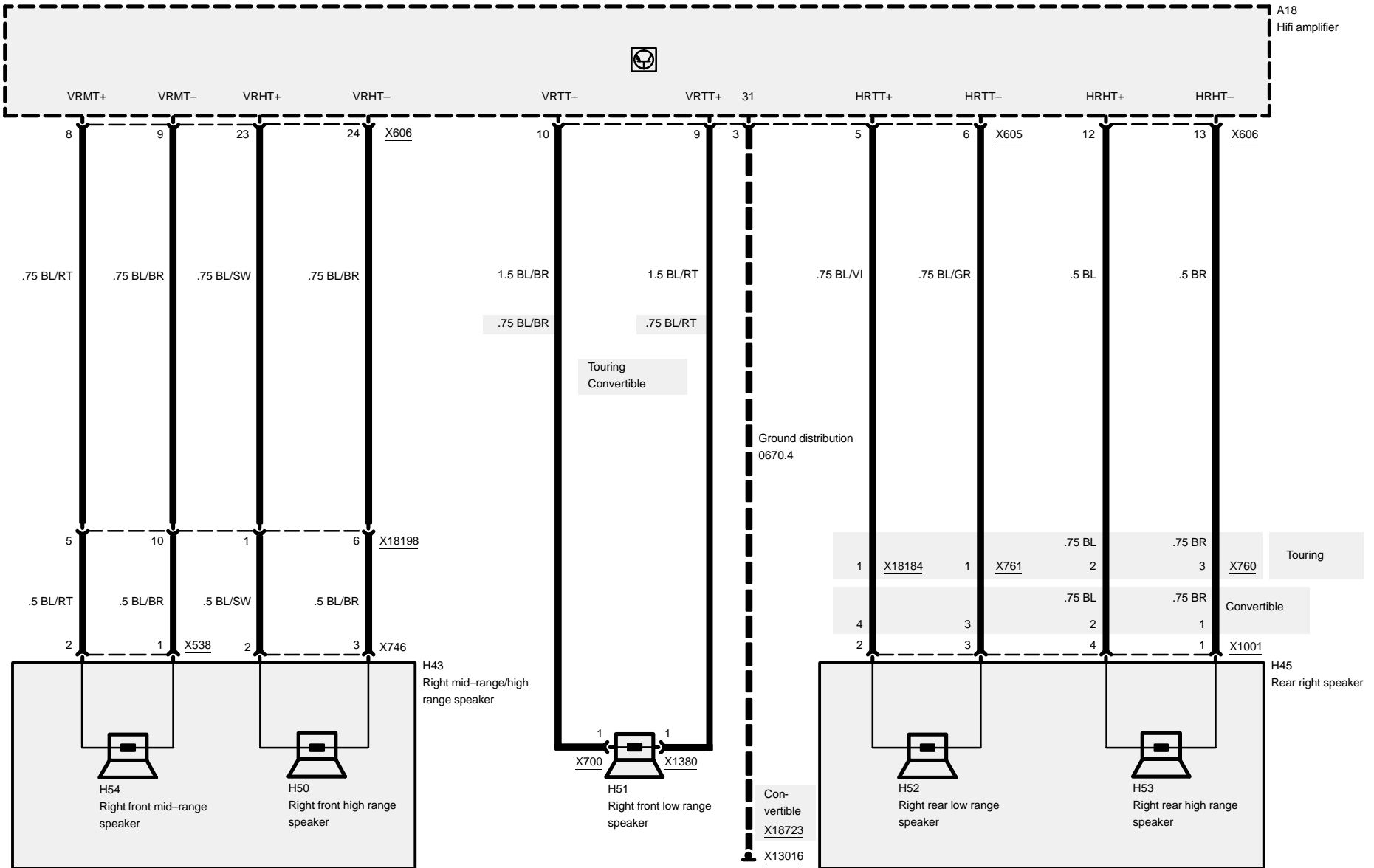






# Radio/HiFi/Top Hifi

## Hifi, 10-speaker system

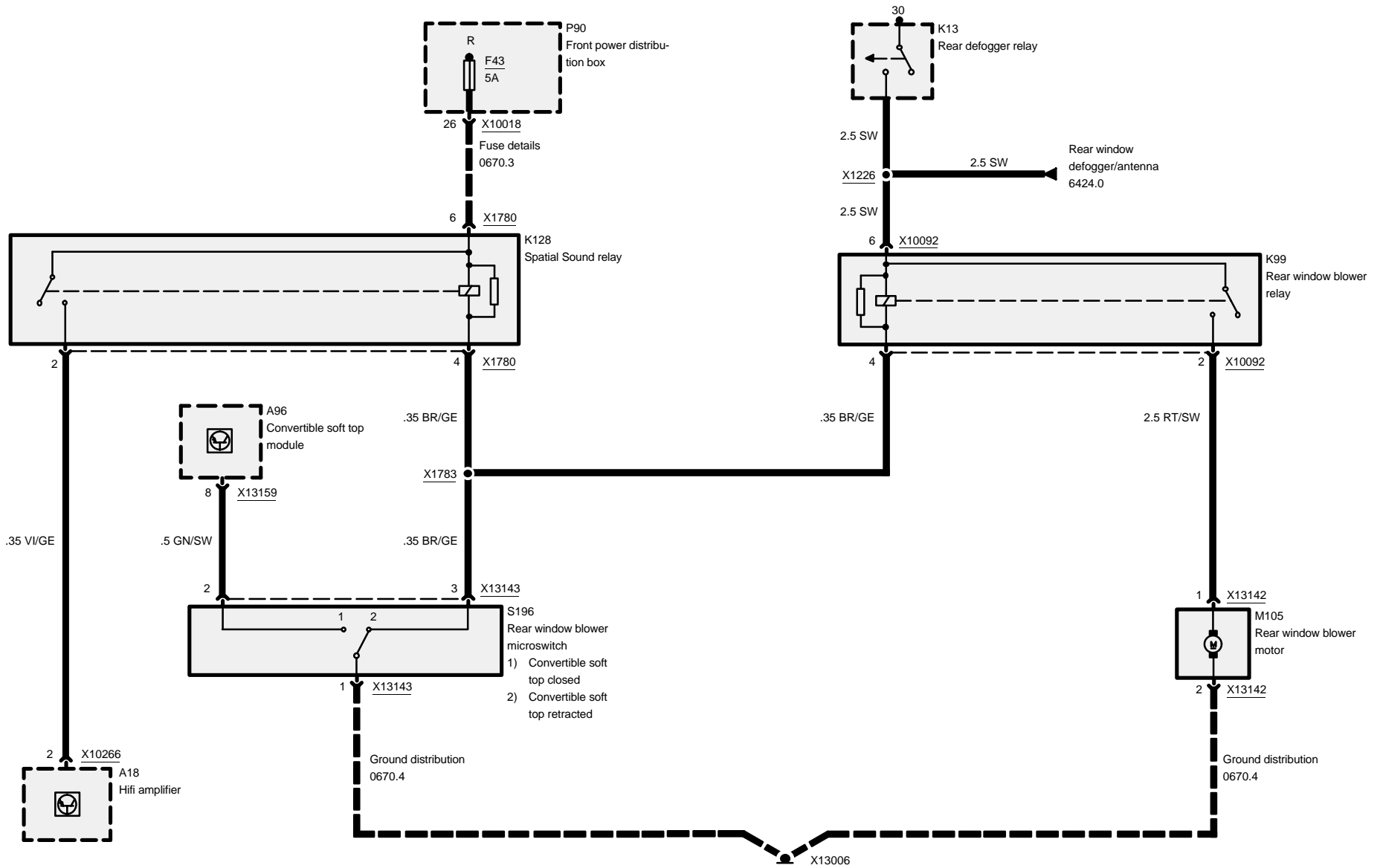




# Radio/HiFi/Top Hifi

## Top – Hifi

# Convertible

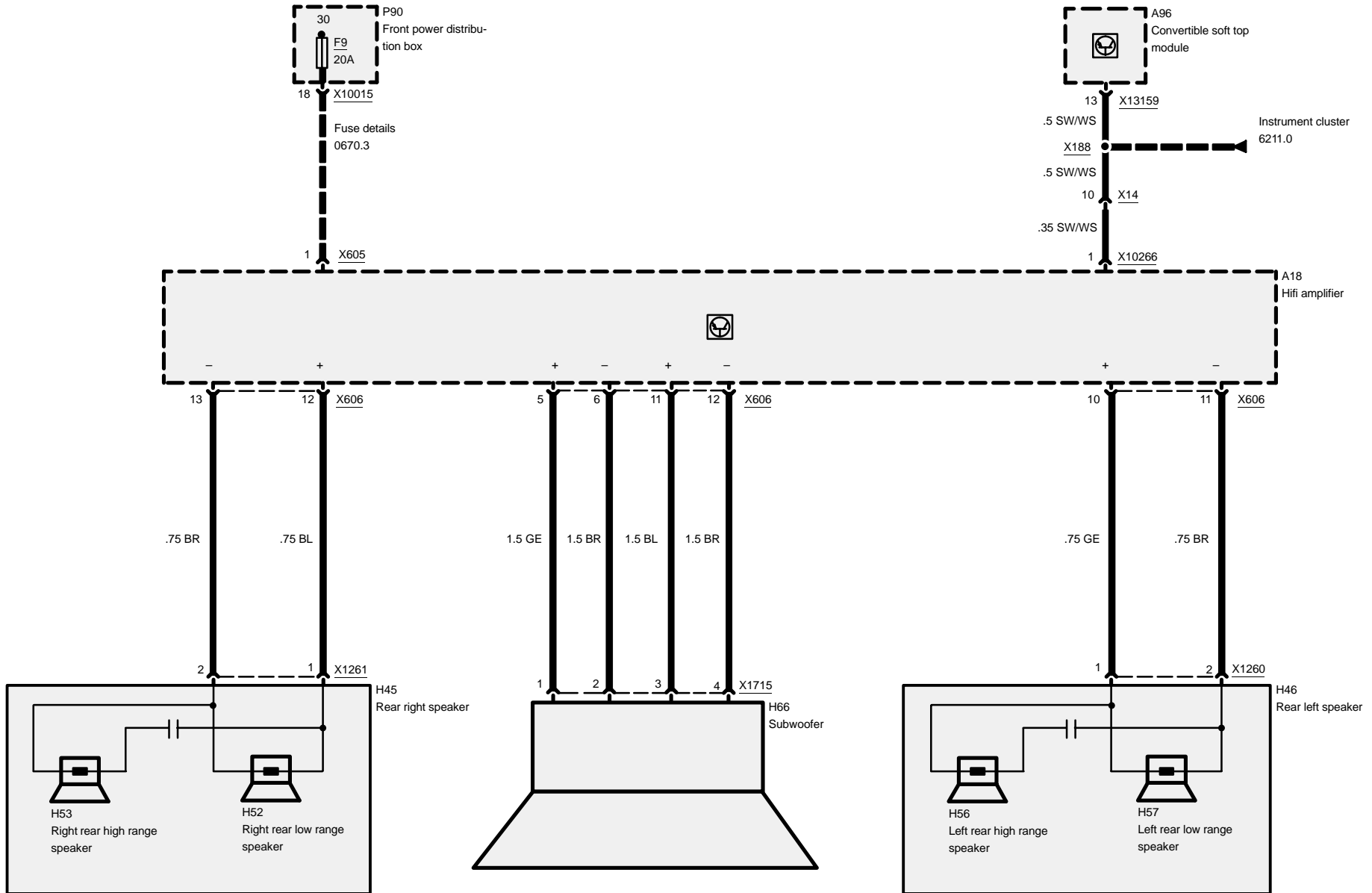




# Radio/HiFi/Top Hifi

## Top - Hifi

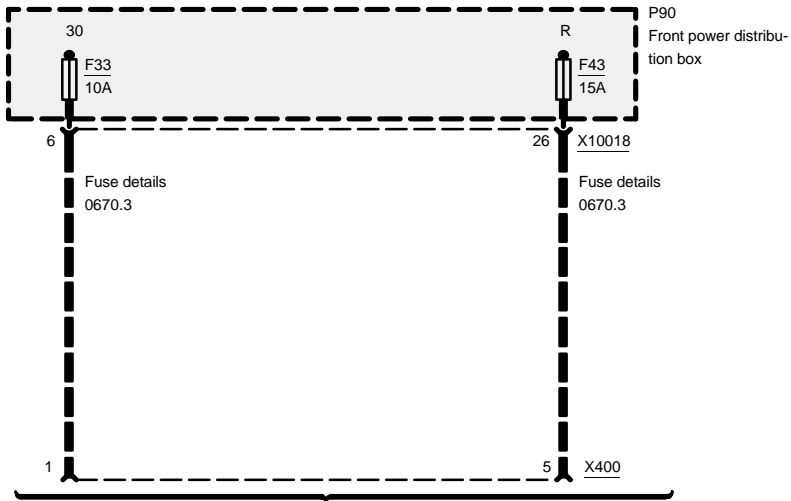
# Convertible



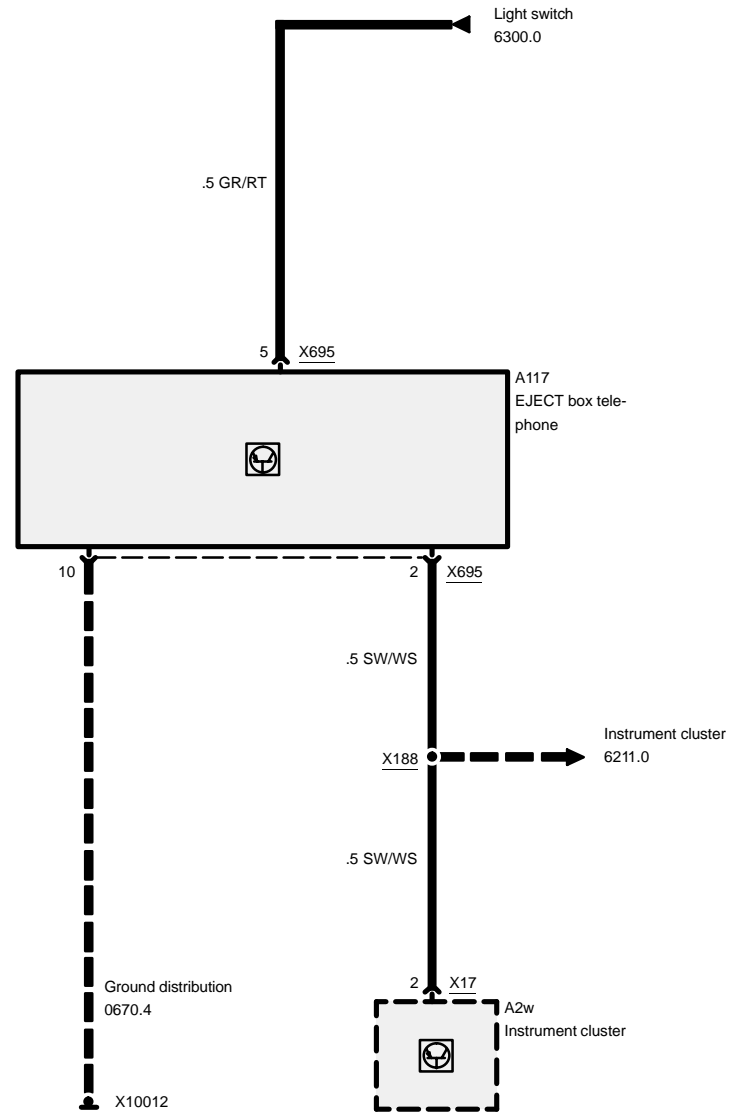
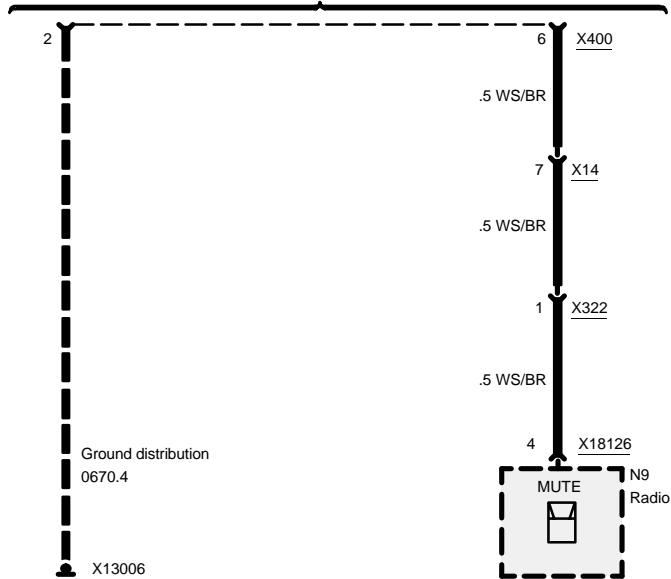


# 6561.0 Cellular telephone

## Provisions



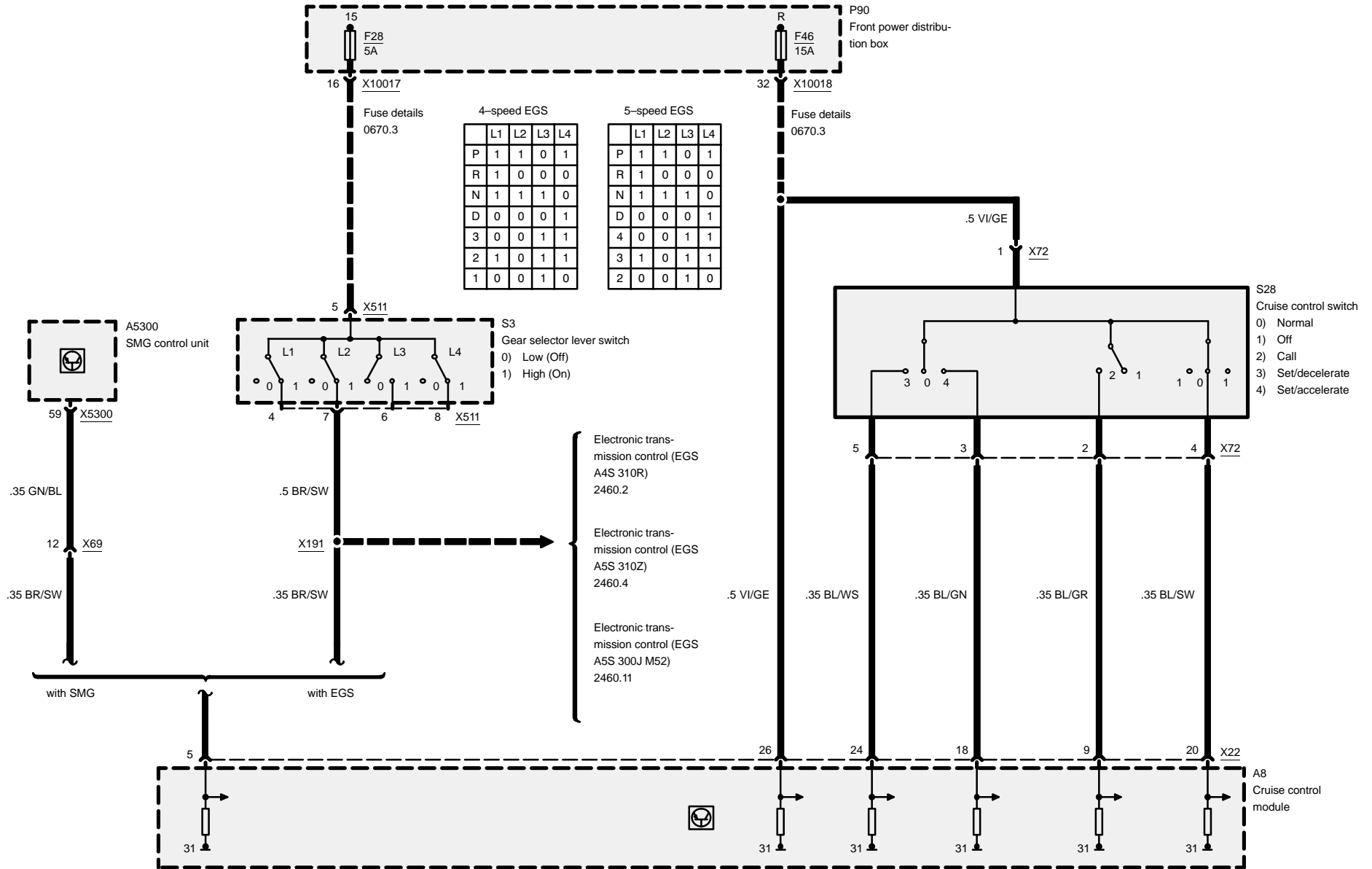
telephone connector  
luggage compartment





# 6571.0 Cruise control

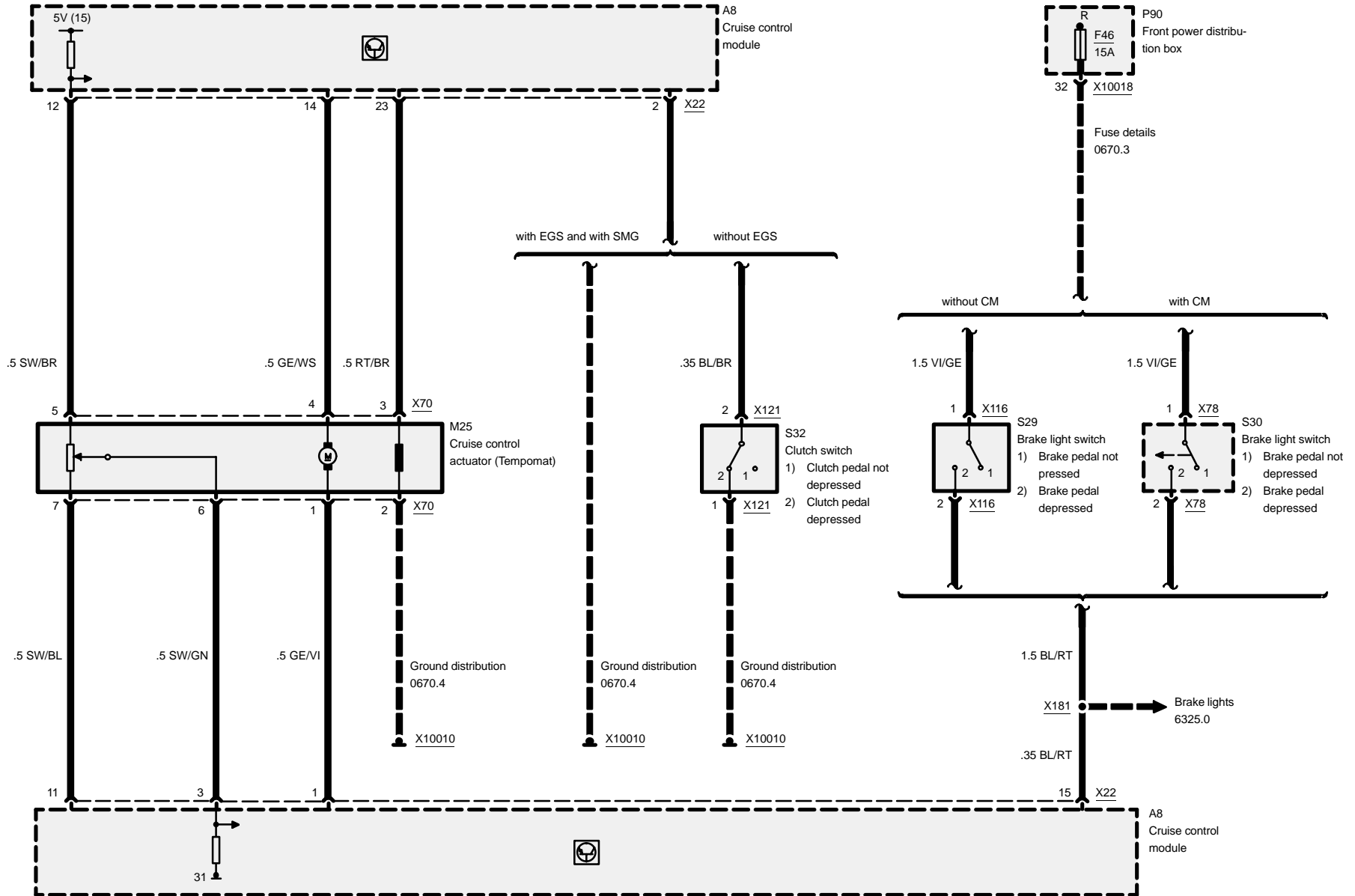
## Petrol-driven vehicle





# Cruise control

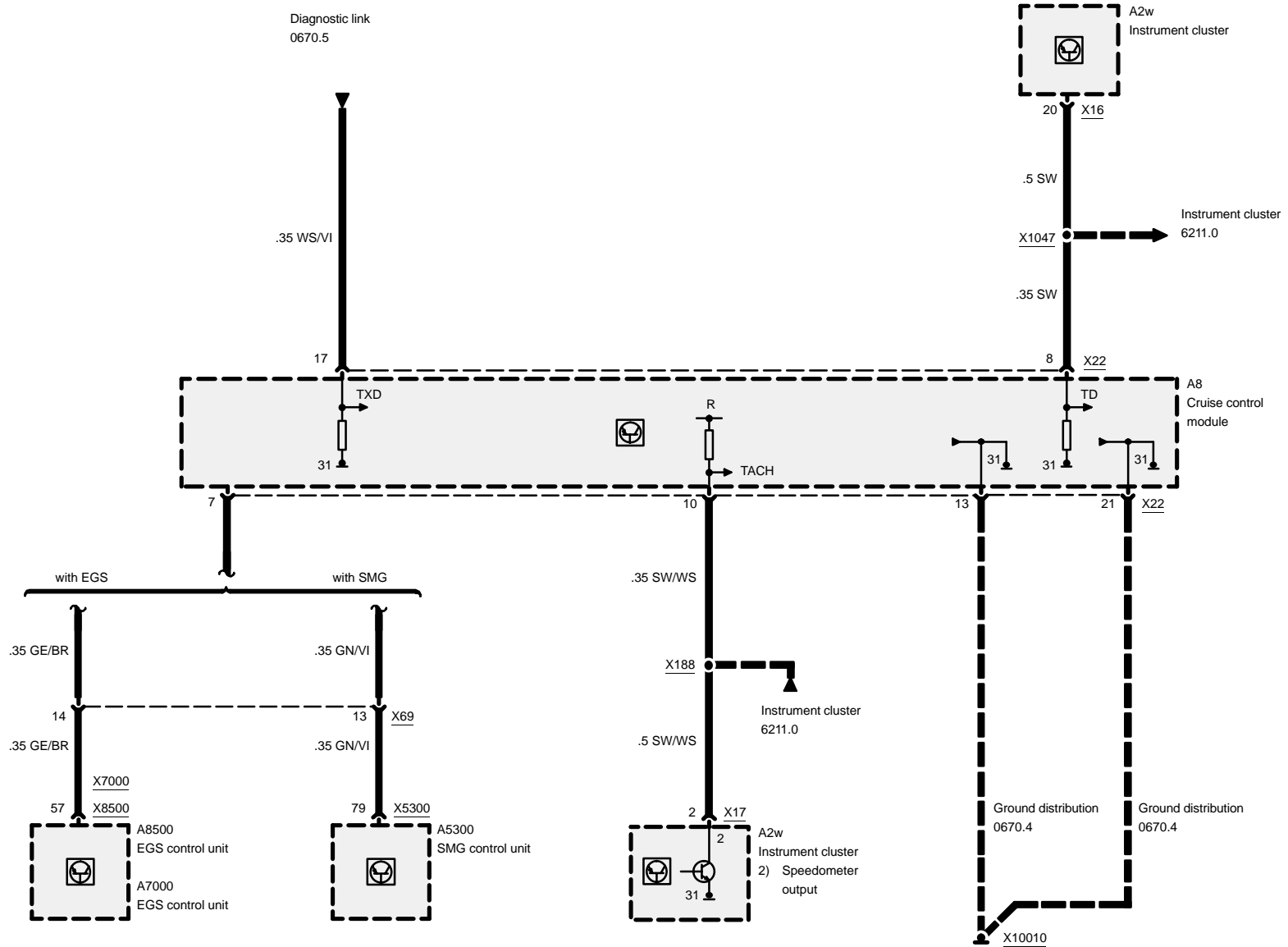
## Petrol-driven vehicle





# Cruise control

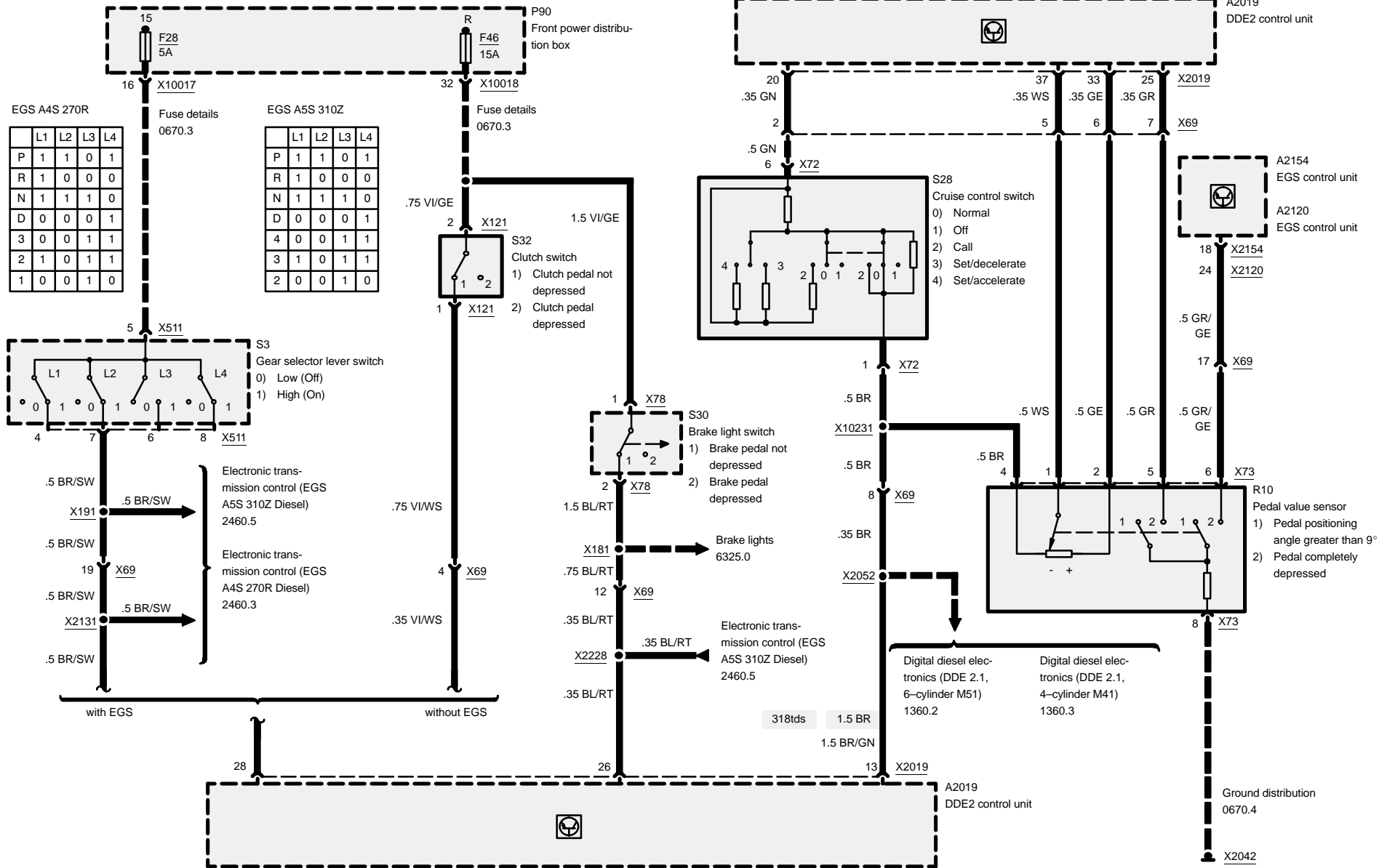
Petrol-driven vehicle





# Cruise control

## Diesel

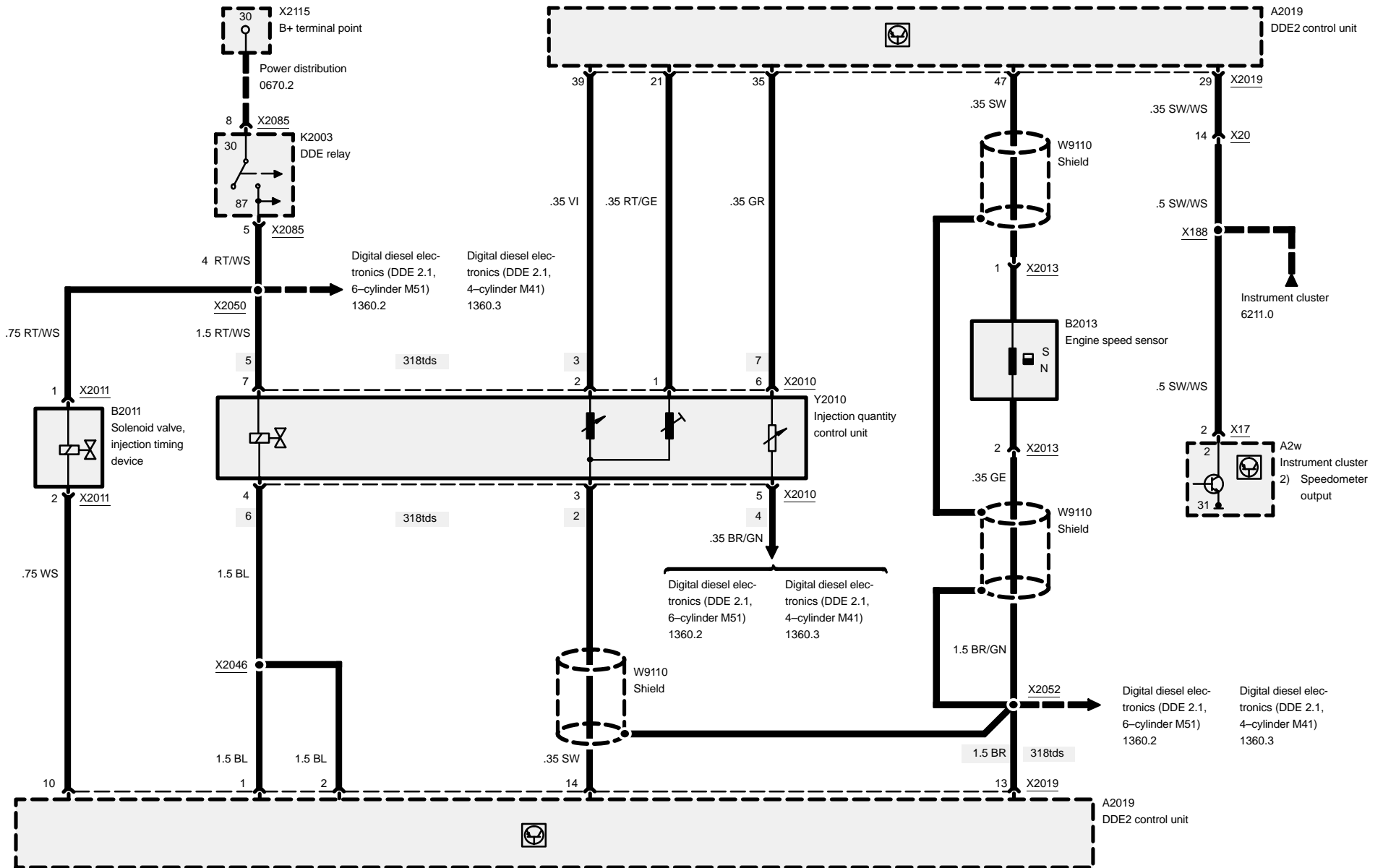






# Cruise control

Diesel



05/99

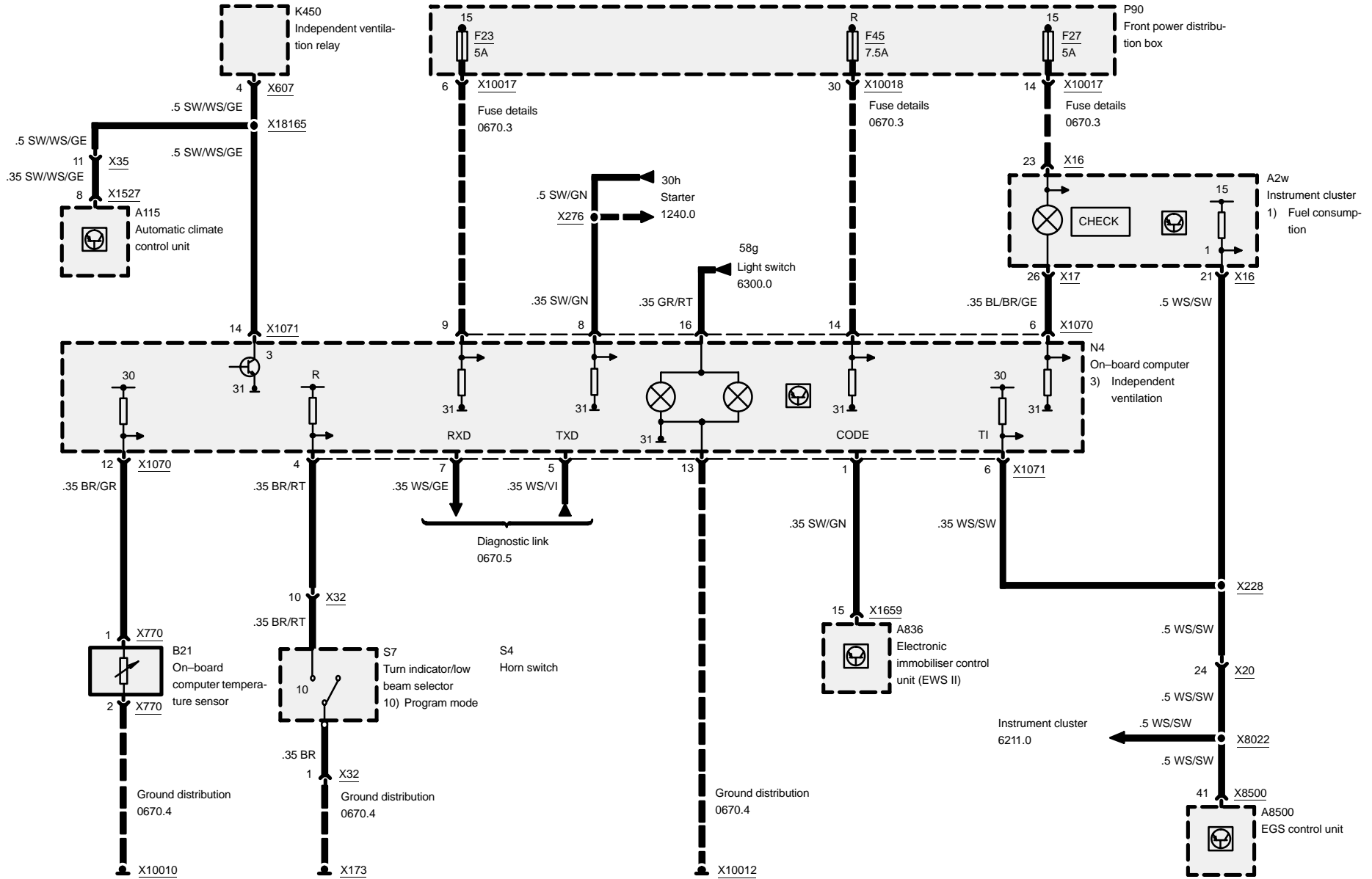
6571.0-04

1998



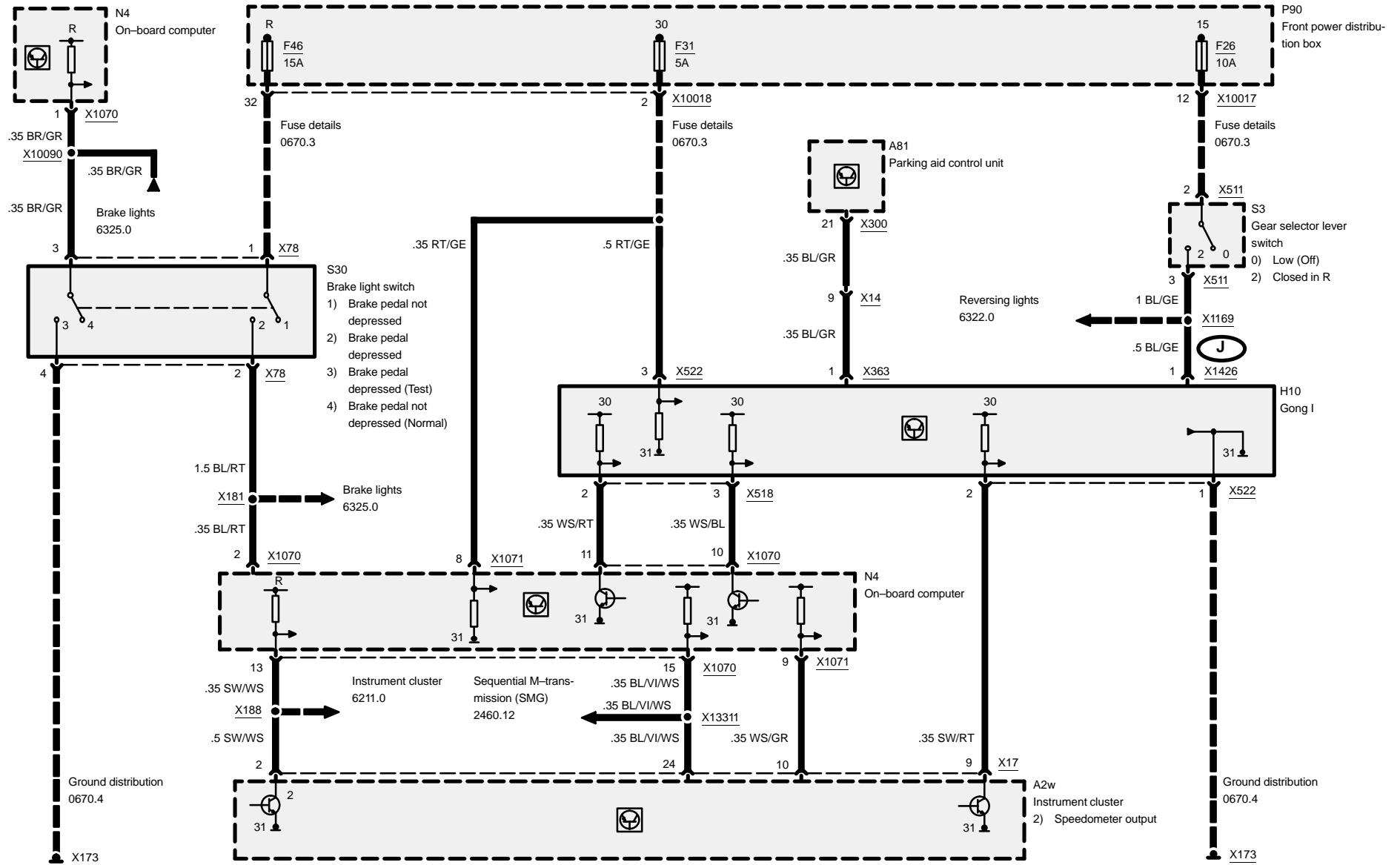
# 6581.2 On-board computer (BC V)

