

BMW Bluetooth Installation Instructions

X5 (E53) Installation Instructions

All Kits

**Please Note:**

Please read all information present before attempting installation of this device.

BMW Bluetooth, defined as the creators, sellers and resellers are in no way responsible for any damage or malfunction, which may occur to your car and/or your car's electrical system by installing this unit.

"Never use any electronic device or make any inputs while driving that may distract you from driving safely. Pay attention to traffic laws and road conditions/situations. Safe vehicle operation is the driver's responsibility. Always wear your safety belt."

PLEASE NOTE: The instructions provided in this manual are considered suggestions, and are provided to help assist you with the installation. BMW Bluetooth accepts no responsibility for what you choose to do with these instructions.

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Kit Contents

Kit One:

BMW OEM Bluetooth Module
BMW Bluetooth Antenna
BMW OEM Pairing Button
Pairing Button Interface Cable
Bluetooth Antenna Interface Cable
ULF Control Module Interface Cable

Kit Two:

BMW OEM Bluetooth Module
BMW Bluetooth Antenna
BMW Eject Box with Oddment Tray
Eject Box Interface Cable
Bluetooth Antenna Interface Cable
ULF Control Module Interface Cable

Kit Three:

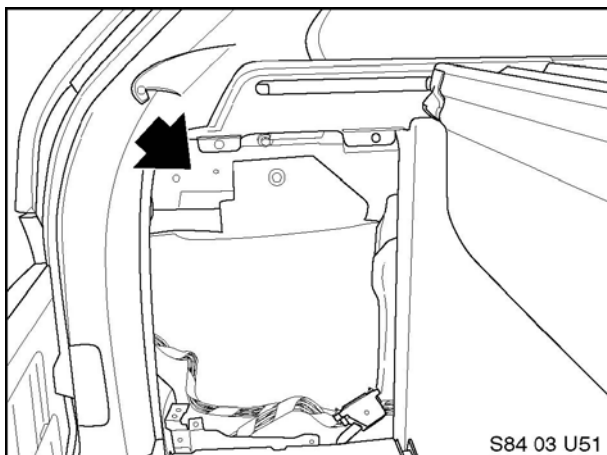
BMW OEM Bluetooth Module
BMW Bluetooth Antenna
Bluetooth Antenna Interface Cable
ULF Control Module Interface Cable with Pairing Button

Optional Accessories:

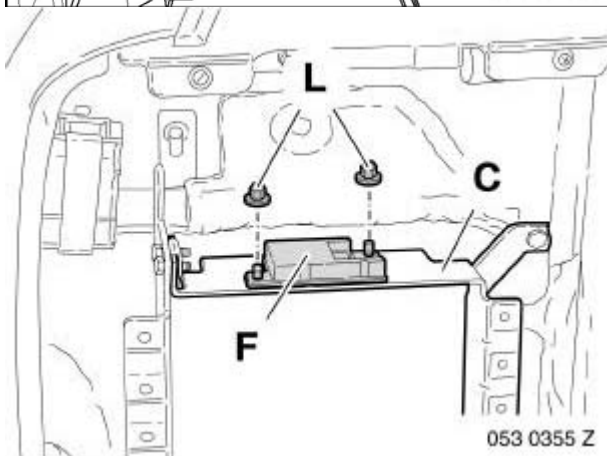
Microphone
SES Jumper Plug
External Amplifier
ULF Installation Brackets
X5 Extension Cables

Installation Instructions:

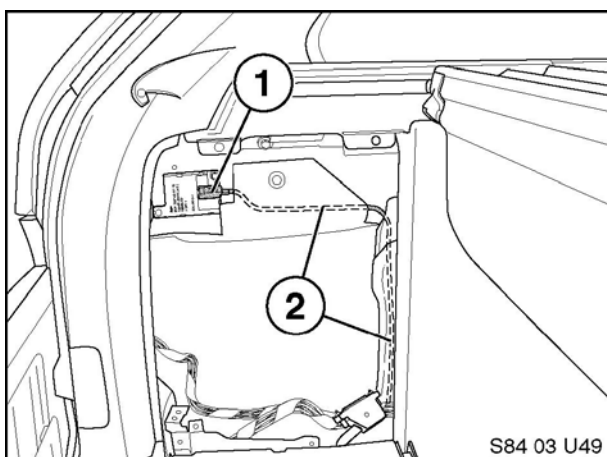
A. Bluetooth Antenna Installation



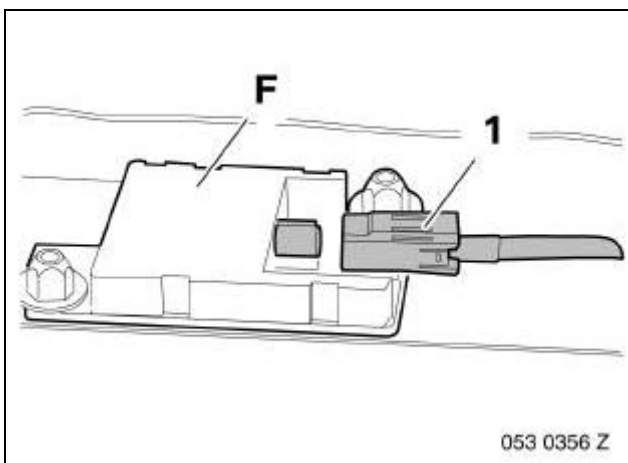
Begin installation in the left rear quarter panel area as shown in the picture to the left.



Mount the antenna in one of the two locations shown on the left, if your vehicle has carrier brackets; use the top picture with either the included double-sided tape or plastic hex nuts.

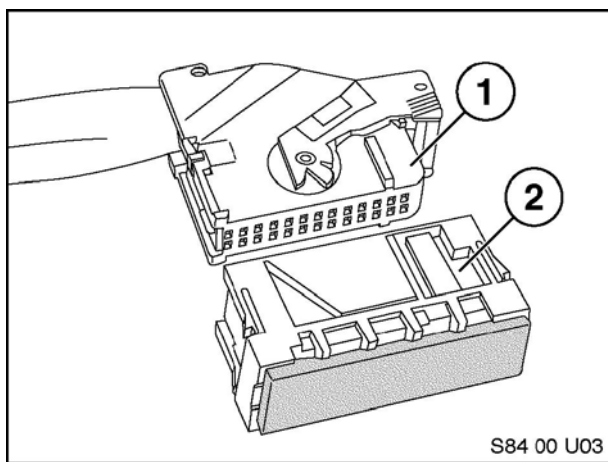


If your vehicle does not have the rear carrier brackets, use the location shown in the picture to the left.



Connect the Bluetooth Interface Cable to the Bluetooth Antenna as shown in the picture. Route the other end of the cable to the lower portion of the left rear quarter panel access area.

B. Voice Input Jumper Installation



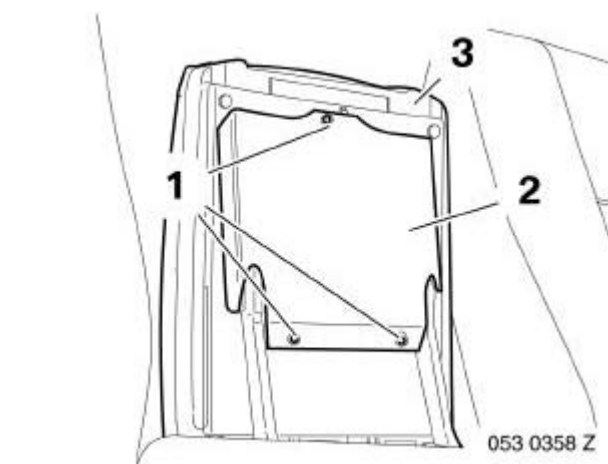
This is a critical step in the installation process. If not done properly, then Bluetooth will not operate correctly.

If a Voice Input Jumper Plug is not installed, then a Jumper Plug must be obtained and installed for the system to function correctly. You may purchase this plug from BMW or on BMWBluetooth.com. The jumper plug should be installed onto a blue 26 pin connector that is located near the black 25 pin connector for the ULF module.

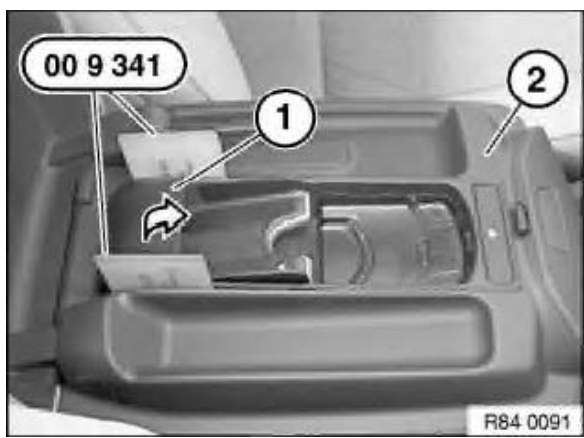
If your vehicle was produced 08/00 or earlier, you may not have this plug in your vehicle.

