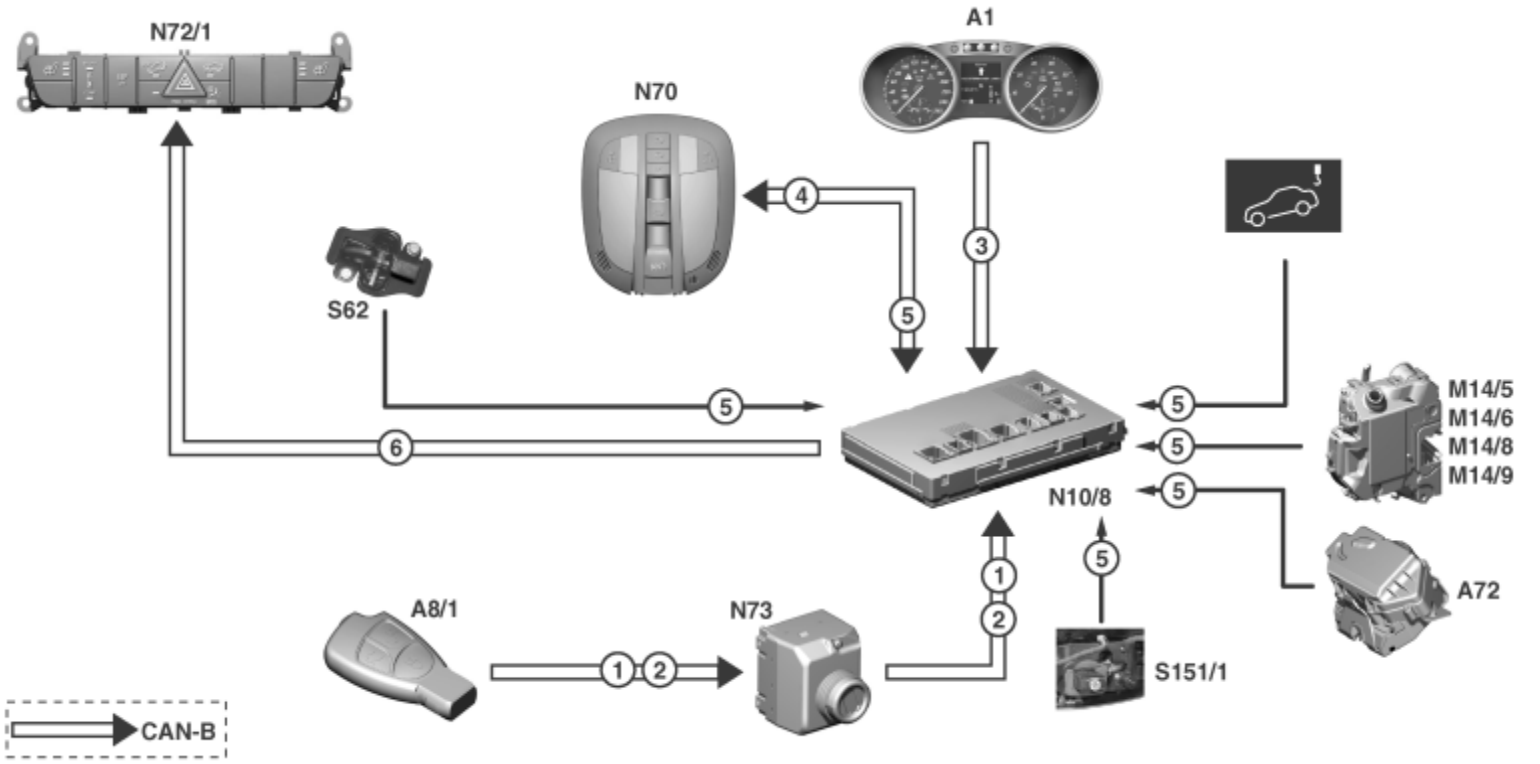
GF80.50-P-2002GZ	Activate anti-theft alarm system, function	21.3.06

MODEL 164 with CODE (551) Anti-theft alarm system (ATA [EDW])