## Current





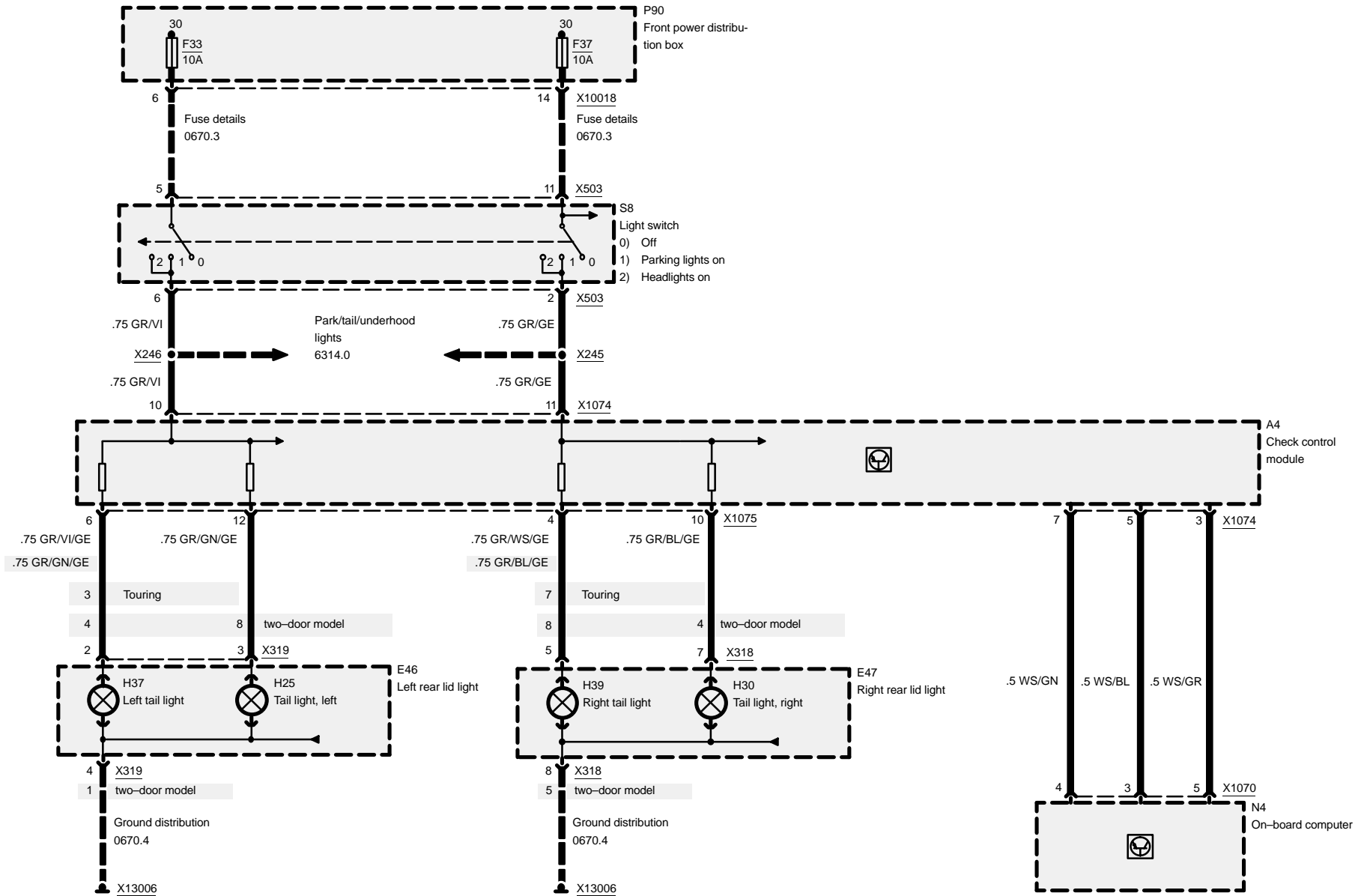
# On-board computer (BC V)





# On-board computer (BC V)

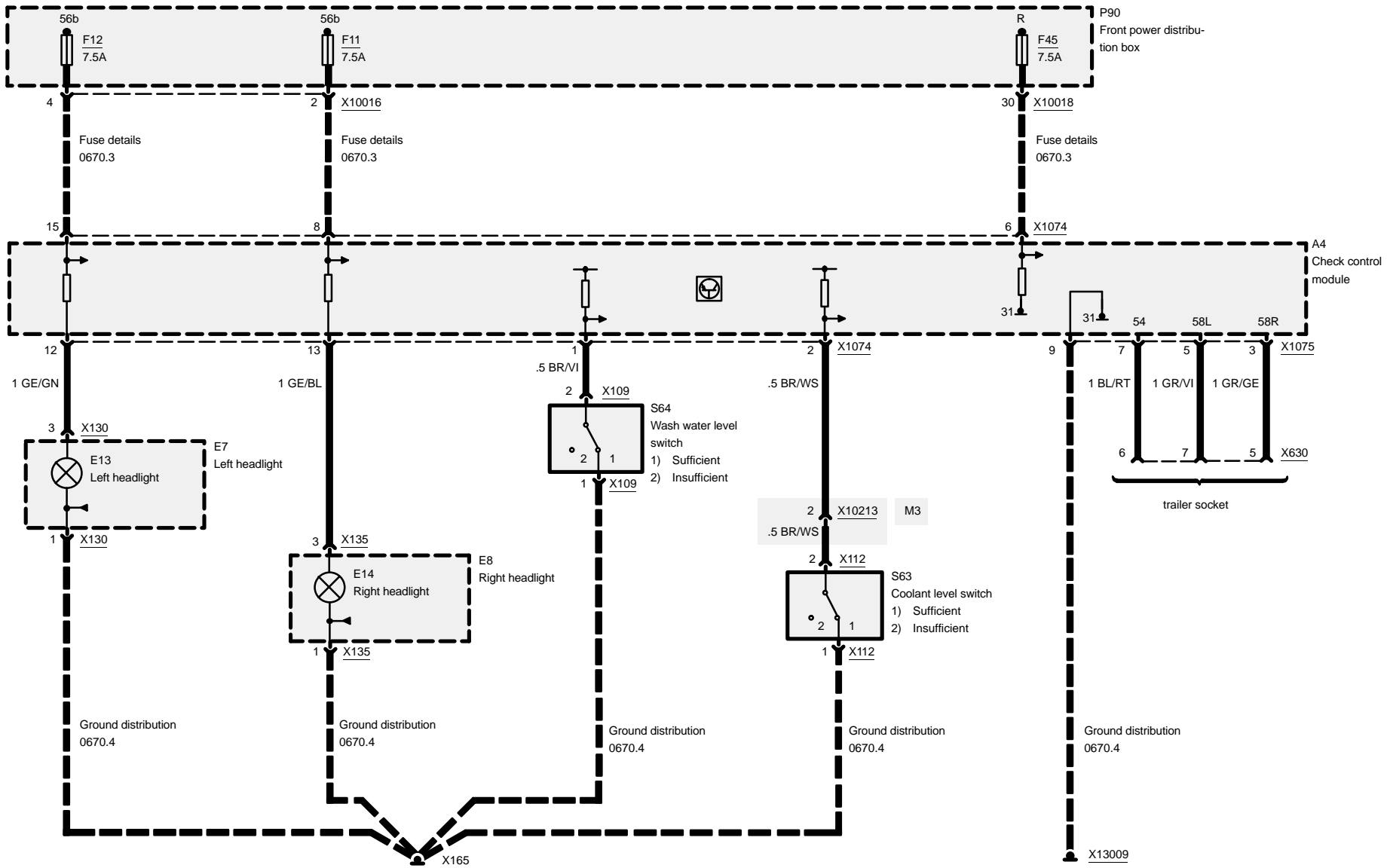
## Check control





# On-board computer (BC V)

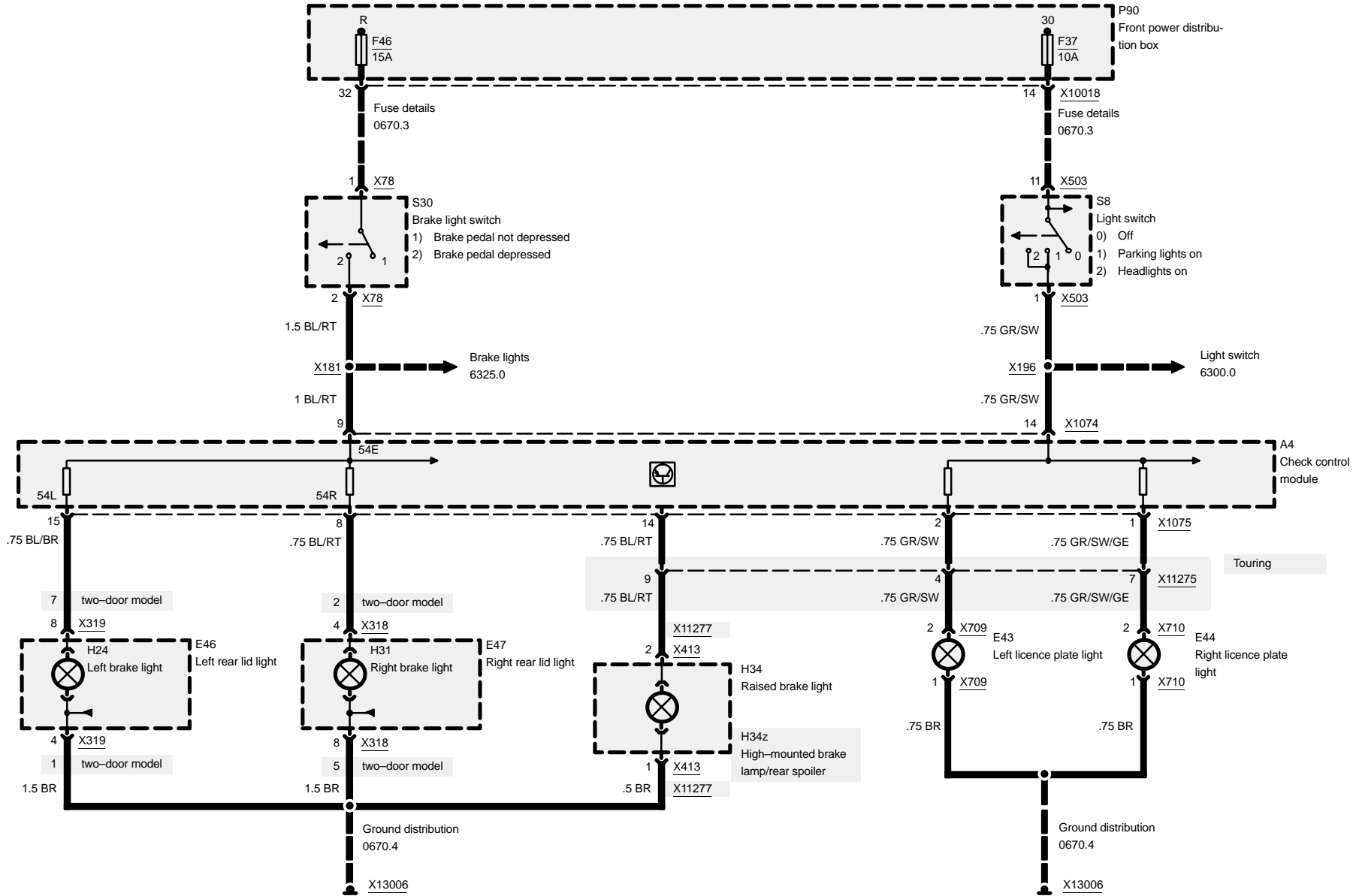
## Check control





# On-board computer (BC V)

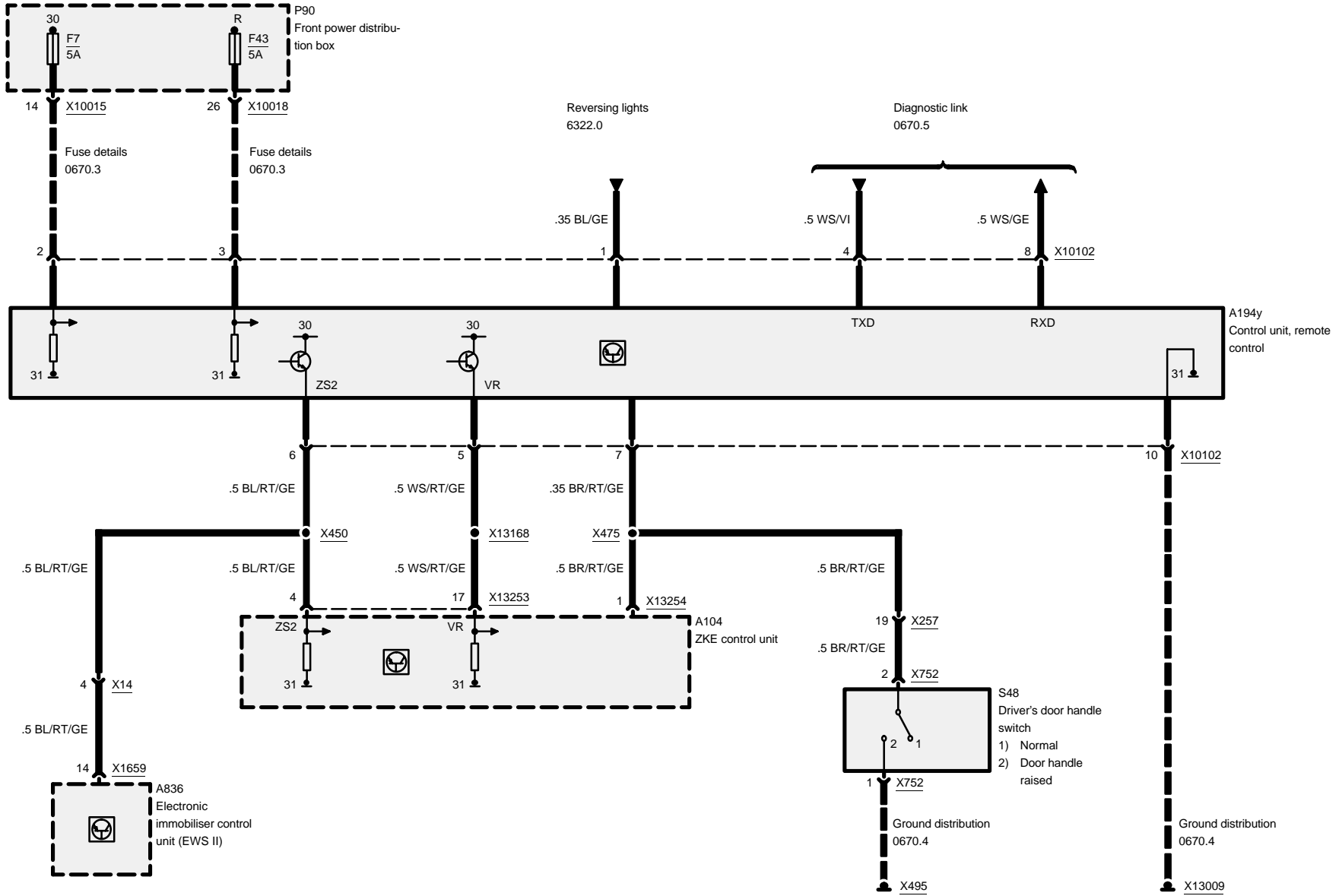
## Check control





# 6610.2 Remote control ZV/DWA

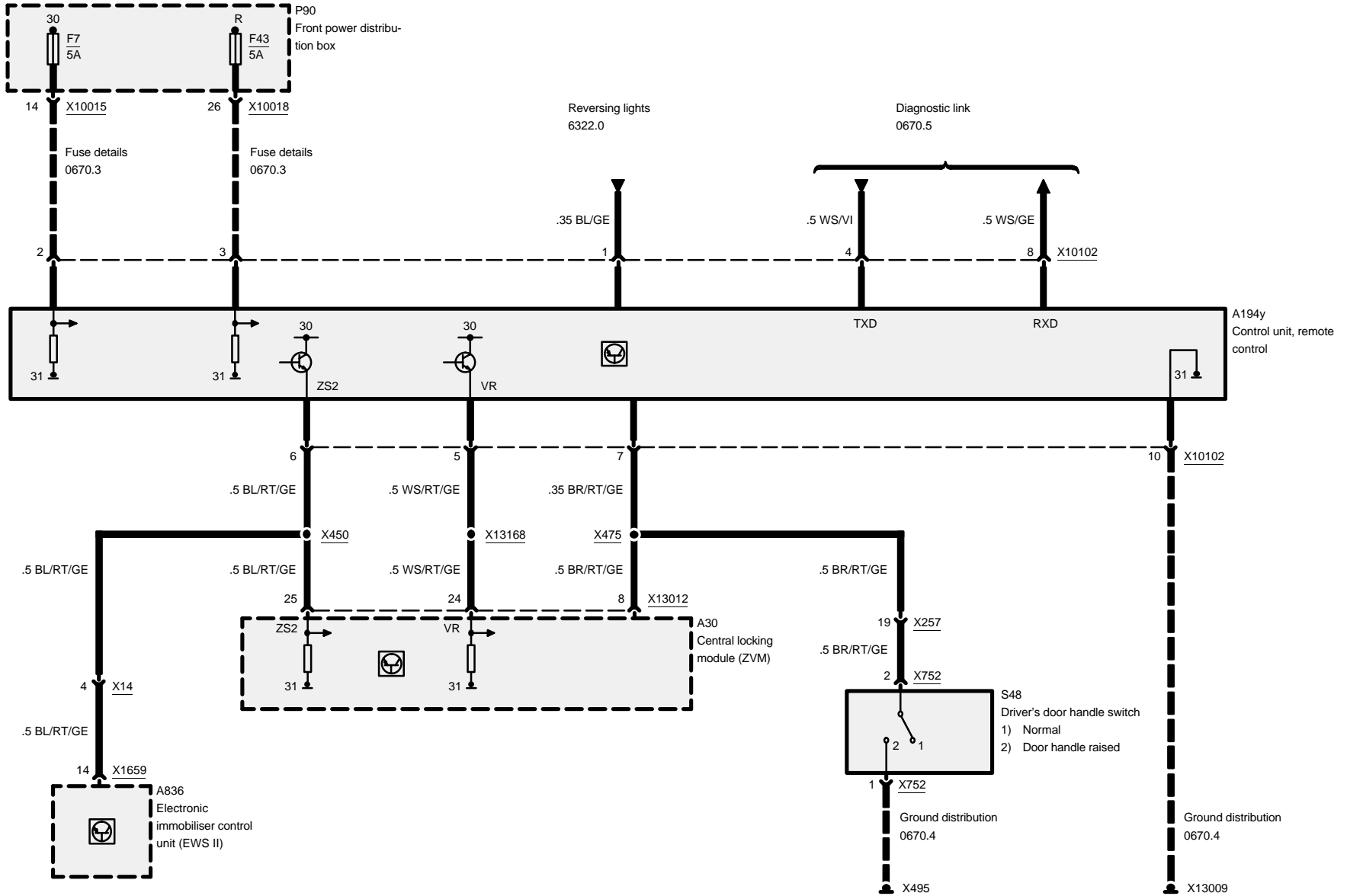
## ZKE





# Remote control ZV/DWA

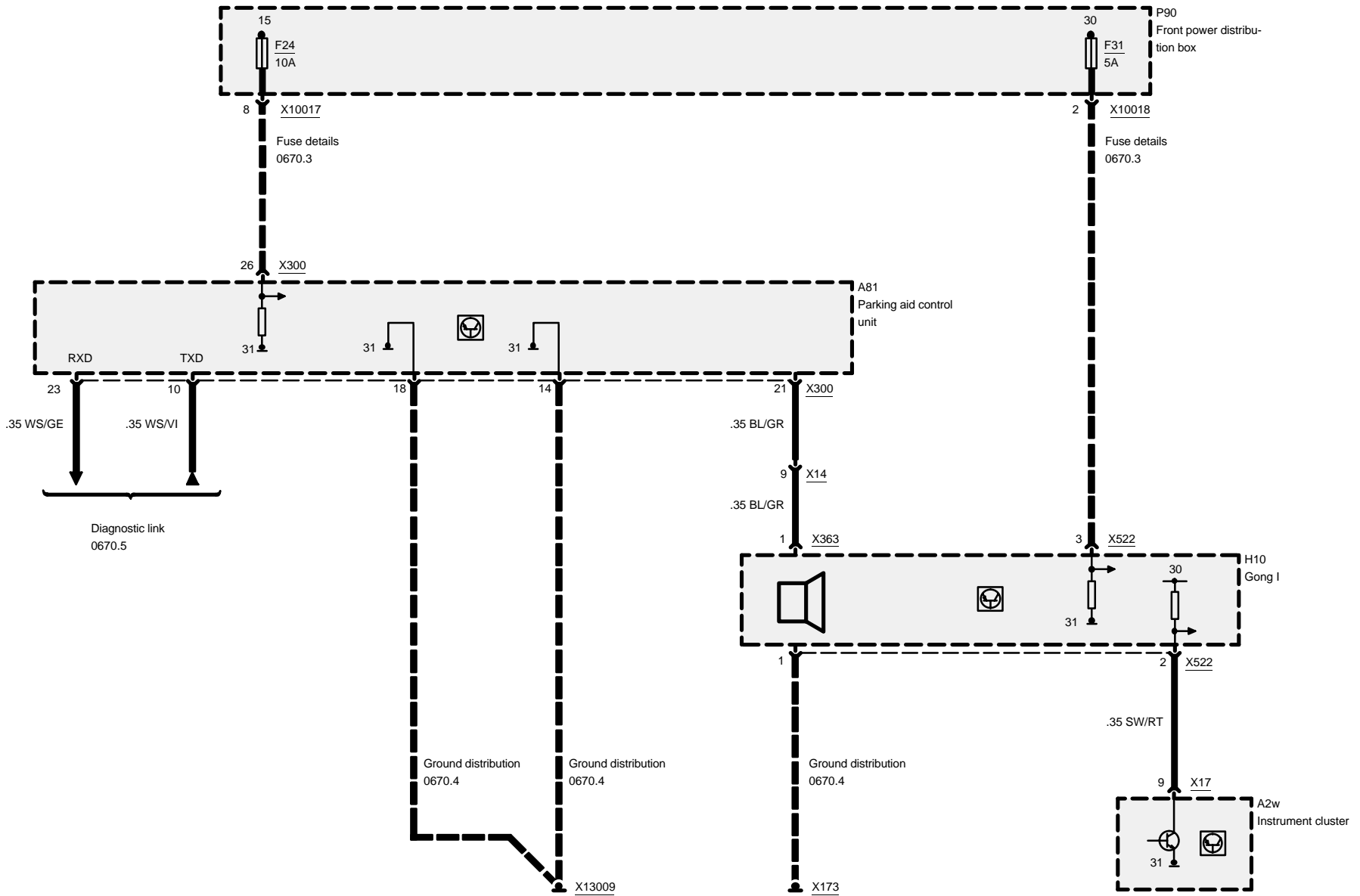
## ZVM





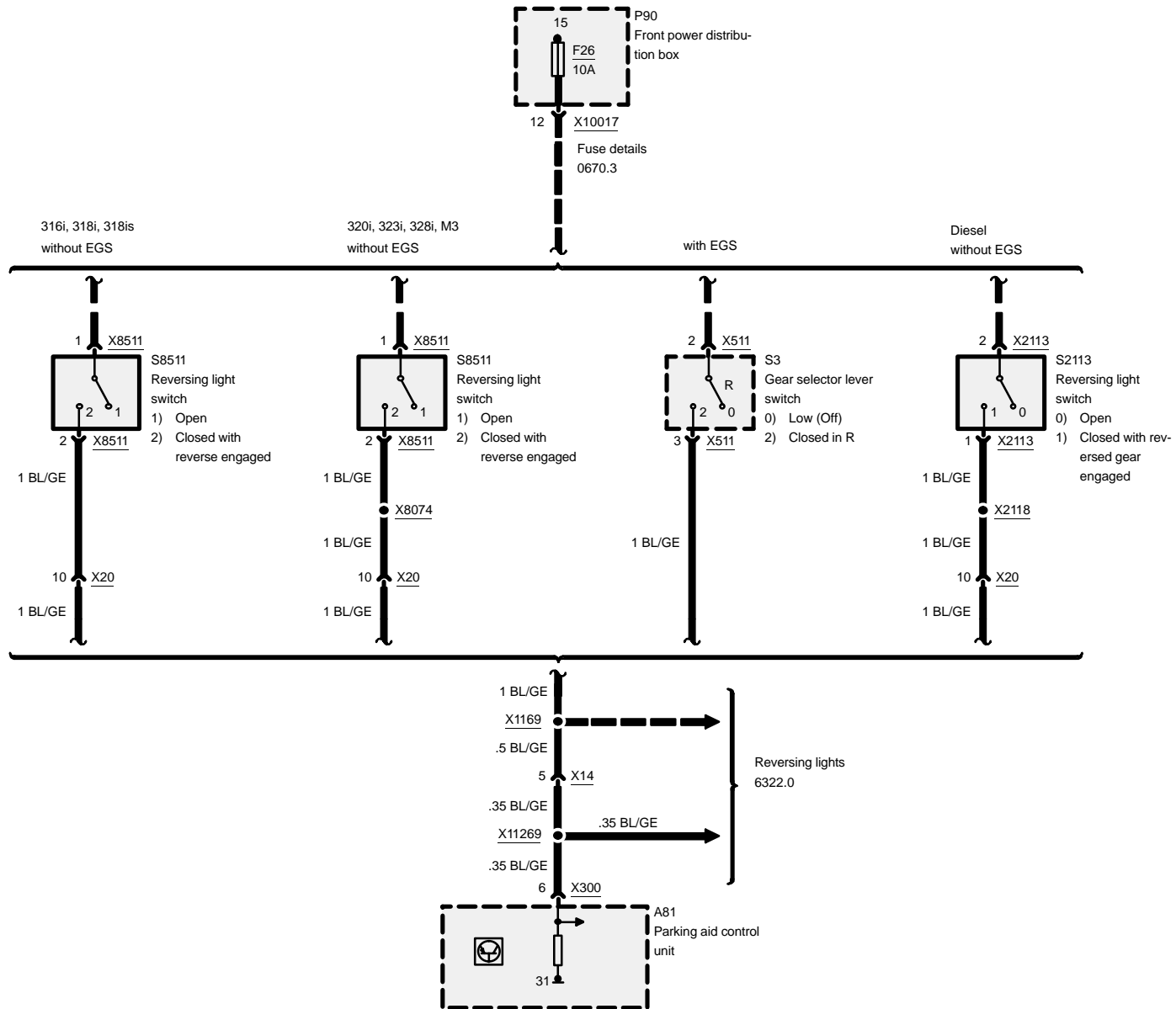


# 6621.0 Park distance control (PDC)



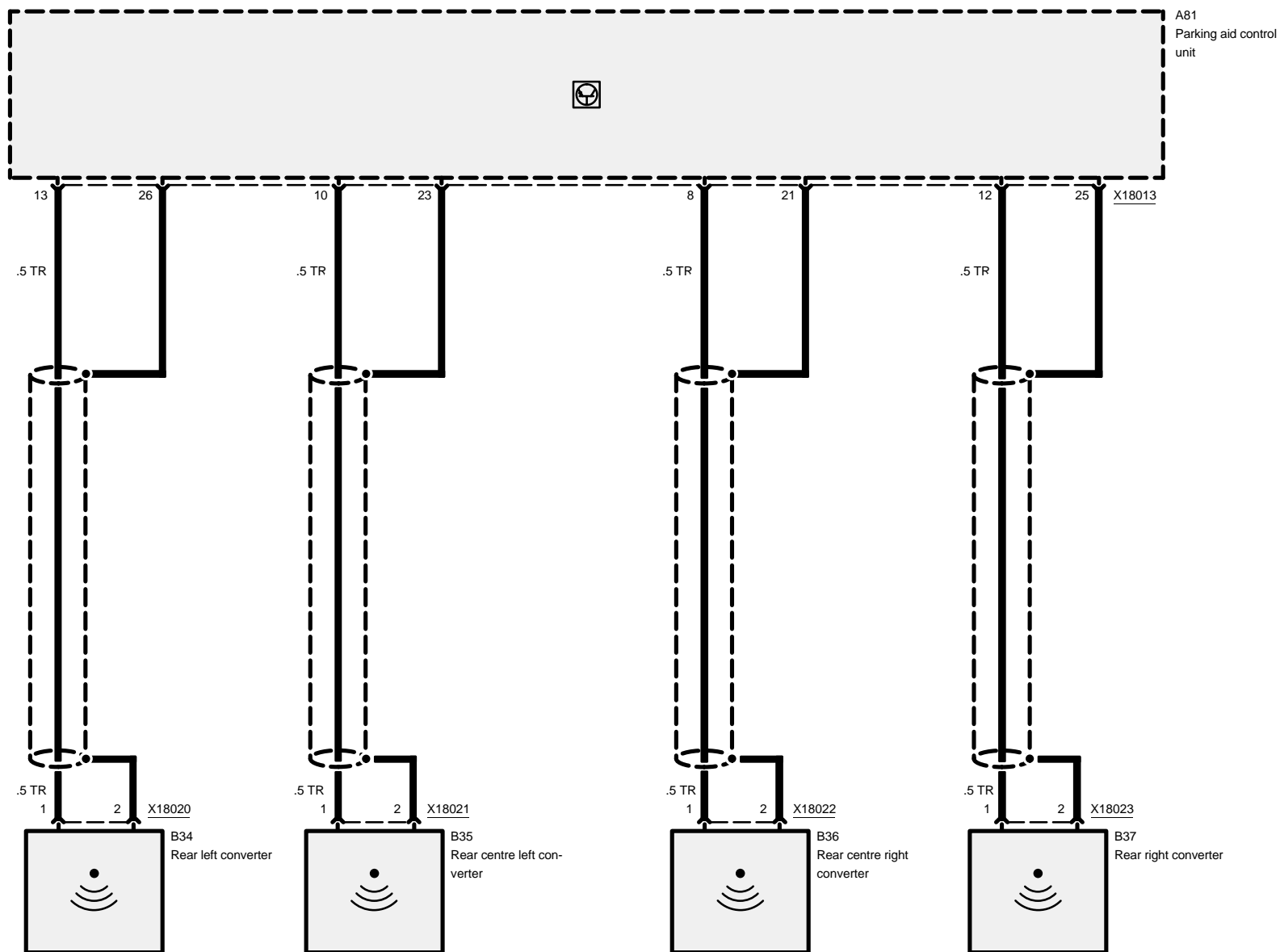


# Park distance control (PDC)





# Park distance control (PDC)





## 7000.0 Component location chart

Comp.	Description	Location	7100.0	8500.0
A2w ..	Instrument cluster .....	LH side of dash .....	28-3	
A4 ....	Check control module .....	under LH side of dash .....	03-3	
A5 ....	Relay module .....	behind glove compartment		
A7 ....	ABS control unit .....	RH side of dash behind glove compartment .....	02-1	
A8 ....	Cruise control module .....	RH side of dash behind glove compartment .....	02-2	
A12 ..	Airbag diagnostic module .....	under rear seat .....	35-1	
A18 ..	Hifi amplifier .....	in LH side of luggage compartment .....	00-3	
A18 ..	Hifi amplifier .....	under RH side of rear seat (Convertible) .....	04-2	
A18 ..	Hifi amplifier .....	in rear LH side of glove compartment (Touring) .....	36-3	
A22z ..	Electrochromatic rear view mirror .....	RH side of dash .....	29-3	
A30 ..	Central locking module (ZVM) .....	RH side of dash behind glove compartment .....	02-1	
A32y ..	Temperature regulator .....	behind dash		
A35 ..	On-board display .....	centre of dash centre console		
A36 ..	Rear wipe/wash interval control unit .....	in rear lid .....	38-1	
A51 ..	Wipe/wash module .....	under RH side of dash behind glove compartment .....	02-2	
A52 ..	ABS/ASC control unit .....	behind glove compartment (glove box removed) .....	02-1	
A56 ..	Tilt/slide sunroof control unit .....	under roof centre panel .....	03-1	
A64 ..	Wipe-wash module (Low II) .....	under RH side of dash behind glove compartment .....	02-2	
A81 ..	Parking aid control unit .....	in rear LH side of glove compartment		
A96 ..	Convertible soft top module .....	in bottom of LH C-post behind side panel .....	04-3	
A104 ..	ZKE control unit .....	behind glove compartment (glove box removed) .....	02-3	
A113 ..	Electronic seat control .....	under RH front seat		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
A115	Automatic climate control unit	rear of centre console	01-2	
A117	EJECT box telephone	centre console		
A133	Electronic gear indicator	under LH side of dash (S50)	40-2	
A135	Gear indicator, centre console	centre console		
A136	Program switch	centre console		
A139	Acceleration sensor, lateral	in LH side of luggage compartment LH side under inside of cover for frame side member (S50)	40-1	
A140	Selector lever potentiometer	below centre console		
A141	Gear indicator, instrument cluster	on instrument cluster		
A194y	Control unit, remote control	in interior rear view mirror	29-3	
A202	ABS control unit	rear LH side of engine compartment		
A835	Transmit/receive module (EWS II)	underside of steering column	03-2	
A836	Electronic immobiliser control unit (EWS II)	under RH side of dash behind glove compartment	00-2	
A2019	DDE2 control unit	rear RH side of engine compartment	00-1	
A2120	EGS control unit	rear RH side of engine compartment	00-1	
A2154	EGS control unit	rear RH side of engine compartment	00-1	
A5300	SMG control unit	rear RH side of engine compartment		
A6000	DME control unit	rear RH side of engine compartment	00-1	
A7000	EGS control unit	rear RH side of engine compartment	00-1	
A8500	EGS control unit	rear RH side of engine compartment	00-1	
B1	Front right ABS sensor	on RH front wheel, above brake calliper	08-3	
B2	Front left ABS sensor	on LH front wheel, above brake calliper	08-3	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
B3	Rear right ABS sensor	on RH rear wheel, above brake calliper		
B4	Rear left ABS sensor	on LH rear wheel, above brake calliper		
B6	Immersion tube sensor	under LH side of rear seat	21-3	
B8y	Pressure switch	near front RH headlight		
B9	Intermediate pressure switch	near front RH headlight		
B10	Speedometer reed contact	on differential	08-1	
B11	Left heat exchanger sensor	centre console		
B12	Right heat exchanger sensor	centre console		
B13	Outside temperature sensor	rear of engine compartment under RH fresh air trim	15-2	
B14	Evaporator sensor	on RH side of LH footwell on LH side of IHKA housing	28-1	
B16	Front left brake pad sensor	on LH front wheel, above brake calliper	08-3	
B17	Rear right brake pad sensor	behind RH rear wheel		
B18	Brake fluid level switch	rear LH side of engine compartment on break fluid reservoir	18-3	
B21	On-board computer temperature sensor	front LH side of vehicle	14-2	
B23	Left catalytic converter thermal sensor	under centre of car on catalytic converter		
B24	Right catalytic converter thermal sensor	under centre of car on catalytic converter		
B25y	Immersion tube sensor II	on top of tank		
B28	Gradient monitor (DWA)	in front RH side of glove compartment	37-1	
B34	Rear left converter	under LH rear bumper	43-2	
B35	Rear centre left converter	under centre of rear bumper left	43-2	
B36	Rear centre right converter	under centre of rear bumper right		
B37	Rear right converter	under RH rear bumper		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
B49	Acceleration sensor, longitudinal	in LH side of luggage compartment under cover on transverse link (S50)	40-1	
B78	Driver's side impact sensor	in seat cushion, driver's seat		
B79	Passenger's side impact sensor	in seat cushion, passenger's seat		
B414	AUC sensor	top front of engine compartment		
B2008	Oil pressure switch	LH side of engine	43-3	
B2009	Remote thermometer sensor	front of engine compartment (Diesel)		
B2011	Solenoid valve, injection timing device	LH side of engine compartment (Diesel)	43-1	
B2012	Charge air temperature sensor	front of engine (Diesel)	42-3	
B2013	Engine speed sensor	LH side of engine compartment (Diesel)	14-3	
B2014	Charge pressure sensor	LH side of engine compartment (Diesel)	42-1	
B2015	Coolant temperature sensor	RH side of engine compartment (Diesel)		
B2017	Changeover valve for exhaust gas recirculation (AGR)	rear LH side of engine compartment (Diesel)	42-1	
B2232	Dual temperature sensor	front of engine compartment (Diesel)	42-2	
B2244	Exhaust return actuator	rear LH side of engine compartment (Diesel)		
B5238	Temperature sensor, transmission oil	in transmission (M3)	39-2	
B6200	Heated oxygen sensor	under centre of car	15-3	
B6203	Crankshaft sensor	RH side under front of vehicle behind radiator	10-3	
B6204	Camshaft sensor	LH front of engine	11-1	
B6205	Intake air temperature sensor	LH side of engine	11-3	
B6207	Hot-film air mass meter	LH side of engine		
B6209	Hall sensor, camshaft	front of engine		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
B6217	Hot film air mass meter	front top of engine	15-1	
B6230	Oil level	underside of oil tray		
B6231	Oil pressure switch	LH side of engine below intake manifold	12-1	
B6231	Oil pressure switch	LH side of engine near dipstick (M3)		
B6231	Oil pressure switch	RH front of engine below intake manifold (316i–318i) (318is)	17-1	
B6232	Remote thermometer sensor	RH front of engine below intake manifold		
B6233	Air flow meter	LH side of engine		
B6236	Coolant temperature sensor	LH front of engine		
B6238	Oil temperature sensor	LH side of engine (M3)		
B6240	Knock sensor	front top of engine	12-2	
B6241	Knock sensor 1 (cyl. 1 and 2)	front top of engine		
B6241z	Knock sensor 1	front top of engine		
B6242	Knock sensor 2 (cyl. 3 and 4)	front top of engine		
B6243	Knock sensor 3 (cyl. 5 and 6)	front top of engine (M3)		
B6254	Oil level switch, thermal	in engine compartment		
B6256	Dual temperature sensor (coolant temperature)	LH front of engine	12-1	
B6277	VANOS sensor 1 (inlet)	front of engine compartment		
B6278	VANOS sensor 2 (exhaust)	front of engine compartment		
B9508	Pressure switch	front RH side of engine compartment near front RH headlight	09-3	
B62001	Oxygen sensor in front of catalytic converter	on catalytic converter		