Ca. Eject Box Installation (Kit Two)

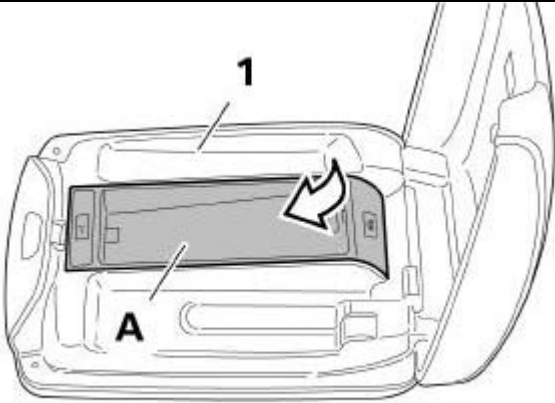
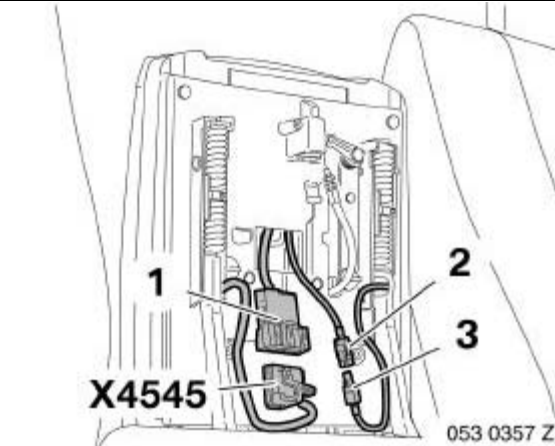
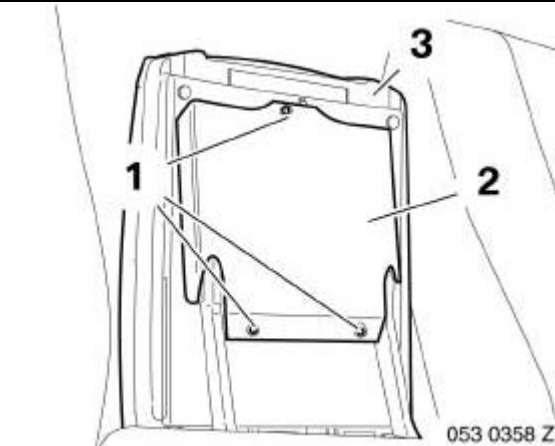
If your vehicle was produced 03/01 or earlier, do not follow the instructions in this section, please follow the instructions in section J. Also, this section does not apply if you have kit number one or three.



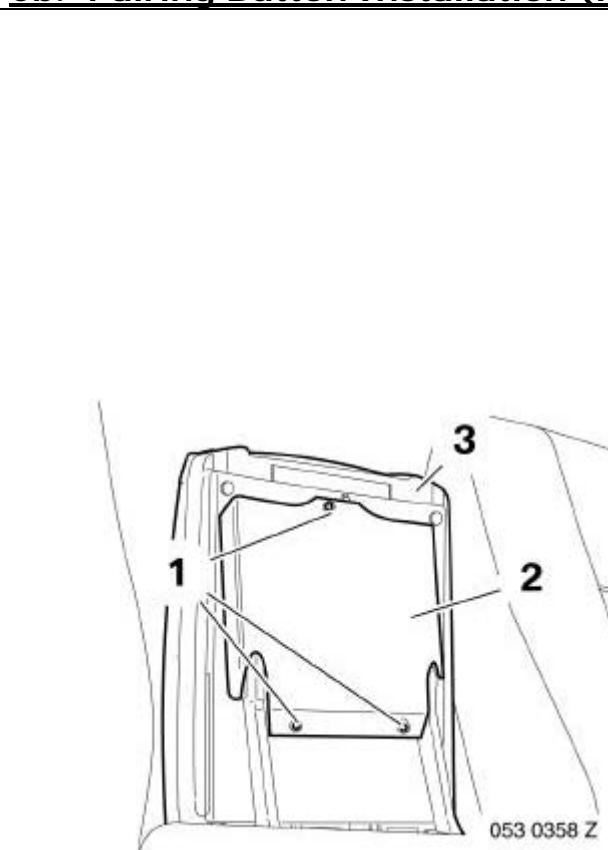
Flip the armrest of the center console up and remove the 3 screws (1) that hold the cover (2) in place.



Remove the oddment tray currently installed in the armrest by using two plastics cards, such as credit cards, and inserting them in the space shown to the left. Slowly pull from the back, up and towards the rearview mirror as shown with the arrow in the picture.

 <p>053 0359 Z</p>	<p>Insert the eject box (A) into the armrest (1) and feed the cables and connectors through the opening in the armrest assembly.</p>
 <p>053 0357 Z</p>	<p>Connect the black 18-pin connector (1) of the eject box to the black connector X4545 from the vehicle wiring harness. Connect the antenna cable (2) from the eject box to the eject box interface cable then connect to the antenna cable for the vehicle (3).</p>
 <p>053 0358 Z</p>	<p>Reinstall the cover (2) to the center armrest (3).</p>

Cb. Pairing Button Installation (Kit One)

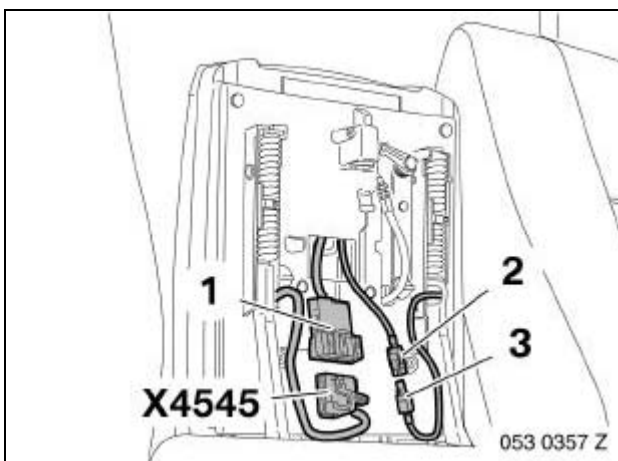


If your vehicle was produced 03/01 or earlier, do not follow the instructions in this section, please follow the instructions in section J. Also, this section does not apply if you have kit number two or three.

Flip the armrest of the center console up and remove the 3 screws (1) that hold the cover (2) in place.

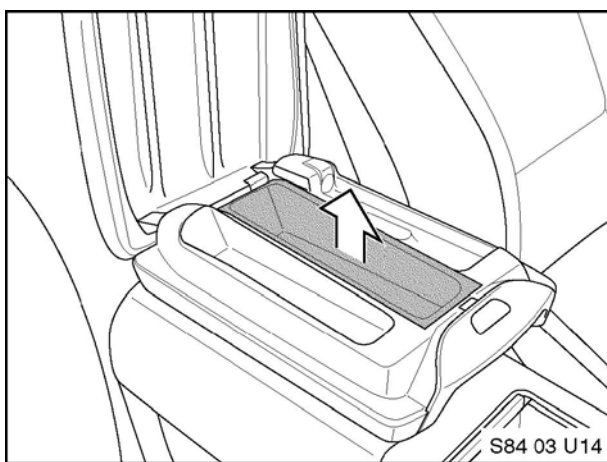


Remove the oddment tray currently installed in the armrest by using two plastics cards, such as credit cards, and inserting them in the space shown to the left. Slowly pull from the back, up and towards the rearview mirror as shown with the arrow in the picture.



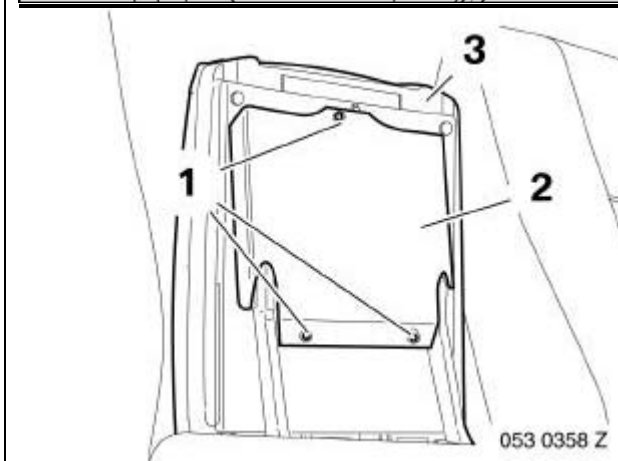
Insert the Pairing Button Adaptor Harness through the opening through the opening in the armrest assembly.

Connect the black 18-pin connector (1) of the eject box to the black connector from the vehicle wiring harness.



The pairing button will end up in the oddment tray. For best location, put the button directly above the opening for the wires to pass through in the center console. You may put the pairing button in a another location as you see fit.

You will have to cut a rectangular hole that is 25mm by 16mm for the pairing button.



Reinstall the cover (2) to the center armrest (3).

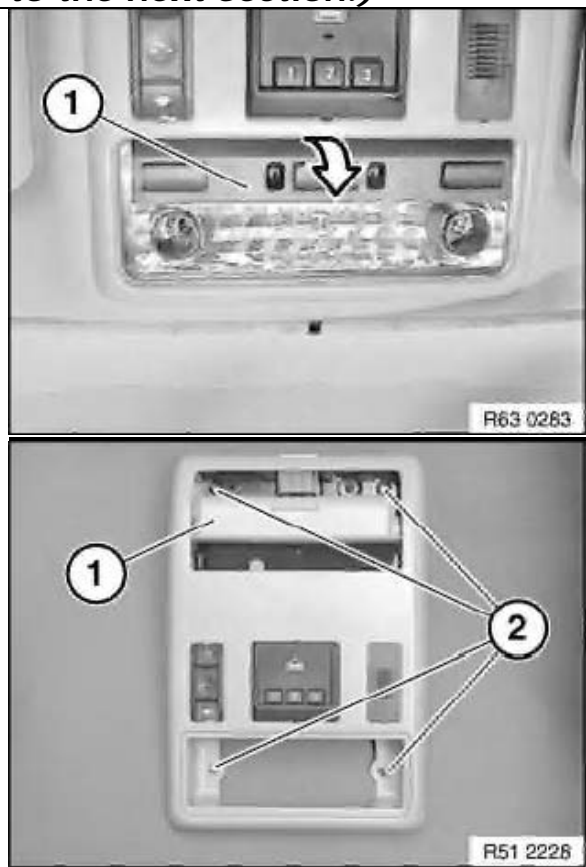
Cc. Limited Access Pairing Button Installation (Kit Three)

Kit Three is ONLY valid if you have a vehicle with a cradle already installed for a different phone system. Also, this section does not apply if you have kit number one or two.