P80.50-2529-09

1 Open central locking system (disarming)
2 Close central locking system (arming)
3 Deactivate interior protection (except USA version, code 494) and/or towing sensor
4 Deactivate interior protection (except USA version, code 494)
5 Status of doors, rear-end door, engine hood, spare wheel carrier lock (only spare wheel holder/spare wheel, code 849), interior protection and towing

A1 Instrument cluster
A8/1 Transmitter key
A72 Rear door locking unit
M14/5 Right front door CL [ZV] motor
M14/6 Left front door CL [ZV] motor
M14/8 Left rear door CL [ZV] motor

M14/9 Right rear door CL [ZV] motor
N10/8 Rear SAM control unit
N70 Overhead control panel control unit
N72/1 Upper control panel control unit
N73 EIS [EZS] control unit
S62 EDW hood switch
S151/1 Spare wheel carrier "locked" switch (only spare wheel holder/spare wheel, code 849)

sensor
6 ATA is armed (LED actuation)

Activate anti-theft alarm (ATA)
- Lock central locking (CL) with transmitter key
- Lock CL with relocking function
- Vehicle locked via Keyless Go (KG) (with Keyless Go, code 889)

Partial activation of ATA
The towing sensor or interior protection (with interior monitoring (with ATA only), code 882) can be switched off for the next activation of the ATA.

Switch off towing sensor and/or interior protection
The towing sensor and/or interior protection can be deactivated for the next arming cycle via the menu in the instrument cluster.

The rear SAM control unit ensures that deactivation commands are not processed after the command "ATA activated" is set. The current status of deactivation of the interior protection sensor and towing sensor are transmitted via the instrument cluster. This deactivation is possible as long as the vehicle is not locked.

Alarm inputs
The ATA evaluates the following alarm inputs:
- Rear door locking unit
- Alarm signal horn with additional battery (H3/1) (except USA version, code 494)
- Alarm signal horn (H3) (only USA version, code 494)
- Right front door rotary tumbler microswitch (M14/5s1)
- Left front door rotary tumbler microswitch (M14/6s1)
- Left rear door rotary tumbler microswitch (M14/8s1)
- Right rear door rotary tumbler microswitch (M14/9s1)
- Spare wheel carrier "locked" switch (only spare wheel holder/spare wheel, code 849)
- EDW hood switch

Only with interior monitoring (with ATA only), code 882:
- Interior protection sensor (B44)
- Left rear window glass breakage sensor (B39)
- Right rear window glass breakage sensor (B39/1)
- Rear window glass breakage sensor (B39/4)

The state of the alarm inputs is checked cyclically If all checks within 10 s indicate the non-actuated state, the corresponding input is armed. Alarm inputs switched to non-actuated state later, are also armed after 10 s.

Towing sensor
The towing sensor is activated 10 s after the locking command from the EIS control unit and after closing of the last door and of the rear-end door, provided that it is not deselected for the next closing cycle on the instrument cluster. If the inclination sensor is defective, the remaining ATA is still fully operable. Determination of this reference position requires 10 s, therefore a towing sensor alarm cannot be accepted before expiration of this time. When the towing sensor function is activated, the ATA inclination sensor determines the current reference position, with which the relative vehicle inclination is compared during the activated time period.

When the maximum vehicle inclination is exceeded with regard to the reference position, a towing sensor alarm is triggered.

The inclination sensor is integrated in the rear SAM control unit.

Interior protection and glass breakage (except USA version, code 494)
The interior protection sensor is activated 10 s after closing of the last door and of the rear-end door, provided that it is not deselected for the next closing cycle on the instrument cluster. The adaptation phase for the interior protection then requires approx. 30 s. The interior protection alarm input is then permitted as an alarm source only, when the overhead control panel control unit recognizes a properly functioning interior protection sensor. The status of the interior protection is returned each time a command transmitted from the overhead control panel control unit is received by the interior protection sensor. With this status feedback, the following replies can be returned to the overhead control panel control unit:

- Interior protection sensor fully operational
- Interior protection sensor defective
- Interior protection sensor activated/disarmed
- interior protection sensor alarm

N70

If a defective interior protection sensor is recognized by the overhead control panel control unit, the remaining ATA function is fully ensured, regardless of this error. The corresponding DTC's are stored in the DTC memory of the overhead control panel control unit.