# Component location chart

Comp.	Description	Location	7100.0	8500.0
B62101	Oxygen sensor I in front of catalytic converter .....	on catalytic converter		
B62201	Oxygen sensor II in front of catalytic converter .....	on catalytic converter		
C1 ...	Capacitor .....	in top of LH C-post		
C101 ..	Volute spring .....	on steering wheel .....	25-1	
C900 ..	Lockout relay .....	in top of RH C-post .....	33-2	
D100 ..	Diagnostic connector .....	rear RH side of engine compartment .....	05-1	
E7 ....	Left headlight .....	front LH side of engine compartment		
E8 ....	Right headlight .....	front RH side of engine compartment		
E9 ....	Rear window defogger I .....	in rear window .....	33-2	
E10 ..	Rear defogger/antenna .....	in rear window		
E11 ...	Left high beam .....	near front LH headlight		
E12 ..	Right high beam .....	near front RH headlight		
E13 ..	Left headlight .....	near front LH headlight		
E14 ..	Right headlight .....	near front RH headlight		
E15 ..	Left parking light .....	front of vehicle		
E19 ..	Right parking light .....	front of vehicle		
E25 ..	Front ashtray light .....	centre console .....	31-2	
E26 ..	Left fog light .....	under front LH bumper .....	08-2	
E27 ..	Right fog light .....	under front RH bumper .....	08-2	
E28 ..	Front cigar lighter .....	centre console		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
E28y	Rear ashtray light	centre console	31-2	
E29	Front cigar lighter light	centre console		
E32	Luggage compartment light	in luggage compartment		
E34	Interior/reading lamp, front	under roof centre panel	03-1	
E35	Driver's make-up mirror light	in windscreen header		
E36	Passenger's make-up mirror light	in windscreen header		
E39	Interior light, left rear	in top of LH C-post	33-1	
E40	Interior light, right rear	in top of RH C-post	33-2	
E42y	Glovebox light/switch	left of glove compartment	26-1	
E43	Left licence plate light	underside of rear lid, near number plate	09-1	
E44	Right licence plate light	underside of rear lid, near number plate	09-1	
E45y	Cassette box light	centre of dash		
E46	Left rear lid light	in rear LH side of glove compartment		
E47	Right rear lid light	in rear RH side of luggage compartment	04-1	
E48	Door lock heating	LH front door		
E51	Left windscreen washer jet heater	underside of front lid		
E52	Right windscreen washer jet heater	underside of front lid		
E56	Driver's backrest heating	in LH backrest	24-3	
E57	Driver's seat heating	LH front seat	24-3	
E58	Passenger's seat heating	bottom of RH front seat		
E59	Passenger's backrest heating	in top of RH backrest		
E61	Front left footwell light	LH footwell		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
E62	Front right footwell light	right footwell		
E82	Gear indicator light	centre console		
E96	Shift lever light	centre console		
E99	Hardtop mount, left	in convertible soft top compartment		
E100y	Hardtop mount, right	in convertible soft top compartment		
E101	Luggage compartment light, left	in rear LH side of glove compartment (Convertible)		
E102	Luggage compartment light, right	in rear RH side of luggage compartment (Convertible)		
E104	Throttle heating	LH side of engine compartment		
E416	Left rear reading light	in top of LH C-post		
E417	Right rear reading light	in top of RH C-post		
E2000	Fuel heating	LH side of engine compartment (Diesel)	42-1	
F97	Fuse link	Battery		
G1	Battery	front RH side of engine compartment		
G1	Battery	in rear RH side of luggage compartment		
G5	Driver's airbag gas generator	behind steering wheel	25-1	
G6	Passenger's airbag gas generator	RH side of dash		
G12	Pyrotechnical belt tensioner, driver's side	driver's seat, right		
G13	Pyrotechnical belt tensioner, passenger's side	passenger's seat, left		
G14	Gas generator, left side airbag	in driver's door		
G15	Gas generator, right side airbag	in passenger's door		
G2023	Alternator	LH bottom of engine compartment	43-3	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
G6430	B+ external start terminal point .....	rear RH side of engine compartment behind RH spring strut dome .....	05-1	
G6509	Alternator .....	front LH side of engine compartment .....	05-2	
H1 ...	Antitheft horn (DWA) .....	front of engine compartment		
H2 ...	Left horn .....	front of engine compartment		
H3 ...	Right horn .....	front of engine compartment		
H4 ...	Front right flasher unit .....	front of vehicle		
H5 ...	Rear right flasher unit .....	RH side of body rear end		
H6 ...	Rear left flasher unit .....	LH side of body rear end		
H7 ...	Front left flasher unit .....	front of vehicle		
H8 ...	Front right auxiliary flasher unit .....	front of vehicle		
H9 ...	Front left auxiliary flasher unit .....	front of vehicle		
H10 ..	Gong I .....	under LH side of dash		
H24 ..	Left brake light .....	LH side of body rear end		
H25 ..	Tail light, left .....	LH side of body rear end		
H26 ..	Left rear fog light .....	Left rear lid light		
H27 ..	Left reversing light .....	Left rear lid light		
H28 ..	Right reversing light .....	Right rear lid light		
H30 ..	Tail light, right .....	Right rear lid light		
H31 ..	Right brake light .....	Right rear lid light		
H34 ..	Raised brake light .....	rear parcel shelf		
H34z ..	High-mounted brake lamp/rear spoiler .....	in rear spoiler		
H37 ..	Left tail light .....	LH side of body rear end		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
H39	Right tail light	Right rear lid light		
H40	Parking aid speaker	rear parcel shelf right		
H41	Left speaker	in bottom of LH A-post		
H42	Left mid-range/high range speaker	in top of LH front door		
H43	Right mid-range/high range speaker	in top of RH front door		
H45	Rear right speaker	under rear window shelf		
H46	Rear left speaker	under rear window shelf		
H50	Right front high range speaker	in top of RH front door		
H51	Right front low range speaker	in bottom of RH A-post		
H52	Right rear low range speaker	under rear window shelf		
H53	Right rear high range speaker	under rear window shelf		
H54	Right front mid-range speaker	in top of RH front door		
H55	Left front mid-range speaker	in top of LH front door		
H56	Left rear high range speaker	under rear window shelf		
H57	Left rear low range speaker	under rear window shelf		
H58	Left front low range speaker	in bottom of LH A-post		
H59	Left front high range speaker	in top of LH front door		
H66	Subwoofer	behind trim		
I1008	Seat mat	in seat cushion, passenger's seat		
K2	Horn relay	rear LH side of engine compartment in power distribution box	20-2	
K4	Heating blower relay	rear LH side of engine compartment in power distribution box	20-2	
K9	Unloader relay terminal 15	under LH side of dash	26-3	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
K10	ABS overvoltage protection relay	rear LH side of engine compartment in power distribution box	20-1	
K13	Rear defogger relay	rear LH side of engine compartment in power distribution box	20-1	
K16	Hazard flasher relay	rear LH side of engine compartment in power distribution box	20-2	
K19	A/C compressor relay	rear LH side of engine compartment in power distribution box	20-1	
K20	Thermal switch (LA Japan)	RH side of dash behind glove compartment		
K21	Auxiliary fan stage 1 relay	rear LH side of engine compartment in power distribution box	20-1	
K22	Auxiliary fan stage 2 relay	rear LH side of engine compartment in power distribution box	20-1	
K25	Right parking light/licence plate light relay	RH side of dash behind glove compartment		
K26	Left parking light relay	RH side of dash behind glove compartment		
K31	Cigar lighter relay	under RH side of dash		
K46	High beam relay	rear LH side of engine compartment in power distribution box	20-2	
K47	Fog light relay	rear LH side of engine compartment in power distribution box	20-2	
K48	Headlight relay	rear LH side of engine compartment in power distribution box	20-2	
K54	Door lock heating relay	RH side of dash behind glove compartment	26-2	
K75	ABS pump motor relay	rear LH side of engine compartment in power distribution box	20-1	
K99	Rear window blower relay	behind glove compartment (Convertible)	26-2	
K113	Hinged window relay	under LH side of dash	26-3	
K114	Comfort relay	footwell, driver's side		
K117	Rear lid lock relay	behind glove compartment	26-2	
K125	ABS pump motor relay, timed	rear LH side of engine compartment in power distribution box	20-3	
K127y	Reading lights relay	under LH side of dash	26-3	
K128	Spatial Sound relay	footwell, driver's side, behind trim	26-3	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
K450	Independent ventilation relay	footwell, driver's side under LH side of dash	01-3	
K2000	Heater plug relay	rear RH side of engine compartment in electronics box (Diesel)	17-2	
K2002	Feed pump relay	rear LH side of engine compartment in power distribution box	21-2	
K2003	DDE relay	rear LH side of engine compartment in power distribution box	21-2	
K2003	DDE relay	rear LH side of engine compartment in power distribution box	35-2	
K2081	Delivery pump relay	rear LH side of engine compartment in power distribution box	35-2	
K2200	Alternator cut-out relay	rear LH side of engine compartment in power distribution box	35-2	
K5360	Hydraulic pump relay	in auxiliary relay box front RH side of engine compartment near spring strut dome	40-3	
K6300	DME relay	rear LH side of engine compartment in power distribution box	20-3	
K6300	DME relay	rear LH side of engine compartment in power distribution box	21-1	
K6301	Electrical fuel pump relay	rear LH side of engine compartment in power distribution box	20-3	
K6303	Oxygen sensor relay	rear LH side of engine compartment in power distribution box	20-3	
K6307	EKP and start detector relay	rear LH side of engine compartment in power distribution box	21-1	
K6309	Oxygen sensor and air pump relays	rear LH side of engine compartment in power distribution box	21-1	
K6326	Unloader relay, terminal 15	rear RH side of engine compartment in electronics box	17-2	
M2	Fuel pump (EKP I)	under RH side of rear seat	22-1	
M3	Wiper motor	rear of engine compartment below centre of fresh air cowl	16-1	
M4	Washer pump	front RH side of engine compartment on washer fluid reservoir	10-1	
M7	Headlight washer pump	front RH side of engine compartment on washer fluid reservoir	10-2	
M9	Auxiliary fan motor	vehicle front, behind grille behind trim	18-1	
M12	Central locking (ZV) drive driver's door	in bottom of LH front door behind trim		
M13	Central locking (ZV) drive passenger's door	in bottom of RH front door behind trim		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
M14	Central locking drive rear right	in bottom of RH rear door behind trim		
M15	Central locking drive rear left	in bottom of LH rear door behind trim		
M16	ZV drive tank flap	in rear RH side of luggage compartment	04-1	
M17	Central locking drive rear lid	in rear of luggage compartment		
M20	Power window motor, rear left	in bottom of LH rear door behind trim		
M21	Driver's window motor	LH front door behind door trim panel	31-3	
M22	Power window motor, rear right	in bottom of RH rear door behind door trim panel		
M23	Passenger's window motor	RH front door behind door trim panel	32-1	
M25	Cruise control actuator (Tempomat)	front LH side of engine compartment	18-2	
M30	Blower motor	rear of engine compartment under RH fresh air trim	15-2	
M35	Defroster flap motor	on RH side of IHKA housing		
M36	Fresh air flap motor	under LH side of dash right of steering column	29-2	
M40	Circulation air flap motor	under LH side of dash right of steering column	29-2	
M43	Convertible soft top flap lock	in convertible soft top compartment	23-3	
M44	Ventilation flap regulating motor	on RH side of IHKA housing		
M46	Foot and rear flap regulating motor	on RH side of IHKA housing		
M50	Driver's seat cushion tilt motor	under LH front seat	24-3	
M51	Driver's seat movement motor	under LH front seat	24-3	
M52	Driver's seat height adjustment motor	under LH front seat	24-3	
M53	Driver's backrest recliner motor	under LH front seat	24-3	
M55z	Driver's lumbar support/compressor valve	under LH front seat		
M58	Passenger's backrest recliner motor	under RH front seat		





## Component location chart

Comp.	Description	Location	7100.0	8500.0
M59	Passenger's seat height adjustment motor	under RH front seat		
M60	Passenger's seat movement motor	under RH front seat		
M61	Passenger's seat cushion tilt motor	under RH front seat		
M80	Left headlight beam angle adjust actuator	front LH side of engine compartment		
M81	Right headlight beam angle adjust actuator	front RH side of engine compartment		
M93	ADS actuator	front of engine compartment		
M98	Rear left power window motor	left of LH rear seat behind trim	23-1	
M99	Rear right power window motor	right of RH rear seat behind trim	23-1	
M100	Convertible soft top flap drive	in rear LH side of glove compartment	34-1	
M101	Convertible soft top drive	in front LH side of luggage compartment	34-3	
M103	Left vent window motor	in bottom of LH C-post		
M104	Right vent window motor	in bottom of RH C-post		
M105	Rear window blower motor	behind rear seat bench	23-2	
M107	Central locking drive (ZV) glovebox	RH side of dash behind glove compartment	26-1	
M132	Motor, windscreen cowl panel lock	front cover	41-1	
M2025	Starter	rear LH side of engine compartment		
M6510	Starter	rear LH side of engine compartment		
N2	Output stage	below centre console		
N3	Dimmer	LH side of dash	27-1	
N4	On-board computer	centre console	01-1	
N5	Analogue clock	centre console		
N8	AM/FM antenna amplifier	in top of LH C-post	33-1	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
N8	AM/FM antenna amplifier	below RH luggage compartment trim panel (Convertible)		
N9	Radio	centre console		
N10	Multi-function clock	centre console		
N17	Crash alarm sensor	footwell, driver's side	01-3	
N20	Radio receiver	in front RH side of glove compartment		
N22	CD changer	in front LH side of luggage compartment	04-1	
N24	Rollover sensor	behind rear seat bench (Convertible)	04-2	
P90	Front power distribution box	rear LH side of engine compartment	05-3	
P92	Auxiliary relay box	front RH side of engine compartment near spring strut dome (M3)	40-3	
P95	Auxiliary fuse box	LH side of engine compartment		
P96	Auxiliary fuse box in luggage compartment	in RH side of luggage compartment, behind trim		
P97	Auxiliary fuse box	under LH side of dash	01-3	
R10	Pedal value sensor	footwell, driver's side		
R11	Blower ballast resistor	behind centre of dash	29-1	
R13	Headlight beam angle adjust potentiometer	LH side of dash		
R21	Rear left door DWA conductor loop	in bottom of LH rear door behind trim		
R22	Rear right door DWA conductor loop	in bottom of RH rear door behind trim		
R27	Conductor loop hinged window right	in bottom of LH C-post		
R28	Conductor loop hinged window left	in bottom of RH C-post		
R31	ADS potentiometer	LH side of engine		
R5140	Gear recognition potentiometer	on transmission (M3)	39-1	
R6252	Throttle potentiometer	LH front of engine (M3)		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
R6252	Throttle potentiometer	LH side of engine	13-3	
R6252	Throttle potentiometer	LH side of engine (316i-318i) (318is)	17-3	
R6253	ASC throttle potentiometer	near throttle valve housing		
S2	Ignition switch	right of steering column	25-3	
S3	Gear selector lever switch	centre console	30-3	
S4	Horn switch	on steering wheel	25-1	
S5	Windscreen wiper switch	right of steering column	25-3	
S6	ASC switch	centre console	30-2	
S7	Turn indicator/low beam selector	left of steering column	25-3	
S8	Light switch	LH side of dash	27-1	
S10	Fog light switch	LH side of dash		
S13	Passenger's door contact switch	rear right door post	33-3	
S14	Driver's door contact switch	LH rear door jamb	33-3	
S15	Rear RH door contact switch	in bottom of RH C-post	33-3	
S16	Rear LH door contact switch	in bottom of LH C-post	33-3	
S17	Driver's power mirror switch	in top of LH front door		
S18	Hazard warning switch	centre console	30-3	
S20	Antitheft (DWA) radio microswitch	behind radio		
S21	Front lid microswitch	rear RH side of engine compartment behind RH spring strut dome	13-2	
S28	Cruise control switch	right of steering column	25-3	
S29	Brake light switch	LH footwell on brake pedal support bracket behind LH footwell trim	27-3	
S30	Brake light switch	LH footwell on brake pedal support bracket behind LH footwell trim	27-2	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
S31	Handbrake switch	centre console on rear of handbrake lever	31-2	
S32	Clutch switch	LH footwell on clutch pedal support bracket behind LH footwell trim	27-3	
S36	Dual temperature switch 91 °C/99 °C	front RH side of engine compartment near front RH headlight	09-3	
S36y	Dual temperature switch 80 °C/88 °C	front RH side of engine compartment near front RH headlight	09-3	
S38	Tilt/slide sunroof switch (SHD)	roof		
S40y	Central power window switch	centre console		
S41y	Window lifter door rear LH (door)	in bottom of LH rear door		
S42y	Window lifter door rear RH (door)	in bottom of RH rear door		
S47	Driver's door lock switch	LH front door next to door lock		
S48	Driver's door handle switch	LH front door next to door lock		
S49	Passenger's door lock switch	RH front door next to door lock		
S51	Driver's seat adjustment switch	LH front seat		
S52	Driver's lumbar support switch	LH front seat		
S53	Driver's seat heating switch	centre console near gear lever	30-2	
S54	Passenger's seat heating switch	centre console near gear lever	30-1	
S56	Passenger's seat adjustment switch	under RH front seat		
S58	Driver's seat belt buckle switch	in LH front seat belt buckle		
S61	Rear lid light switch	on rear lid		
S61y	Luggage compartment light switch	underside of rear lid left	34-2	
S63	Coolant level switch	front RH side of engine compartment	18-1	
S64	Wash water level switch	front RH side of engine compartment on washer fluid reservoir	10-1	
S75	Blower switch	centre of dash		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
S77	Driver's make-up mirror switch	above LH sun visor		
S78	Passenger's make-up mirror switch	above RH sun visor		
S82	Fog light switch	LH side of dash		
S99	Passenger's window monitoring switch (DWA)	RH front door behind trim		
S100	Driver's window monitoring switch (DWA)	LH front door behind trim		
S101	Rear right window monitoring switch (DWA)	in bottom of RH rear door behind trim		
S102	Rear left window monitoring switch (DWA)	in bottom of LH rear door behind trim		
S124	Rear right door contact	rear right door post		
S125	Contact rear left door	LH rear door jamb		
S126y	Driver's door power window switch	centre console near gear lever	31-1	
S127y	Passenger's door power window switch	centre console near gear lever	31-1	
S128y	Window lifter door rear LH (centre console)	centre console		
S128z	Rear left power window switch	centre console		
S129y	Window lifter door rear RH (centre console)	centre console		
S129z	Rear right power window	centre console		
S130	Child safety lock (centre console)	centre console		
S137y	Front lid switch, right	RH side of engine compartment		
S138y	Front lid switch, left	LH side of engine compartment		
S143	Switch for electrically operated convertible soft top	centre console		
S164	Convertible soft top deadpoint microswitch	on convertible soft top linkage		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
S165	Convertible soft top microswitch	on convertible soft top linkage		
S182	Hinged window switch LH	under centre console		
S183	Hinged window switch RH	under centre console		
S196	Rear window blower microswitch	in convertible soft top compartment left (Convertible)	41-2	
S198	Thermal switch, heated jets	front LH side of engine compartment	35-3	
S213	Rear lid microswitch	in rear LH side of glove compartment		
S214	Convertible soft top flap microswitch	on convertible soft top linkage		
S231	Windscreen cowl panel lock microswitch	front cover	41-1	
S302y	Central locking switch	centre console		
S303y	Top Hifi switch	centre console		
S1134	SMG selector lever	centre console		
S2113	Reversing light switch	LH side of transmission (Diesel)		
S2138	A/C fan II switch	RH side of engine compartment (Diesel)		
S8503	Program switch	centre console		
S8507	Kick-down switch	LH footwell		
S8511	Reversing light switch	on transmission left	39-3	
T6151	Ignition coil 1	RH top of engine	13-1	
T6151	Ignition coil 1	RH side of engine compartment (316i-318i) (318is)	17-3	
T6152	Ignition coil 2	RH top of engine	13-1	
T6152	Ignition coil 2	RH side of engine compartment (316i-318i) (318is)	17-3	
T6153	Ignition coil 3	RH top of engine	13-1	
T6153	Ignition coil 3	RH side of engine compartment (316i-318i) (318is)	17-3	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
T6154	Ignition coil 4	RH top of engine	13-1	
T6154	Ignition coil 4	RH side of engine compartment (316i–318i) (318is)	17-3	
T6155	Ignition coil 5	RH top of engine	13-1	
T6156	Ignition coil 6	RH top of engine	13-1	
V5	Antitheft (DWA) LED	centre console near gear lever	30-1	
V6	Decoupling diode	rear LH side of engine compartment, in power distribution box		
V7	ASC diode	top LH side of engine compartment in front power distributor		
V9	Decoupling diode lighting	top LH side of engine compartment in front power distributor		
V9501	Decoupling diode	front of engine compartment		
X0	B+ terminal point	rear LH side of engine compartment	05-3	
X2	B+ terminal point	rear LH side of engine compartment	05-3	
X9	B+ terminal point	rear LH side of engine compartment	05-3	
X13	(30 pins, black)	LH side of LH footwell	25-2	00-4
X14	(30 pins, natural)	LH side of LH footwell	25-2	00-4
X16	(26 pins, white)	LH side of dash, rear of instrument cluster, A2w	28-3	00-2
X17	(26 pins, blue)	LH side of dash, rear of instrument cluster, A2w	28-3	00-2
X20	(25 pins, black)	rear LH side of engine compartment	18-3	05-2
X20	(25 pins, black)	rear LH side of engine compartment (Diesel)	19-1	05-2
X22	(26 pins, grey)	RH side of dash behind glove compartment	02-2	00-2
X31	(12 pins, black)	rear LH side of engine compartment behind LH spring strut dome	16-2	01-6
X32	(12 pins, white)	LH footwell underside of steering column	28-2	02-6
X33	(12 pins, black)	LH footwell underside of steering column behind LH footwell trim	27-2	02-6



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X35	(12 pins, natural)	under LH side of dash, on steering column	28-1	02-6
X43	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X44	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X45	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X51	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X52	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X53	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X54	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X56	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X58	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X63	(9 pins, black)	under LH side of dash		03-6
X64	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X65	(9 pins, black)	under LH side of dash		03-6
X66	(9 pins, black)	under RH side of dash		03-6
X69	(25 pins, grey)	rear LH side of engine compartment	18-3	05-2
X69	(25 pins, black)	rear LH side of engine compartment (Diesel)	19-1	05-2
X70	(7 pins, black)	front LH side of engine compartment	18-2	02-2
X72	(8 pins, natural)	LH footwell underside of steering column behind LH footwell trim	27-2	03-5
X72	(6 pins, natural)	LH footwell underside of steering column behind LH footwell trim	27-2	04-2
X73	(8 pins, grey)	LH side of dash		03-5
X74	(50 pins, black)	under rear seat	35-1	12-2
X78	(4 pins, black)	LH footwell on brake pedal support bracket behind LH footwell trim	27-2	03-3





## Component location chart

Comp.	Description	Location	7100.0	8500.0
X82 ..	(3 pins, black) .....	front of engine compartment on auxiliary fan .....	18-1	08-1
X85 ..	(3 pins, black) .....	rear LH side of engine compartment .....	16-2	06-3
X87 ..	(3 pins, black) .....	RH top of radiator .....	09-3	06-3
X105 .	(2 pins, grey) .....	underside of front lid		
X106 .	(2 pins, grey) .....	underside of front lid		
X107 .	(2 pins, grey) .....	front RH side of engine compartment on washer fluid reservoir .....	10-1	
X109 .	(2 pins, black) .....	front RH side of engine compartment on washer fluid reservoir .....	10-1	
X111 ..	(2 pins, black) .....	rear LH side of engine compartment on break fluid reservoir .....	18-3	
X112 ..	(2 pins, black) .....	front RH side of engine compartment .....	18-1	
X112 ..	(2 pins, black) .....	rear of engine compartment, top of coolant expansion tank (M3)		
X113 ..	(2 pins, grey) .....	above RH front wheel well behind RH front wheel .....	09-2	
X114 ..	(2 pins, grey) .....	above LH front wheel well behind LH front wheel .....	09-2	
X116 ..	(2 pins, black) .....	LH footwell on brake pedal support bracket behind LH footwell trim .....	27-3	
X118 ..	(2 pins, black) .....	above LH front wheel well behind LH front wheel .....	09-2	
X121 .	(2 pins, white) .....	LH footwell underside of steering column on clutch pedal support bracket .....	27-3	
X123 .	(2 pins, grey) .....	front RH side of engine compartment on washer fluid reservoir .....	10-2	
X128 .	(2 pins, black) .....	front RH side of engine compartment		
X130 .	(4 pins, black) .....	front LH side of engine compartment .....		03-4
X132 .	(2 pins, black) .....	front of engine compartment		
X133 .	(2 pins, black) .....	front of engine compartment		
X135 .	(4 pins, black) .....	front RH side of engine compartment .....		03-4
X137 .	(2 pins, black) .....	front LH side of engine compartment		



# Component location chart

Comp.	Description	Location	7100.0	8500.0
X142	(3 pins, grey)	under rear of vehicle to left near on differential		02-1
X143	(3 pins, grey)	under rear of vehicle to left near on differential	08-1	02-1
X163	(3 pins, black)	front RH side of engine compartment on washer fluid reservoir	10-1	06-3
X165	Ground	front LH side of engine compartment	06-3	
X168	(1 pin, black)	left of steering column		
X173	Ground	under LH side of dash	07-1	
X173	Ground	under LH side of dash (M3)	40-2	
X256	(26 pins, black)	ahead of RH front door in bottom of RH A-post	32-1	04-1
X257	(26 pins, black)	ahead of LH front door in bottom of LH A-post		04-1
X271	(12 pins, black)	LH side of dash, rear of instrument cluster, A2w	28-3	01-3
X272	(2 pins, black)	under roof centre panel	24-1	
X273	(12 pins, black)	in bottom of LH B-post	22-3	01-2
X274	(12 pins, black)	in bottom of RH B-post	22-3	01-2
X275	(4 pins, white)	under LH front seat	24-2	03-3
X279	(4 pins, white)	under RH front seat	38-3	03-3
X285	(15 pins, blue)	under RH side of dash behind glove compartment	02-2	00-3
X286	(9 pins, black)	RH side of dash behind glove compartment		03-6
X290	(9 pins, black)	RH side of dash behind glove compartment		03-6
X292	(9 pins, black)	power distribution box rear LH side of engine compartment		03-6
X295	(8 pins, black)	LH footwell underside of steering column behind LH footwell trim	27-2	03-5
X300	(26 pins, black)	in rear of luggage compartment		10-2
X311	(3 pins, black)	underside of rear lid left	34-2	01-1



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X311	(3 pins, black)	underside of rear lid (Touring)	38-1	01-1
X312	(2 pins, black)	in rear RH side of luggage compartment behind RH rear light assembly	04-1	
X315	(2 pins, black)	underside of rear lid left	34-2	
X315	(2 pins, black)	underside of rear lid left	38-1	
X316	(6 pins, green)	centre console near gear lever	31-1	05-3
X317	(6 pins, white)	centre console near gear lever	30-3	05-3
X318	(8 pins, black)	in rear RH side of luggage compartment behind RH rear light assembly	04-1	01-4
X319	(8 pins, black)	in rear LH side of glove compartment behind LH rear light assembly		01-4
X320	(6 pins, white)	centre console near gear lever	30-3	05-3
X322	(6 pins, black)	LH footwell	28-2	04-2
X324	(6 pins, green)	centre console near gear lever	31-1	05-3
X333	(4 pins, black)	rear of engine compartment below centre of fresh air cowl	16-1	07-2
X336	(6 pins, black)	above LH sun visor		09-3
X351	(2 pins, black)	in top of RH B-post		
X352	(3 pins, black)	in top of LH B-post	41-3	01-1
X353	(1 pin, natural)	in bottom of RH C-post		
X354	(1 pin, natural)	in bottom of LH C-post		
X355	(2 pins, black)	in top of RH C-post	33-2	
X356	(2 pins, black)	in top of LH C-post	33-1	
X363	(1 pin, black)	under LH side of dash		
X371	(2 pins, black)	rear RH side of engine compartment behind RH spring strut dome	13-2	
X379	(1 pin, natural)	in top of LH C-post	33-1	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X379	(1 pin, natural)	in rear lid (Touring)	36-1	
X380	(1 pin, natural)	in top of RH C-post	33-2	
X380	(1 pin, natural)	in rear lid (Touring)	36-1	
X381	(3 pins, black)	under roof centre panel	24-1	01-1
X382	(3 pins, black)	above RH sun visor	03-1	01-1
X383	(2 pins, black)	under rear of vehicle on differential	08-1	
X386	(2 pins, black)	Rear ashtray light		
X389	(2 pins, grey)	rear LH side of engine compartment		
X390	(2 pins, black)	RH side of dash behind glove compartment		
X400	(8 pins, black)	in rear LH side of glove compartment		03-5
X401	(1 pin, black)	above LH sun visor	24-1	
X402	(1 pin, black)	above RH sun visor	03-1	
X409	(2 pins, black)	under centre of car on catalytic converter		
X410	(2 pins, black)	under centre of car on catalytic converter		
X413	(3 pins, natural)	rear parcel shelf		01-1
X413	(3 pins, natural)	in rear lid (Touring)	36-1	01-1
X423	(1 pin, natural)	below centre console on rear of handbrake lever		
X424	(1 pin, brown)	in top of LH C-post	33-1	
X494	Ground	under driver's seat	07-2	
X495	Ground	behind RH footwell trim top	07-3	
X498	Ground	under driver's seat	07-2	
X503	(12 pins, white)	behind LH side of dash	27-1	01-6



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X504	(4 pins, white)	behind LH side of dash	27-1	03-3
X509	(9 pins, black)	behind glove compartment (glove box removed)		03-6
X510	(9 pins, black)	behind glove compartment (glove box removed)		03-6
X511	(8 pins, black)	centre console near gear lever	30-3	01-4
X514	(4 pins, black)	centre console	30-1	10-1
X516	(5 pins, black)	centre console	30-3	03-2
X517	(4 pins, black)	behind LH side of dash	27-1	03-3
X518	(4 pins, black)	LH footwell	28-2	03-3
X521	(6 pins, blue)	centre console		04-5
X522	(3 pins, white)	LH footwell	28-2	04-6
X531	(1 pin, natural)	centre console near gear lever	30-2	
X532	(2 pins, black)	centre console near gear lever	30-2	
X537	(3 pins, black)	in top of LH front door behind door trim panel	31-3	01-1
X538	(2 pins, black)	RH front door behind door trim panel	32-1	01-1
X539	(2 pins, black)	centre console		
X542	(2 pins, black)	left of glove compartment	26-1	
X603	(12 pins, black)	LH front seat		02-6
X604	(12 pins, black)	RH front seat		02-6
X605	(12 pins, black)	in LH side of luggage compartment	00-3	11-3
X605	(12 pins, black)	under RH side of rear seat (Convertible)	04-2	11-3
X605	(12 pins, black)	in rear LH side of glove compartment (Touring)	36-3	11-3
X606	(26 pins, black)	in LH side of luggage compartment	00-3	00-2



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X606	(26 pins, black)	under RH side of rear seat (Convertible)	04-2	00-2
X606	(26 pins, black)	in rear LH side of glove compartment (Touring)	36-3	00-2
X607	(9 pins, black)	under LH side of dash		03-6
X623	(4 pins, black)	in top of LH front door behind door trim panel		10-1
X624	(4 pins, black)	in top of RH front door behind door trim panel	32-1	10-1
X625	(6 pins, white)	LH front door	31-3	05-1
X630	(13 pins, black)	under centre of rear bumper (trailer socket)		10-4
X638	(2 pins, black)	under RH side of rear seat	22-1	
X641	(6 pins, black)	RH front door behind door trim panel		08-2
X643	(6 pins, green)	in windscreen header		07-1
X644	(6 pins, black)	in bottom of LH rear door		05-3
X645	(6 pins, blue)	in bottom of LH rear door		06-2
X646	(6 pins, black)	in bottom of RH rear door behind trim		06-2
X647	(6 pins, blue)	in bottom of RH rear door behind trim		08-4
X651	(6 pins, yellow)	centre console	30-2	05-3
X652	(6 pins, —)	centre console		05-1
X658	(6 pins, yellow)	centre console	30-1	05-3
X660	(6 pins, black)	LH front door next to door lock		05-4
X663	(6 pins, black)	under RH side of dash		04-5
X663	(4 pins, black)	under RH side of dash		10-1
X671	(5 pins, black)	behind LH side of dash		12-1
X679	(2 pins, white)	under RH side of rear seat	22-1	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X695	(10 pins, black)	below centre console		02-4
X700	(1 pin, natural)	behind RH footwell speaker cover		
X701	(1 pin, natural)	behind LH footwell speaker trim cover		
X706	(2 pins, black)	centre console	31-2	
X709	(2 pins, black)	underside of rear lid, near number plate	09-1	
X710	(2 pins, black)	underside of rear lid, near number plate	09-1	
X711	(1 pin, natural)	underside of rear lid left	34-2	
X711	(1 pin, natural)	underside of rear lid (Touring)	38-1	
X712	(1 pin, natural)	underside of rear lid left		
X713	(2 pins, black)	under rear of vehicle on differential	08-1	
X714	(2 pins, grey)	in bottom of LH rear door behind trim		
X720	(2 pins, grey)	in bottom of RH rear door behind trim		
X726	(2 pins, —)	under LH front seat	24-2	
X727	(2 pins, —)	under LH front seat	24-2	
X728	(2 pins, —)	under LH front seat	24-2	
X729	(2 pins, —)	under LH front seat	24-2	
X732	(4 pins, black)	under LH front seat under carpet		03-3
X733	(4 pins, black)	under LH front seat under carpet		03-3
X734	(2 pins, —)	under RH front seat		
X735	(2 pins, —)	under RH front seat		
X736	(2 pins, —)	under RH front seat		
X737	(2 pins, —)	under RH front seat		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X740	(4 pins, black)	under RH front seat	38-3	03-3
X741	(4 pins, black)	under RH front seat	38-3	03-3
X742	(2 pins, yellow)	RH front door next to door lock		
X744	(4 pins, grey)	RH front door behind door trim panel	32-1	11-6
X745	(3 pins, black)	footwell, passenger's side		01-1
X746	(3 pins, white)	RH front door behind door trim panel	32-1	01-1
X747	(2 pins, yellow)	LH front door next to door lock	32-2	
X748	(3 pins, black)	footwell, driver's side		01-1
X749	(4 pins, grey)	in top of LH front door	31-3	11-6
X751	(2 pins, white)	LH front door next to door lock	32-2	
X752	(2 pins, grey)	LH front door next to door lock	32-2	
X753	(3 pins, black)	LH front door	31-3	01-1
X760	(3 pins, black)	in head lining		01-1
X761	(1 pin, black)	in head lining		
X762	(3 pins, black)	in head lining		01-1
X763	(1 pin, black)	in head lining		
X768	(2 pins, white)	in engine compartment near front LH headlight	08-2	
X769	(2 pins, white)	in engine compartment near front RH headlight	08-2	
X770	(2 pins, yellow)	front LH side of vehicle	14-2	
X771	(2 pins, black)	on RH side of LH footwell on LH side of IHKA housing	28-1	
X772	(2 pins, white)	centre console		
X773	(2 pins, white)	centre console		





## Component location chart

Comp.	Description	Location	7100.0	8500.0
X774	(1 pin, grey)	rear of engine compartment under RH fresh air trim		
X778	(3 pins, black)	under LH front seat	24-2	01-1
X779	(2 pins, black)	left of glove compartment (Charge socket)	26-1	
X782	(3 pins, orange)	behind glove compartment (glove box removed)		
X783	(3 pins, black)	underside of steering column		08-3
X816	(2 pins, black)	rear of engine compartment under RH fresh air trim		
X817	(1 pin, black)	rear of engine compartment under RH fresh air trim		
X899	(12 pins, black)	behind centre of dash		01-3
X904	(4 pins, black)	behind centre of dash	29-1	03-3
X905	(5 pins, black)	behind centre of dash		
X912	(2 pins, white)	in bottom of LH rear door		
X998	(4 pins, black)	below centre console		03-1
X999	(4 pins, black)	behind centre of dash on RH side of IHKA housing		03-3
X1001	(4 pins, natural)	Rear right speaker		03-3
X1002	(4 pins, natural)	Rear left speaker		03-3
X1014	(1 pin, black)	centre console near gear lever	30-2	
X1034	(3 pins, black)	front LH side of engine compartment		11-2
X1035	(3 pins, black)	front RH side of engine compartment		11-2
X1070	(18 pins, black)	centre console	01-1	01-5
X1071	(18 pins, natural)	centre console	01-1	01-5
X1074	(15 pins, white)	under LH side of dash	03-3	00-3
X1075	(15 pins, black)	under LH side of dash	03-3	00-3



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X1148	(2 pins, black)	front LH side of engine compartment Thermal switch, heated jets	35-3	
X1155	(3 pins, black)	behind centre of dash		01-1
X1161	(9 pins, black)	rear LH side of engine compartment		03-6
X1165	Ground	under LH side of dash	07-1	
X1165	Ground	under LH side of dash (M3)	40-2	
X1166	Ground	behind RH footwell trim top	07-3	
X1170	(42 pins, black)	behind glove compartment (glove box removed)		09-2
X1171	(55 pins, black)	behind glove compartment (glove box removed)	02-1	00-1
X1175	(42 pins, black)	behind glove compartment (glove box removed)		09-2
X1176	(25 pins, black)	LH side of engine compartment		05-2
X1178	(2 pins, white)	centre console on RH side of gear shift lever		
X1193	(3 pins, black)	centre console on RH side of gear shift lever		01-1
X1213	(2 pins, black)	centre console	31-2	
X1222	(6 pins, white)	in front RH side of glove compartment		04-2
X1222	(6 pins, white)	in front RH side of glove compartment (Touring)	37-1	04-2
X1239	(2 pins, black)	RH C-post		
X1240	(2 pins, black)	LH C-post		
X1241	(2 pins, natural)	under LH side of rear seat	21-3	
X1243	(6 pins, black)	centre console near gear lever	31-1	02-5
X1245	(1 pin, black)	above LH sun visor	24-1	
X1246	(1 pin, black)	above RH sun visor	03-1	
X1260	(2 pins, —)	Rear left speaker		



# Component location chart

Comp.	Description	Location	7100.0	8500.0
X1261	(2 pins, —) . . . . .	Rear right speaker		
X1285	(1 pin, —) . . . . .	in top of LH C-post Capacitor		
X1292	(4 pins, natural) . . . . .	centre console . . . . .		10-1
X1380	(1 pin, natural) . . . . .	behind RH footwell speaker cover		
X1381	(1 pin, natural) . . . . .	behind LH footwell speaker trim cover		
X1405	(1 pin, natural) . . . . .	rear LH side of engine compartment in power distribution box		
X1406	(1 pin, white) . . . . .	rear LH side of engine compartment in power distribution box		
X1426	(1 pin, brown) . . . . .	rear RH side of engine compartment		
X1439	(2 pins, black) . . . . .	centre console		
X1441	Ground . . . . .	under rear seat . . . . .	35-1	
X1527	(26 pins, blue) . . . . .	rear of centre console . . . . .	01-2	00-2
X1529	(1 pin, —) . . . . .	rear LH side of engine compartment in front power distributor		
X1530	(1 pin, natural) . . . . .	rear LH side of engine compartment in front power distributor		
X1558	(3 pins, blue) . . . . .	centre of dash . . . . .	01-2	01-1
X1588	(2 pins, black) . . . . .	under LH side of dash		
X1659	(15 pins, black) . . . . .	under RH side of dash behind glove compartment . . . . .	00-2	00-3
X1660	(3 pins, white) . . . . .	underside of steering column . . . . .	03-2	01-1
X1697	(18 pins, natural) . . . . .	under LH side of dash . . . . .	40-2	01-5
X1699	(12 pins, blue) . . . . .	LH side of dash, rear of instrument cluster, A2w . . . . .		01-3
X1705	(12 pins, black) . . . . .	rear of centre console . . . . .		01-3
X1707	(3 pins, black) . . . . .	below centre console . . . . .		08-6
X1708	(10 pins, black) . . . . .	below centre console . . . . .		02-4



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X1710	(3 pins, natural)	LH side under inside of cover for frame side member (M3)	40-1	12-3
X1711	(2 pins, black)	LH side of engine compartment		
X1712	(2 pins, black)	RH side of engine compartment		
X1715	(4 pins, natural)	behind trim, Subwoofer		03-3
X1780	(9 pins, black)	footwell, driver's side, behind trim		03-6
X1883	(3 pins, orange)	in passenger's door		08-3
X1884	(3 pins, orange)	in driver's door		08-3
X1885	(3 pins, black)	under LH front seat		07-5
X1886	(3 pins, black)	under RH front seat		07-5
X1890	(3 pins, black)	under glove box		06-3
X2000	(12 pins, black)	in electronics box (Diesel)	17-2	11-3
X2008	(2 pins, black)	RH side of engine	43-1	
X2009	(2 pins, black)	front of engine compartment (Diesel Electric cutout)	42-3	
X2010	(7 pins, black)	front of engine (Diesel)	19-3	04-3
X2010	(7 pins, black)	front of engine (Diesel)	42-2	04-3
X2011	(2 pins, black)	LH side of engine compartment (Diesel)	19-2	
X2011	(2 pins, black)	LH side of engine compartment (Diesel)	43-1	
X2012	(2 pins, black)	front of engine (Diesel)	19-3	
X2012	(2 pins, black)	front of engine (Diesel)	42-3	
X2013	(2 pins, black)	LH side of engine compartment (Diesel)	14-3	
X2014	(3 pins, black)	rear LH side of engine compartment (Diesel)	19-1	07-3
X2014	(3 pins, black)	rear LH side of engine compartment (Diesel)	42-1	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X2017	(2 pins, black)	rear LH side of engine compartment (Diesel)	19-1	
X2017	(2 pins, black)	rear LH side of engine compartment (Diesel)	42-1	
X2019	(55 pins, black)	in electronics box (Diesel)	17-2	00-1
X2023	(1 pin, —)	LH bottom of engine compartment Alternator		
X2024	(1 pin, —)	LH bottom of engine compartment Alternator		
X2025	(1 pin, —)	rear LH side of engine compartment Starter		
X2026	(1 pin, —)	rear LH side of engine compartment Starter		
X2027	(1 pin, —)	rear LH side of engine compartment, Starter		
X2042	Ground	rear RH side of engine compartment		
X2081	(9 pins, black)	rear LH side of engine compartment in power distribution box (Diesel)		03-6
X2082	(2 pins, black)	front of engine (Diesel)	19-3	
X2083	(2 pins, black)	LH side of engine compartment (Diesel)	19-2	
X2083	(2 pins, black)	LH side of engine compartment (Diesel)	43-3	
X2085	(9 pins, black)	rear LH side of engine compartment in power distribution box (Diesel)		03-6
X2086	(3 pins, black)	rear LH side of engine compartment (Diesel)	19-1	08-1
X2086	(3 pins, black)	rear LH side of engine compartment (Diesel)	42-1	
X2091	(1 pin, —)	centre top of engine (Glow plug cyl. 1)		
X2092	(1 pin, —)	centre top of engine (Glow plug cyl. 2)		
X2093	(1 pin, —)	centre top of engine (Glow plug cyl. 3)		
X2094	(1 pin, —)	centre top of engine (Glow plug cyl. 4)		
X2095	(1 pin, —)	centre top of engine (Glow plug cyl. 5)		
X2096	(1 pin, —)	centre top of engine (Glow plug cyl. 6)		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X2110	Cable shoe, heater plug relay .....	in electronics box (Diesel) .....	17-2	
X2113	(2 pins, black) .....	on transmission left (Diesel)		
X2115	B+ terminal point .....	rear RH side of engine compartment		
X2120	(55 pins, black) .....	rear RH side of engine compartment (Diesel) .....		00-1
X2122	(9 pins, black) .....	under front of car .....		03-6
X2123	(2 pins, black) .....	under front of car		
X2138	(2 pins, black) .....	RH side of engine compartment (Diesel)		
X2153	(16 pins, black) .....	on LH side of transmission .....		11-4
X2154	(88 pins, black) .....	rear RH side of engine compartment .....		06-1
X2200	(10 pins, black) .....	rear LH side of engine compartment in power distribution box .....		09-1
X2226	(3 pins, black) .....	LH side of engine .....	43-3	
X2232	(2 pins, black) .....	front of engine compartment .....	42-2	
X2244	(2 pins, black) .....	rear LH side of engine compartment		
X3211	(4 pins, black) .....	front RH side of engine compartment .....		07-2
X4770	(4 pins, natural) .....	in top of RH C-post .....		10-1
X4771	(4 pins, natural) .....	in top of LH C-post .....		10-1
X5140	(4 pins, black) .....	on transmission (M3) .....	39-1	07-2
X5210	(3 pins, black) .....	front of engine compartment		
X5220	(3 pins, black) .....	front of engine compartment		
X5238	(2 pins, black) .....	on transmission .....	39-2	
X5271	(1 pin, black) .....	LH side of transmission		
X5272	(1 pin, black) .....	LH side of transmission		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X5300	(88 pins, black)	rear RH side of engine compartment		06-1
X5330	(25 pins, black)	on the hydraulic unit front RH side of engine compartment (M3)	38-2	05-2
X5360	(9 pins, black)	in auxiliary relay box front RH side of engine compartment near spring strut dome	40-3	03-6
X5370	Ground	rear RH side of engine compartment behind RH spring strut dome		
X6000	(88 pins, black)	rear RH side of engine compartment		06-1
X6002	(20 pins, black)	rear RH side of engine compartment	05-1	04-4
X6031	(12 pins, black)	rear LH side of engine compartment		01-6
X6101	(2 pins, black)	centre top of engine		
X6102	(2 pins, black)	centre top of engine		
X6103	(2 pins, black)	centre top of engine		
X6104	(2 pins, black)	centre top of engine		
X6105	(2 pins, black)	centre top of engine		
X6106	(2 pins, black)	centre top of engine		
X6120	(2 pins, black)	LH side of engine compartment, right of LH spring strut dome	15-1	
X6120	(2 pins, black)	LH side of engine compartment, right of LH spring strut dome	22-2	
X6130	(3 pins, black)	LH front of engine below intake manifold	12-2	07-3
X6130	(2 pins, black)	rear LH side of engine compartment (M3)		
X6131	(2 pins, black)	rear LH side of engine compartment		
X6133	(2 pins, black)	front of engine compartment		
X6150	(12 pins, black)	front RH side of engine compartment	05-1	01-6
X6151	(3 pins, black)	RH top of engine		07-4
X6152	(3 pins, black)	RH top of engine		07-4



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X6153	(3 pins, black)	RH top of engine		07-4
X6154	(3 pins, black)	RH top of engine		07-4
X6155	(3 pins, black)	RH top of engine		07-4
X6156	(3 pins, black)	RH top of engine		07-4
X6164	(2 pins, black)	in engine compartment		
X6200	(4 pins, black)	under centre of car	15-3	03-4
X6203	(3 pins, black)	front of engine below intake manifold (M3)		07-4
X6203	(3 pins, black)	front of engine below intake manifold	14-1	07-3
X6204	(3 pins, black)	front of engine below intake manifold (M3)		07-3
X6204	(3 pins, black)	front of engine below intake manifold	14-1	07-3
X6205	(2 pins, black)	LH side of engine	11-3	
X6207	(4 pins, black)	LH side of engine compartment, right of LH spring strut dome		07-2
X6208	(2 pins, black)	front of engine Camshaft control		
X6209	(3 pins, black)	front of engine Hall sensor, camshaft		07-5
X6210	(4 pins, black)	front top of engine		07-2
X6217	(4 pins, black)	front top of engine	15-1	07-2
X6220	(4 pins, black)	front top of engine		07-2
X6230	(3 pins, black)	RH bottom of engine		07-3
X6231	(2 pins, black)	LH front of engine	12-1	
X6231	(2 pins, black)	LH front of engine near dipstick (M3)		
X6231	(2 pins, brown)	LH front of engine below intake manifold (316i–318i) (318is)	17-1	
X6232	(2 pins, black)	RH front of engine below intake manifold		