There is no additional front installation required. Your pairing button will be next to the BMW OEM ULF Module in the trunk of your vehicle.

D. Microphone Installation

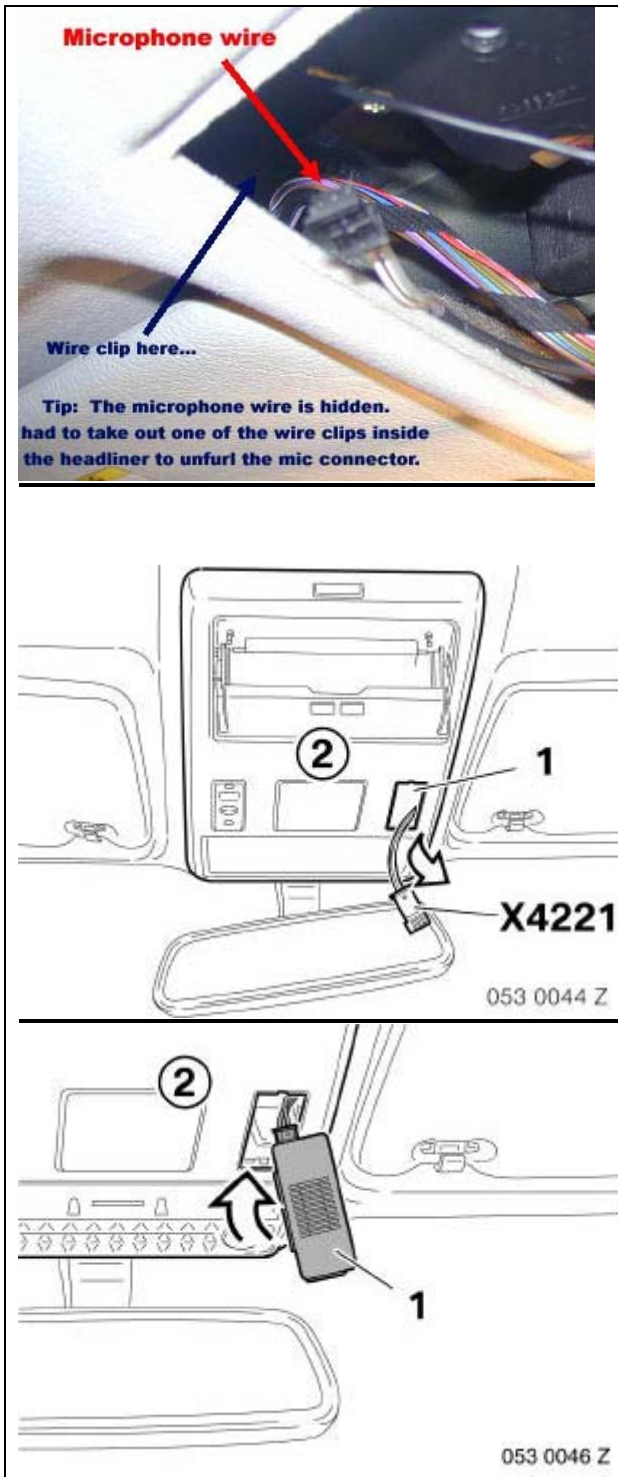
(This step is only necessary if you have purchased a microphone that needs to be installed. Otherwise, please skip to the next section.)



Removal of front ceiling light:

Lever out ceiling light (1) in the direction of the arrow. Then disconnect plug connection underneath and remove the ceiling light. (1)

Now open the "glasses compartment," (1) and unfasten the four screws. (2) Lower the bracket, and disconnect the plug connections and remove the bracket.



Locate the microphone wire, it may be wire tied toward the left side of the headliner inside the front ceiling light area. The connector is black in color.

Please Note: If you do not have the universal garage door opener, there may be two connectors. Please verify that you are using the microphone connector. One of the wires on the microphone connector will have clear insulation.

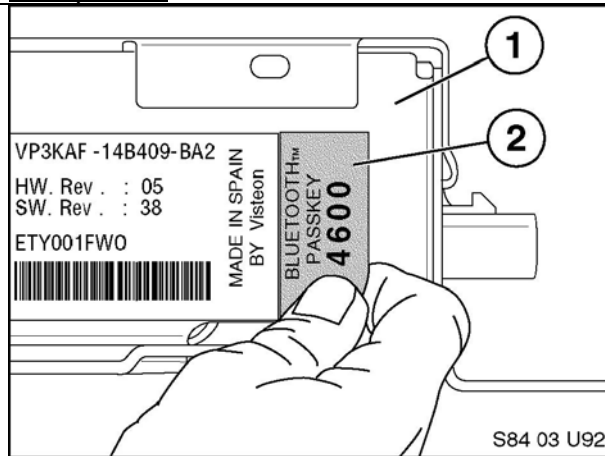
Remove the microphone fret (1) and install the microphone, and connect the black 3 pin connector.

Install microphone, into the microphone fret (1) and reinstall the fret into the headliner console. Reinstall the headliner console.

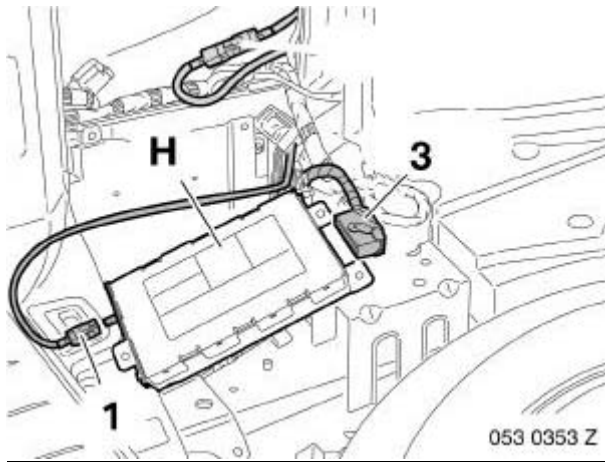
E1. ULF Control Module Installation

(This is the installation for those who chose not to purchase the optional ULF Control Module Brackets.)

If you purchased Kit Three with the limited access pairing button, please make sure that it is accessible after this installation step is complete.



Remove the BMW Bluetooth Passkey sticker from the ULF Control Module and place it in a safe place, such as the owners manual. You will need this anytime you want to add a phone to operate with your car's Bluetooth hands free system. Locate the DB25 connector located



Connect the end coming from the BMW Bluetooth Antenna to the antenna connection as shown by number one on the BMW ULF Module.

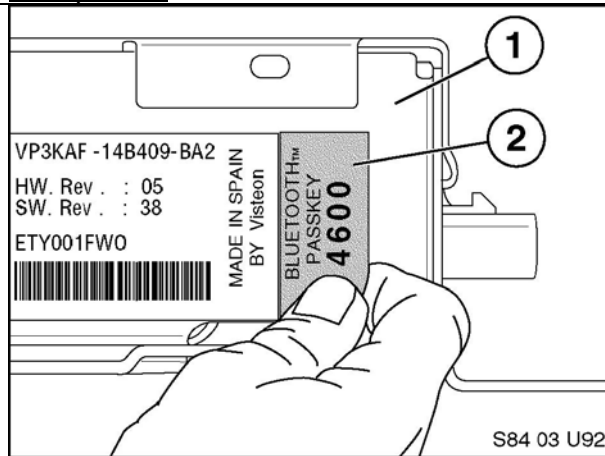
Connect the vehicle's DB25 connector to the DB25 connector on the end of the ULF Interface Cable. Ensure that the ULF Interface Cable is securely connected to the ULF Module.

Use the included zip ties to securely mount the ULF Control Module in place.

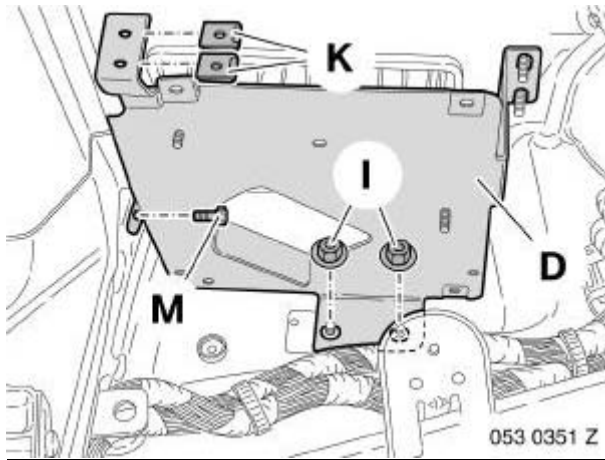
E2. ULF Control Module Installation with Brackets

(This installation is for those who chose to purchase the optional ULF Control Module Brackets.)

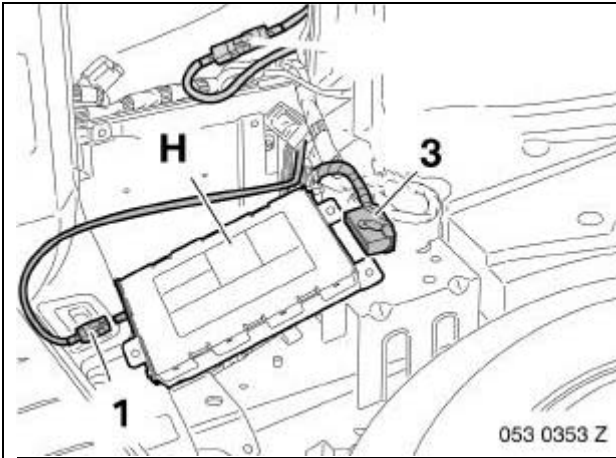
If you purchased Kit Three with the limited access pairing button, please make sure that it is accessible after this installation step is complete.