Alarm signal horn with additional battery (except USA version, code 494)
The alarm signal horn with additional battery can be activated in two different manners:

1.) All doors and the rear-end door are closed: In this case, the alarm signal horn with additional battery is activated by the siren command SET CLOSE.
2.) At least one door or the rear-end door is open: In this case, the alarm signal horn with additional battery is activated by the siren command SET OPEN.

When the alarm signal horn with additional battery is activated, it is cyclically actuated by the rear SAM control unit. This serves for recognition of an interruption in communication, consequently triggering an ATA alarm. When this pause time is exceeded, the alarm signal horn with additional battery triggers automatically an acoustic alarm.

Special case: Driver door
When the anti-theft alarm system (ATA) is activated and the driver door is still open, the left front door CL motor is not actuated and the door remains unlocked. This has the effect that the vehicle key cannot be trapped in the vehicle unintentionally. After closing the driver door, the door status is indicated to the rear SAM control unit and the alarm input is included in the check cycle; a plausible ATA alarm can occur If the driver door is opened without previously activating the ATA, the alarm is triggered.

Special case: Convenience opening/closing function
The windows and the tilting/sliding roof (with power glass tilting/sliding roof, code 414) can be opened and closed with the transmitter key via the convenience opening/closing function. On this convenience function the ATA can be in the activation phase or is already in the armed state The alarm is deactivated for the duration of the convenience function so that the motions of the windows and tilting/sliding roof do not trigger an alarm. After the convenience opening/closing function the ATA is reset to the same status as before the function

Feedback after successful activation
Visual

The activated ATA is displayed with an LED in the ATA function display (N72/1e2) in the upper control panel control unit

Implausible opening/closing command
Repeated or continuous presence of the lock/unlock commands has no effect on the function of the ATA. When the opening and closing commands are transmitted indiscriminately, the signal last received determines the function status.

Automatic relocking
The automatic relocking is actuated by the EIS control unit, if the vehicle is unlocked and none of the doors or the rear-end door are opened within 40 s. In this case the vehicle relocks automatically. Relocking is not signaled by the turn signal lamps. The interior protection and the towing sensor are set to the same state as before the last unlocking procedure.
The ATA is armed when relocking

Automatic rear-end door remote release
The rear-end door remote release is a convenience function offering the driver the possibility to open the rear-end door with the transmitter key. Since the rear-end door is also an alarm input and this function should also be available when the vehicle is locked, it is necessary that the ATA supports the rear-end door function so that no alarm is generated and after completion of the rear-end door remote release, the ATA is reset to its original state.

Disarm automatic rear-end door remote release
Only the alarm inputs for the rear-end door, interior protection and towing sensor are disarmed by the rear-end door remote control; all other ATA alarm inputs remain armed, i.e. actuated.

Rearm after automatic rear-end door remote release
If the rear-end door is relocked after rear-end door remote release, the rear-end door, interior protection and towing sensor alarm inputs are rearmed.

	Deactivate anti-theft alarm system, function		GF80.50-P-2003GZ
	Trigger anti-theft alarm system, function		GF80.50-P-2004GZ
	Rear SAM control unit, component description		GF54.21-P-7030GZ
	Upper control panel control unit, component description	With AIRmatic (air suspension with level adjustment and adaptive damping system(ADS) code 489, offroad package, code 430 and USA version, code 494	GF54.21-P-6040GZU
		With AIRmatic (air suspension with level adjustment and adaptive damping system (ADS), code 489, except offroad package, code 430	GF54.21-P-6040GZ
		Model 164.8 with AIRmatic (air	GF54.21-P-6040GZA

		suspension with level adjustment and adaptive damping system (ADS), code 489 and with USA version, code 494	
	Left front door control unit, component description		GF72.29-P-4141GZ
	Infrared remote control receiver, component description		GF80.30-P-6000GZ
	Alarm signal horn, component description	USA version, code 494	GF80.50-P-6030GZU
	Electronic ignition switch (EIS) control unit, component description		GF80.57-P-6000GZ
	Transmitter key, component description		GF80.57-P-6010GZ
	Overhead control panel control unit, component description		GF82.20-P-5216GZ
	Roof antenna module, component description	USA version code 494	GF82.62-P-3127GZU