## Component location chart

Comp.	Description	Location	7100.0	8500.0
X6233	(7 pins, black) . . . . .	LH side of engine compartment right of LH spring strut dome . . . . .		04-3
X6238	(2 pins, black) . . . . .	LH side of engine (M3)		
X6240	(4 pins, black) . . . . .	LH front of engine . . . . .	14-1	07-2
X6241	(3 pins, black) . . . . .	LH side of engine (M3) . . . . .		07-5
X6241	(3 pins, black) . . . . .	LH side of engine . . . . .	16-3	07-5
X6242	(2 pins, black) . . . . .	LH side of engine (M3) . . . . .		
X6242	(3 pins, black) . . . . .	LH side of engine . . . . .	16-3	07-5
X6243	(3 pins, black) . . . . .	LH side of engine (M3) . . . . .		07-5
X6252	(3 pins, black) . . . . .	LH side of engine (M3) . . . . .		07-3
X6252	(3 pins, black) . . . . .	LH side of engine near dipstick . . . . .	13-3	07-3
X6254	(3 pins, black) . . . . .	LH bottom of engine . . . . .		08-6
X6256	(4 pins, black) . . . . .	LH front of engine . . . . .	12-1	07-2
X6275	(2 pins, black) . . . . .	LH front of engine . . . . .	11-1	
X6277	(3 pins, black) . . . . .	front of engine compartment		
X6278	(3 pins, black) . . . . .	front of engine compartment		
X6300	(9 pins, black) . . . . .	rear LH side of engine compartment . . . . .		03-6
X6301	(9 pins, black) . . . . .	rear LH side of engine compartment . . . . .		03-6
X6303	(9 pins, black) . . . . .	rear LH side of engine compartment . . . . .		03-6
X6307	(10 pins, black) . . . . .	front of engine compartment . . . . .		09-1
X6309	(10 pins, black) . . . . .	front of engine compartment . . . . .		09-1
X6326	(9 pins, black) . . . . .	rear RH side of engine compartment in electronics box . . . . .	17-2	03-6
X6403	B+ terminal point . . . . .	on battery		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X6430	B+ terminal point	on B+ external start terminal point		
X6431	B+ terminal point	on B+ external start terminal point		
X6432	B+ terminal point	on B+ external start terminal point		
X6437	B+ terminal point	on B+ external start terminal point		
X6454	Ground	rear RH side of engine compartment behind RH spring strut dome	06-2	
X6456	Ground	front RH side of engine compartment		
X6509	Cable shoe, alternator B+	front LH side of engine compartment	05-2	
X6510	Cable shoe, starter terminal 50	rear LH side of engine compartment below intake manifold		
X6511	Cable shoe, starter terminal 30h	rear LH side of engine compartment below intake manifold		
X6512	Cable shoe, starter terminal 30	rear LH side of engine compartment below intake manifold		
X7000	(88 pins, black)	rear RH side of engine compartment		06-1
X7163	Distributor B+	Distributor B+, X7163		
X7509	Cable shoe, alternator D+	front LH side of engine compartment bottom		
X8500	(88 pins, black)	rear RH side of engine compartment		06-1
X8503	(10 pins, white)	centre console on RH side of gear shift lever	31-1	02-4
X8503	(6 pins, yellow)	centre console on RH side of gear shift lever		05-3
X8505	(16 pins, black)	on RH side of transmission	11-2	11-4
X8507	(1 pin, black)	under LH side of dash		
X8511	(2 pins, black)	under front of car LH side of transmission	39-3	
X8516	(2 pins, black)	on LH side of transmission	39-2	
X8516	(3 pins, black)	on transmission	39-3	08-6
X8521	(9 pins, black)	on RH side of transmission		08-5



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X8525	(3 pins, black)	under centre of car		07-3
X8551	(10 pins, black)	under centre of car		11-5
X8587	(2 pins, black)	on clutch pedal support bracket		
X8588	(2 pins, black)	on clutch pedal support bracket		
X8681	(8 pin, black)	in auxiliary relay box front RH side of engine compartment (M3)	40-3	
X9317	(6 pins, white)	below centre console		11-1
X9320	(6 pins, white)	below centre console		11-1
X9997	(2 pins, orange)	behind steering wheel	25-1	
X10010	Ground	behind RH footwell trim top	07-3	
X10012	Ground	behind RH footwell trim top	07-3	
X10015	(20 pins, black)	power distribution box rear LH side of engine compartment		
X10016	(20 pins, black)	power distribution box rear LH side of engine compartment		
X10017	(20 pins, black)	power distribution box rear LH side of engine compartment		
X10018	(32 pins, black)	power distribution box rear LH side of engine compartment		
X10026	(6 pins, black)	power distribution box rear LH side of engine compartment		
X10030	(5 pins, black)	power distribution box rear LH side of engine compartment		
X10034	(2 pins, —)	rear LH side of engine compartment near front power distribution box		
X10035	(2 pins, —)	rear LH side of engine compartment near front power distribution box		
X10036	(2 pins, black)	rear LH side of engine compartment near front power distribution box		
X10051	(4 pins, white)	under LH side of dash		03-3
X10054	(12 pins, black)	under LH side of dash on steering column	28-1	02-6
X10073	(1 pin, natural)	on front LH wheel well		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X10092	(9 pins, black)	behind glove compartment		03-6
X10094	(2 pins, black)	LH side of engine compartment		
X10095	(2 pins, white)	under LH side of dash		
X10098	(1 pin, —)	front RH side of engine compartment		
X10099	(1 pin, —)	front RH side of engine compartment		
X10102	(10 pins, black)	near interior rear view mirror	29-3	02-4
X10182	(18 pins, black)	behind glove compartment (glove box removed)	02-3	01-5
X10216	(2 pins, yellow)	under driver's seat		
X10217	(2 pins, yellow)	under passenger's seat		
X10218	(3 pins, natural)	under RH front seat		01-1
X10223	(3 pins, black)	in convertible soft top compartment	23-3	04-6
X10224	(2 pins, black)	in convertible soft top compartment	23-3	
X10225	(3 pins, natural)	underside of rear lid		01-1
X10226	(9 pins, black)	behind glove compartment	26-2	03-6
X10227	(4 pins, yellow)	in convertible soft top compartment		07-6
X10239	(3 pins, black)	LH side of engine compartment		07-3
X10240	(9 pins, black)	under LH side of dash		03-6
X10250	(2 pins, —)	under LH side of dash		
X10259	(1 pin, —)	front power distribution box		
X10260	(3 pins, natural)	under LH side of dash		01-1
X10261	(4 pins, black)	front RH side of engine compartment near front RH headlight	09-3	11-6
X10266	(6 pins, black)	in LH side of luggage compartment		07-1



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X10267	(6 pins, black)	centre console		05-3
X10271	(3 pins, black)	Rear compartment interior light, centre		
X10273	(2 pins, black)	under LH side of dash		
X10300	(7 pins, black)	front RH side of engine compartment		12-4
X10353	(25 pins, grey)	rear LH side of engine compartment		12-5
X10507	(1 pin, black)	LH side of LH footwell		
X11166	Ground	behind rear seat bench left (Convertible)	41-3	
X11205	(2 pins, black)	behind rear seat bench right (Convertible)	32-3	
X11208	(2 pins, black)	hardtop		
X11209	(2 pins, black)	behind rear seat bench left (Convertible)	41-3	
X11211	(2 pins, —)	hardtop		
X11274	(4 pins, black)	in rear LH side of glove compartment (Touring)	36-2	
X11275	(10 pins, black)	in rear LH side of glove compartment (Touring)	36-2	
X11277	(3 pins, violet)	in rear lid (M3)		01-1
X11288	(4 pins, natural)	in rear LH side of glove compartment (Touring)	36-2	
X11289	(3 pins, violet)	under LH front seat		01-1
X11290	(3 pins, violet)	under RH front seat		01-1
X11335	(3 pins, orange)	in passenger's door		08-3
X11336	(3 pins, orange)	in driver's door		08-3
X11379	(3 pins, black)	RH top of radiator		06-3
X11382	(2 pins, blue)	front cover	41-1	
X11383	(2 pins, blue)	behind rear seat bench left	41-3	



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X11385	(3 pins, black)	front cover	41-1	08-1
X11386	(3 pins, blue)	behind rear seat bench	41-3	08-1
X11390	(12 pins, black)	in bottom of LH C-post behind side panel	04-3	01-3
X11393	(9 pins, black)	front power distribution box		03-6
X11394	(25 pins, black)	rear LH side of engine compartment		12-5
X11396	(3 pins, blue)	behind rear seat bench		01-1
X13004	Ground	in top of RH rear backrest	06-1	
X13004	Ground	RH C-pillar (Touring)	37-3	
X13006	Ground	behind rear seat bench		
X13006	Ground	LH C-pillar (Touring)	37-2	
X13009	Ground	behind RH footwell trim top	07-3	
X13012	(26 pins, natural)	behind glove compartment (glove box removed)	02-1	00-2
X13013	(5 pins, black)	behind glove compartment RH side of dash		12-1
X13014	(4 pins, black)	behind glove compartment RH side of dash		10-3
X13016	Ground	under LH side of dash	07-1	
X13016	Ground	under LH side of dash (M3)	40-2	
X13016	Ground	LH C-pillar (Touring)	37-2	
X13044	(12 pins, black)	in bottom of LH C-post behind side panel	04-3	01-3
X13045	(6 pins, natural)	centre console		05-3
X13057	(2 pins, black)	underside of rear lid (Touring)	38-1	
X13079	(3 pins, yellow)	behind rear seat bench		01-1
X13125	(3 pins, yellow)	Left vent window motor		01-1



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X13126	(3 pins, yellow)	Right vent window motor		01-1
X13142	(2 pins, white)	behind rear seat bench (Convertible)	23-2	
X13143	(3 pins, black)	behind rear seat bench left	41-3	01-1
X13145	(6 pins, black)	in convertible soft top compartment (Convertible)	34-3	04-2
X13146	(2 pins, black)	in rear LH side of glove compartment	34-1	
X13152	(4 pins, black)	in rear LH side of glove compartment	34-1	07-6
X13156	(10 pins, black)	in bottom of LH C-post behind side panel	04-3	09-4
X13157	(6 pins, black)	in bottom of LH C-post behind side panel	04-3	05-3
X13159	(26 pins, black)	in bottom of LH C-post behind side panel	04-3	00-2
X13172	(2 pins, black)	under centre of car		
X13176	(6 pins, natural)	in windscreen header		07-1
X13226	(2 pins, black)	behind rear seat bench		
X13227	(2 pins, black)	behind rear seat bench		
X13230	Ground	behind RH footwell trim top (Convertible)	07-3	
X13242	(3 pins, black)	RH B-pillar		01-1
X13242	(3 pins, yellow)	in front RH side of glove compartment (Touring)	37-1	01-1
X13243	(3 pins, black)	LH B-pillar		01-1
X13243	(3 pins, yellow)	in rear LH side of glove compartment (Touring)	36-2	01-1
X13252	(15 pins, black)	behind glove compartment (glove box removed)	02-3	00-3
X13253	(26 pins, yellow)	behind glove compartment (glove box removed)	02-3	00-2
X13254	(26 pins, green)	behind glove compartment (glove box removed)	02-3	00-2
X13255	(12 pins, natural)	behind glove compartment (glove box removed)	02-3	01-3



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X13256	(2 pins, black)	left of LH rear seat behind trim	23-1	
X13257	(2 pins, black)	right of RH rear seat behind trim	23-1	
X13258	(15 pins, white)	behind glove compartment (glove box removed)	26-2	00-3
X13262	(6 pins, blue)	centre console		05-3
X13263	(2 pins, black)	behind glove compartment	26-1	
X13268	(3 pins, black)	underside of rear lid (Touring)	38-1	
X13275	(6 pins, natural)	in head lining		08-4
X13283	(9 pins, black)	under LH side of dash		03-6
X18013	(26 pins, —)	in rear of luggage compartment		
X18020	(2 pins, black)	in LH side of rear bumper Rear left converter	43-2	
X18021	(2 pins, black)	in LH side of rear bumper Rear centre left converter	43-2	
X18022	(2 pins, black)	in RH side of rear bumper, Rear centre right converter		
X18023	(2 pins, black)	in RH side of rear bumper, Rear right converter		
X18049	(2 pins, grey)	in bottom of LH rear door behind trim		
X18050	(2 pins, white)	RH front door behind trim		
X18051	(2 pins, white)	in bottom of RH rear door behind trim		
X18052	(2 pins, grey)	in bottom of RH rear door behind trim		
X18067	(3 pins, natural)	under cover on transverse link	40-1	08-6
X18080	(1 pin, natural)	in luggage compartment		
X18084	(2 pins, white)	LH front door behind trim		
X18126	(17 pins, black)	centre console behind radio		02-3
X18135	(4 pins, —)	under LH front seat		





## Component location chart

Comp.	Description	Location	7100.0	8500.0
X18180	(3 pins, white)	in rear RH side of luggage compartment	04-1	02-1
X18184	(1 pin, natural)	Right rear low range speaker (Touring)		
X18189	(1 pin, natural)	Left rear low range speaker (Touring)		
X18196	(10 pins, black)	driver's door Left front high range speaker		02-4
X18198	(10 pins, black)	passenger's door Right front high range speaker		02-4
X1826x	(2 pins, black)	in LH rear door		
X1826y	(2 pins, black)	in RH rear door		
X18279	(3 pins, black)	in bottom of LH front door behind trim		
X18280	(3 pins, black)	in bottom of RH front door behind trim		
X18295	(2 pins, yellow)	in bottom of RH B-post behind trim panel		
X18296	(2 pins, yellow)	LH front door	32-2	
X18313	(6 pins, —)	driver's door		
X18314	(6 pins, —)	passenger's door		
X18336	(3 pins, black)	right of glove compartment (glove box removed)	26-1	01-1
X18520	(10 pins, —)	centre console Radio		
X18521	(10 pins, —)	RH side of luggage compartment CD changer		
X18723	Ground	under LH side of dash		
X18797	(1 pin, natural)	in rear RH side of luggage compartment		
X18798	(1 pin, natural)	in rear RH side of luggage compartment		
X18997	(4 pins, black)	under LH side of dash		03-6
X18998	(1 pin, natural)	in LH rear door		
X18999	(1 pin, natural)	in RH rear door		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
X19000	(1 pin, —) . . . . .	in LH rear door		
X19001	(1 pin, —) . . . . .	in RH rear door		
X19562	(4 pins, natural) . . . . .	under front RH bumper . . . . .		11-6
X19564	(2 pins, black) . . . . .	in RH side of luggage compartment, behind trim		
X62001	(4 pins, black) . . . . .	centre top of engine . . . . .		07-2
X62101	(4 pins, black) . . . . .	centre top of engine . . . . .	14-1	07-2
X62101	(4 pins, black) . . . . .	on transmission . . . . .	39-3	07-2
X62101	(4 pins, black) . . . . .	on transmission . . . . .	39-2	07-2
X62201	(4 pins, black) . . . . .	centre top of engine . . . . .	14-1	07-2
X62201	(4 pins, black) . . . . .	on transmission . . . . .	39-2	07-2
X90260	(3 pins, black) . . . . .	underside of steering column . . . . .	03-2	01-1
X91009	(2 pins, black) . . . . .	bottom of RH front seat		
Y1 . . . .	ABS hydraulic unit . . . . .	rear LH side of engine compartment behind LH spring strut dome . . . . .	16-2	
Y1z . . .	Hydraulic unit . . . . .	front RH side of engine compartment		
Y2 . . . .	Solenoid clutch . . . . .	front of engine		
Y4 . . . .	Water valves . . . . .	rear LH side of engine compartment . . . . .	16-2	
Y5 . . . .	Left outside mirror . . . . .	in top of LH front door		
Y6 . . . .	Right outside mirror . . . . .	in top of RH front door		
Y19 . .	Shift lock selector lever lock . . . . .	centre console on RH side of gear shift lever		
Y85 . .	Crash actuator, left . . . . .	behind rear seat bench (Convertible) . . . . .	04-2	
Y86 . .	Crash actuator, right . . . . .	behind rear seat bench (Convertible) . . . . .	04-2	
Y198 .	Exhaust-gas flap valve . . . . .	under centre of car		



## Component location chart

Comp.	Description	Location	7100.0	8500.0
Y2008	Needle motion sensor	RH side of engine (Diesel)	43-1	
Y2009	Electric cutout	front of engine compartment (Diesel)	42-3	
Y2010	Injection quantity control unit	front of engine compartment (Diesel)	42-2	
Y2121	Transmission shift unit	on transmission		
Y2153	Gear shift unit	on transmission		
Y5210	VANOS valve 1 and 2 (inlet)	front of engine compartment		
Y5220	VANOS valve 1 and 2 (exhaust)	front of engine compartment		
Y6101	Fuel injector 1	centre top of engine	12-3	
Y6102	Fuel injector 2	centre top of engine	12-3	
Y6103	Fuel injector 3	centre top of engine	12-3	
Y6104	Fuel injector 4	centre top of engine	12-3	
Y6105	Fuel injector 5	centre top of engine	12-3	
Y6106	Fuel injector 6	centre top of engine	12-3	
Y6120	Charcoal filter valve	front LH side of engine compartment right of LH spring strut dome	15-1	
Y6120	Charcoal filter valve	LH side of engine compartment right of LH spring strut dome	22-2	
Y6130	Idle actuator	LH front of engine below intake manifold	12-2	
Y6130	Idle actuator	rear LH side of engine compartment (M3)		
Y6131	Changeover valve I	rear LH side of engine compartment		
Y6133	Air pump	front of engine compartment		
Y6164	Valve for secondary air pump	in engine compartment		
Y6275	VANOS valve 1	LH front of engine	11-1	
Y8505	Gear-shift unit	on transmission		



## Component location chart

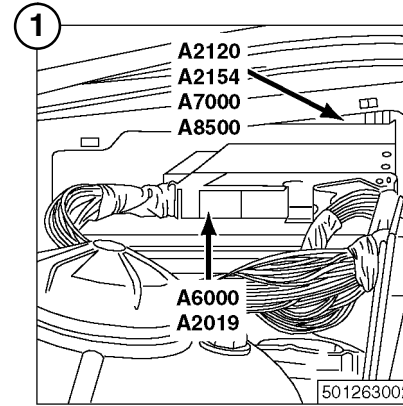
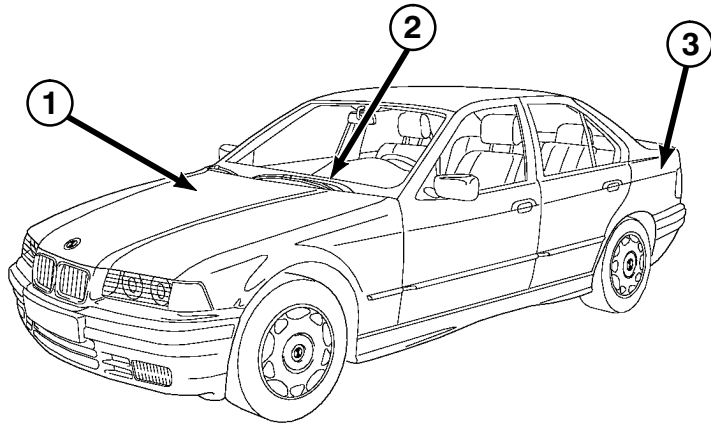
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Comp.	Description	Location	7100.0	8500.0
Y8505y	Gearshift unit .....	on transmission		
Y8516	Speed sensor EGS .....	on LH side of transmission .....	39-2	
Y8551	Transmission switch .....	on transmission		

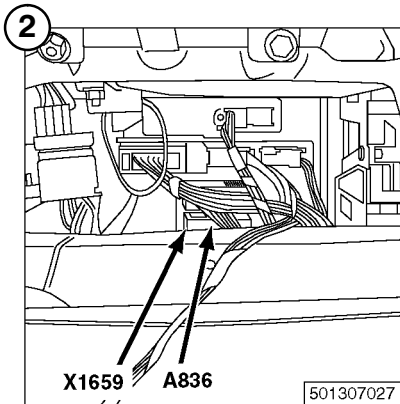


# 7100.0 Component location views

## Location of control units



- A2019 DDE2 control unit
- A6000 DME control unit
- A2120 EGS control unit
- A7000 EGS control unit
- A2154 EGS control unit
- A8500 EGS control unit

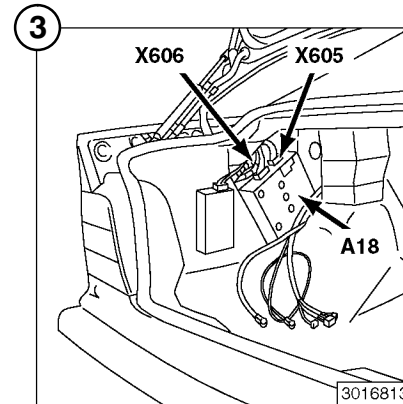


- A836 Electronic immobiliser control unit (EWS II)

X1659

X1659 A836

501307027



- A18 HiFi amplifier

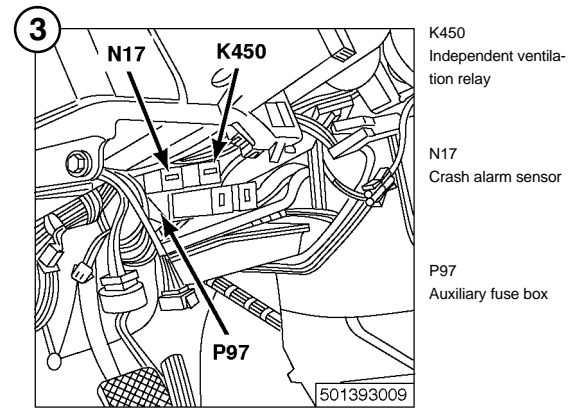
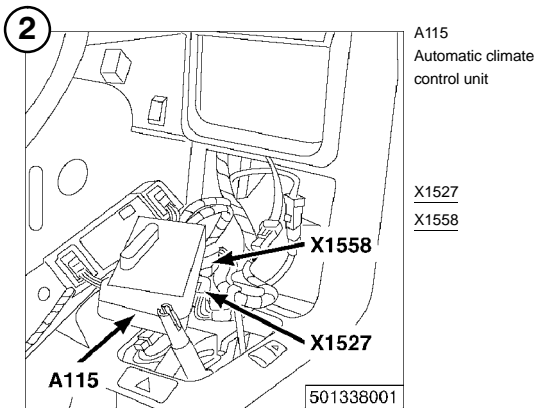
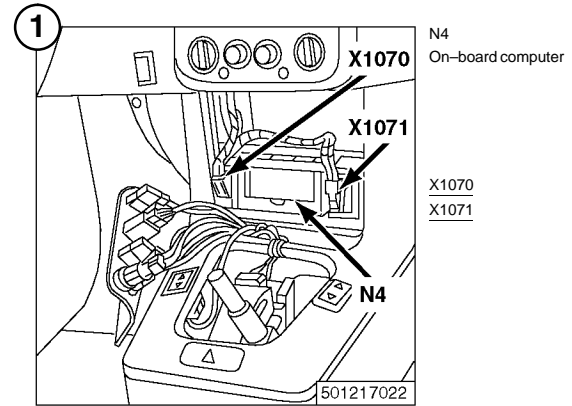
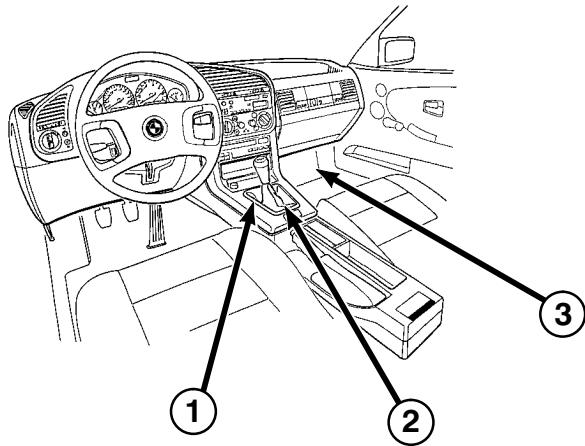
X605  
X606

3016813



## Component location views

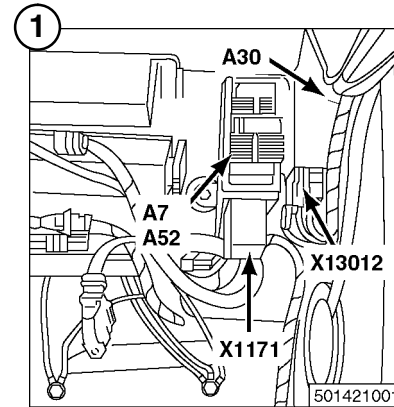
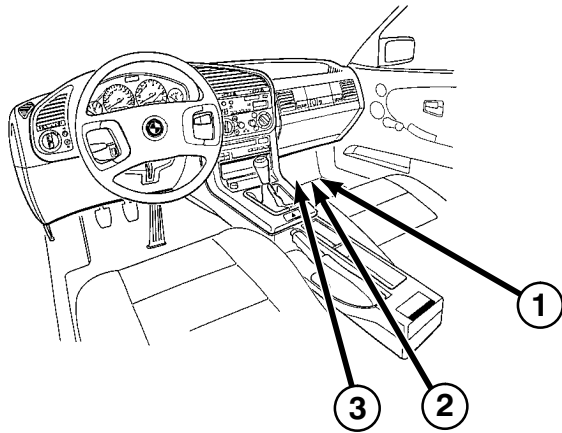
### Location of control units





# Component location views

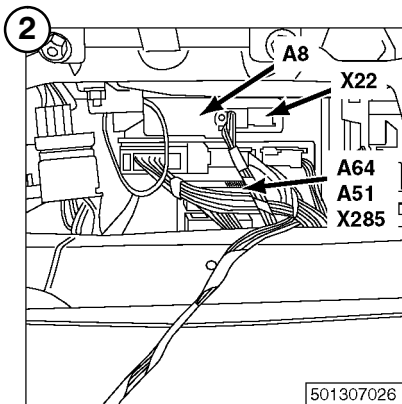
## Location of control units



A7 ABS control unit  
X1171  
X13012

A30 Central locking module (ZVM)

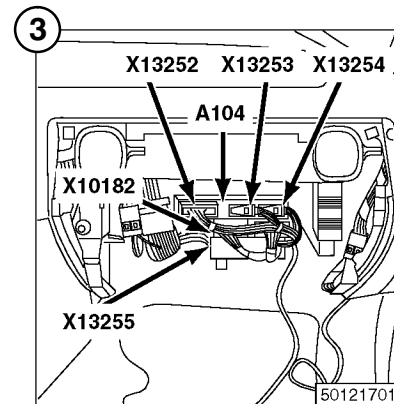
A52 ABS/ASC control unit



A8 Cruise control module  
X22  
X285

A51 Wipe/wash module

A64 Wipe-wash module (Low II)



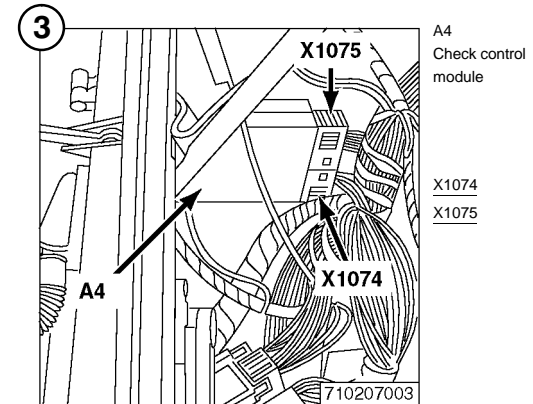
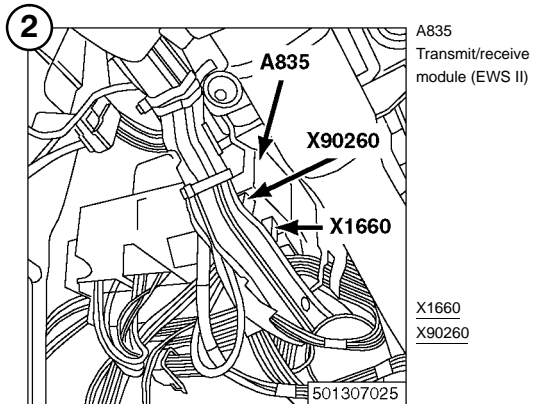
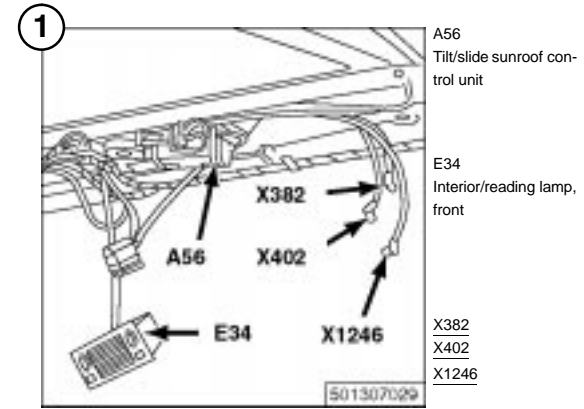
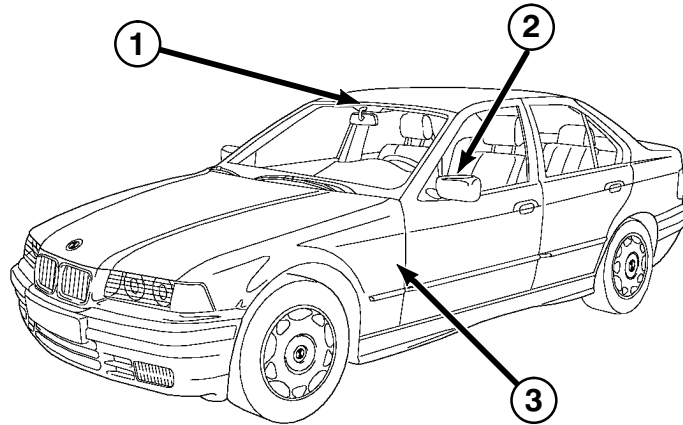
A104 ZKE control unit

X10182  
X13252  
X13253  
X13254  
X13255



## Component location views

### Location of control units

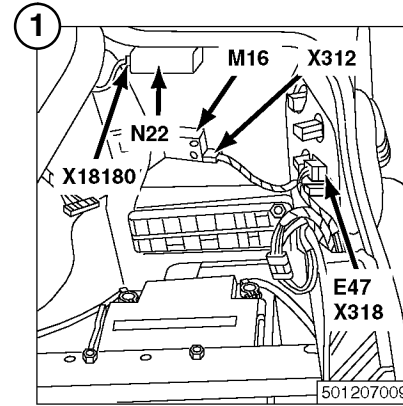
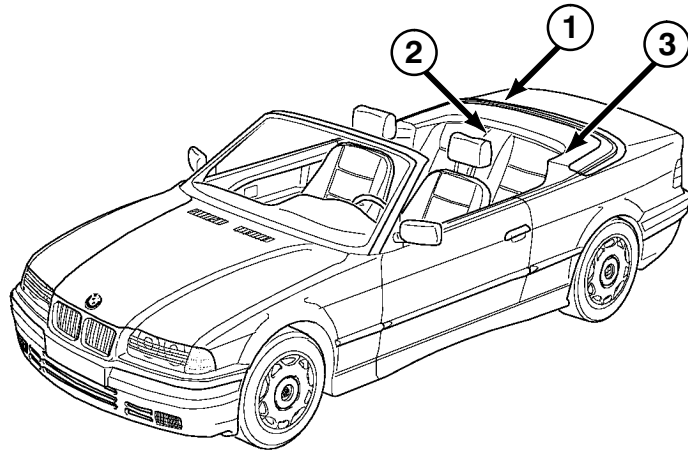






# Component location views

## Location of control units

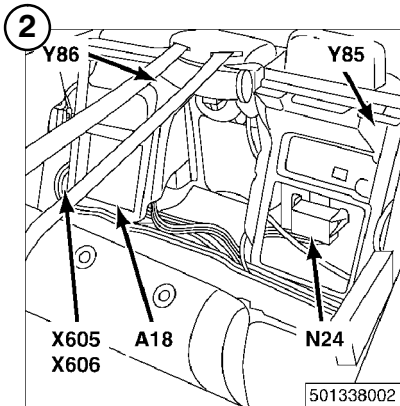


E47  
Right rear lid light  
X312  
X318  
X18180

M16  
ZV drive tank flap

N22  
CD changer

501207009



A18  
Hifi amplifier

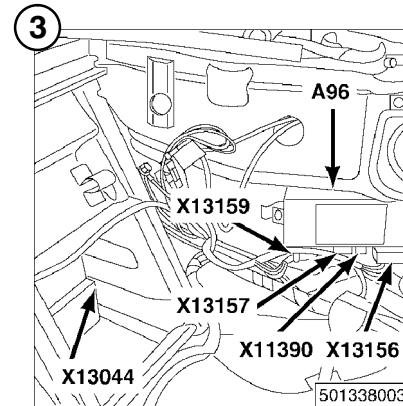
Y86  
Crash actuator, right

N24  
Rollover sensor

X605  
X606

Y85  
Crash actuator, left

501338002



A96  
Convertible soft top module

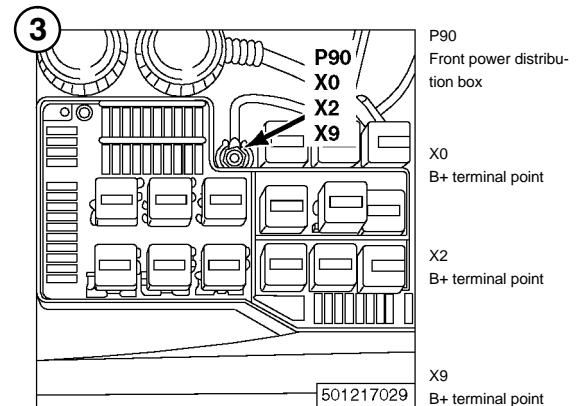
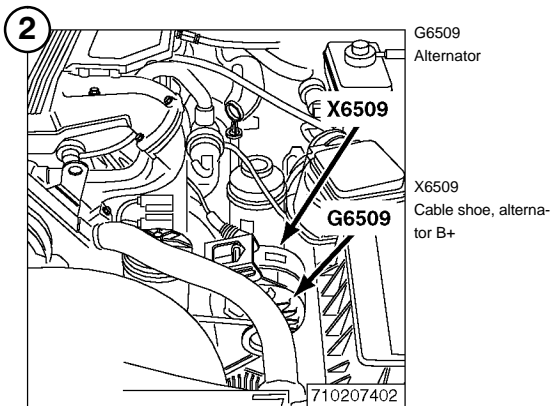
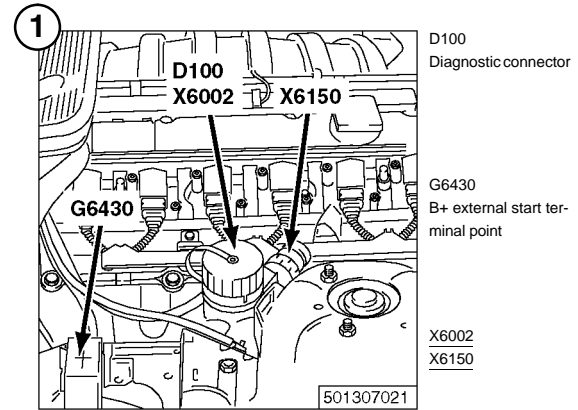
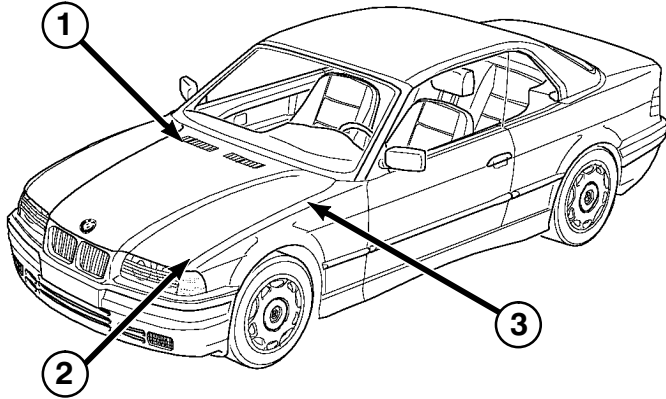
X11390  
X13044  
X13156  
X13157  
X13159

501338003



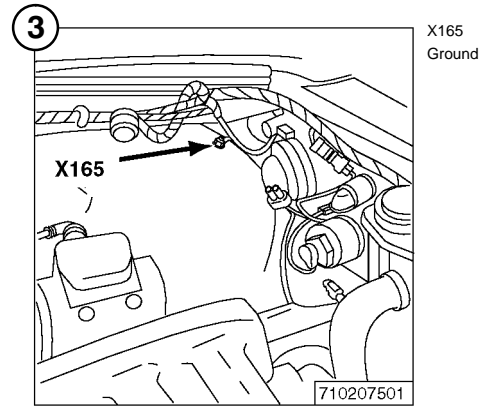
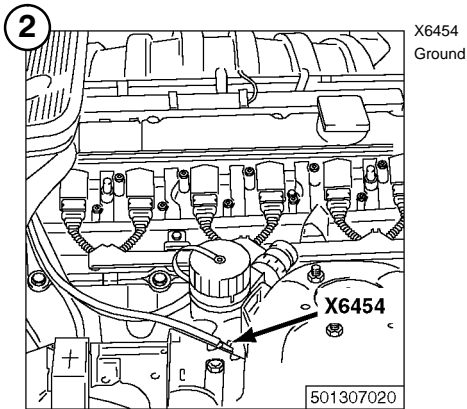
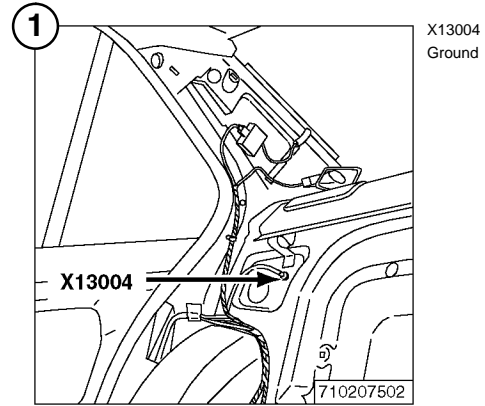
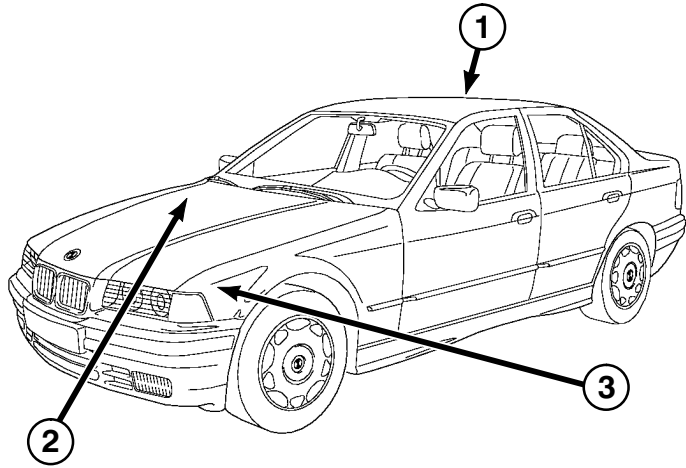
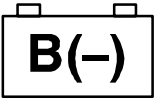
# Component location views

**B(+)**





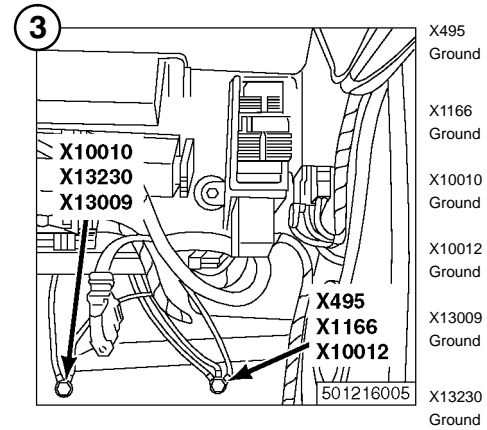
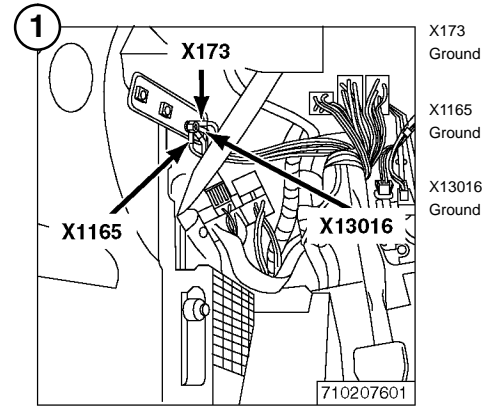
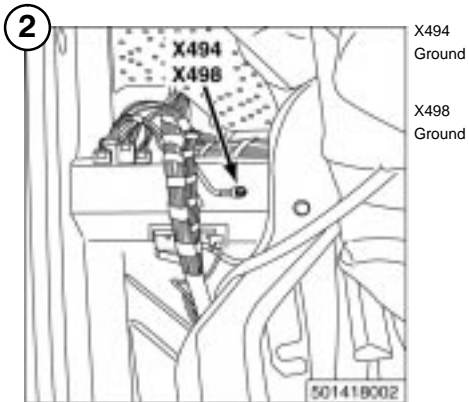
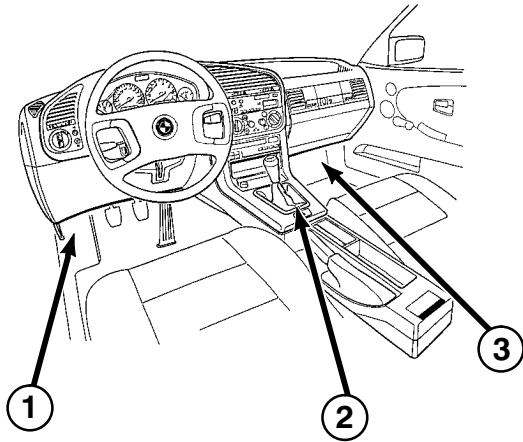
# Component location views





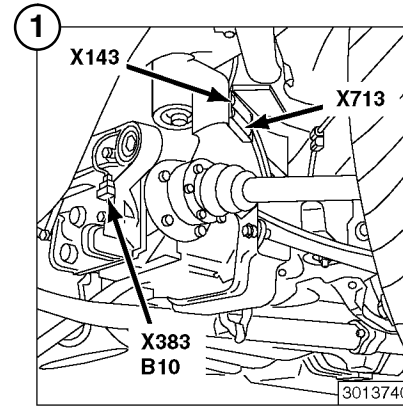
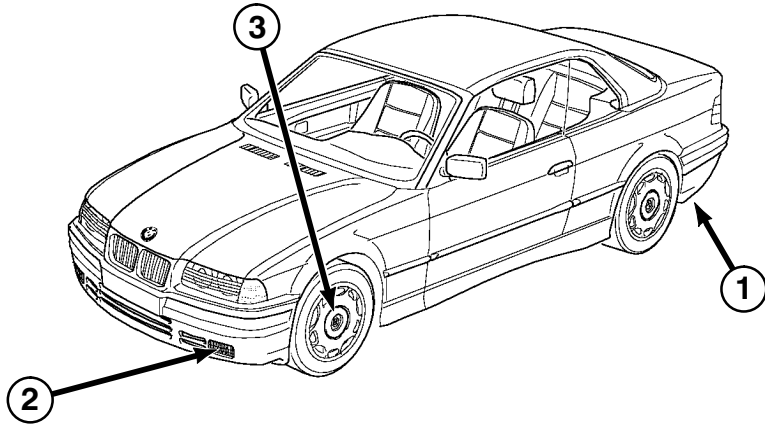
# Component location views