Remove the BMW Bluetooth Passkey sticker from the ULF Control Module and place it in a safe place, such as the owners manual. You will need this anytime you want to add a phone to operate with your car's Bluetooth hands free system. Locate the DB25 connector located _____.

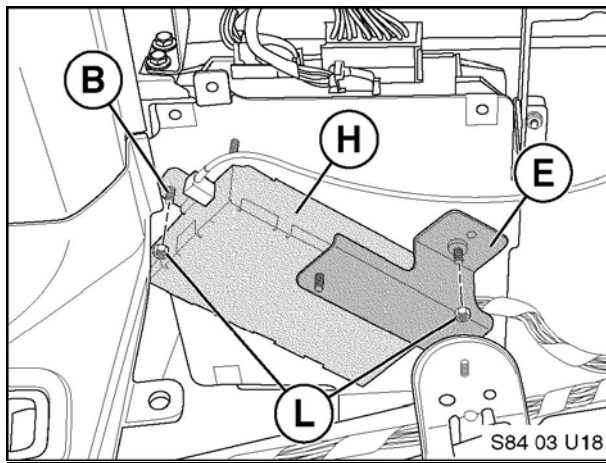


Use the included bracket and fasteners to replace the existing bracket in the vehicle as shown in the picture to the left.



Connect the end coming from the BMW Bluetooth Antenna to the antenna connection as shown by number one on the BMW ULF Module.

Connect the vehicle's DB25 connector to the DB25 connector on the end of the ULF Interface Cable. Ensure that the ULF Interface Cable is securely connected to the ULF Module.



Insert the single metal tap of the ULF Control Module (H) over the threaded pin (B) on the left side of the mounting plate and allow the control module (H) to rest on top of the lower support plate. Secure the module to the mounting plate using a plastic cap nut (L).

F. Coding ULF Control Module to Vehicle


Your system may not work until the vehicle is recoded at the local dealer using a BMW Diagnostics Computer. Below are the steps that the dealer will have to take to do the recoding:

After installing the ULF Kit, the vehicle should be re-coded with DISPlus/GT1 SW 33 or higher, using the "Retrofit" path to ensure that the system works properly with the systems currently installed in the vehicle. The recoding is done automatically when using the following "retrofit" procedure:

- Connect DISPlus or GT1 to vehicle (with SW 33 or higher installed).
- Turn on ignition
- Select "Coding ZCS"
- Series: "E53 Series"
- Path: "2 Retrofit"
- System: "ULF Universal charging and Handsfree facility".
- Follow the on screen requests to activate the coding procedure.

G. Function Test

Upon completion of the recoding, verify that the BMW Universal Bluetooth Hands-Free System is working correctly by going through the following action steps. After completing each step, ensure that the desired result is obtained.

Action	Response
Pair phone to vehicle (refer to section ____ for pairing instructions).	Phone and/or Radio/MID/Board Computer should display statement indicating Pairing Succeeded.
Turn on radio and initiate a call using voice recognition commands by depressing/holding the Voice Recognition button on steering wheel until an audible beep is heard. Please Note: Voice recognition will only work if you have the voice button on your steering column, otherwise you can initiate it using the pairing button or cradle.	Radio should mute and an audible beep is heard through vehicle speakers. 
Say "Dial Number."	System states, "Please speak the number."
Say phone number to be dialed. Ex. 913-555-1212	System states, "913-555-1212."
If number is correct, say "Dial."	Call is placed and number being dialed is displayed on the phone as well as on the Radio/MID/Board Computer.

H. Troubleshooting

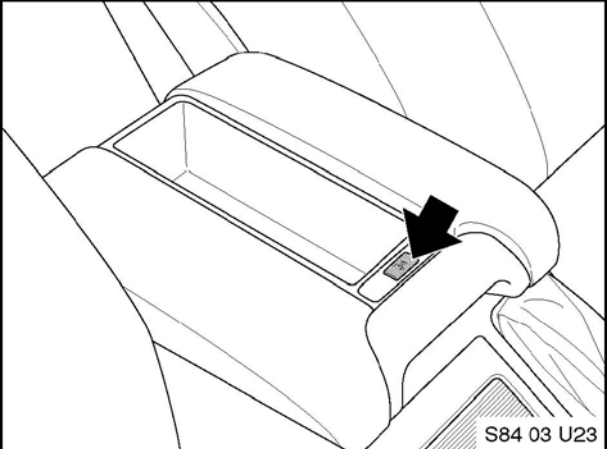
Situation	Correction
No audio output through vehicle speakers.	Check SES module jumper plug.
Radio does not mute after placing a call.	Check connections at rear of radio for Tel On and Tel Mute signal. Verify that connectors and pins and properly seated.
Audio quality in vehicle may not sound very good.	<ul style="list-style-type: none"> • Recode ULF Control Module • NOTE: Audio quality in vehicle or at person being contacted is dependent on the quality and signal strength of the wireless service provider in the area traveled.
The person being contacted hears a "Buzzing" noise, at times during your conversation or on voicemail messages that you have left.	Intermittently a "Buzzing" noise is noticeable to the person being called from the vehicle. The "Buzzing" noise is a result of the GSM signal giving feedback through the microphone, this usually occurs if the GSM phone is located too close to the microphone. You should change the location of where your phone is placed/stored.
You are told that the person being contacted complains that there is an echo/reverberation in the audio; person can hear his/her voice back through the phone.	Audio volume in vehicle during a call may be a bit too loud, causing the other person to hear his/her voice coming back through the phone.
A second call is received while in a call, and call cannot be accepted using MFL controls.	Use handset to expect second call and place previous called on hold. Call waiting is functional only via the handset.
The radio audio does not come back immediately if the other person hangs up first.	It takes approximately 15 seconds for the ULF system to recognize that the call was terminated from outside the vehicle. If the call is terminated from outside the vehicle first, the driver

	can depress the button on the steering wheel to terminate the call from the vehicle and un-mute the radio quicker.
Customer is not able to pair phone to system, not able to locate ULF passkey/password reference card.	<ul style="list-style-type: none"> - The Bluetooth Passkey is identified on the label of the ULF Control Module located in the rear of the vehicle. - The Bluetooth Passkey for the installed control module can be obtained by connecting the DISPlus or GT1 and accessing the diagnostics for the ULF system: - select Diagnostic requests - select Bluetooth code
Intermittently a popping noise is audible through the vehicles speaker and there is no Bluetooth wireless communication established between the ULF module and the phone.	<ul style="list-style-type: none"> - Vehicle and /or ULF Control Module are not correctly coded. - Recode module and vehicle (refer to Coding ULF Control Module to Vehicle)

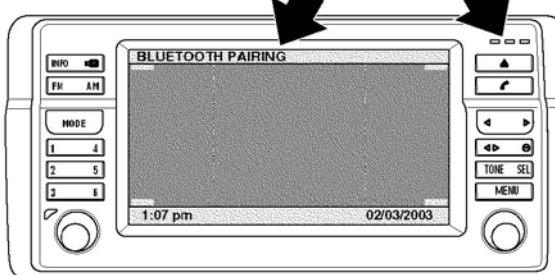
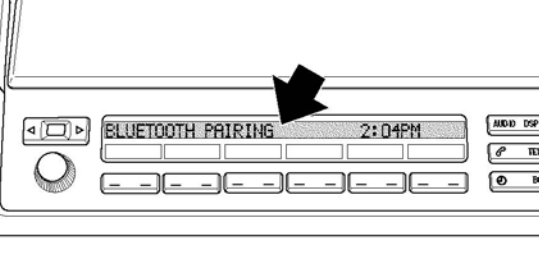
I. Pairing Procedure:

The pairing procedure that must be initiated through the phone will differ corresponding to the different menu configurations of the various Bluetooth mobile phones on the market. The user's manual of the phone should always be referenced for specific steps on how to activate the Bluetooth feature and to pair/link devices.

The following steps are generalized steps that should help in activating the Bluetooth function of most phones:

	<p>IN VEHICLE:</p> <ol style="list-style-type: none">1. Depress the pairing button for at least 1 second prior to switching on the ignition and continue to hold the button down for approximately 2-3 seconds after the ignition is turned on.2. Release the button.
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3. Shortly after releasing the button; the Board Monitor or MID display should look like one of the following:

 <p style="text-align: right;">S84 03 U</p>	 <p style="text-align: right;">S84 03 U</p>
<p>a. Board Monitor Display:</p> <ul style="list-style-type: none"> • "Bluetooth Pairing" displayed. • Green, Yellow and Red LEDs on the right side of the unit are flashing which indicates that the ULF is searching for available Bluetooth devices. <p>Please Note: Displays may not say "Bluetooth Pairing," however; the three LEDs will flash to indicate that the ULF is searching for available Bluetooth devices.</p>	<p>b. MID Display:</p> <ul style="list-style-type: none"> • "BT Pairing" display which indicates that the ULF is searching for available Bluetooth devices. • Green, Yellow and Red LEDs on the right side of the unit are flashing which indicates that the ULF is searching for available Bluetooth devices. <p>Please Note: Displays may not say "Bluetooth Pairing," however; the three LEDs will flash to indicate that the ULF is searching for available Bluetooth devices.</p>

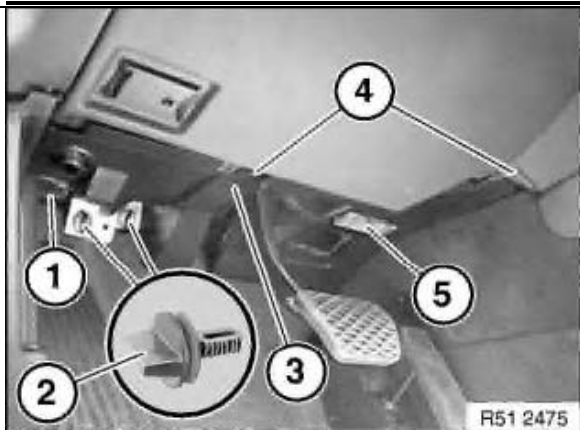
4. Activate the search function of the phone as indicated on the next page.