**B(-)**



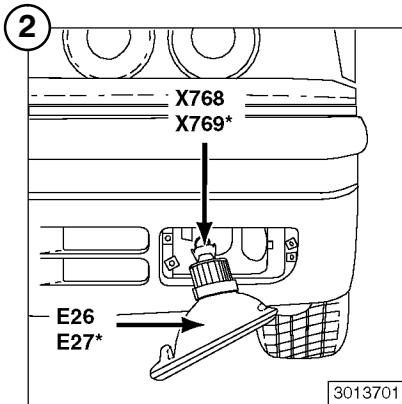


# Component location views



B10  
Speedometer reed  
contact

X143  
X383  
X713

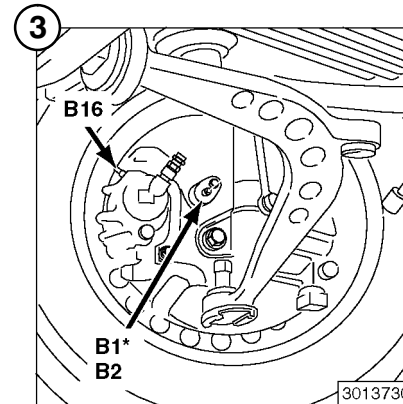


E26  
Left fog light

E27 \*  
Right fog light

X768  
X769 \*

\* RH similar



B1 \*  
Front right ABS sensor

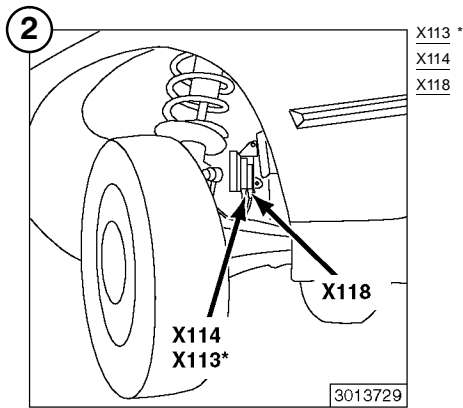
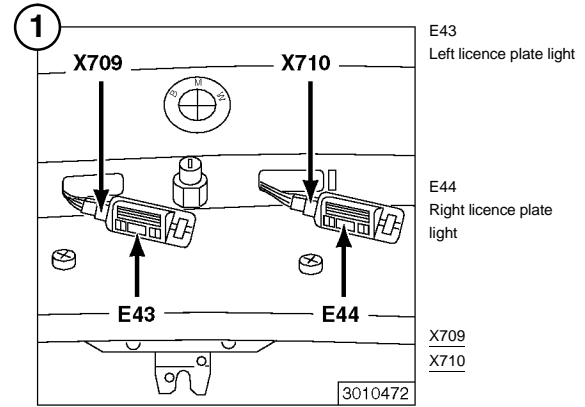
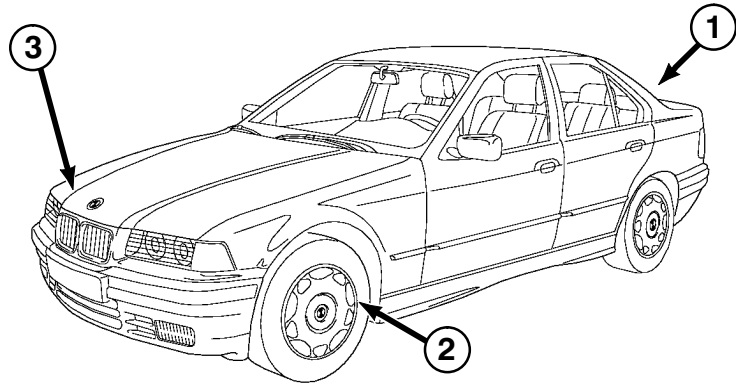
B2  
Front left ABS sensor

B16  
Front left brake pad  
sensor

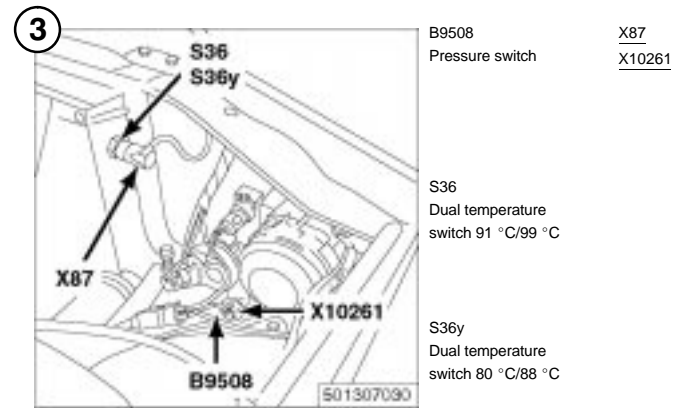
\* RH similar



# Component location views

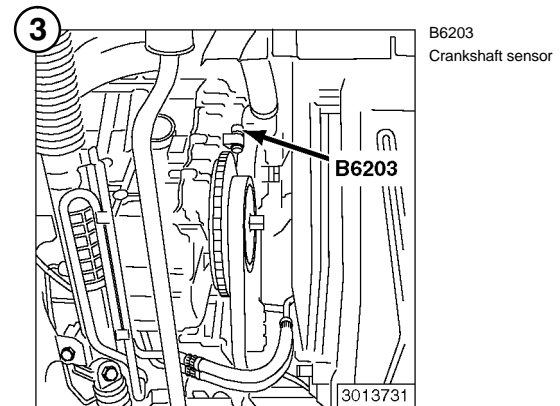
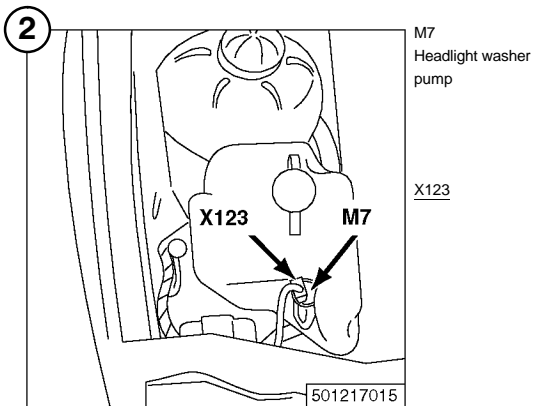
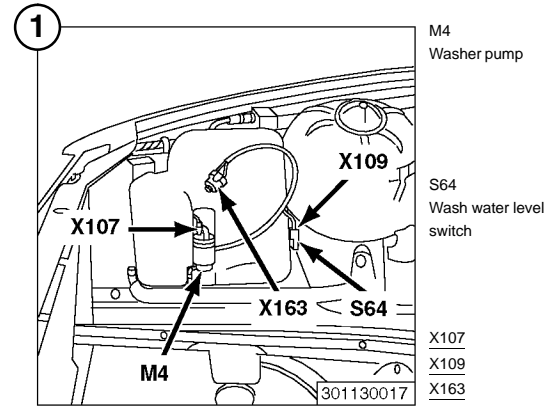
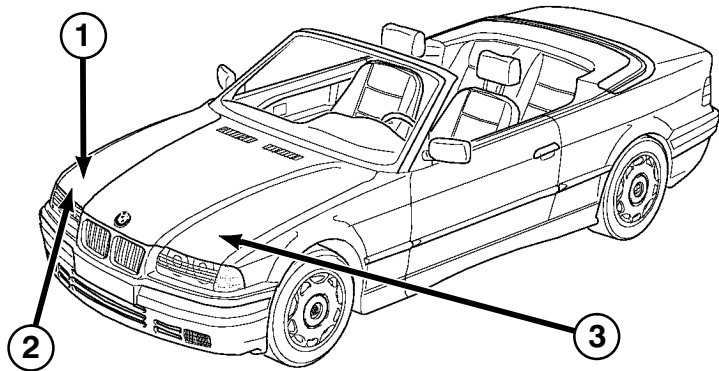


\* RH similar



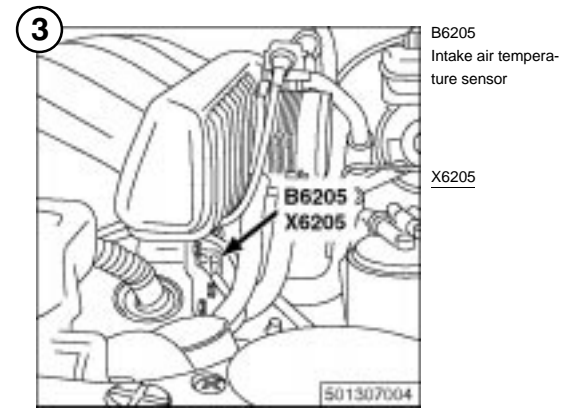
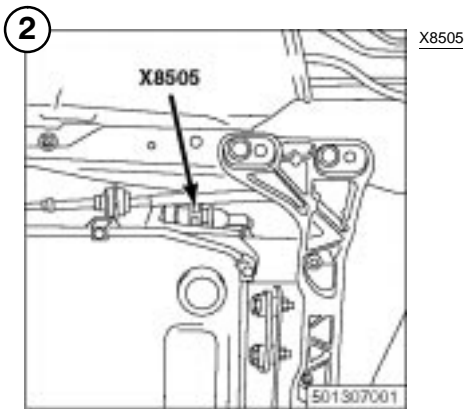
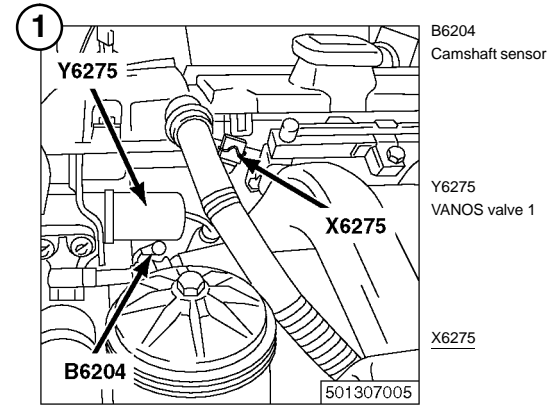
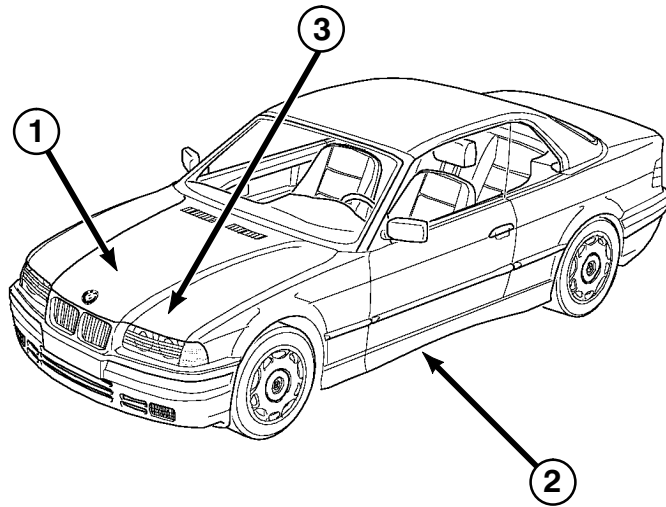


# Component location views





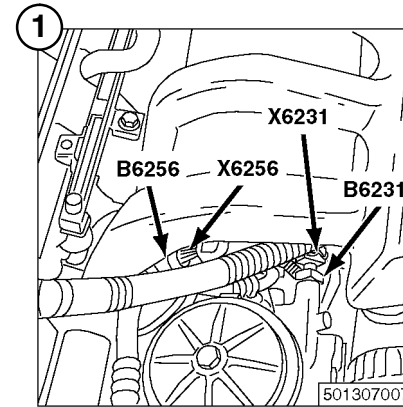
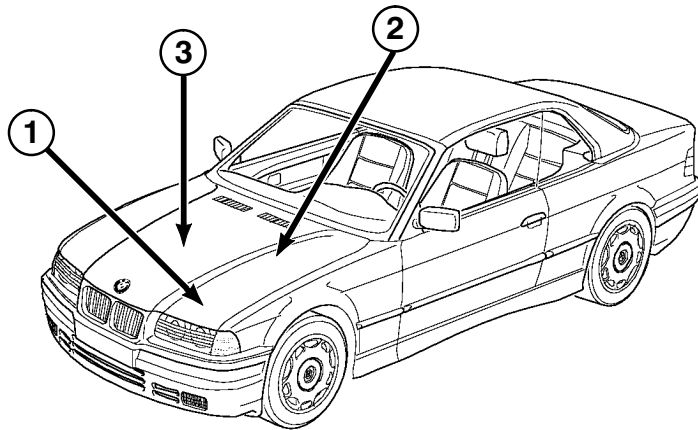
## Component location views



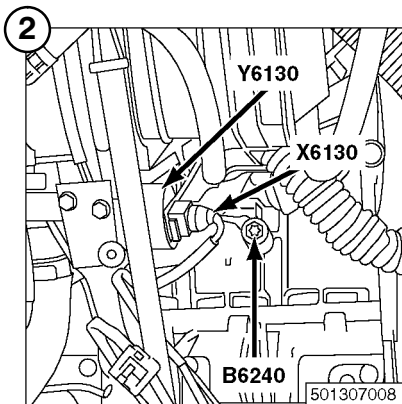




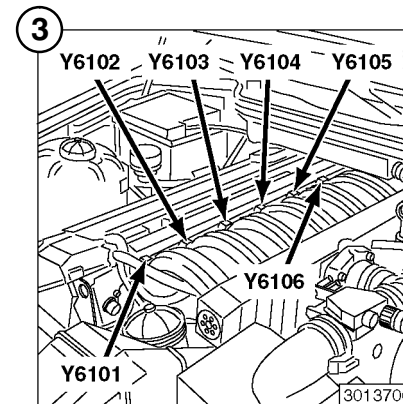
# Component location views



- B6231  
Oil pressure switch
- B6256  
Dual temperature sensor (coolant temperature)
- X6231
- X6256



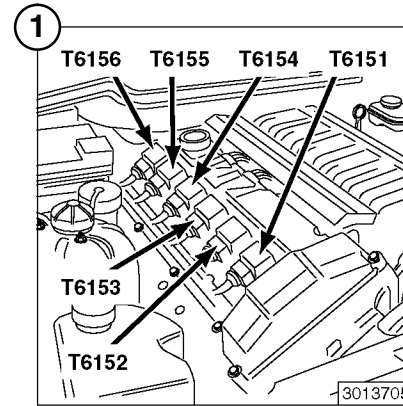
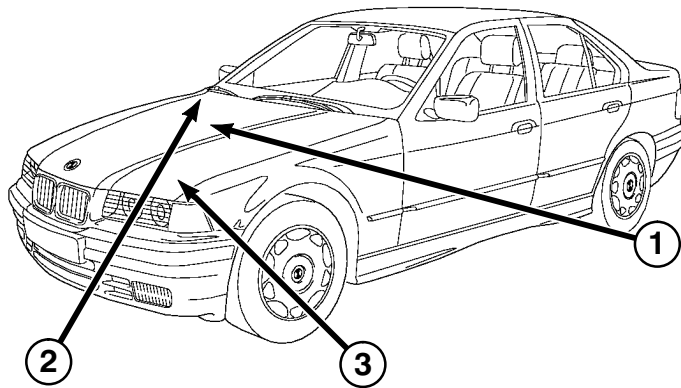
- B6240  
Knock sensor
- Y6130  
Idle actuator
- X6130



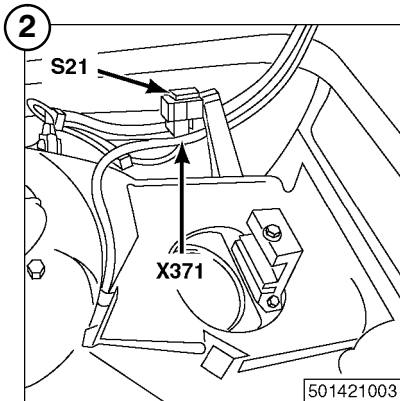
- Y6101  
Fuel injector 1
- Y6102  
Fuel injector 2
- Y6103  
Fuel injector 3
- Y6104  
Fuel injector 4
- Y6105  
Fuel injector 5
- Y6106  
Fuel injector 6



# Component location views

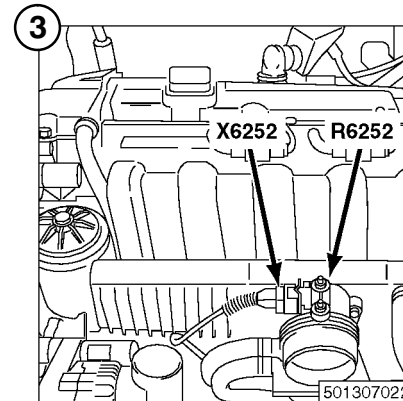


- T6151 Ignition coil 1
- T6152 Ignition coil 2
- T6153 Ignition coil 3
- T6154 Ignition coil 4
- T6155 Ignition coil 5
- T6156 Ignition coil 6



- S21 Front lid microswitch

X371

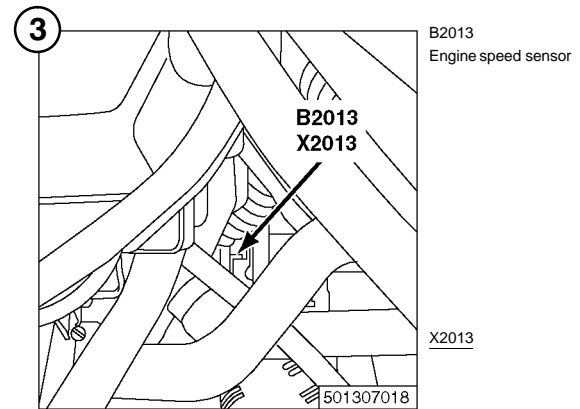
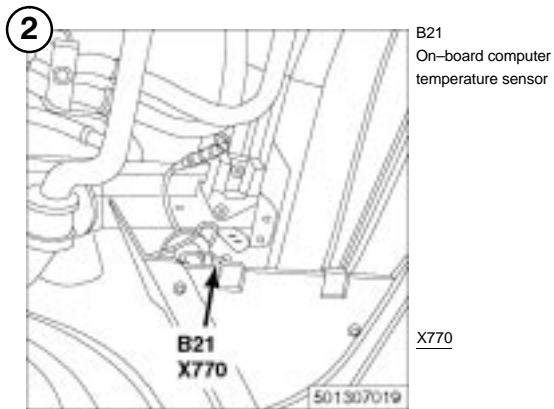
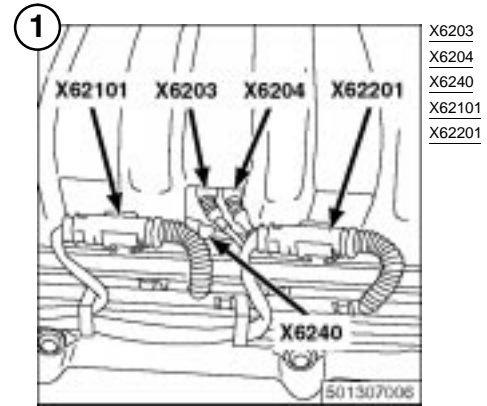
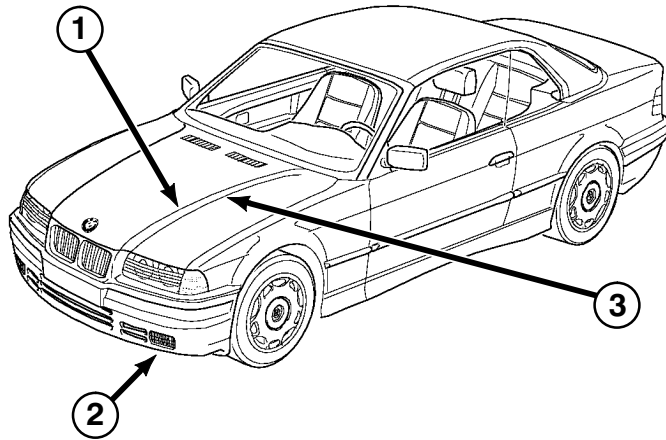


- R6252 Throttle potentiometer

X6252

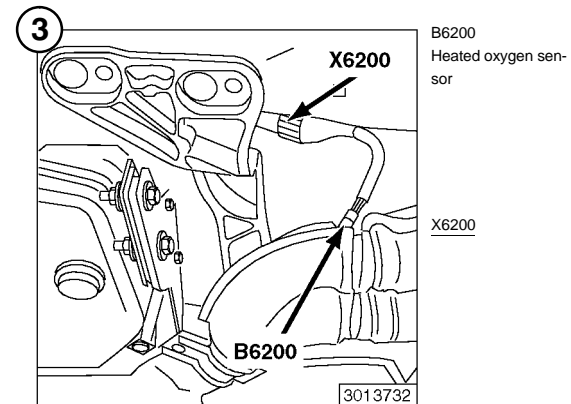
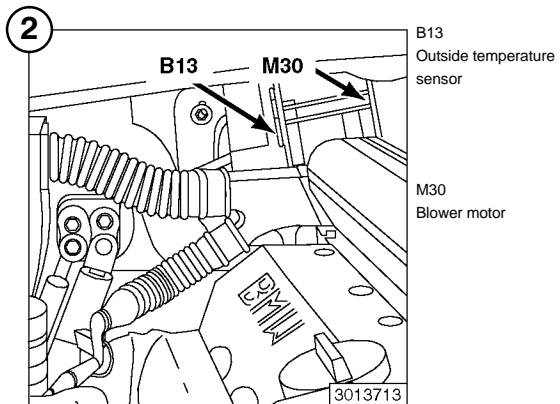
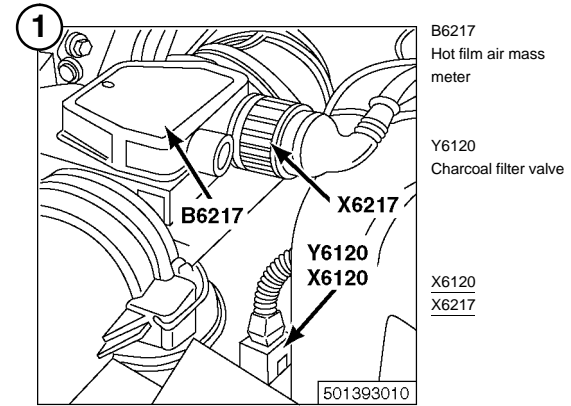
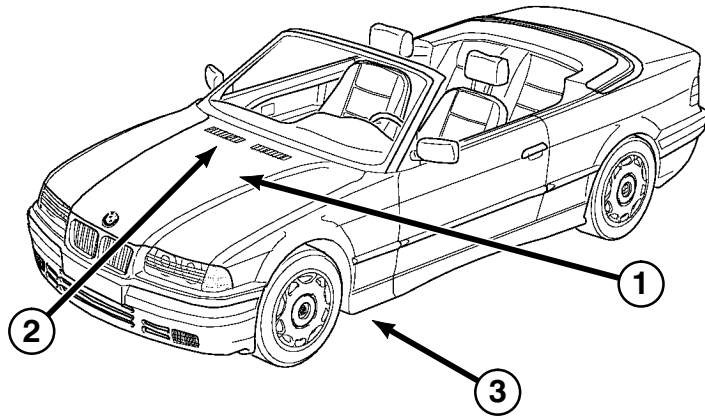


## Component location views



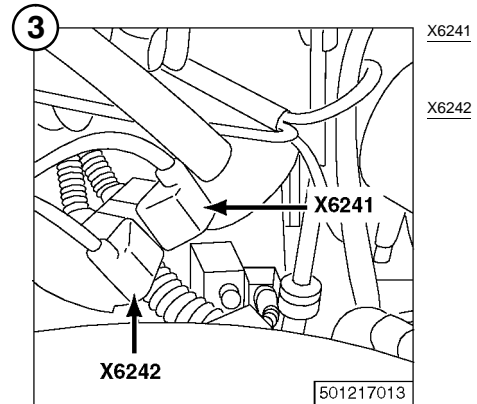
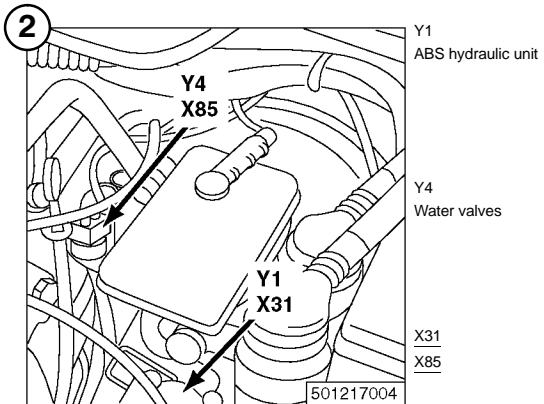
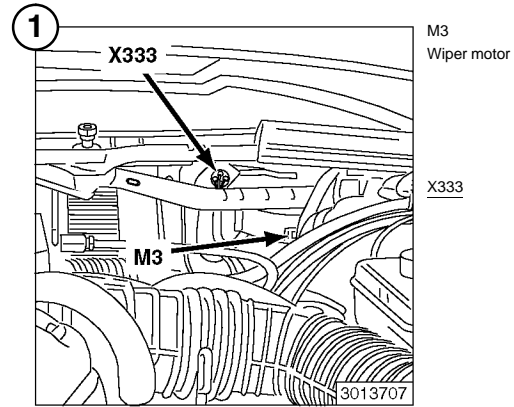
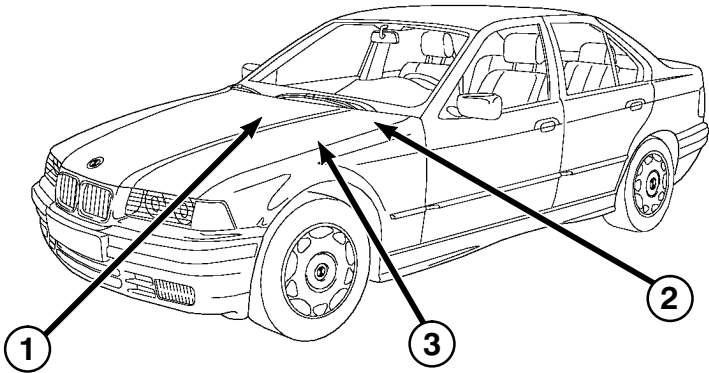


## Component location views



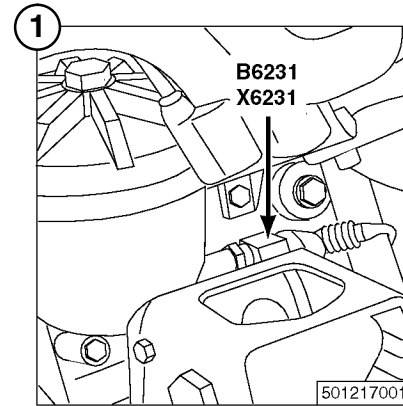
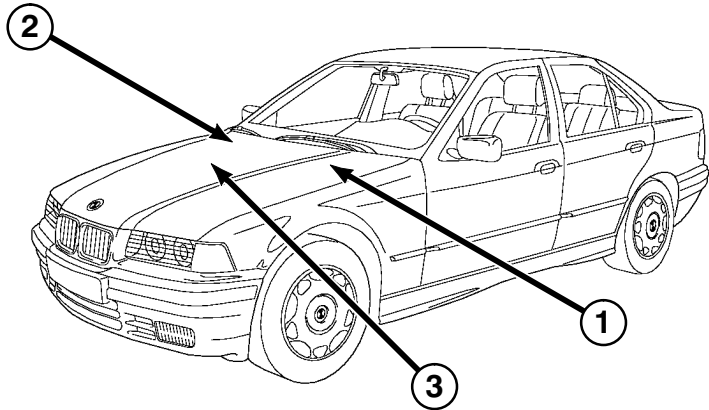


# Component location views





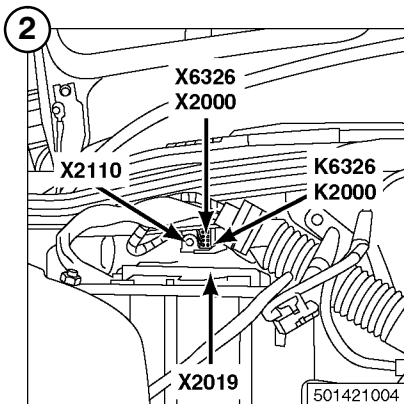
# Component location views



B6231  
Oil pressure switch

X6231

501217001

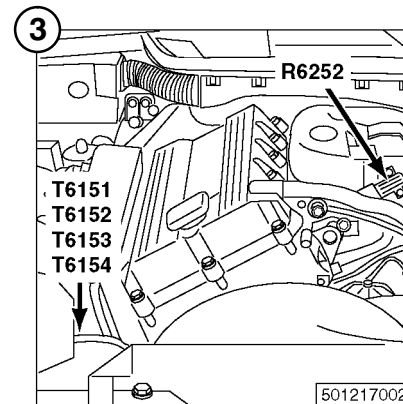


K2000 \*  
Heater plug relay

K6326 \*\*  
Unloader relay, terminal 15

X2000 \*  
X2019 \*  
X2110 \*  
X6326 \*\*

\* Diesel  
\*\* Petrol model



R6252  
Throttle potentiometer

T6151  
Ignition coil 1

T6152  
Ignition coil 2

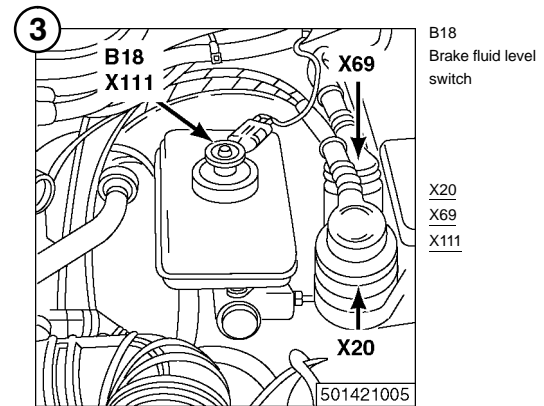
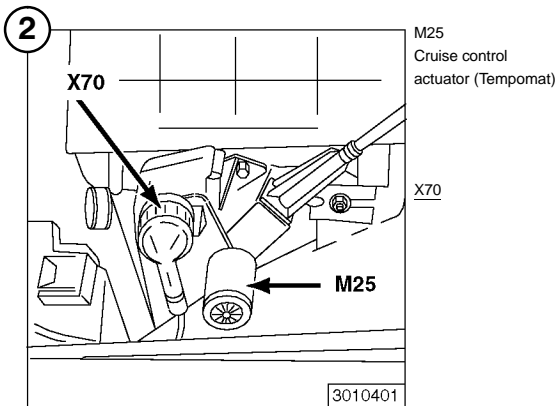
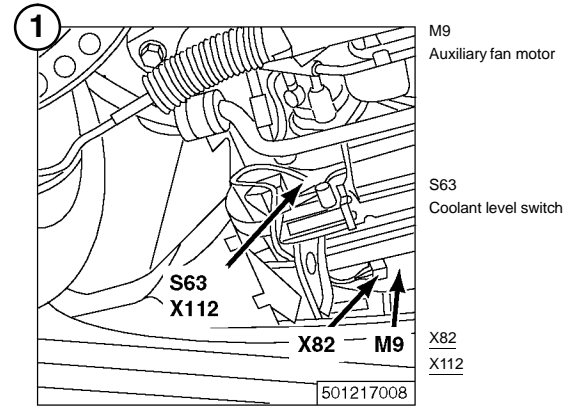
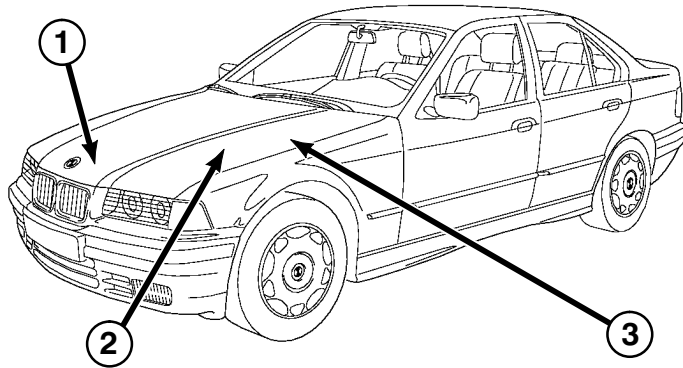
T6153  
Ignition coil 3

T6154  
Ignition coil 4

501217002



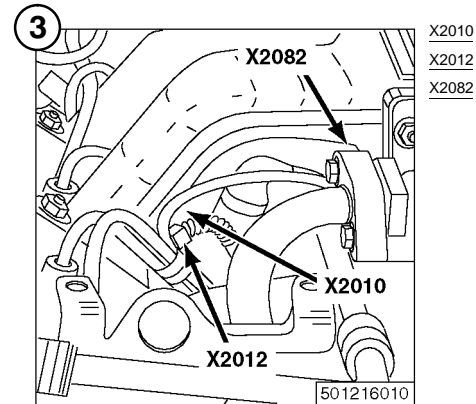
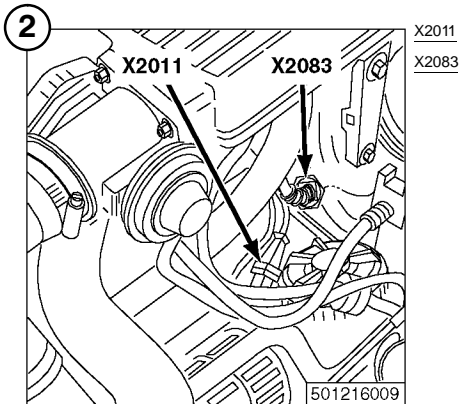
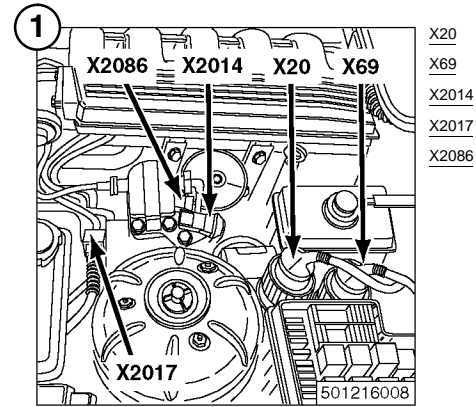
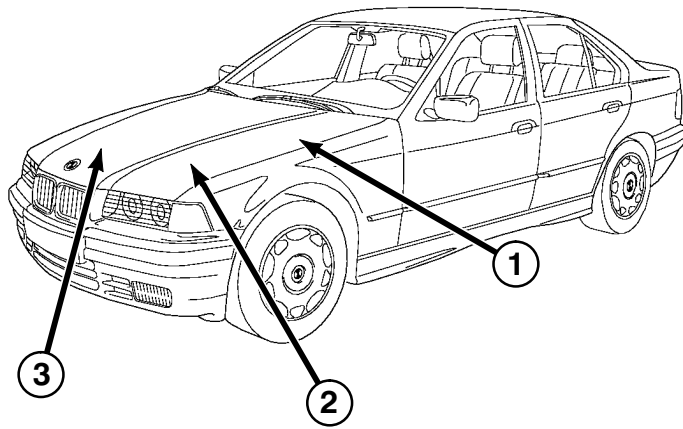
# Component location views





# Component location views

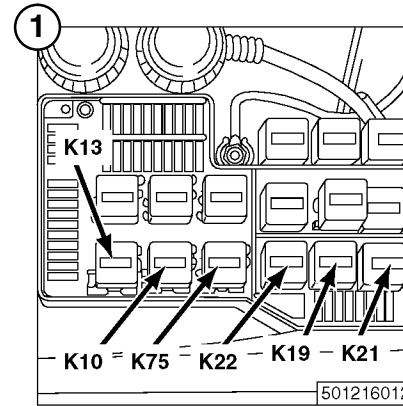
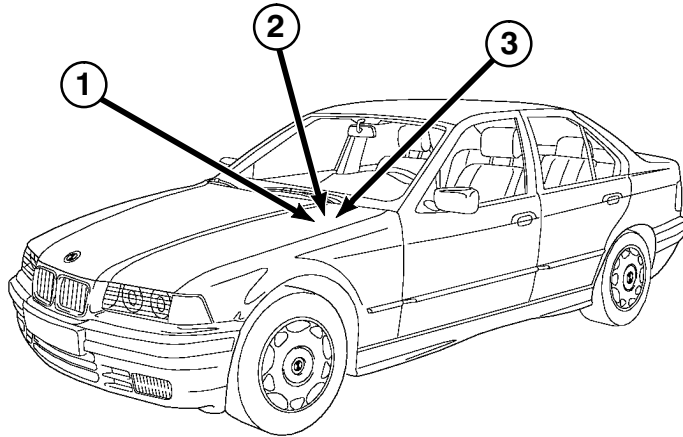
Diesel



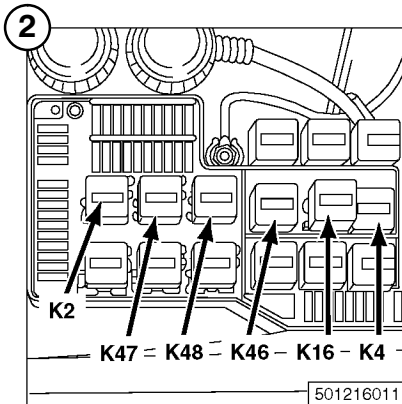




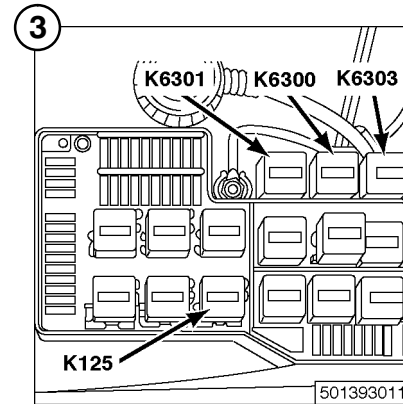
# Component location views



- K10  
ABS overvoltage protection relay
- K13  
Rear defogger relay
- K19  
A/C compressor relay
- K21  
Auxiliary fan stage 1 relay
- K22  
Auxiliary fan stage 2 relay
- K75  
ABS pump motor relay



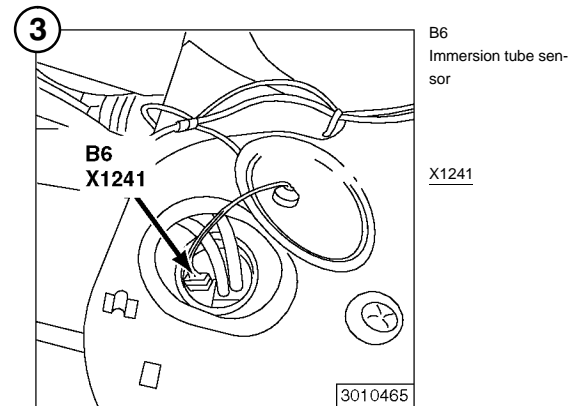
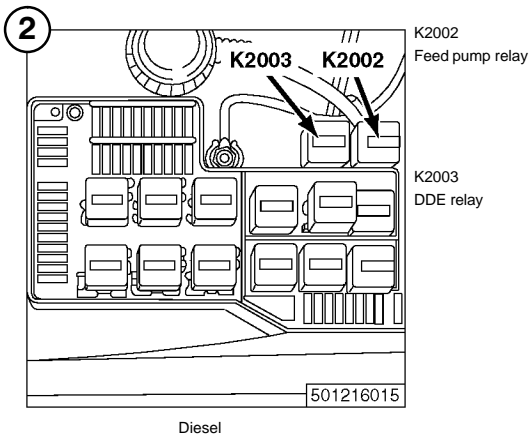
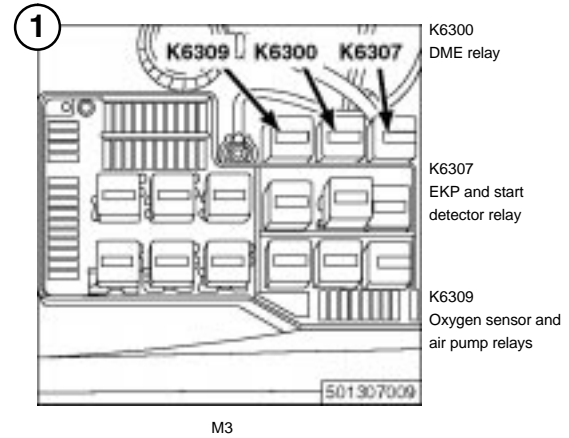
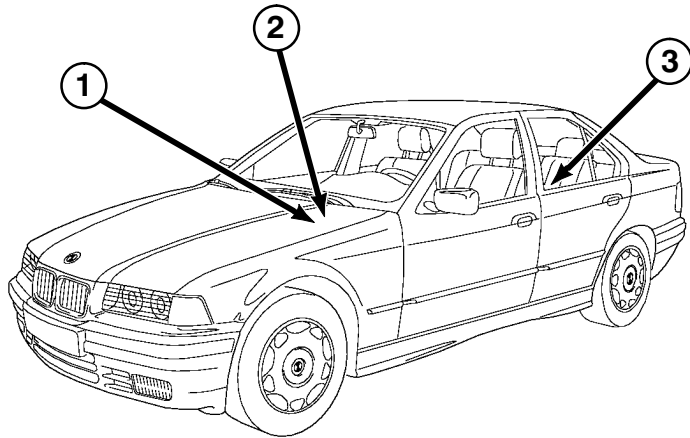
- K2  
Horn relay
- K4  
Heating blower relay
- K16  
Hazard flasher relay
- K46  
High beam relay
- K47  
Fog light relay
- K48  
Headlight relay



- K125  
ABS pump motor relay, timed
- K6301  
Electrical fuel pump relay
- K6300  
DME relay
- K6303  
Oxygen sensor relay