ON PHONE:

1. Locate the connection/settings menu and select Bluetooth.
2. Select the response that will activate the Bluetooth feature of the phone.
3. Next select a menu option that will allow you to "Discover" or "Search" for active Bluetooth devices.
4. If the phone identifies/finds a device select it and follow the indicated steps to complete the pairing process.
5. Once the phone is successfully paired to the device cycle the ignition switch off and back on and the devices should wirelessly connect within 30 seconds. When the connection is established the phone will display a connection symbol.

Note: Shortly after turning on the ignition and the Bluetooth connection is identified, the phone may display a message asking if the connection should be established/accepted. The connection authorization request will always occur unless the setting on the phone is modified to allow automatic connection every time, please refer to the user's manual of the phone to determine how to change this setting.

J. X5 Center Console Extension Installation 03/01 and Earlier



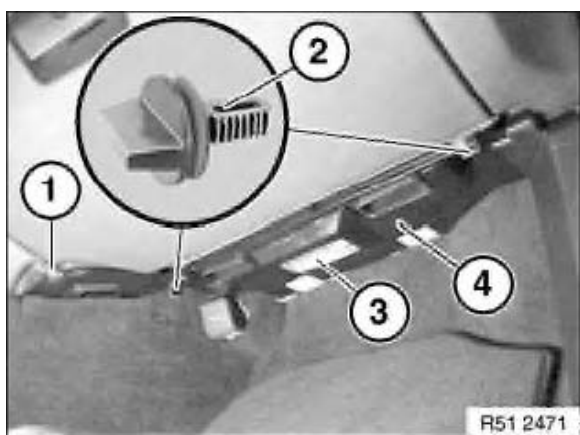
Unlock gong (1) and remove from trim (3).

Release screws (4).

Turn toggle (2) and remove.

Lower trim (3) a little and disconnect plug connection for footwell light (5).

Remove trim (3).



Release screw (1).

Turn toggle (2) and remove.

Lower trim (4) a little and disconnect plug connection for footwell light (3).

Remove bottom right trim (4) for instrument panel.



Remove Heating Controls by prying on controls from left side.



Press out switch unit through the opening for heating controls. When the switch unit is out, disconnect the plug.



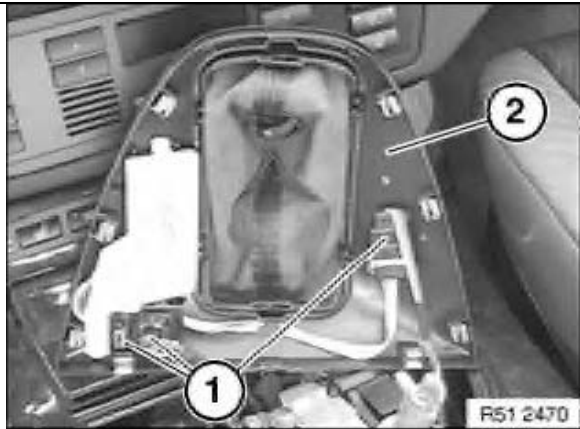
Engage Parking Brake, with key in ignition, **BUT VEHICLE NOT RUNNING**, engage into drive.

Pull shift knob (1) upwards with a forceful jerk, **DO NOT** twist the knob, as it will cause damage.

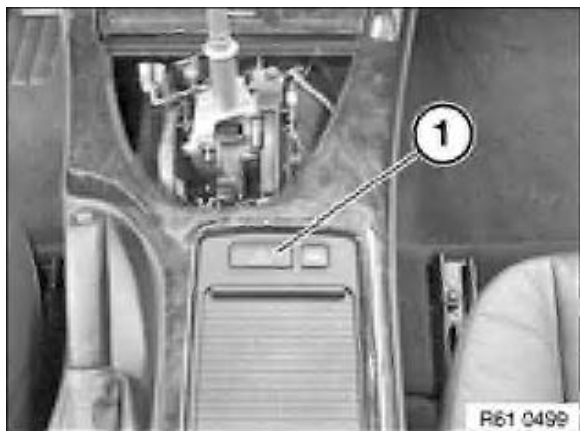
When reinstalling, press shift knob down until you feel a snap.



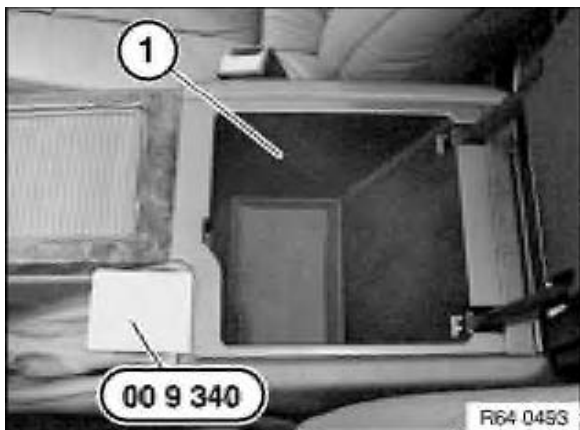
Remove trim piece by pulling by arrow in the direction of the arrow.



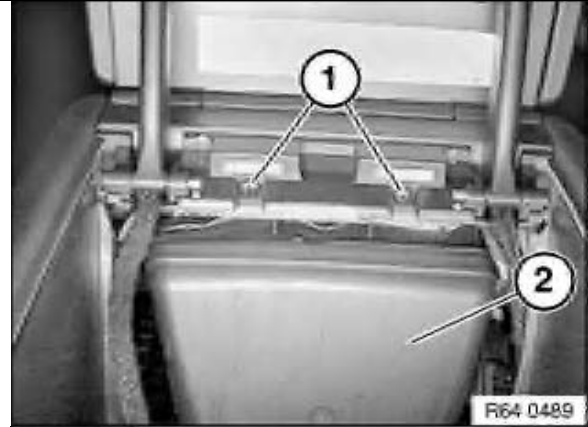
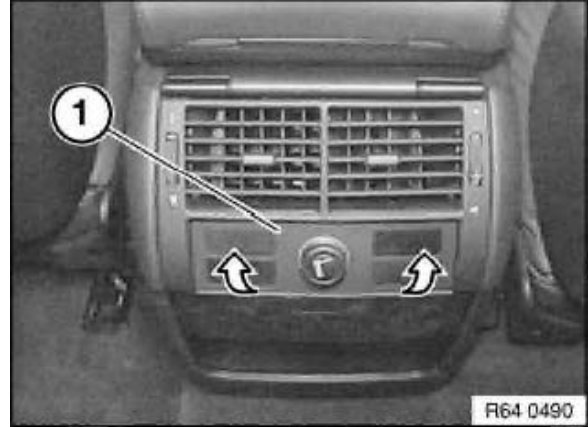
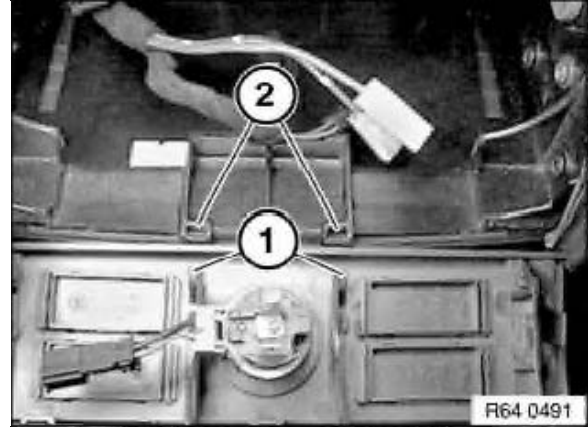
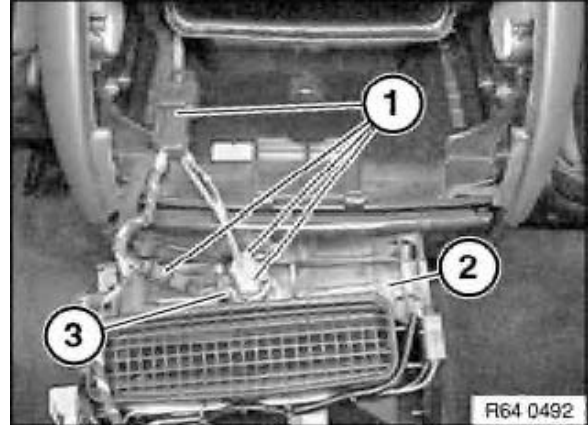
Disconnect all connections (1) and remove trim piece.
Please Note: Pay special attention to connectors for hazard switch and shift indicator; they are keyed the same and can be inadvertently switched during the reassembly process.