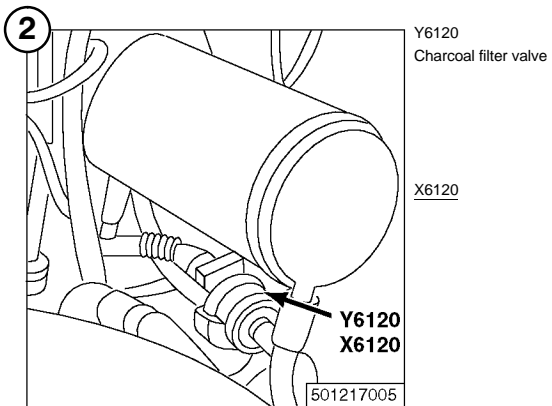
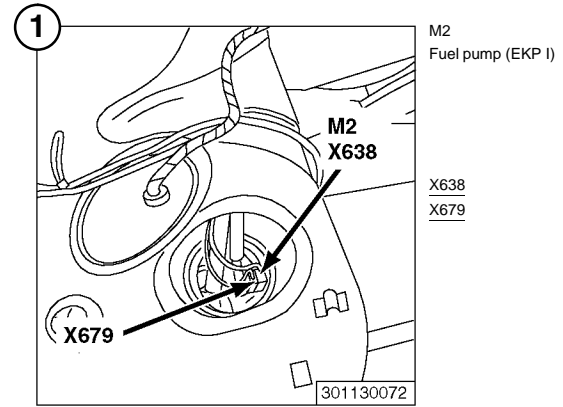
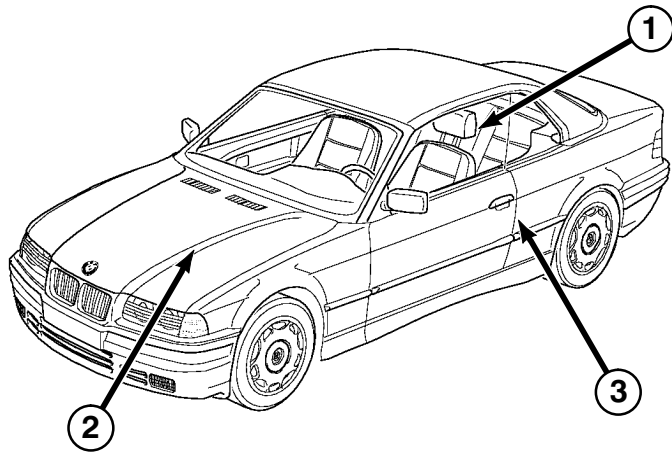


# Component location views

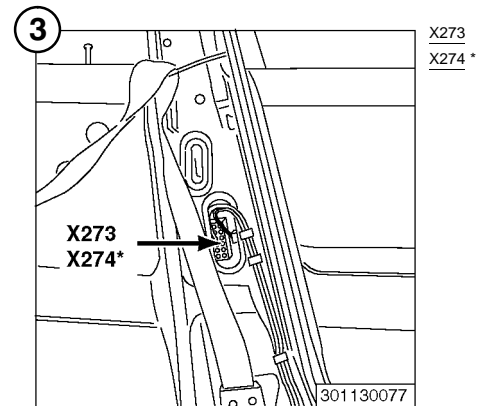




# Component location views



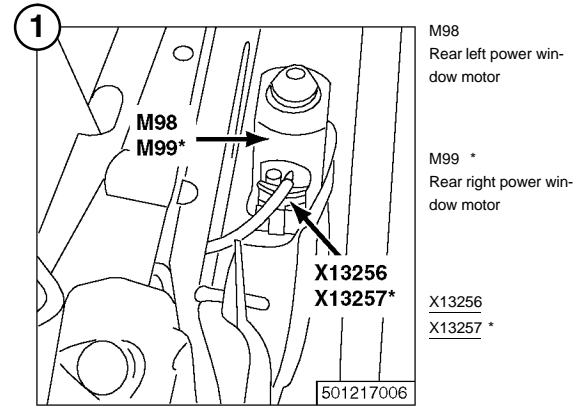
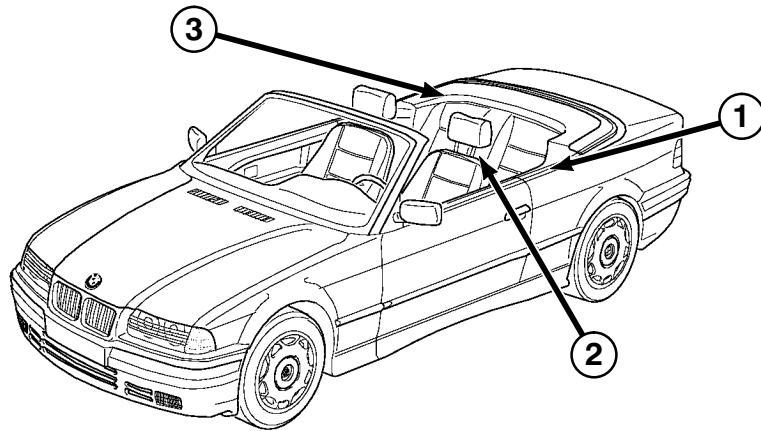
316i, 318i, 318is



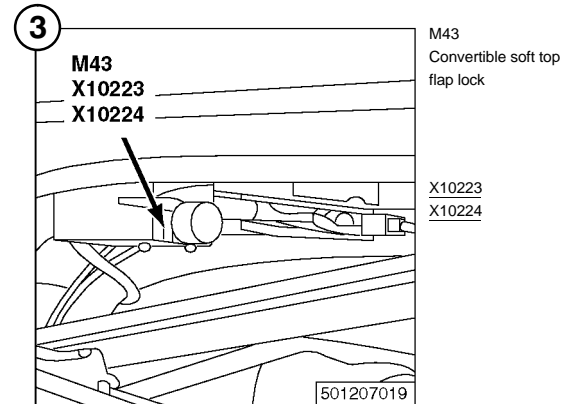
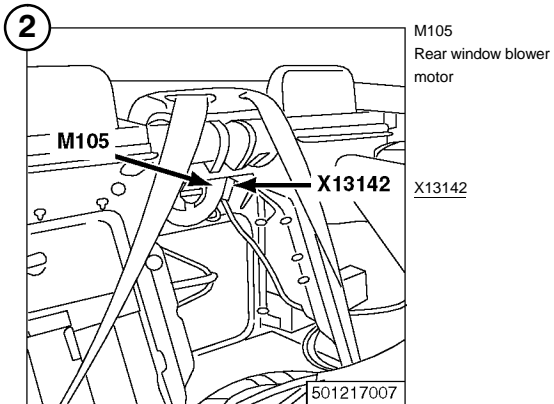
\* RH similar



# Component location views

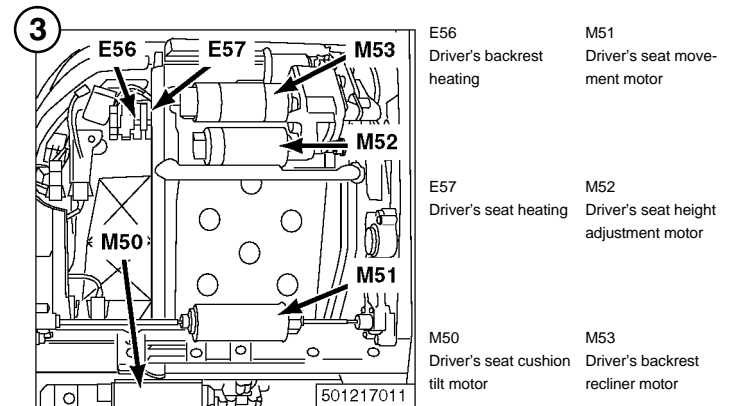
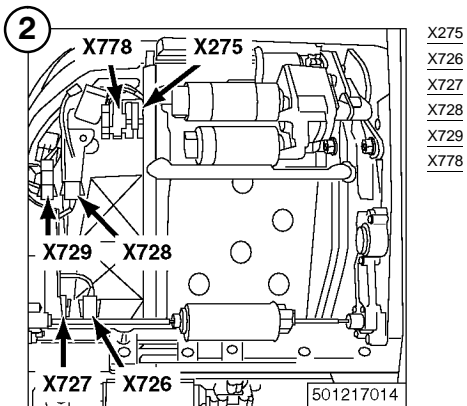
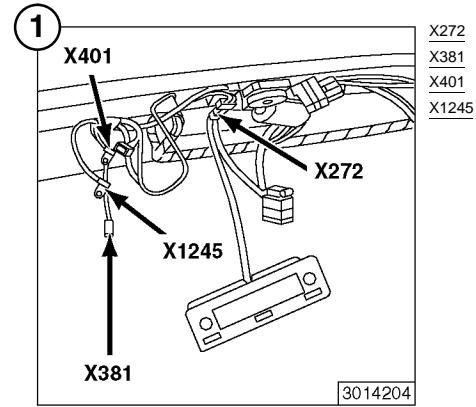
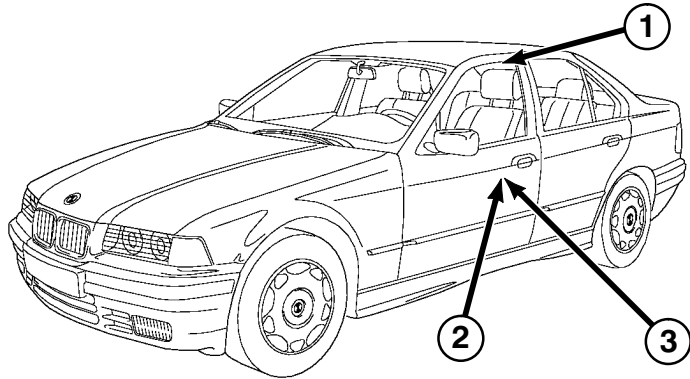


\* RH similar



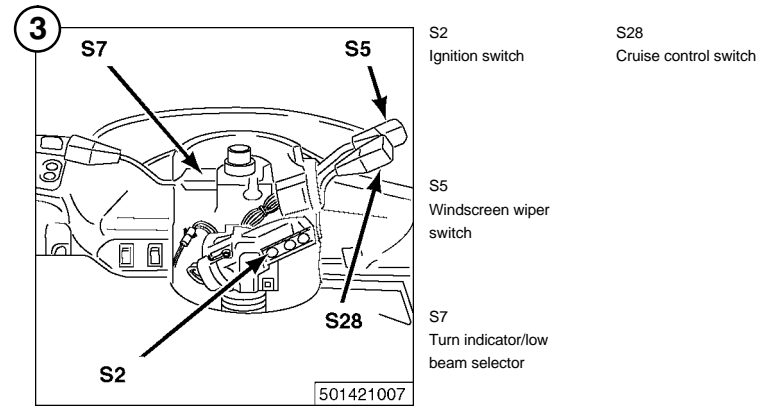
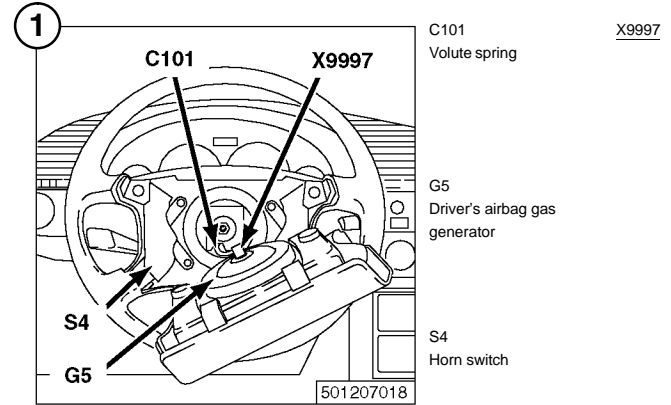
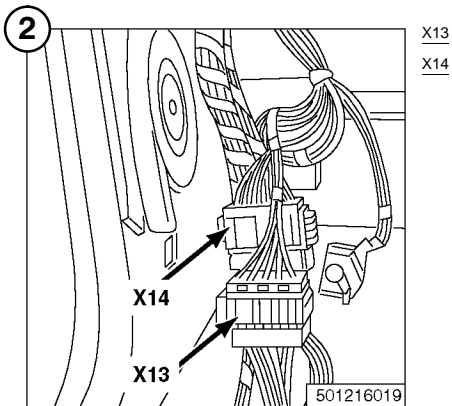
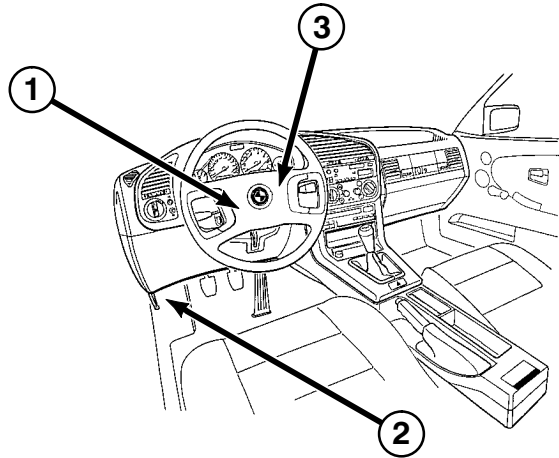


# Component location views



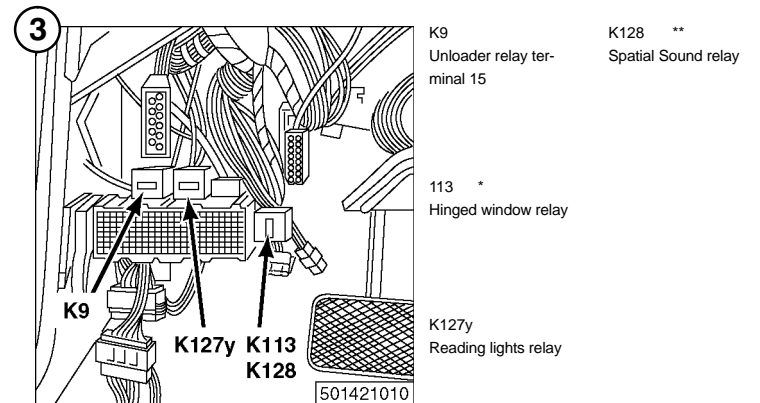
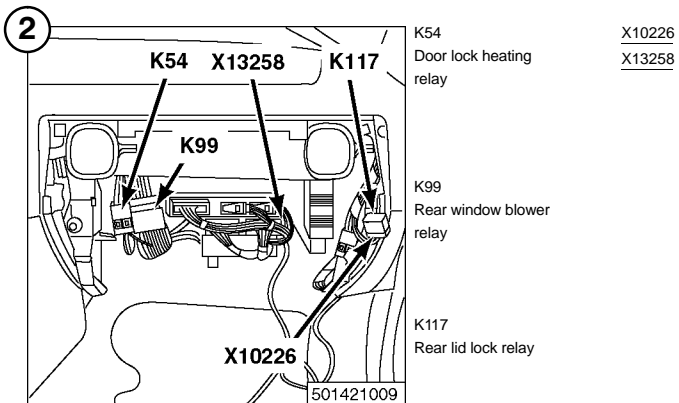
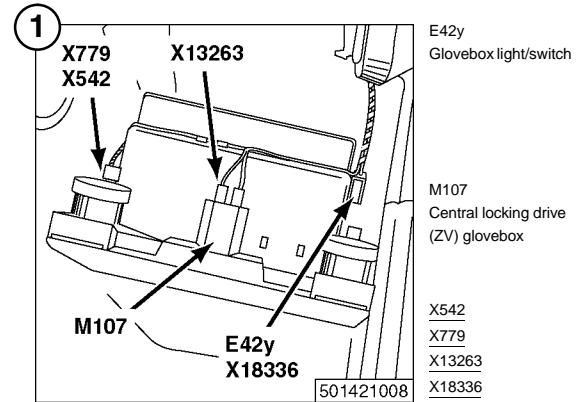
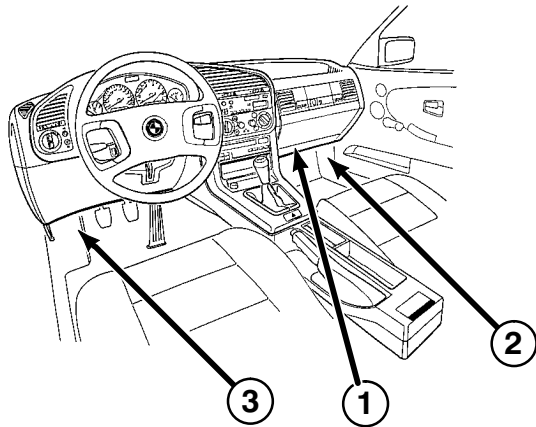


# Component location views





# Component location views

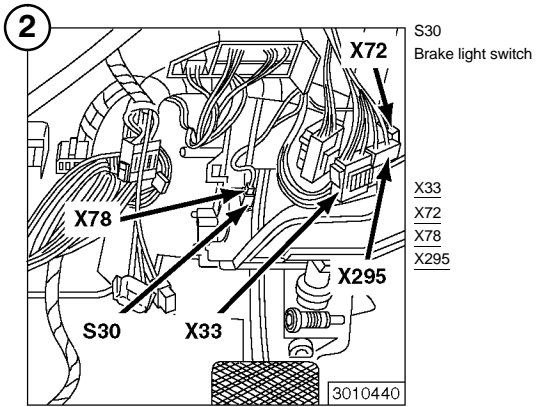
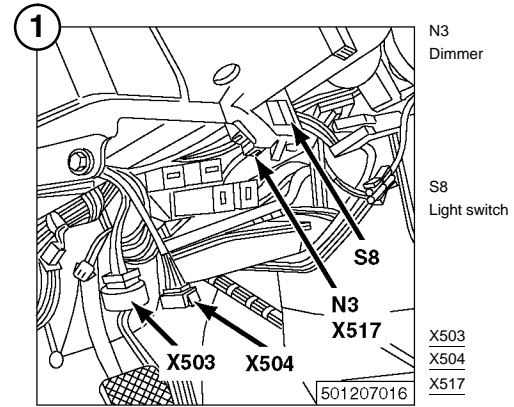
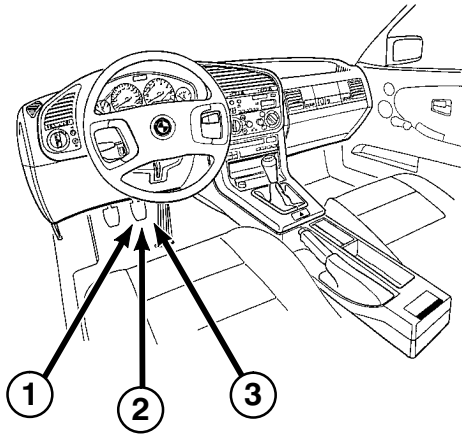


\* Coupé

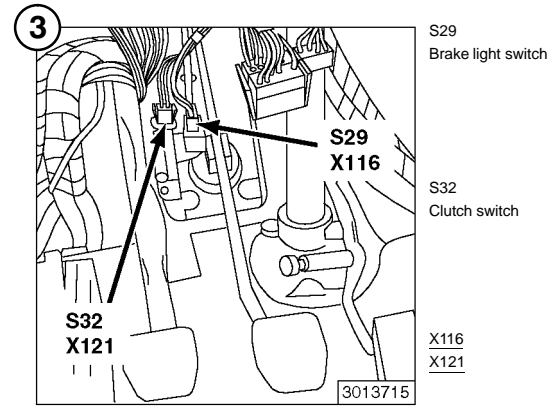
\*\* Convertible



# Component location views



automatic

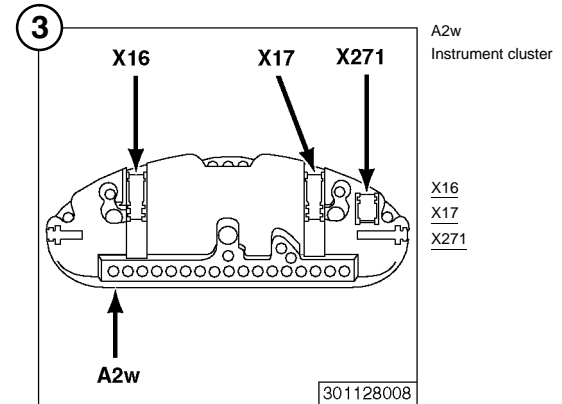
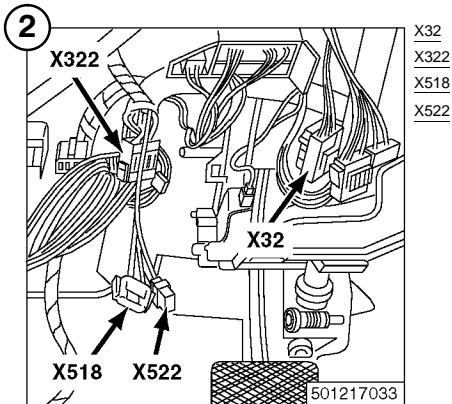
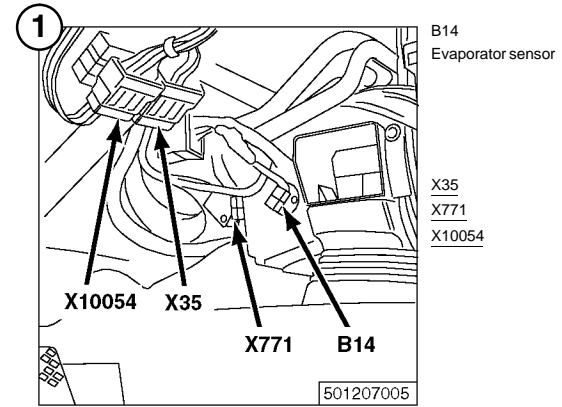
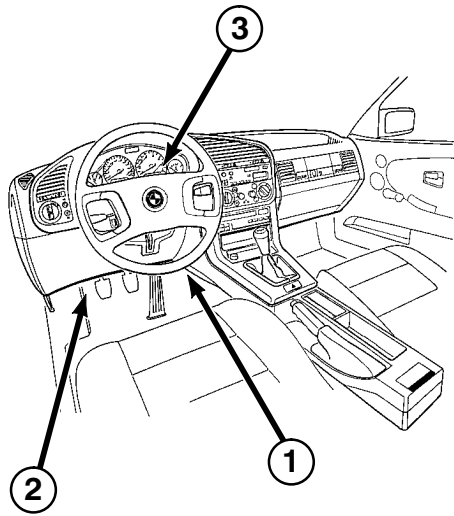


manual



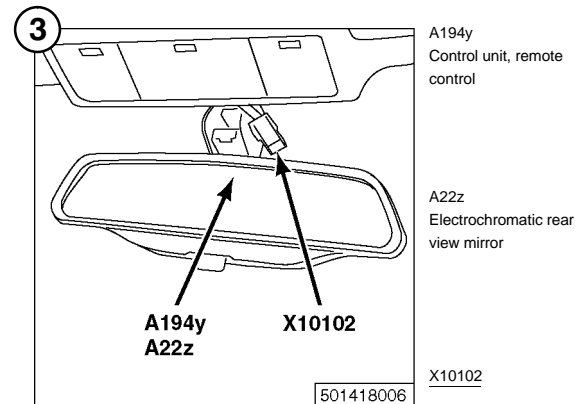
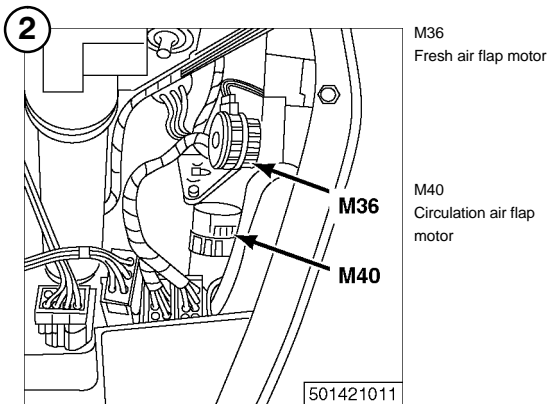
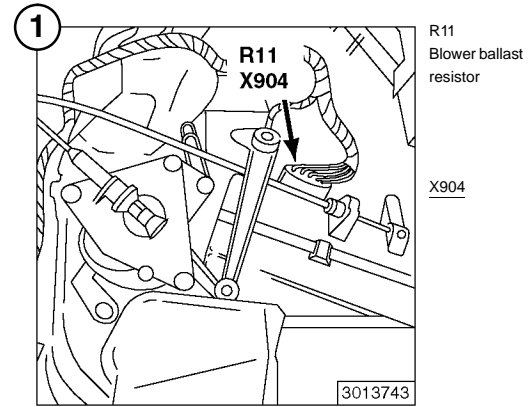
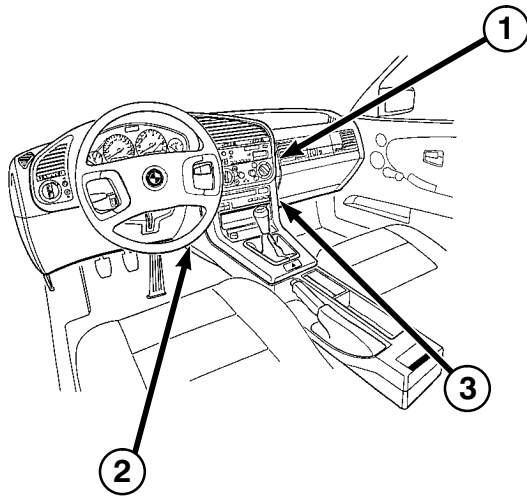


# Component location views



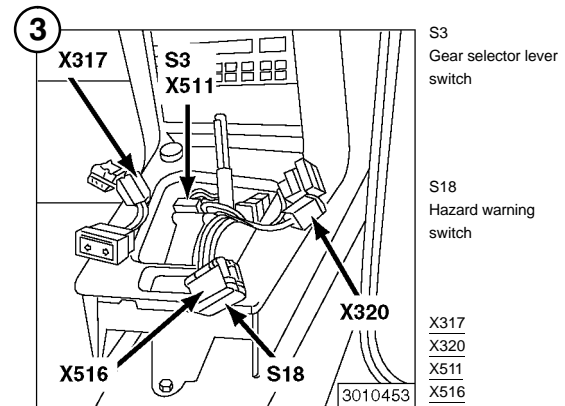
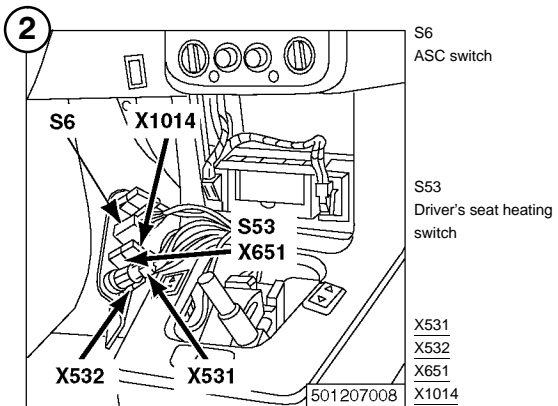
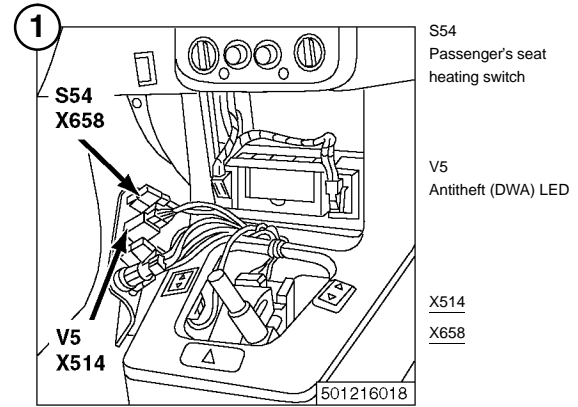
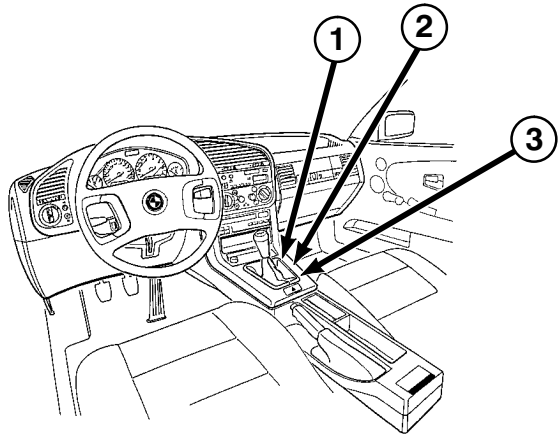


## Component location views



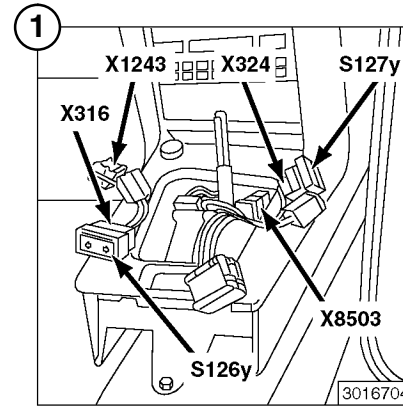
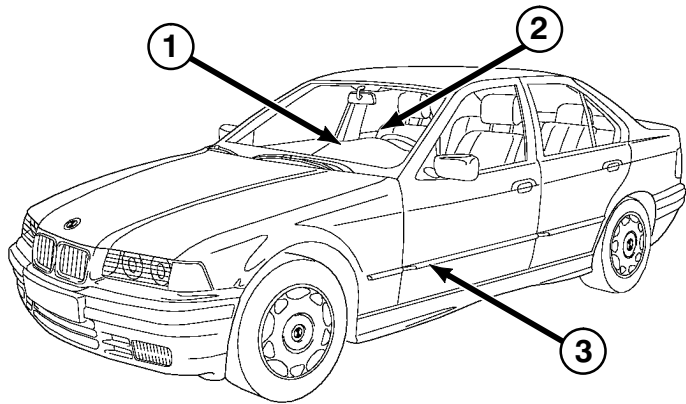


# Component location views





# Component location views

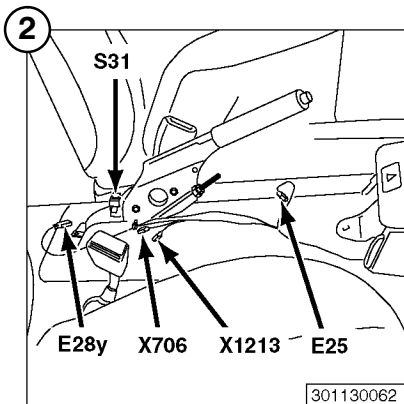


S126y  
Driver's door power window switch

S127y  
Passenger's door power window switch

X316  
X324  
X1243  
X8503

3016704



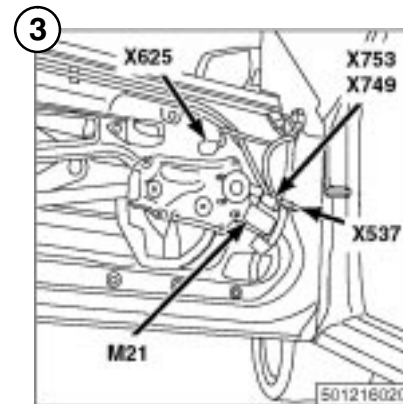
E25  
Front ashtray light

X706  
X1213

E28y  
Rear ashtray light

S31  
Handbrake switch

301130062



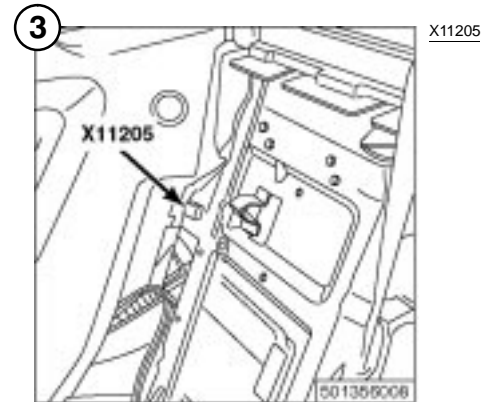
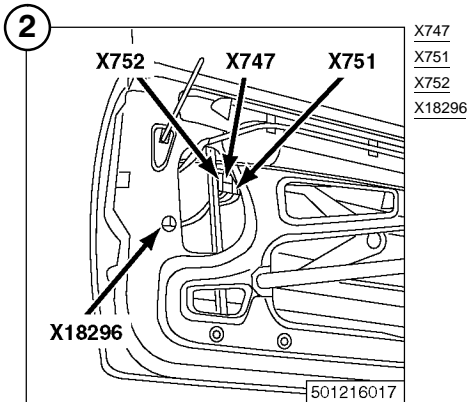
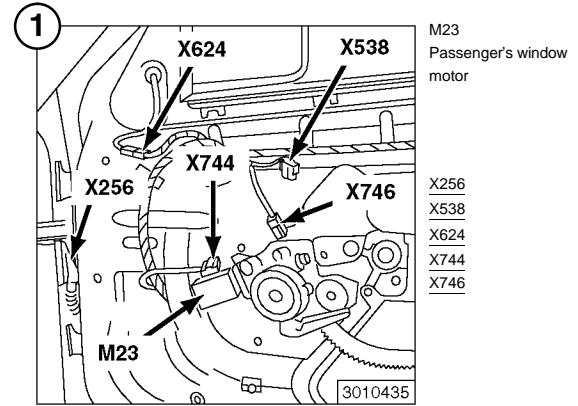
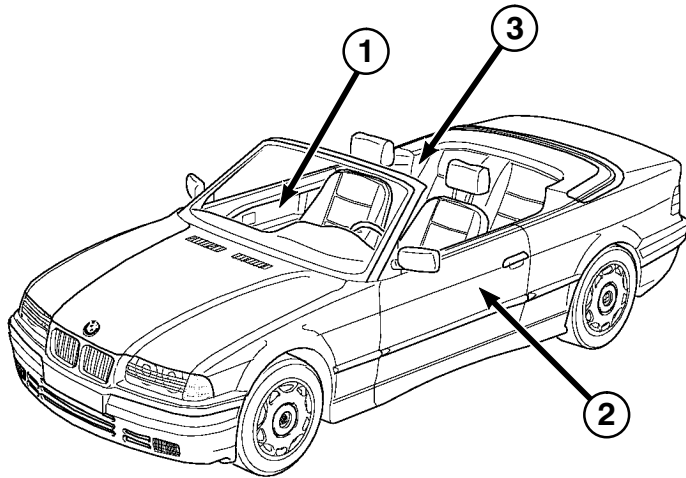
M21  
Driver's window motor

X537  
X625  
X749  
X753

501216020

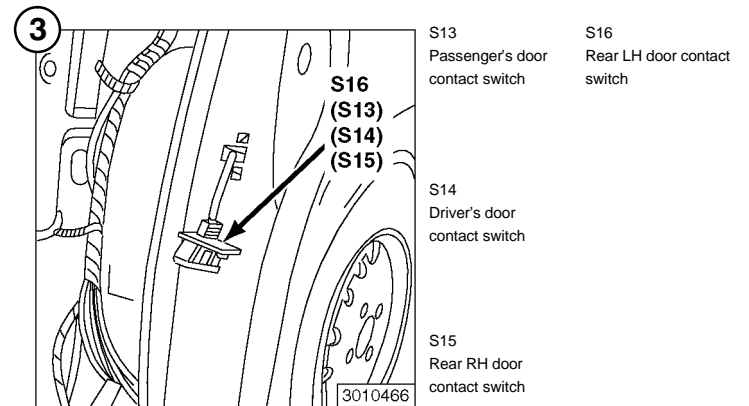
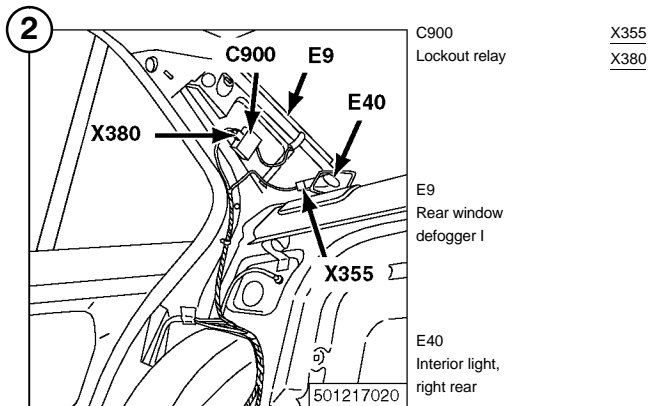
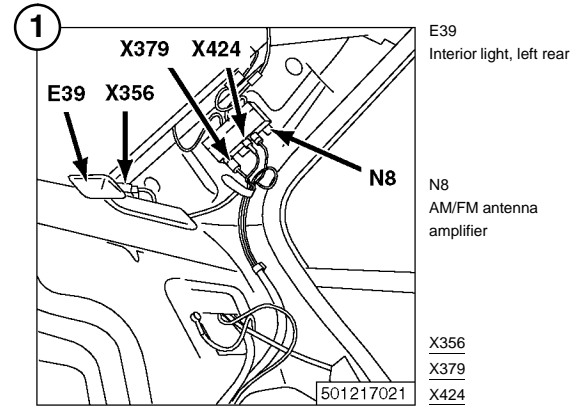
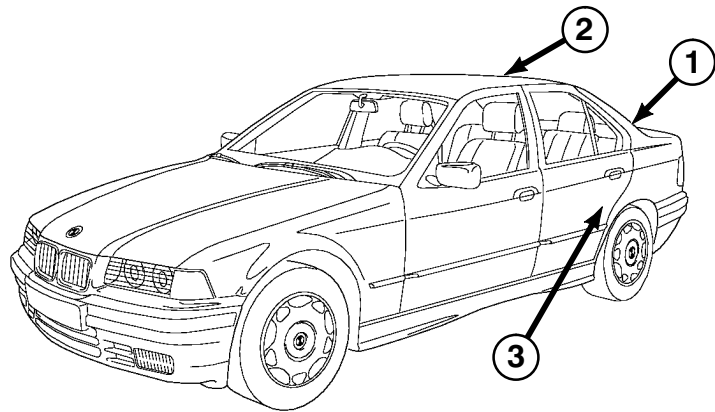


# Component location views



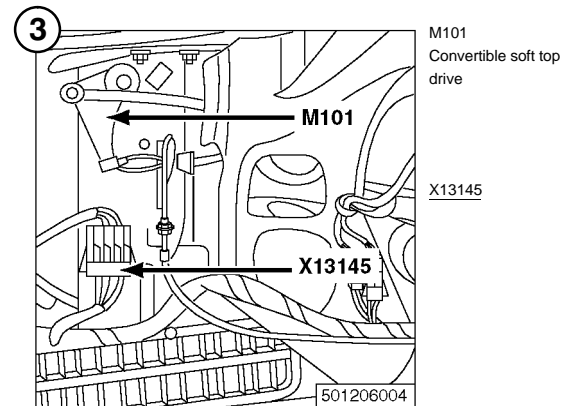
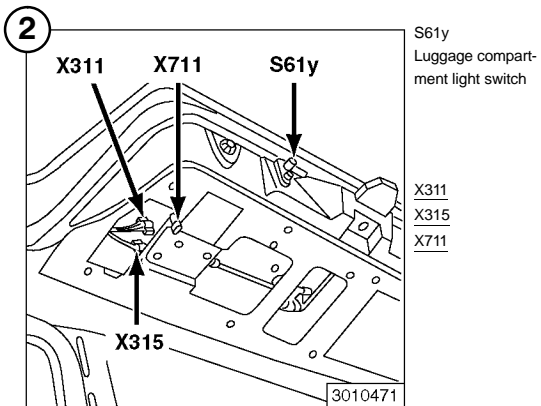
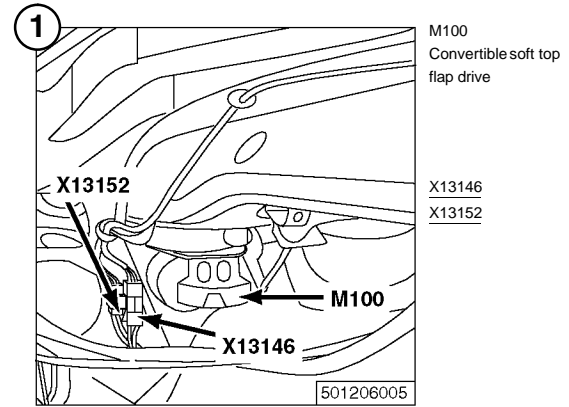
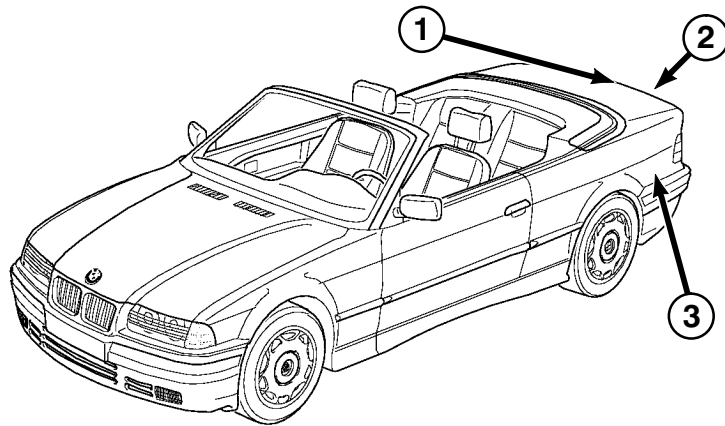


# Component location views



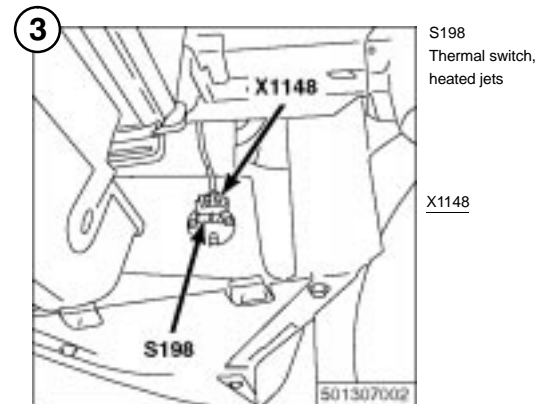
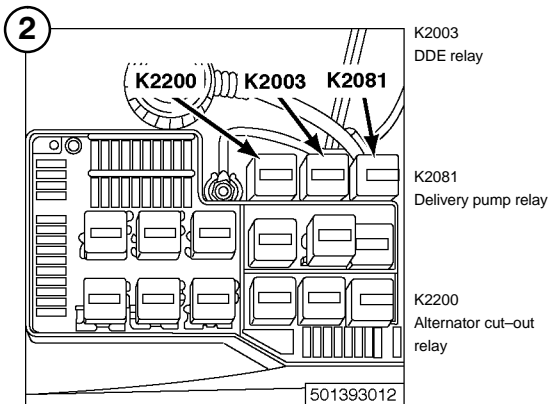
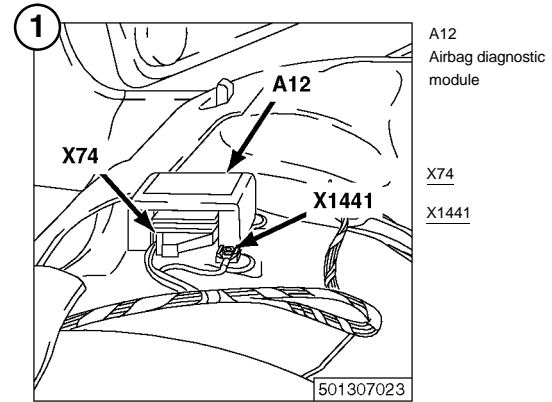
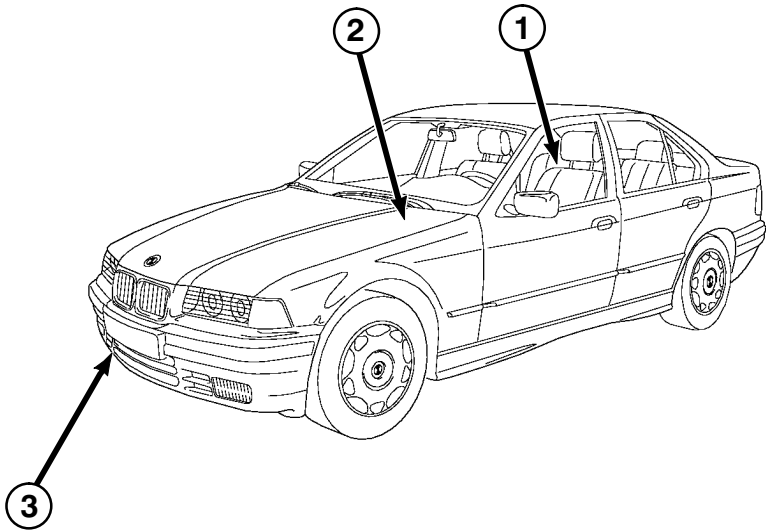