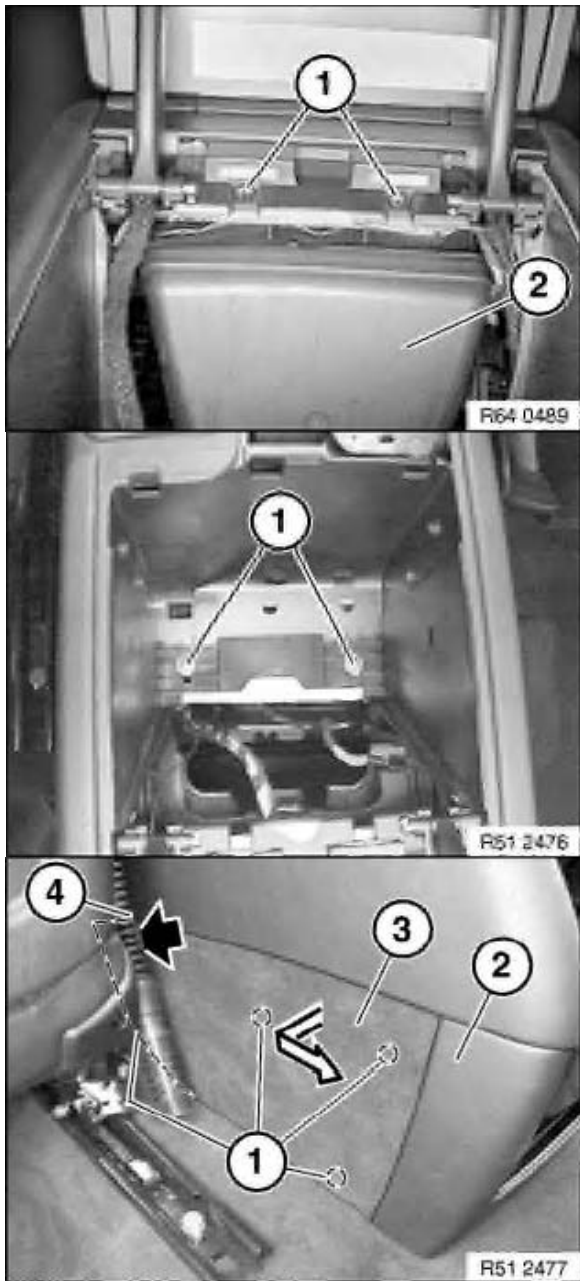


Press out the Hazard Warning Switch(1) through the opening for the shift knob lever finisher.
Please Note: Pay special attention to connectors for hazard switch and shift indicator; they are keyed the same and can be inadvertently switched during the reassembly process.



Remove Storage Box, by using a screwdriver.

	<p>Loosen Screws (1)</p> <p>When reinstalling, ensure that the air duct (2) is correctly sealed.</p>
	<p>Pull out fresh-air grill (1) in direction of arrow.</p>
	<p>When reinstalling, snap journals (1) into place in openings (2).</p>
	<p>Disconnect plug connections (1). Remove fresh-air grill (2).</p>



Remove Air Duct (2)

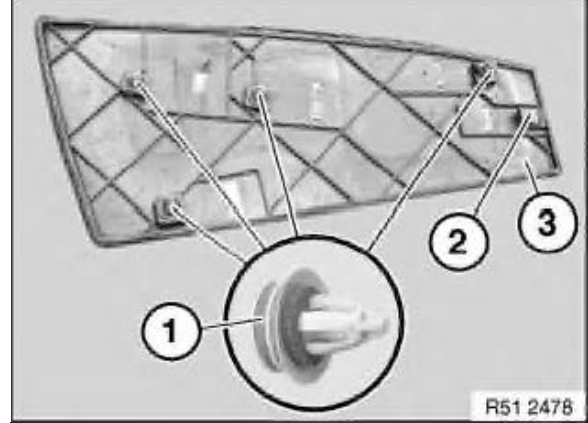
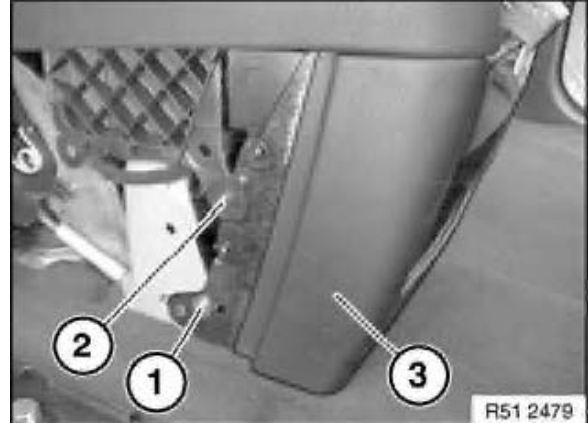
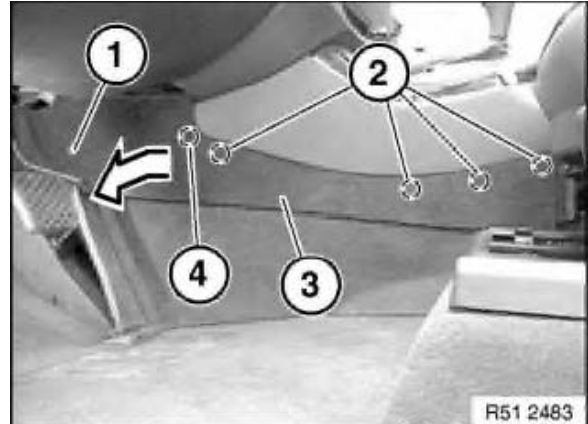
Remove screws (1)

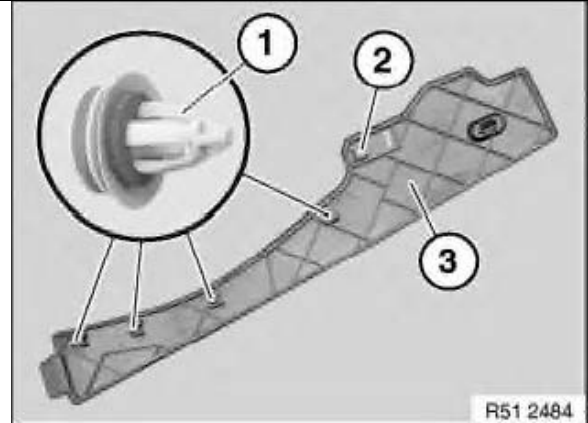

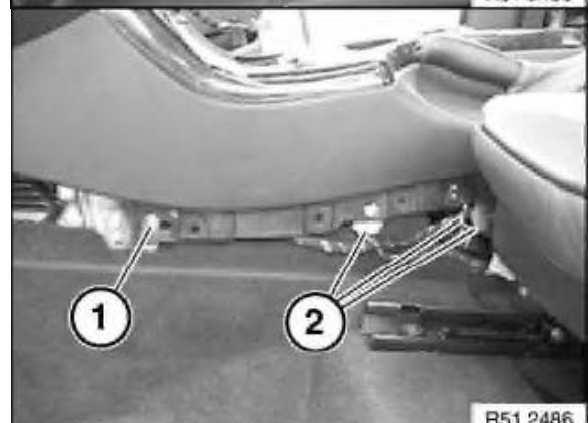
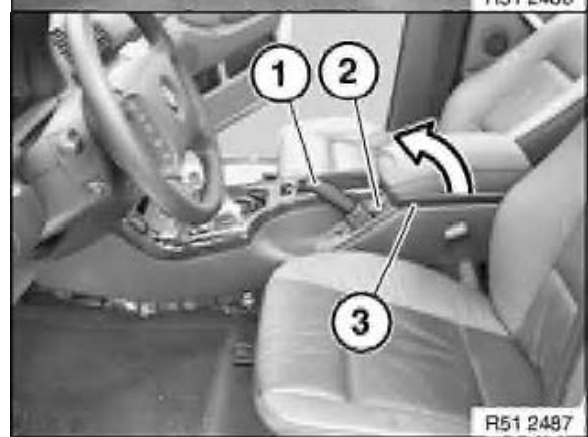
Caution!

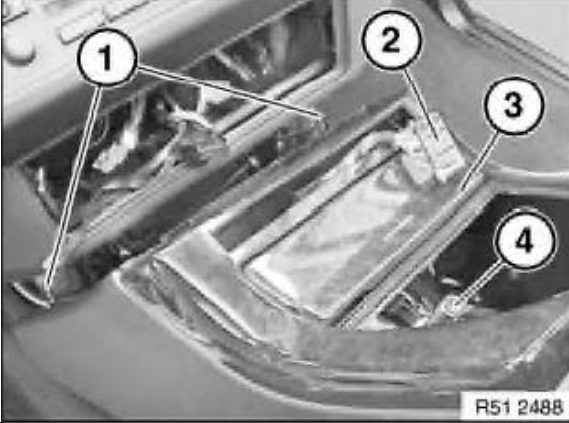
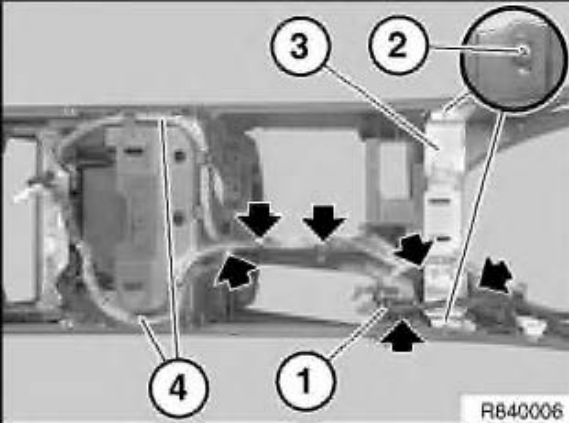
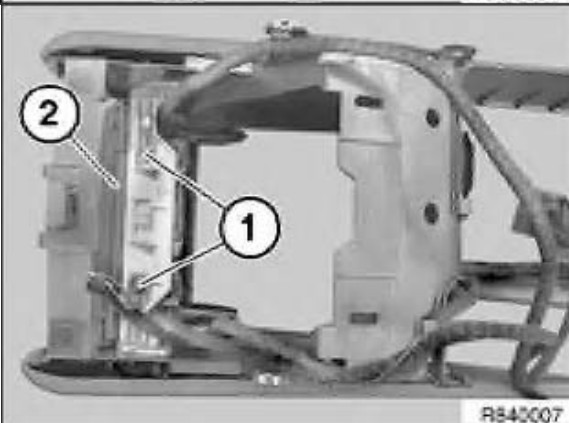
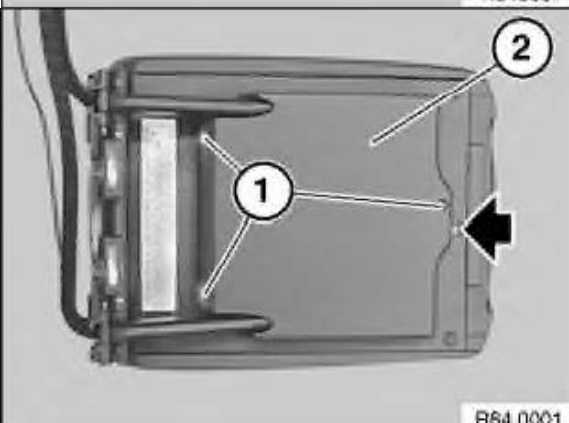
Last clip on front carpet (4) must be unclipped (risk of damage).