# Component location views





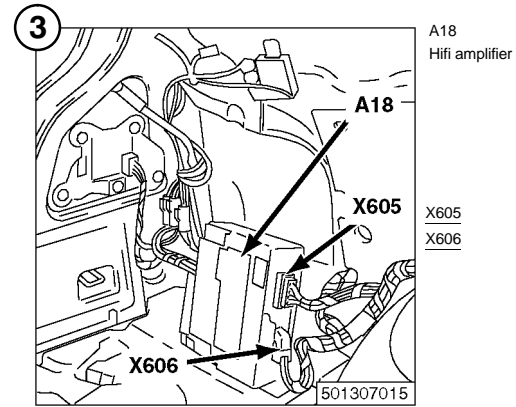
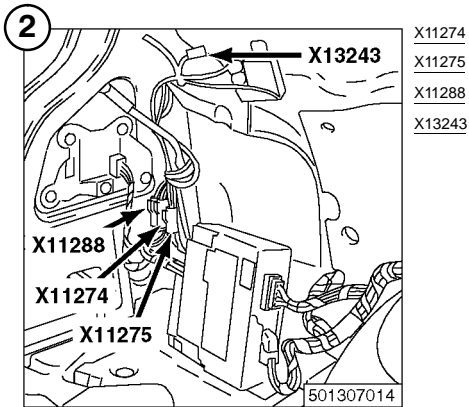
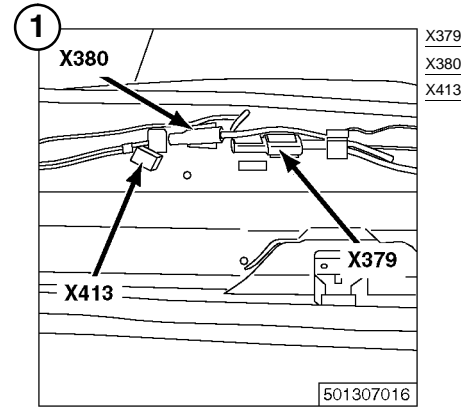
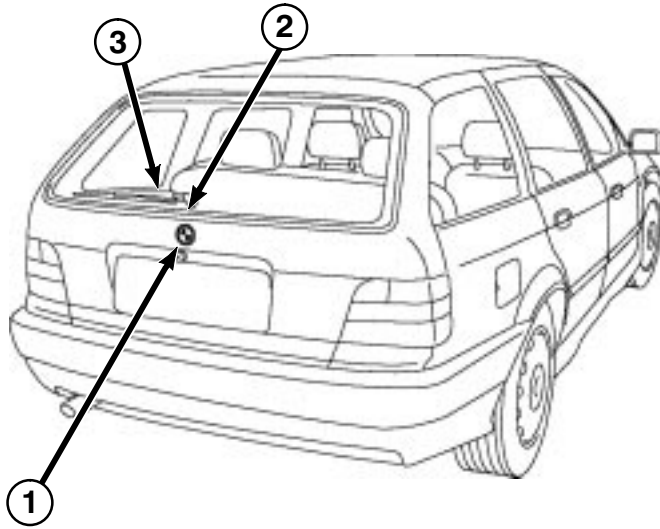
# Component location views





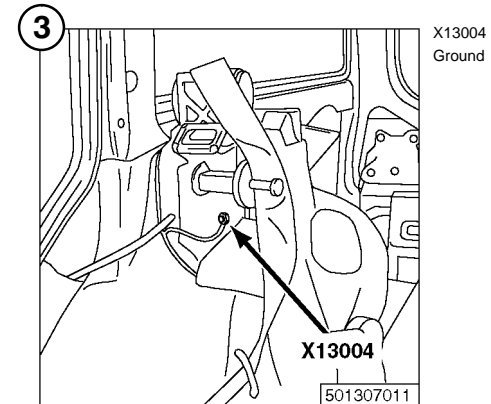
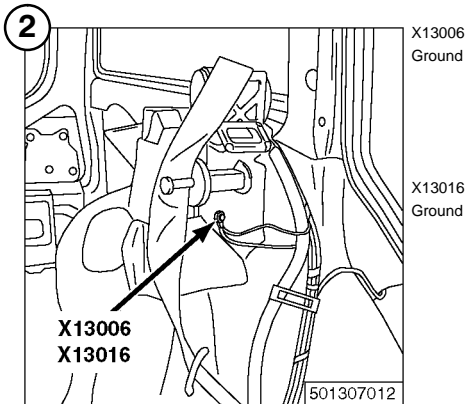
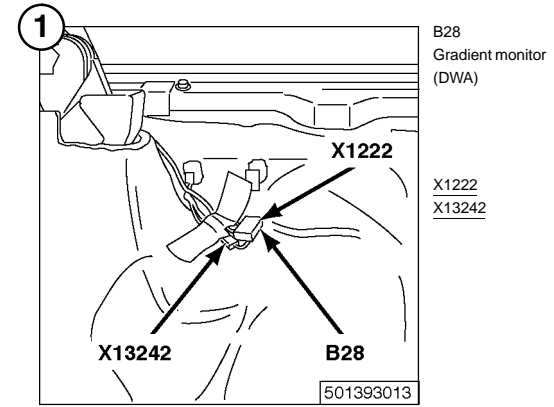
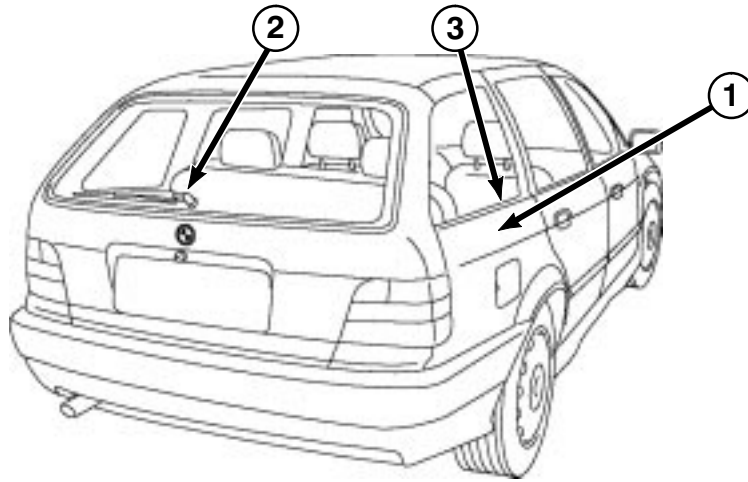


# Component location views



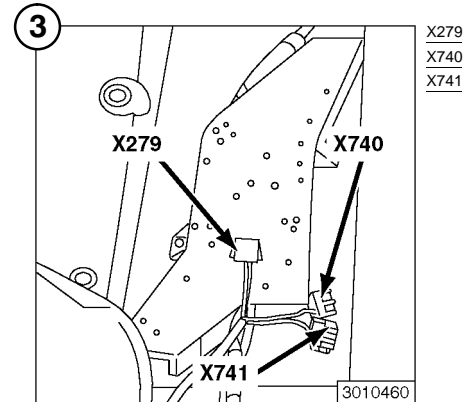
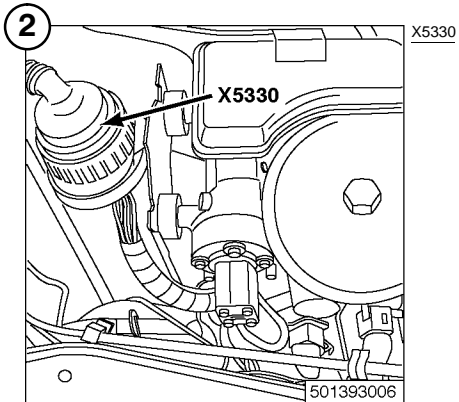
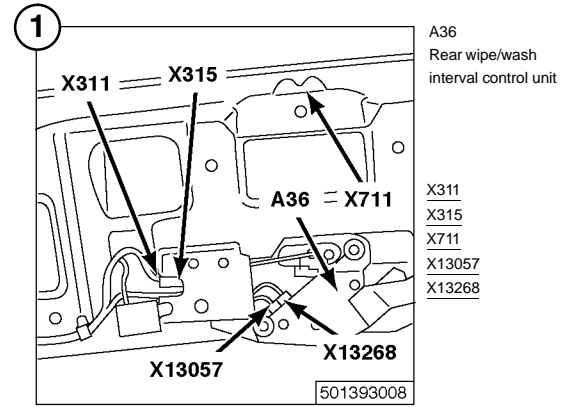
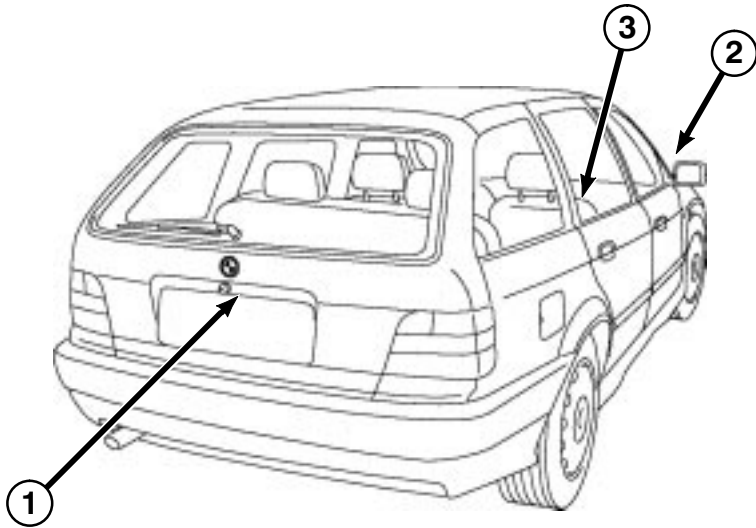


# Component location views



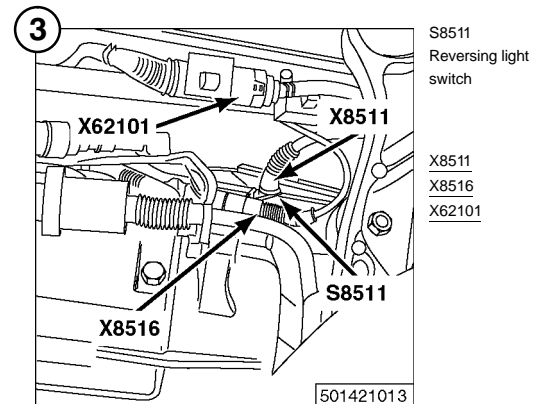
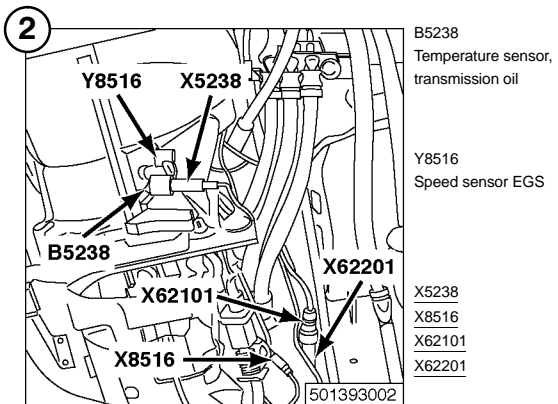
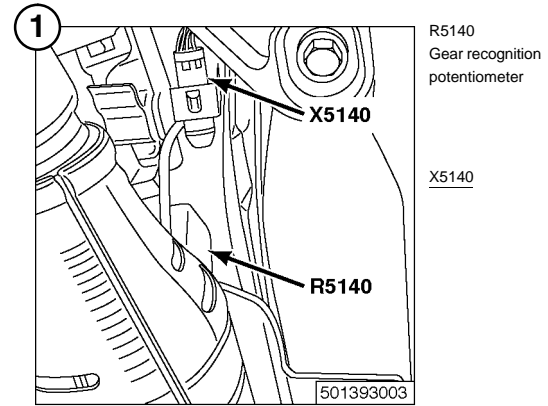
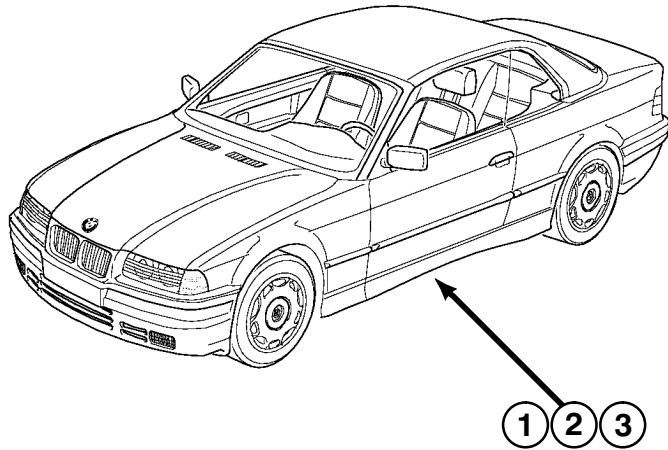


# Component location views



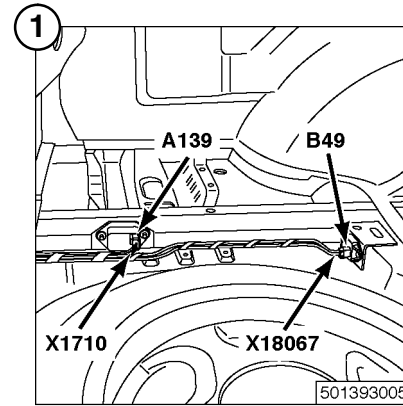
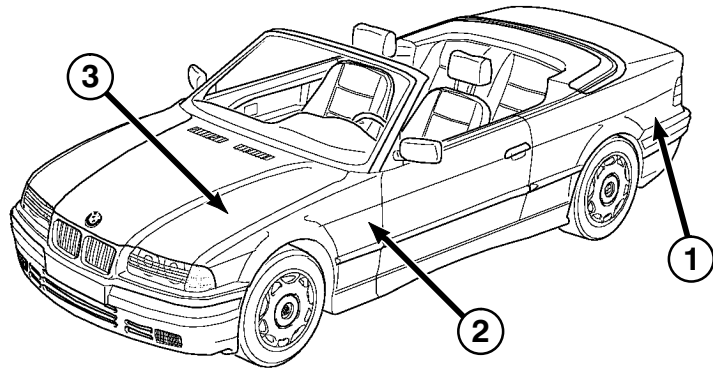


# Component location views





# Component location views



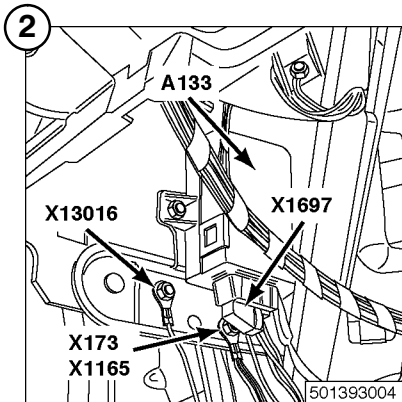
1

A139  
Acceleration sensor,  
lateral

B49  
Acceleration sensor,  
longitudinal

X1710  
X18067

501393005

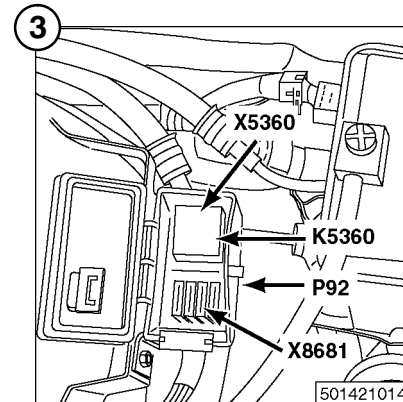


2

A133  
Electronic gear indi-  
cator

X173  
X1165  
X1697  
X13016

501393004



3

K5360  
Hydraulic pump relay

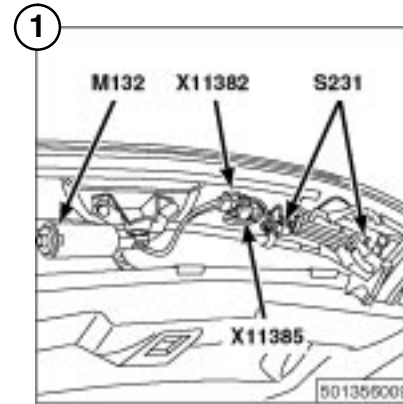
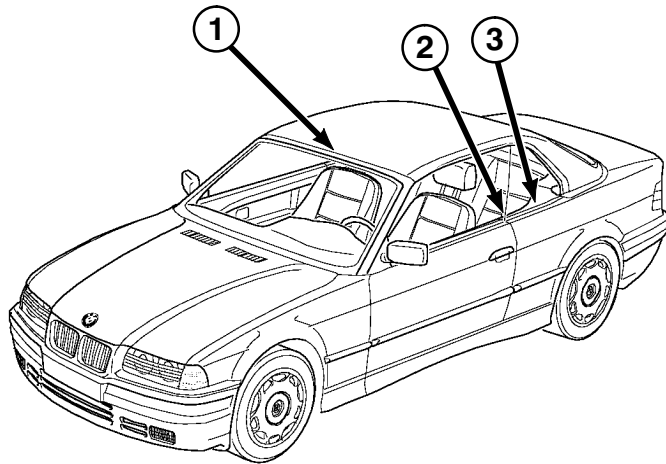
P92  
Auxiliary relay box

X5360  
X8681

501421014



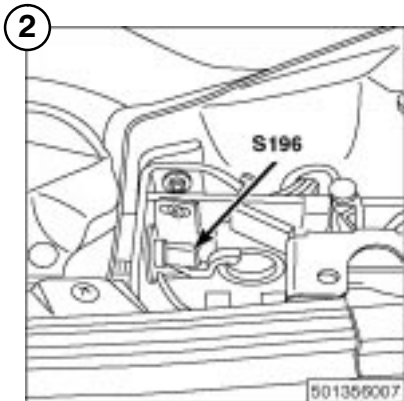
## Component location views



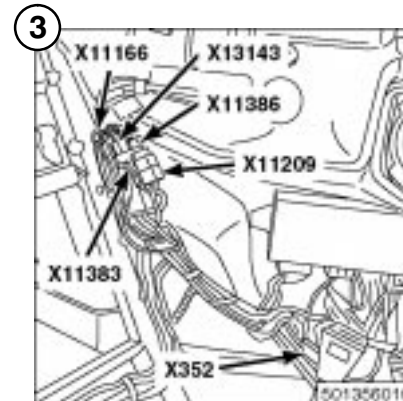
M132  
Motor, windscreen  
cowl panel lock

S231  
Windscreen cowl  
panel lock micro-  
switch

X11382  
X11385



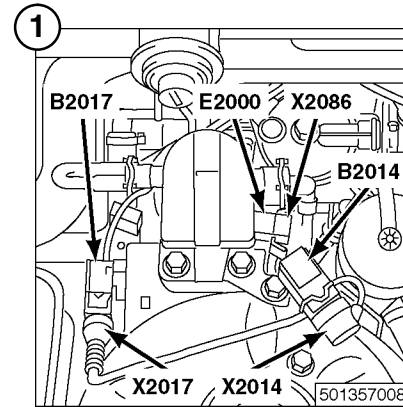
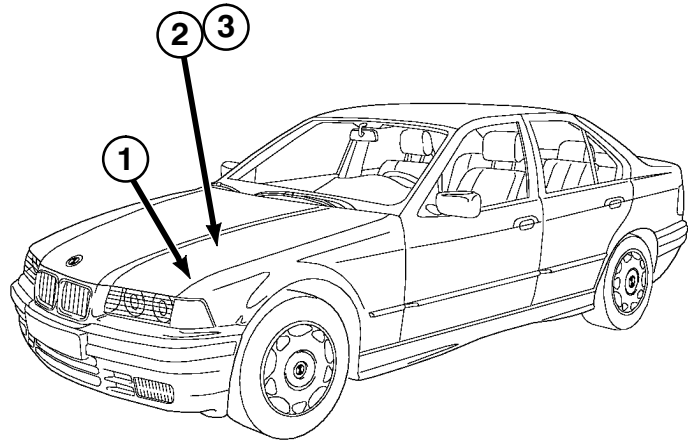
S196  
Rear window blower  
microswitch



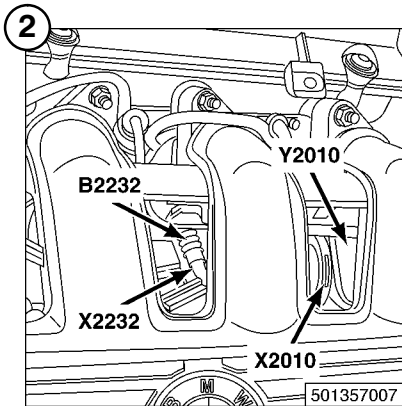
X352  
X11166  
X11209  
X11383  
X11386  
X13143



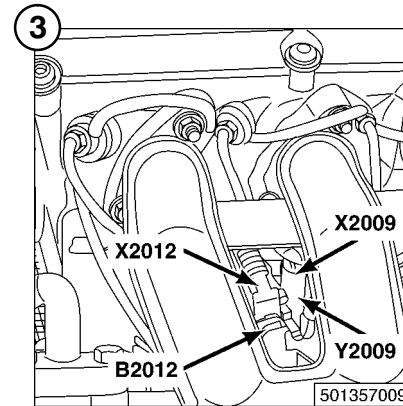
# Component location views



- B2014 Charge pressure sensor
- B2017 Changeover valve for exhaust gas recirculation (AGR)
- E2000 Fuel heating
- X2014
- X2017
- X2086



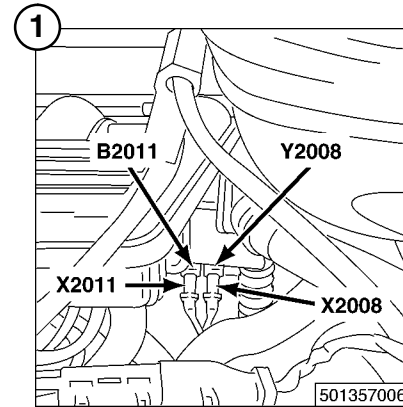
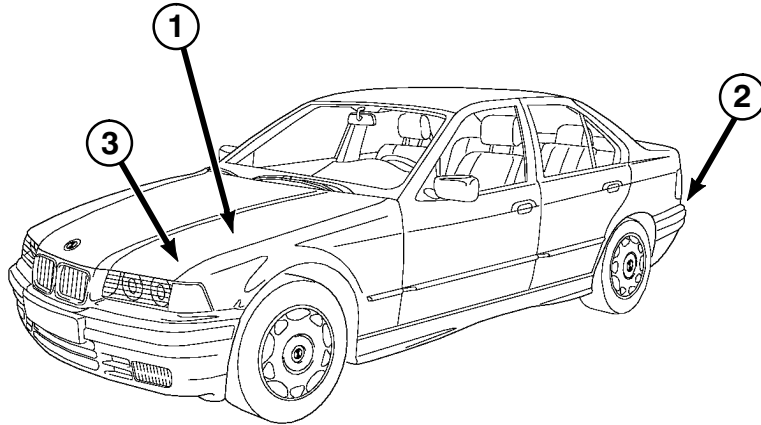
- B2232 Dual temperature sensor
- Y2010 Injection quantity control unit
- X2010
- X2232



- B2012 Charge air temperature sensor
- Y2009 Electric cutout
- X2009
- X2012



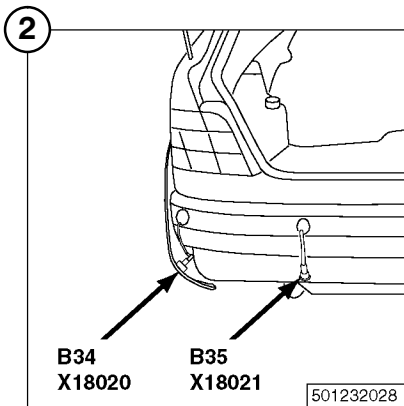
# Component location views



B2011  
Solenoid valve, injection timing device

Y2008  
Needle motion sensor

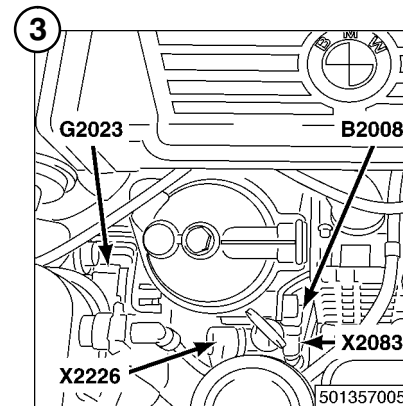
X2008  
X2011



B34  
Rear left converter

B35  
Rear centre left converter

X18020  
X18021



B2008  
Oil pressure switch

G2023  
Alternator

X2083  
X2226





## 8000.0 Connector location views (soldering spots and comb-type connectors)

Solder connector	Wire harness	Side	Solder connector	Wire harness	Side
X181–X276	Front	8000.0-11	X1541–X1542	Front	8000.0-11
X313–X314	Rear	8000.0-03	X1682–X1693	Front	8000.0-11
X313–X314	Rear, Convertible	8000.0-04	X1894–X1895	Rear	8000.0-03
X344–X378	Trailer adapter module	No Fig.	X2006–X2167	M51 engine	8000.0-06
X428–X481	Rear	8000.0-03	X2006–X2214	M41 engine	8000.0-10
X428	Rear, Convertible	8000.0-04	X2228	M51 engine	8000.0-06
X441–X456	Rear, Convertible	8000.0-04	X2152	Rear	8000.0-03
X460–X462	Rear, Convertible	8000.0-04	X5254–X5270	MSS50 engine	8000.0-07
X465–X481	Rear, Convertible	8000.0-04	X5269–X5270	MSS50 engine	8000.0-07
X530–X595	Front	8000.0-11	X6410	M43 engine	8000.0-05
X805	Rear	8000.0-03	X6410–X6492	MSS50 engine	8000.0-07
X805	Rear, Convertible	8000.0-04	X6410	M44 engine	8000.0-08
X824–X830	Radio	No Fig.	X6411	M52 engine	8000.0-09
X849–X851	Driver's door	No Fig.	X6412	M52 engine	8000.0-09
X876–X878	Radio	No Fig.	X6413	M44 engine	8000.0-08
X942	Passenger's door	No Fig.	X6420	M52 engine	8000.0-09
X1015–X1164	Front	8000.0-11	X6421	M52 engine	8000.0-09
X1167	Rear	8000.0-03	X6422	M52 engine	8000.0-09
X1168–X1192	Front	8000.0-11	X6459	M52 engine	8000.0-09
X1212–X1218	Rear	8000.0-03	X6460–X6463	M43 engine	8000.0-05
X1212–X1238	Rear, Convertible	8000.0-04	X6460–X6463	M44 engine	8000.0-08
X1225–X1233	Front	8000.0-11	X6492	M43 engine	8000.0-05
X1226–X1235	Rear	8000.0-03	X6492	M52 engine	8000.0-09
X1258	Front	8000.0-11	X6492	M44 engine	8000.0-08
X1299	Rear	8000.0-03	X6810–X6866	MSS50 engine	8000.0-07
X1382–X1383	Radio	No Fig.	X6810	M52 engine	8000.0-09
X1387–X1396	Rear	8000.0-03	X6810	M43 engine	8000.0-05
X1387–X1396	Rear, Convertible	8000.0-04	X6810	M44 engine	8000.0-08



## Connector location views (soldering spots and comb-type connectors)

Solder connector	Wire harness	Side	Solder connector	Wire harness	Side
X6819–6822	M52 engine	8000.0-09	X8004	M52 engine	8000.0-09
X6820	M43 engine	8000.0-05	X8004–X8074	MSS50 engine	8000.0-07
X6820	M44 engine	8000.0-08	X8004	M44 engine	8000.0-08
X6821	M43 engine	8000.0-05	X8007	M52 engine	8000.0-09
X6821	M44 engine	8000.0-08	X8008	M44 engine	8000.0-08
X6830	M52 engine	8000.0-09	X8010	M52 engine	8000.0-09
X6832	M43 engine	8000.0-05	X8015	M43 engine	8000.0-05
X6832	M44 engine	8000.0-08	X8015	M52 engine	8000.0-09
X6835	M43 engine	8000.0-05	X8015	M44 engine	8000.0-08
X6835	M52 engine	8000.0-09	X8022	M43 engine	8000.0-05
X6835	M44 engine	8000.0-08	X8038	M52 engine	8000.0-09
X6860	M43 engine	8000.0-05	X8056	M43 engine	8000.0-05
X6860	M52 engine	8000.0-09	X8056	M44 engine	8000.0-08
X6860	M44 engine	8000.0-08	X8051	M52 engine	8000.0-09
X6863	M43 engine	8000.0-05	X8071–8074	M52 engine	8000.0-09
X6863	M52 engine	8000.0-09	X8073	M43 engine	8000.0-05
X6863	M44 engine	8000.0-08	X8073	M44 engine	8000.0-08
X6866	M43 engine	8000.0-05	X8089–X8090	MSS50 engine	8000.0-08
X6866	M52 engine	8000.0-09	X8564	M43 engine	8000.0-05
X6866	M44 engine	8000.0-08	X8564	M52 engine	8000.0-09
X6890	MSS50 engine	8000.0-07	X8564	M44 engine	8000.0-08
X6891	M44 engine	8000.0-08	X8565	M43 engine	8000.0-05
X6901–X6906	MSS50 engine	8000.0-07	X8056	M44 engine	8000.0-08
X7845	M43 engine	8000.0-05	X8576	M43 engine	8000.0-05
X7845	M44 engine	8000.0-08	X8576	M44 engine	8000.0-08
X7846	M43 engine	8000.0-05	X8589	M43 engine	8000.0-05
X7846	M44 engine	8000.0-08	X8565	M52 engine	8000.0-09
X8004	M43 engine	8000.0-05	X8681	MSS50 engine	8000.0-09



## Connector location views (soldering spots and comb-type connectors)

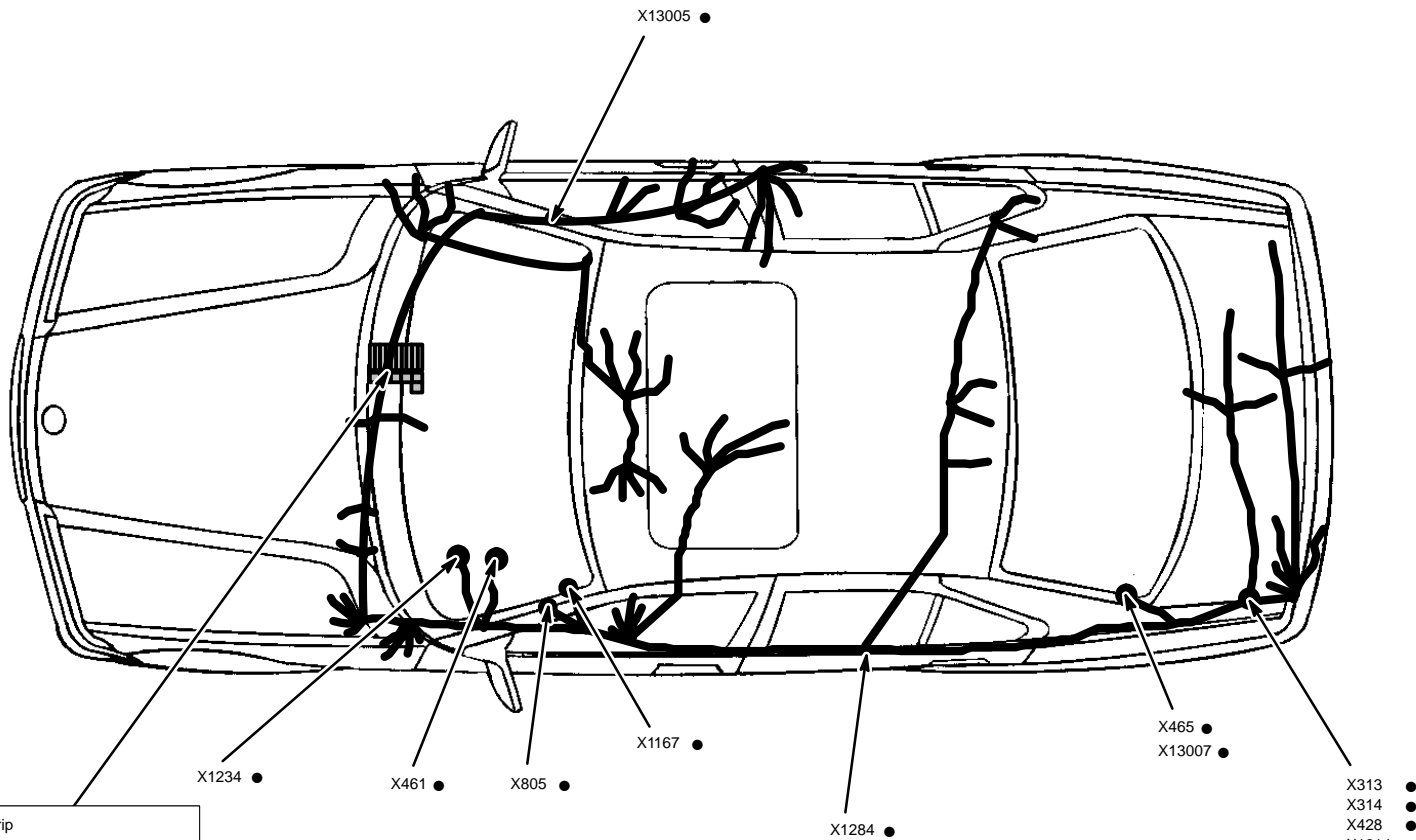
Solder connector	Wire harness	Side
X10007–X10104	Front	8000.0-11
X10118	Rear, Convertible	8000.0-04
X10169	M43 engine	8000.0-05
X10169	M44 engine	8000.0-08
X10252	Front	8000.0-11
X10120–X10192	Front	8000.0-11
X10189–X10229	Rear, Convertible	8000.0-04
X10191–X10231	Front	8000.0-11
X11264	Front	8000.0-11
X11269	Rear, Convertible	8000.0-04
X11269	Rear	8000.0-03
X11273	Rear, Touring	8000.0-03
X11282–X11284	Front	8000.0-11
X11381	Front	8000.0-11
X13002–X13011	Rear	8000.0-03
X13002–X13011	Rear, Convertible	8000.0-04
X13021–X13115	Front	8000.0-11
X13007–X13273	Rear, Convertible	8000.0-04
X13129–X13173	Rear	8000.0-03
X13273	Convertible	8000.0-04
X13282	Front	8000.0-11
X13300–13304	Front	8000.0-11
X13311–X13313	Front	8000.0-11
X18160–X18161	IHKA	No Fig.
X18165	Front	8000.0-11
X18251	Driver's door	No Fig.
X18252	Passenger's door	No Fig.
X18253	Driver's door	No Fig.

Solder connector	Wire harness	Side
X18254–X18284	Passenger's door	No Fig.
X18783–X18784	Front	8000.0-11
X18785–X18799	Rear, Convertible	8000.0-04
X19513–X19514	Radio	No Fig.
X69001–X69011	MSS50 engine	8000.0-07



# Connector location views (soldering spots and comb-type connectors)

## Rear wire harness



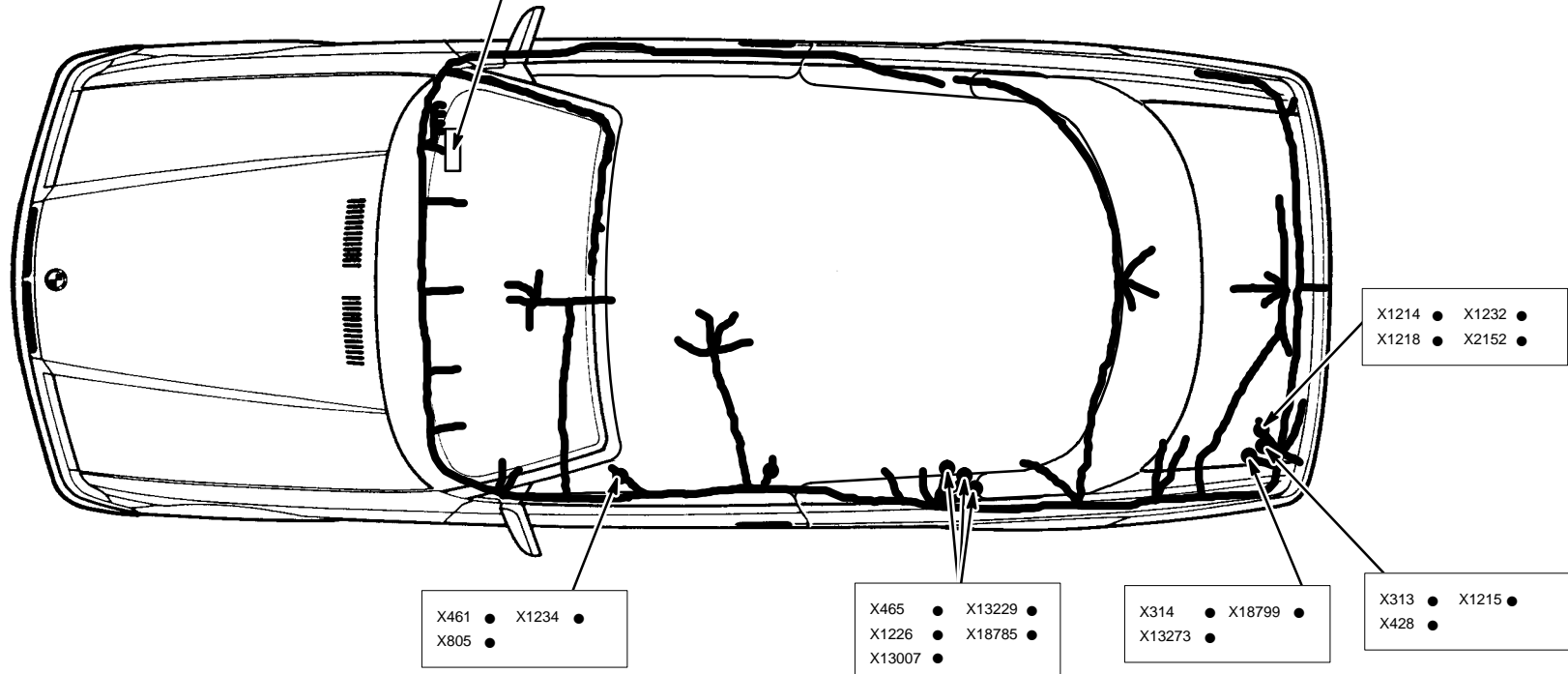
Connector strip			
X441 ●	X462 ●	X1894 ●	X13132 ●
X442 ●	X475 ●	X10118 ●	X13164 ●
X443 ●	X481 ●	X10269 ●	X13168 ●
X444 ●	X1212 ●	X11269 ●	X13173 ●
X445 ●	X1235 ●	X13002 ●	X13289 ●
X449 ●	X1263 ●	X13003 ●	X13309 ●
X450 ●	X1299 ●	X13010 ●	
X453 ●	X1387 ●	X13011 ●	
X455 ●	X1396 ●	X13129 ●	



# Connector location views (soldering spots and comb-type connectors)

## Rear harness – Convertible

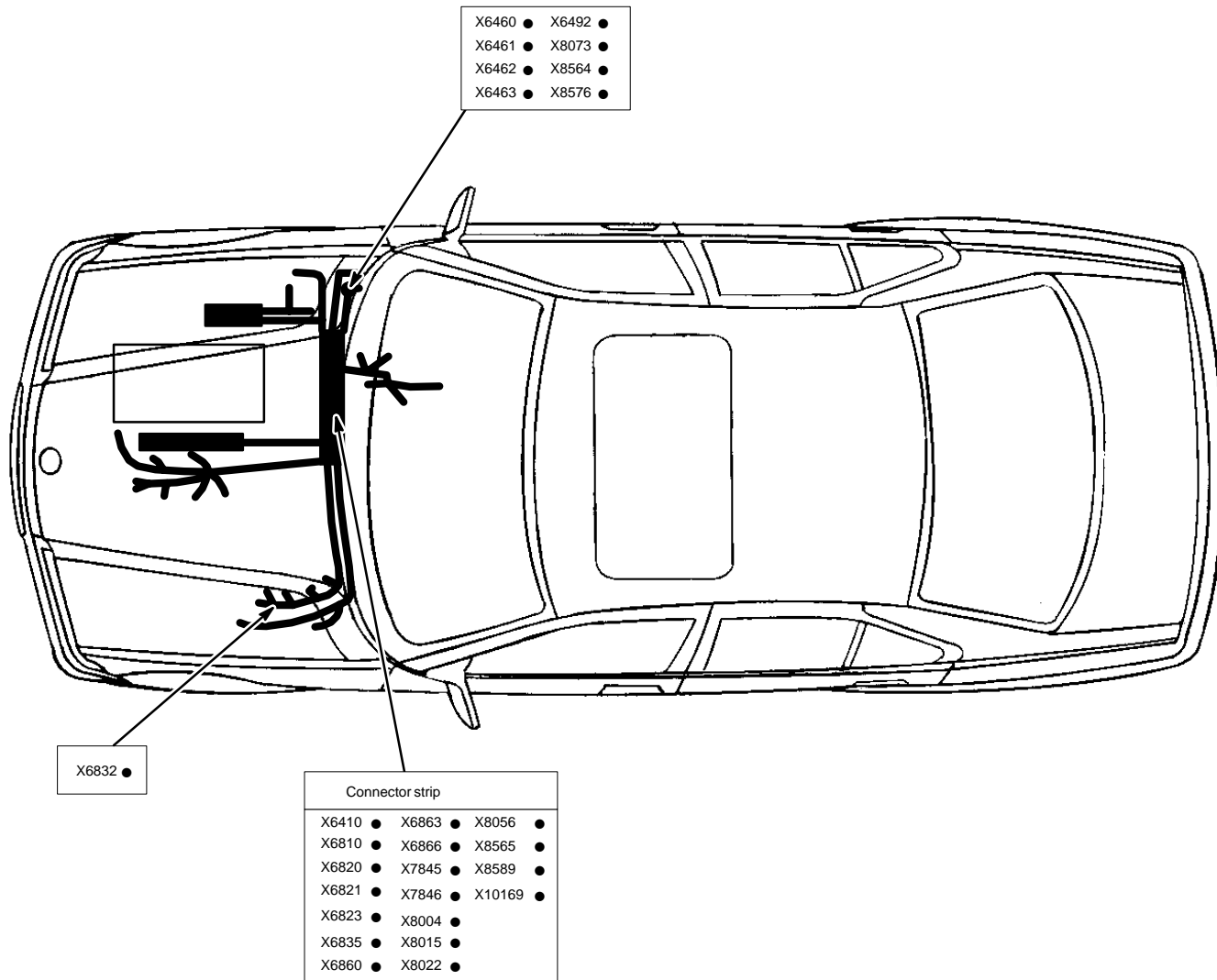
Connector strip					
X441 ●	X455 ●	X1396 ●	X13003 ●	X13289 ●	
X442 ●	X462 ●	X10118 ●	X13010 ●	X13309 ●	
X443 ●	X475 ●	X10189 ●	X13011 ●	X18796 ●	
X444 ●	X481 ●	X10228 ●	X13127 ●		
X445 ●	X1212 ●	X10229 ●	X13129 ●		
X449 ●	X1235 ●	X10269 ●	X13132 ●		
X450 ●	X1263 ●	X11269 ●	X13168 ●		
X453 ●	X1387 ●	X13002 ●	X13173 ●		





# Connector location views (soldering spots and comb-type connectors)

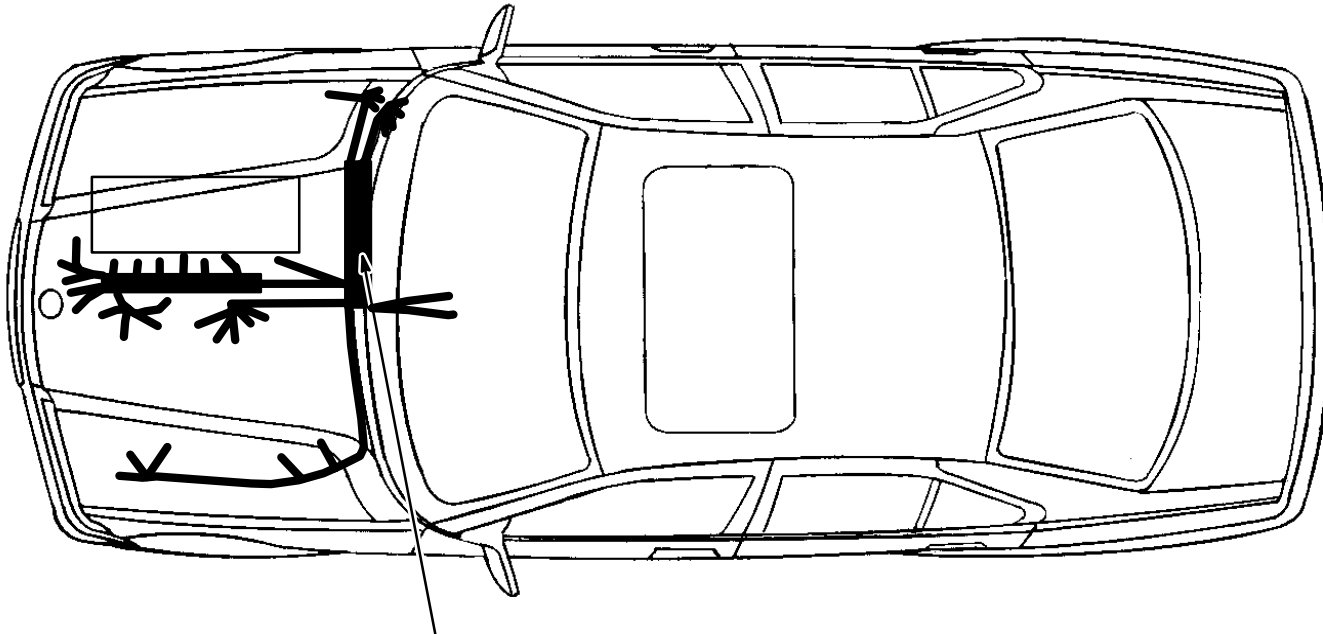
## Engine wire harness M43





# Connector location views (soldering spots and comb-type connectors)

Engine harness M51

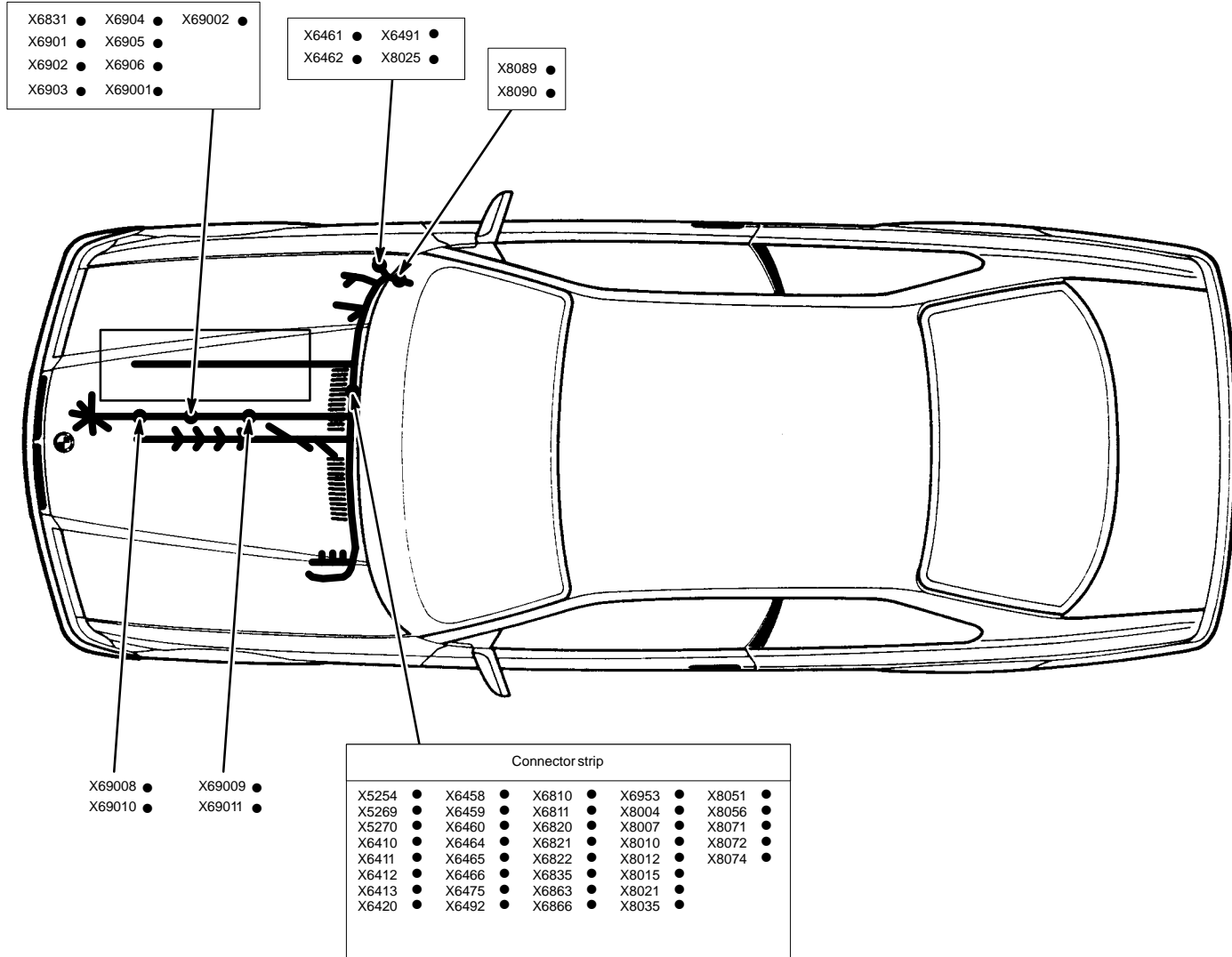


Connector strip			
X2006 ●	X2039 ●	X2112 ●	X2165 ●
X2029 ●	X2040 ●	X2118 ●	X2166 ●
X2032 ●	X2041 ●	X2130 ●	X2167 ●
X2033 ●	X2046 ●	X2131 ●	X2228 ●
X2034 ●	X2049 ●	X2139 ●	X2229 ●
X2036 ●	X2050 ●	X2146 ●	X8004 ●
X2037 ●	X2053 ●	X2147 ●	
X2038 ●	X2060 ●	X2149 ●	



# Connector location views (soldering spots and comb-type connectors)

## Engine wire harness MSS50

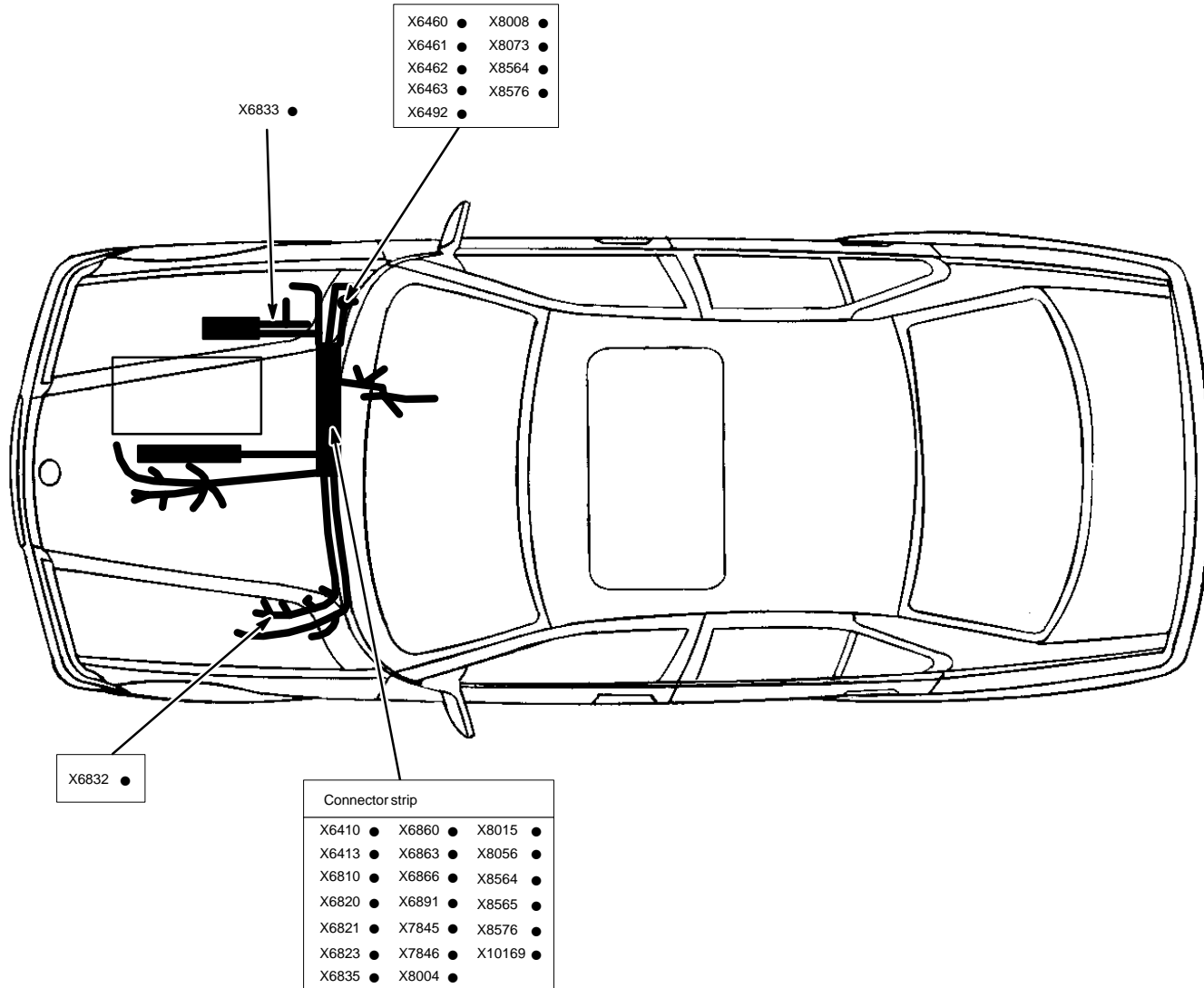






# Connector location views (soldering spots and comb-type connectors)

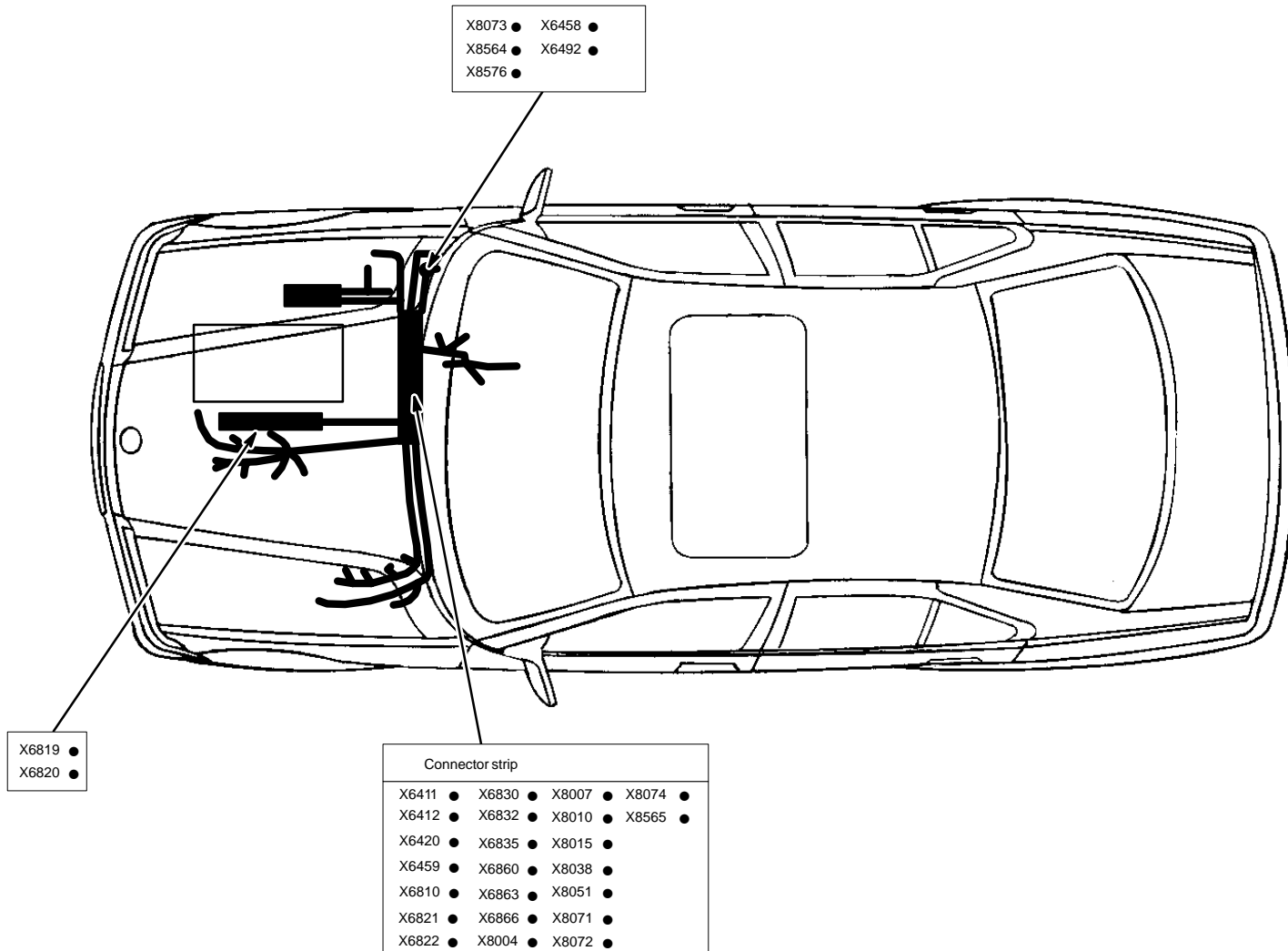
## Engine wire harness M44





# Connector location views (soldering spots and comb-type connectors)

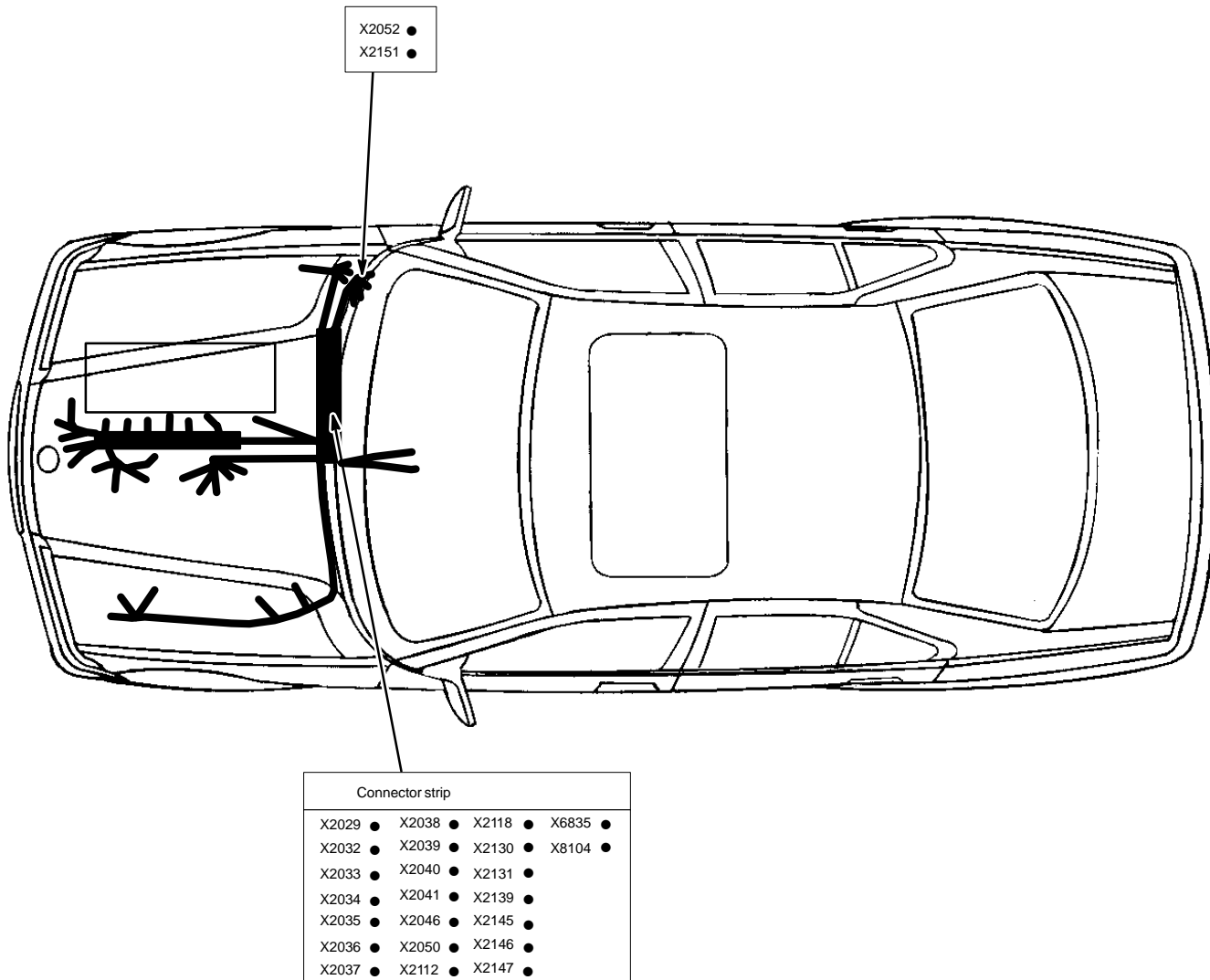
## Engine harness M52





# Connector location views (soldering spots and comb-type connectors)

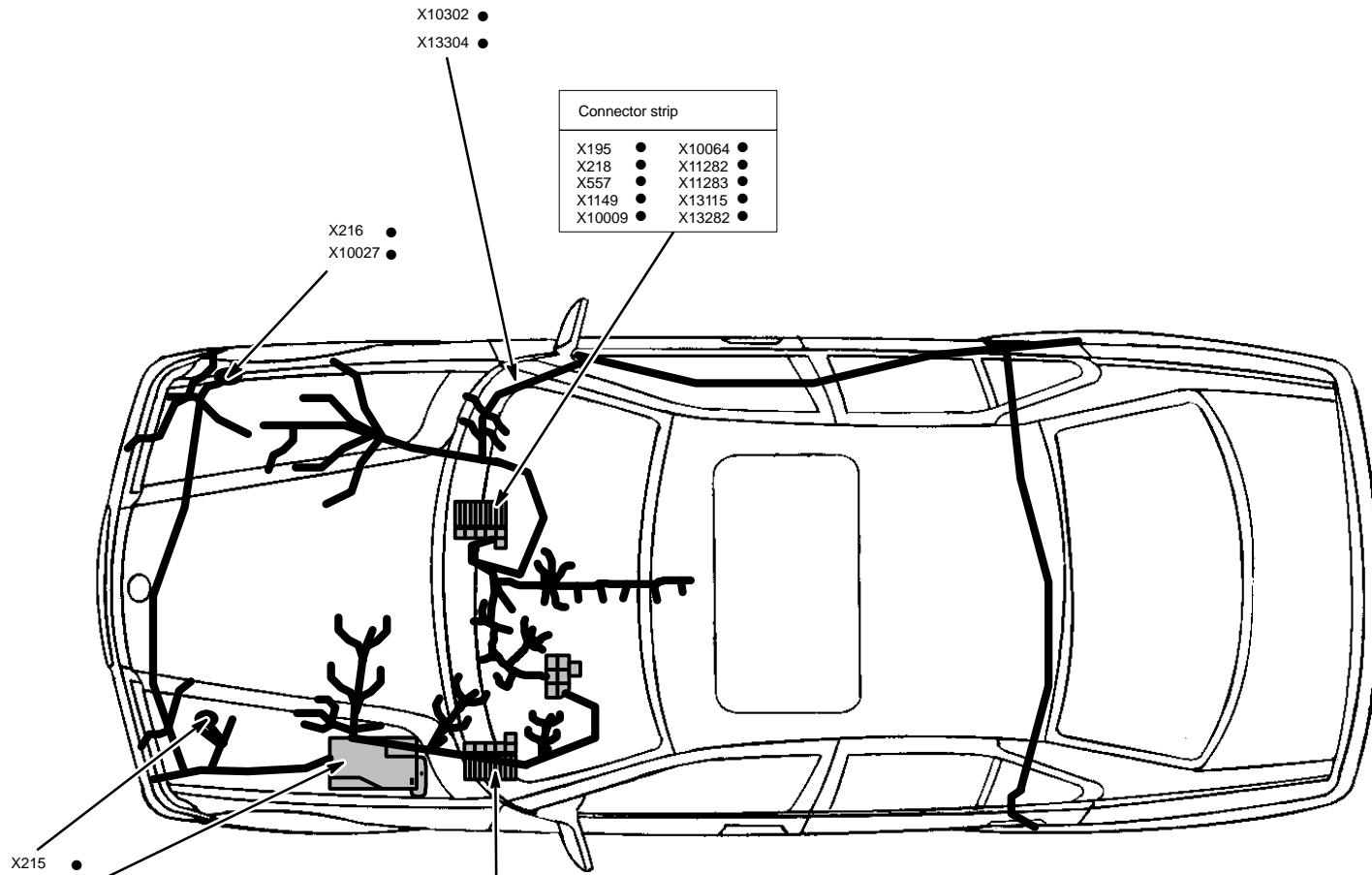
## Engine wire harness M41





# Connector location views (soldering spots and comb-type connectors)

## Front wire harness



Connector strip	
X195 ●	X10064 ●
X218 ●	X11282 ●
X557 ●	X11283 ●
X1149 ●	X13115 ●
X10009 ●	X13282 ●

Connector strip				
X184 ●	X530 ●	X1076 ●	X1233 ●	X13000 ●
X185 ●	X595 ●	X1077 ●	X1541 ●	X13302 ●
X186 ●	X1015 ●	X1152 ●	X10007 ●	X18783 ●
X187 ●	X1022 ●	X1163 ●	X10020 ●	X18784 ●
X203 ●	X1027 ●	X1164 ●	X10022 ●	
X223 ●	X1028 ●	X1168 ●	X10029 ●	
X238 ●	X1036 ●	X1172 ●	X10055 ●	
X245 ●	X1055 ●	X1177 ●	X10100 ●	
X246 ●	X1068 ●	X1186 ●	X10192 ●	
X276 ●	X1073 ●	X1192 ●	X11284 ●	

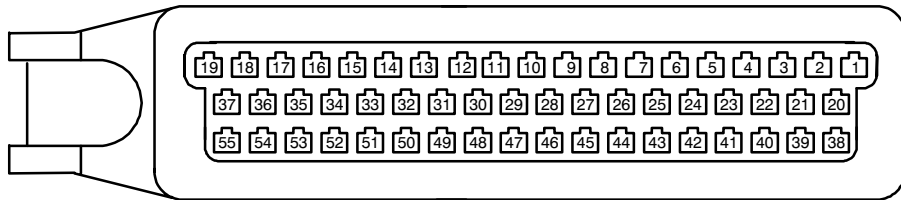
Connector strip					
X181 ●	X1029 ●	X1169 ●	X1691 ●	X10104 ●	X13311 ●
X182 ●	X1047 ●	X1179 ●	X1693 ●	X10120 ●	X13312 ●
X183 ●	X1065 ●	X1182 ●	X10008 ●	X10123 ●	X13313 ●
X188 ●	X1066 ●	X1225 ●	X10011 ●	X10191 ●	X18165 ●
X191 ●	X1067 ●	X1258 ●	X10024 ●	X10192 ●	
X196 ●	X1069 ●	X1542 ●	X10028 ●	X10231 ●	
X197 ●	X1079 ●	X1682 ●	X10060 ●	X10252 ●	
X213 ●	X1080 ●	X1686 ●	X10061 ●	X11264 ●	
X228 ●	X1085 ●	X1687 ●	X10090 ●	X11381 ●	
X1019 ●	X1159 ●	X1689 ●	X10103 ●	X13021 ●	



# 8500.0 Connector views

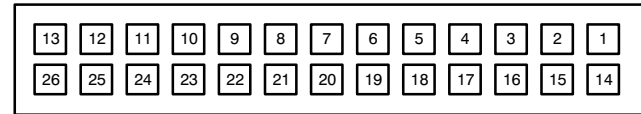
**Fig. 1**

B550001.03



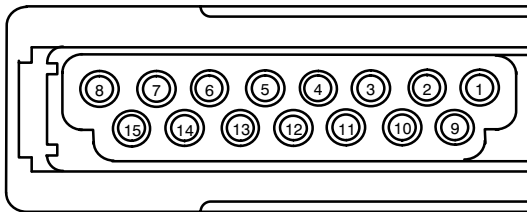
**Fig. 2**

B260005.00



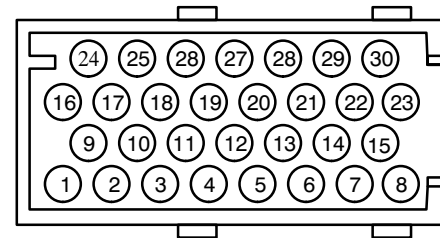
**Fig. 3**

B150003.00



**Fig. 4**

B300001.00

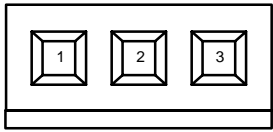




# Connector views

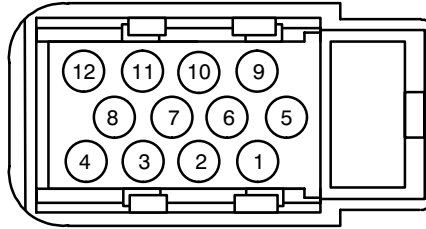
**Fig. 1**

B030024



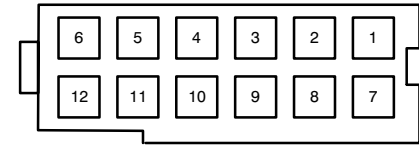
**Fig. 2**

B120003.00



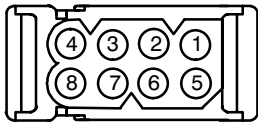
**Fig. 3**

B120001.00



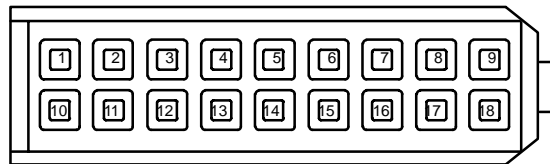
**Fig. 4**

B080002.00



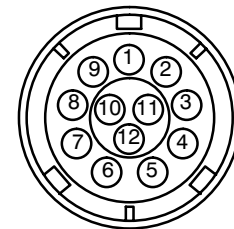
**Fig. 5**

B180000.00



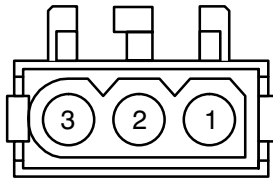
**Fig. 6**

B120015



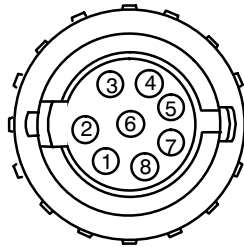
**Fig. 1**

B030001.00



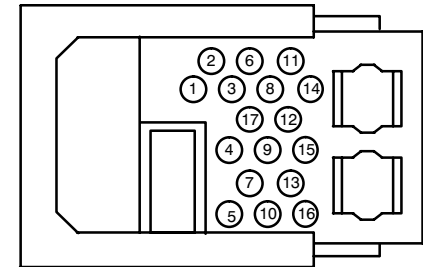
**Fig. 2**

B070007.00



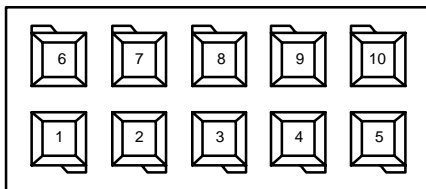
**Fig. 3**

B170001.00



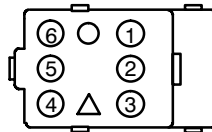
**Fig. 4**

B100008.00



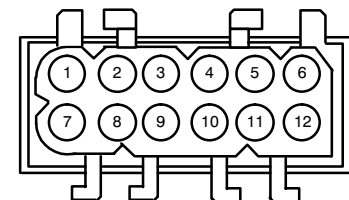
**Fig. 5**

B060008.00



**Fig. 6**

B120004.01

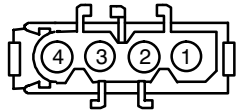




# Connector views

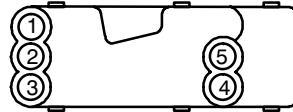
**Fig. 1**

B040002.00



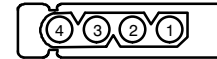
**Fig. 2**

B050003.00



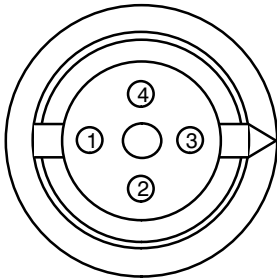
**Fig. 3**

B040004.00



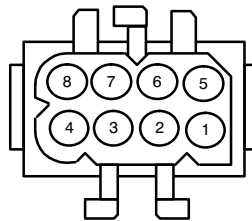
**Fig. 4**

B040018



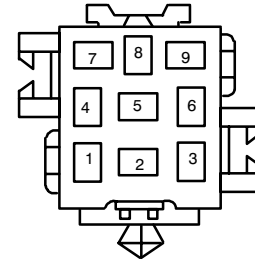
**Fig. 5**

B080001.00



**Fig. 6**

B090002.00







# Connector views

Fig. 1

B260002.01

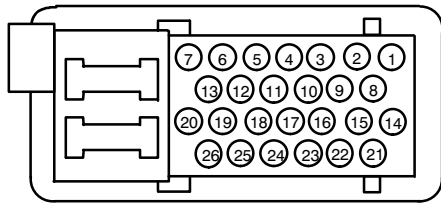


Fig. 2

B060001.02

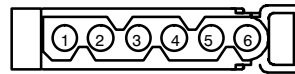


Fig. 3

B070005.00

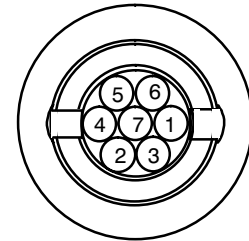


Fig. 4

B200003.00

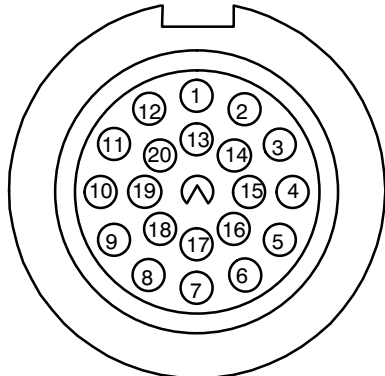


Fig. 5

B060010.01

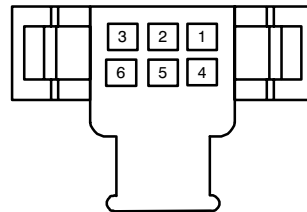


Fig. 6

B030003.02

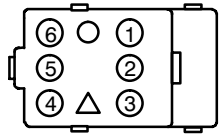




# Connector views

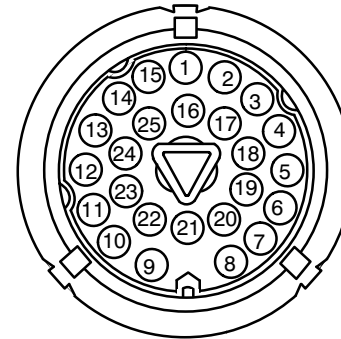
**Fig. 1**

B060008.00



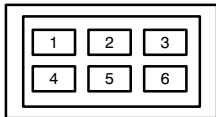
**Fig. 2**

B250001.01



**Fig. 3**

B060019.02



**Fig. 4**

B060037.00

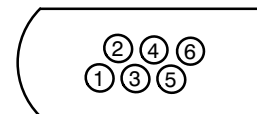


Fig. 1

B880001.00

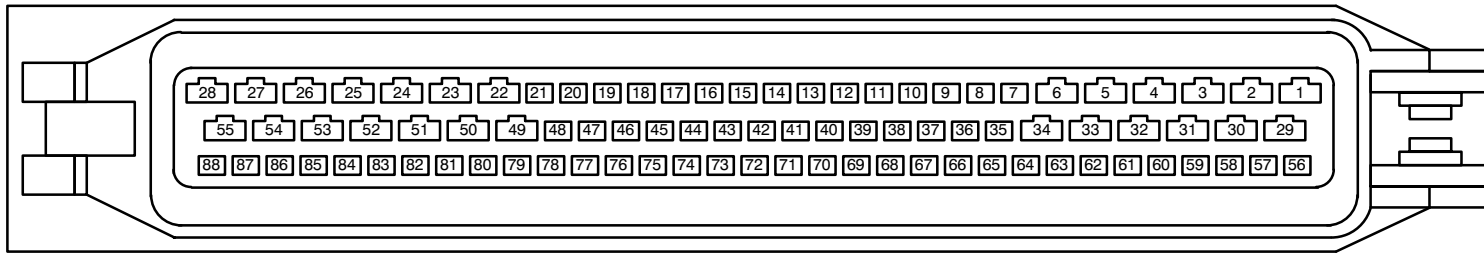


Fig. 2

B060038.00

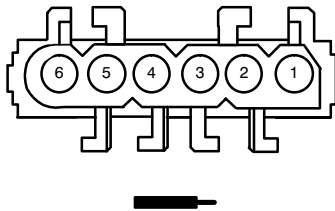
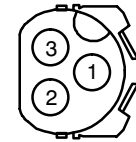


Fig. 3

B030006.00

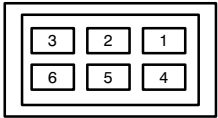




# Connector views

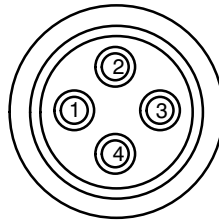
**Fig. 1**

B060019.03



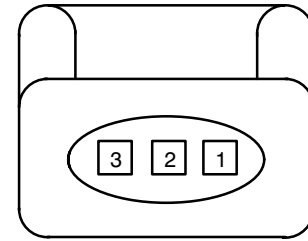
**Fig. 2**

B040023.01



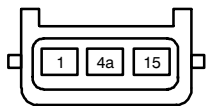
**Fig. 3**

B030018.00



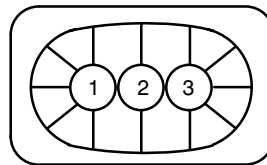
**Fig. 4**

B030015.08



**Fig. 5**

B030023.00



**Fig. 6**

B040020.00

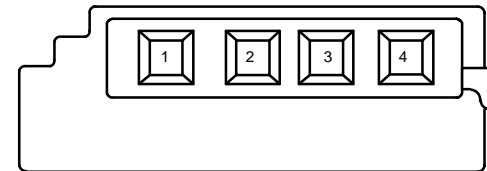


Fig. 1

B030025.00

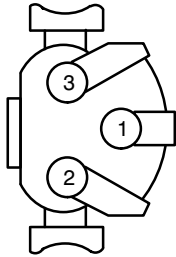


Fig. 2

B060037.01

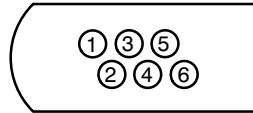


Fig. 3

B030042.01

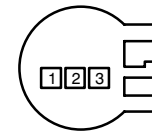


Fig. 4

B060001.00

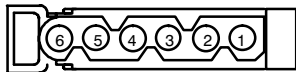


Fig. 5

B090006.00

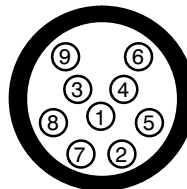
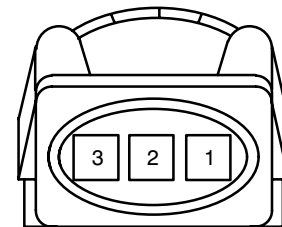


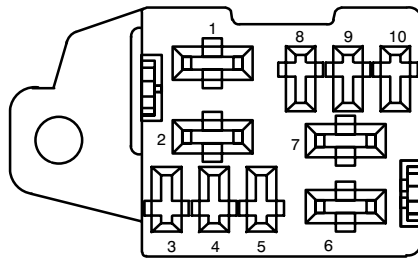
Fig. 6

B030018.01



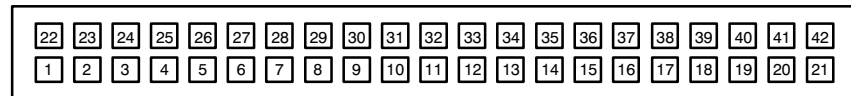
**Fig. 1**

B100004.01



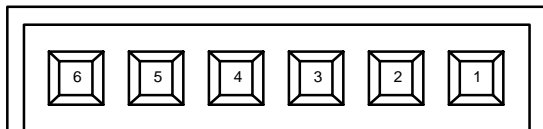
**Fig. 2**

B420000.00



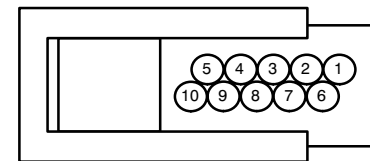
**Fig. 3**

B060042



**Fig. 4**

B100007.00





# Connector views

Fig. 1

B040021

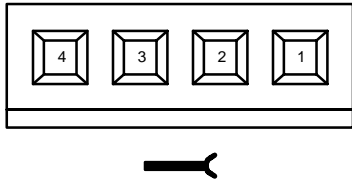


Fig. 2

B260002.04

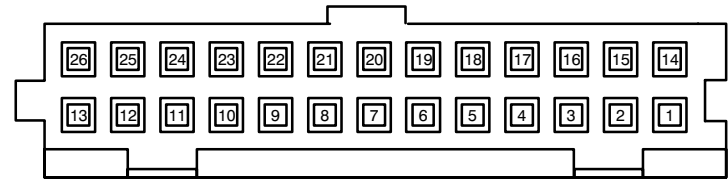


Fig. 3

B040003.00

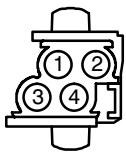


Fig. 4

B130002.00

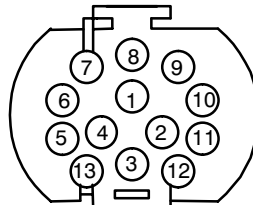
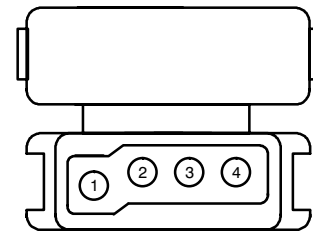


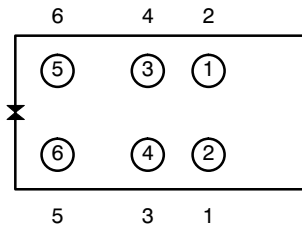
Fig. 5

B040013



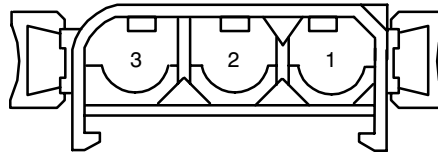
**Fig. 1**

B060038.00



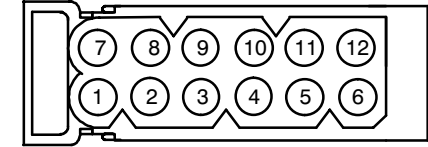
**Fig. 2**

B030009.00



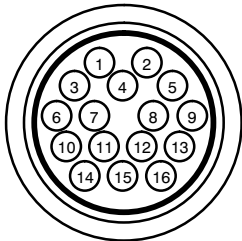
**Fig. 3**

B120002.02



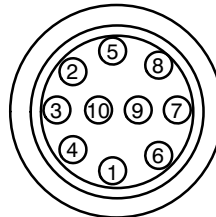
**Fig. 4**

B160001.00



**Fig. 5**

B100011.01



**Fig. 6**

B040027.00

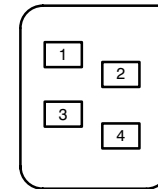




Fig. 1

B050005.00

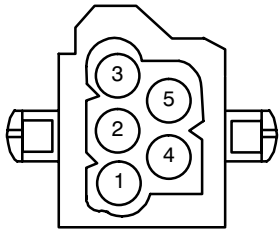


Fig. 2

B500000.00

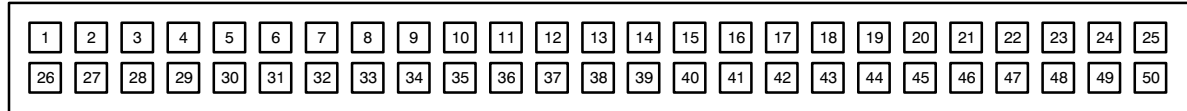


Fig. 3

B030004.01

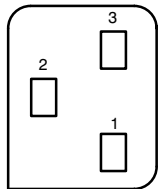


Fig. 4

B070013.00

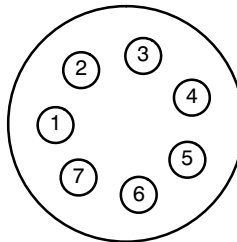


Fig. 5

B250004.00