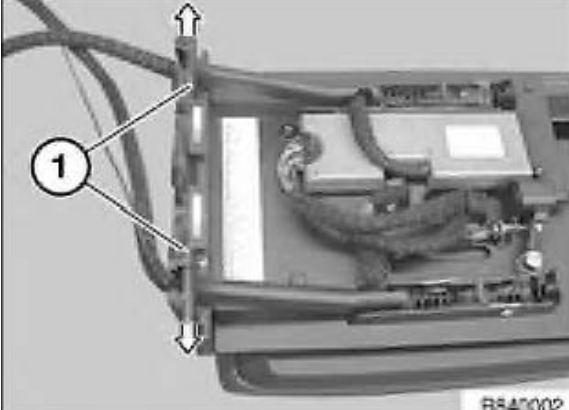
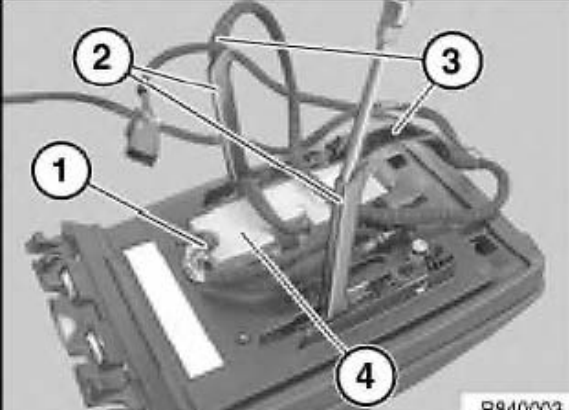

Unclip clips (1) on left/right with carpet (3) outwards from center console (2).

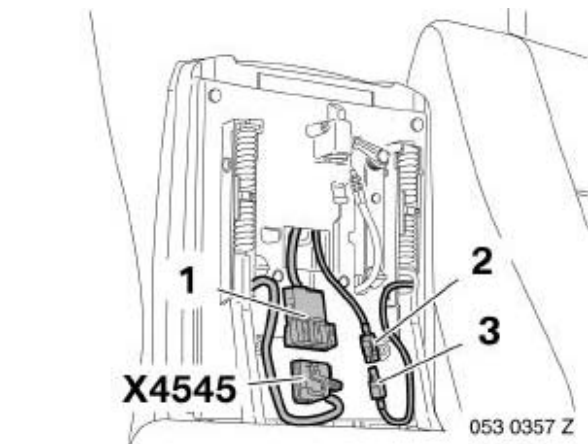
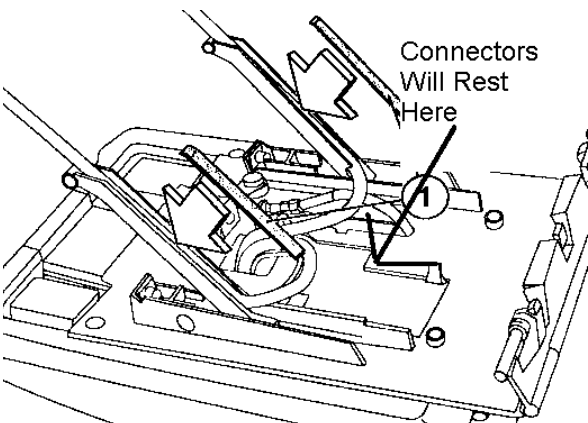
Pull out carpet (3) towards rear.

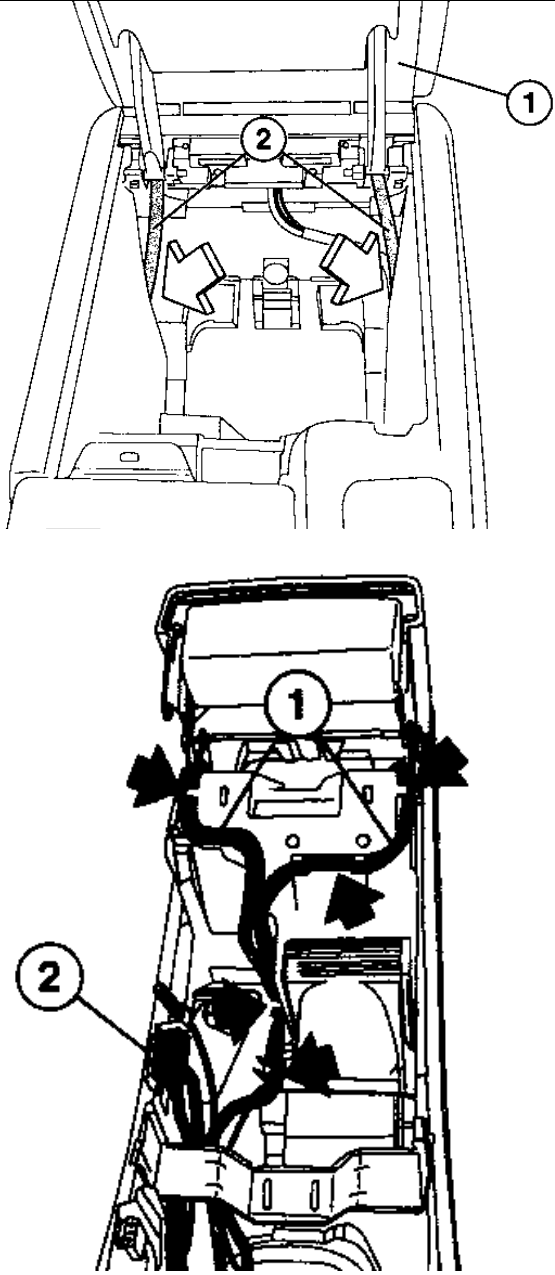
	<p>Picture to show locations of hidden clips.</p>
	<p>Release screw number 1 ONLY.</p>
	<p>Release left/right screws (1). Unclip clips (2) outwards on side carpet (3) on left/right. Slide side carpet (3) forwards out of retainer (4) and remove.</p>

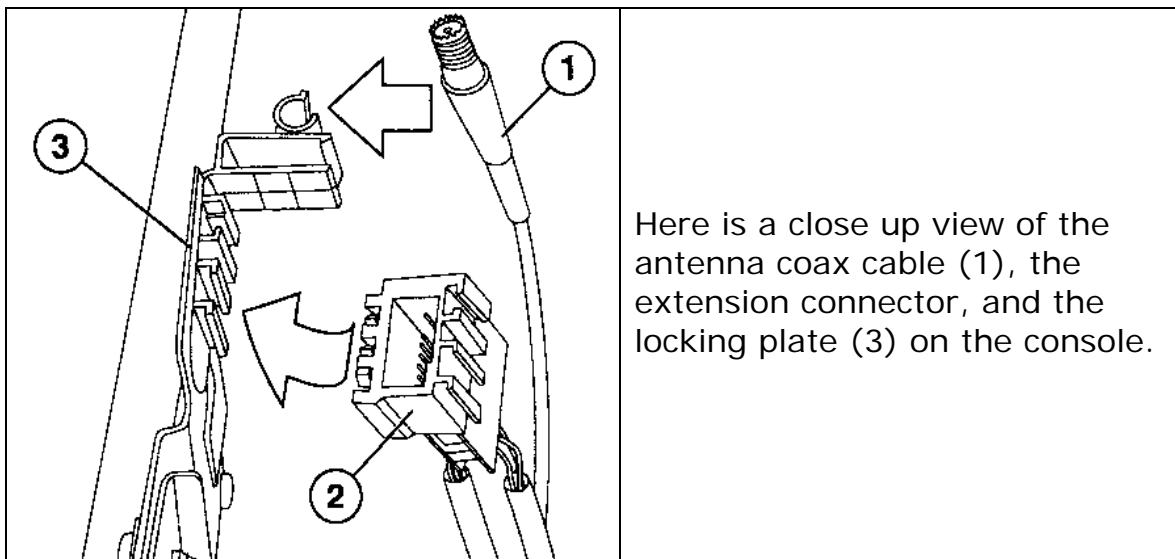
 <p>R51 2484</p>	<p>Picture to show locations of hidden clips.</p>
 <p>R51 2485</p>	<p>Release screw (1).</p>
 <p>R51 2486</p>	<p>Release left/right screws (1). Disconnect plug connections (2).</p> <p>On the lower left side of console, approximately in the middle, are three connectors. Ashtray cigar lighter and phone antenna coax cable with 18 pin ELO connector (2)</p>
 <p>R51 2487</p>	<p>Apply handbrake lever (1) to max setting. Unclick rubber gaiter (2). Raise center console (3) at rear and lift over handbrake lever (1).</p>

 <p>R51 2488</p>	<p>Feed plug (2) out of center console (3). Lift center console (3) over shift stick (4) and remove from car.</p> <p><i>When installing:</i> Guides (1) must not be damaged.</p>
 <p>R640006</p>	<p>With center console removed:</p> <p>Unclip plug connections (1). Release screws (2) and remove bracket (3). Release cable straps and remove wiring harness (4) from guides.</p> <p><i>When reinstalling:</i> Ensure correct cable routing.</p>
 <p>R640007</p>	<p>Loosen screws (1). Remove armrest (2).</p>
 <p>R64 0001</p>	<p>Loosen screws (1). Feed out cover (2) on lock and lift off.</p>

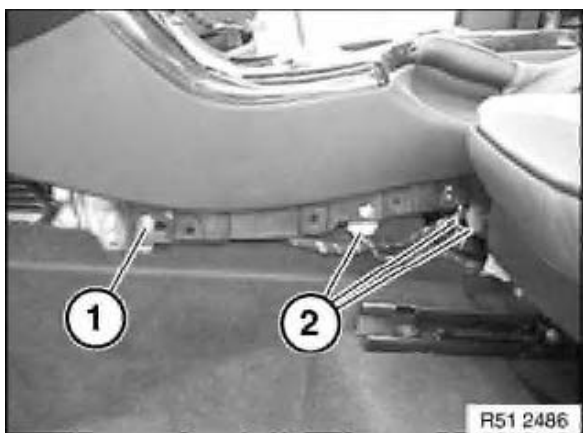
 <p>R840002</p>	<p>Drive out pins (1) in direction of arrow.</p>
 <p>R840003</p>	<p>Disconnect plug connection (1). Lever out covers (2) and feed out wiring harness (3). Remove interface for telephone (4). <i>When installing:</i> Ensure correct cable routing.</p>
 <p>R84 0091</p>	<p>Remove the oddment tray or phone cradle currently installed in the armrest by using two plastics cards, such as credit cards, and inserting them in the space shown to the left. Slowly pull from the back, up and towards the rearview mirror as shown with the arrow in the picture. Remove of old cradle completely.</p>

	<p>Install supplied extension harness. Route new harness along armrest leaving the X4545 connector in the same approximate place as the picture. Also make sure the green Fakra connector is in the same place as connector number 3.</p> <p>FOLLOW THIS PICTURE FOR THE LOCATION OF THE Extension Connectors.</p>
	<p>Feed the X4545 cable along one of the two guides (1) and the RF cable along the other guide. Ensure to leave enough room for the connectors to be able to rest. If possible, route the cable with the armrest in the extended position.</p> <p>Install trim covers. Be sure to leave enough slack in harness so that when hinges are reinstalled, you do not place any undo stress on the wire harness.</p> <p>Please Note: The connectors will be resting in this area with the arrow.</p> <p>Drive pins back into hinges</p>

	<p>Reinstall armrest onto center console. Install the two securing bolts in the rear.</p> <p>Please note the armrest underside (1) and exit points of harness (2).</p> <p>Route harness (1) along the channels (marked with arrows).</p> <p>Note location of connector (2) for male end of the extension cable.</p>
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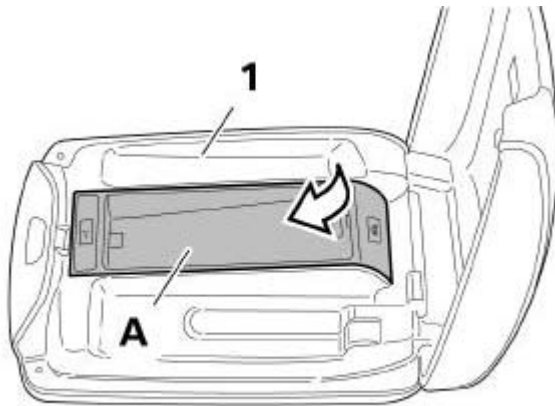
After installing the harness, proceed to reinstall the center console. Please note the new harness that was just installed will connect into the BLACK 18 pin ELO plug found in the area arrowed as number 2 in the picture below.



On the lower left side of console, approximately in the middle, are three connectors. Ashtray cigar lighter and phone antenna coax cable with 18 pin ELO connector (2)

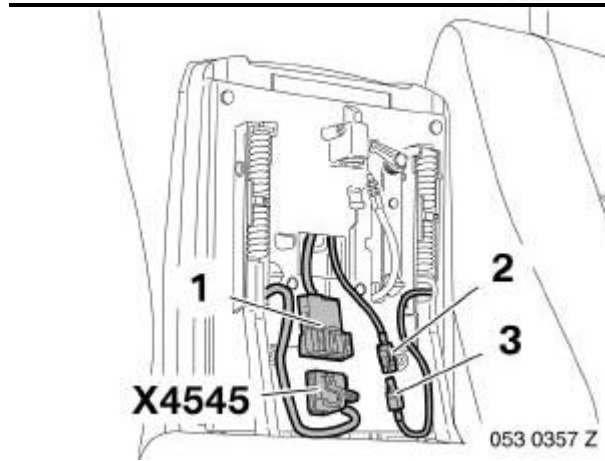
When the center console is all put back together proceed to one of the steps below:

Eject Box Installation (Kit Two)



053 0359 Z

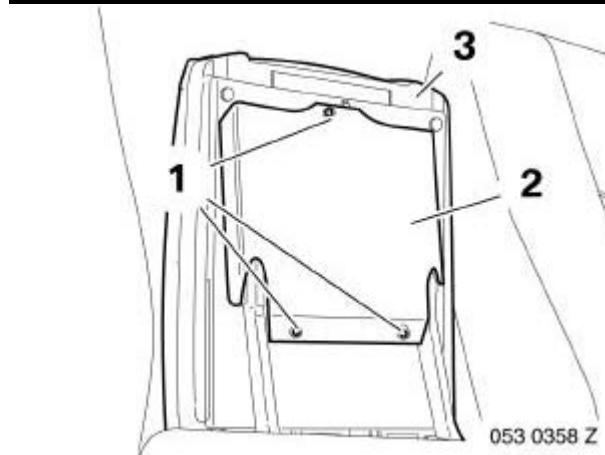
Insert the eject box (A) into the armrest (1) and feed the cables and connectors through the opening in the armrest assembly.



053 0357 Z

Connect the black 18-pin connector (1) of the eject box to the black connector X4545 from the vehicle wiring harness.

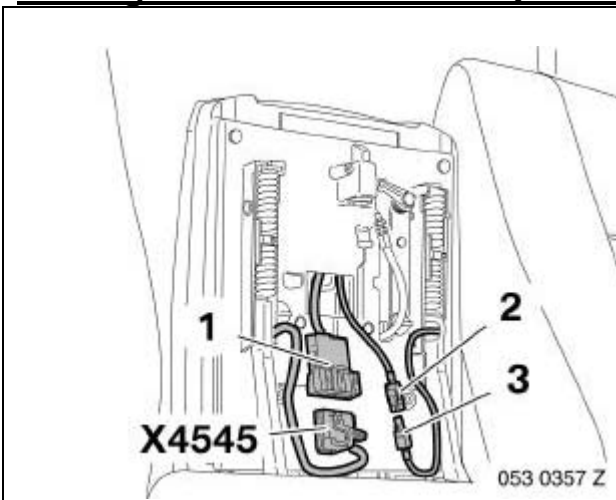
Connect the antenna cable (2) from the eject box to the antenna cable for the vehicle (3).



053 0358 Z

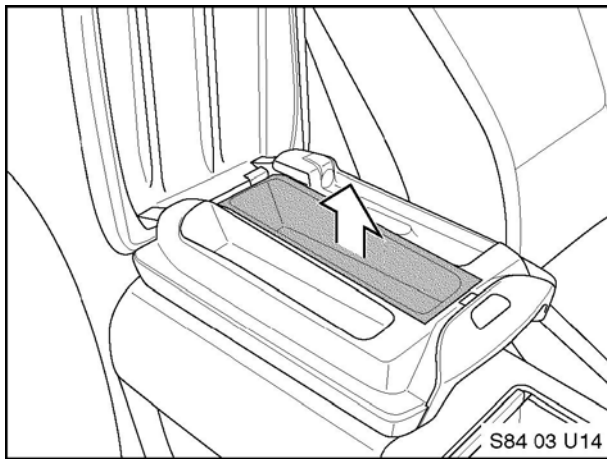
Reinstall the cover (2) to the center armrest (3).

Pairing Button Installation (Kit One)



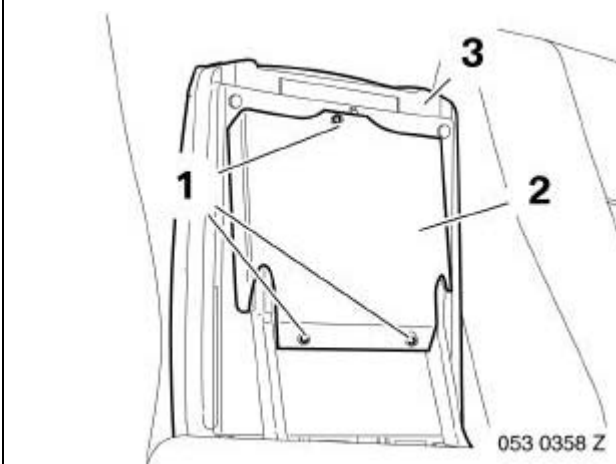
Insert the Pairing Button Adaptor Harness through the opening through the opening in the armrest assembly.

Connect the black 18-pin connector (1) of the eject box to the black connector from the vehicle wiring harness.



The pairing button will end up in the ejectment tray. For best location, put the button directly above the opening for the wires to pass through in the center console. You may put the pairing button in another location as you see fit.

You will need to cut a rectangular hole that is 25mm by 16mm for the pairing button.



Reinstall the cover (2) to the center armrest (3).