

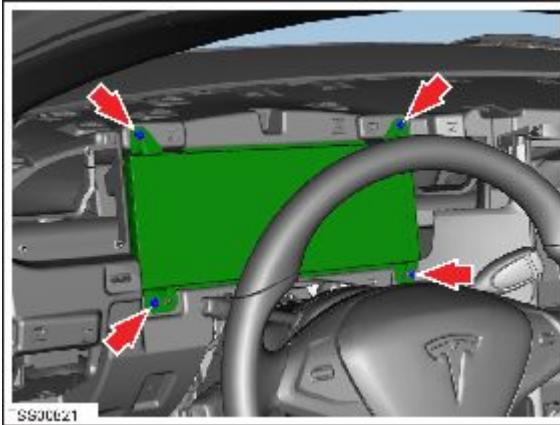
## Instrument Cluster (Remove and Replace)

FRT No: 21050202

- ⚠ **Caution:** Before beginning this procedure, prepare a protected surface to set instrument cluster on when it is removed, such as placing a fender cover, towel, or other soft material onto a workbench.
- ⚠ **Caution:** The screen on the instrument cluster is very easy to scratch. When handling the instrument cluster, only touch the metal frame that surrounds the screen. Do not touch the screen, even when wearing gloves.

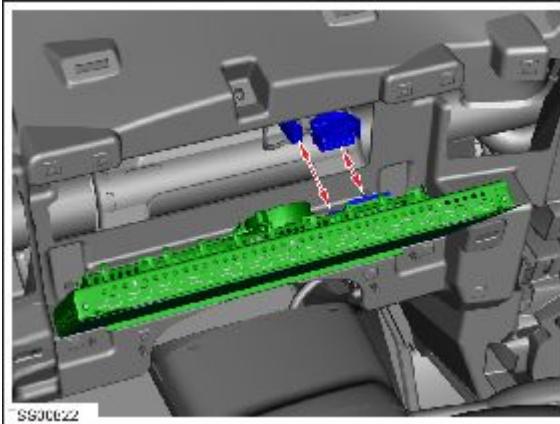
### Removal

1. Remove the driver's outboard face level vent ([refer to procedure](#)).
2. Remove driver's inboard face level vent ([refer to procedure](#)).
3. Remove the 4 screws that secure the instrument cluster to the substrate.



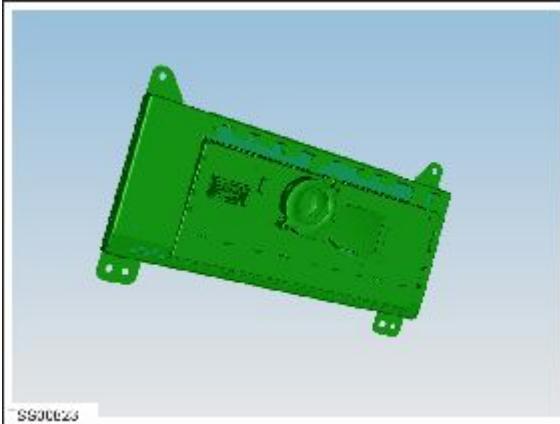
4. Carefully release the instrument cluster from the substrate to access the harness connections.
5. Disconnect the 2 harness connectors.

⚠ **Caution:** Protect the harnesses connectors from contamination and dirt ingress.



6. Carefully remove the instrument cluster and put it onto a protected surface.

⚠ **Caution:** Do not touch the screen.



### Installation

Installation procedure is the reverse of removal, except for the following:

Update the vehicle firmware.

## Media Control Unit - Touch Screen (Remove and Replace)

FRT No: 21060102

### Backup

1. Connect a laptop with Toolbox to the vehicle.
2. Select Views > Gateway and Center Display > MCU Cloner.
3. Select MCU Backup to backup the MCU files.
4. If the backup is successful, disable the MCU. If the backup is not successful, contact Service Engineering.

⚠ **Caution:** Do not disable the MCU if the backup is not successful.

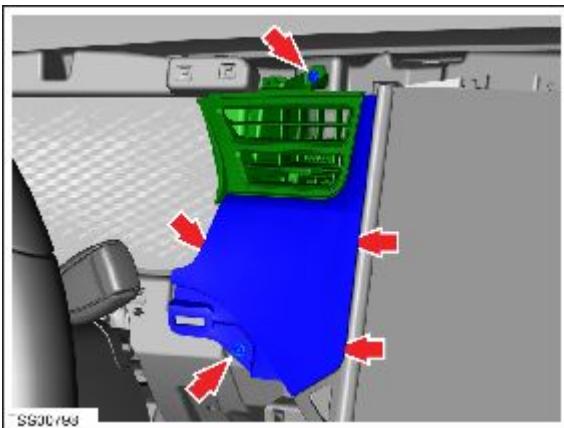
### Removal

⚠ **Warning:** If the 12V power supply is disconnected, do not attempt to open any doors with door glass in closed position. Failure to follow this instruction could result in door glass shatter.

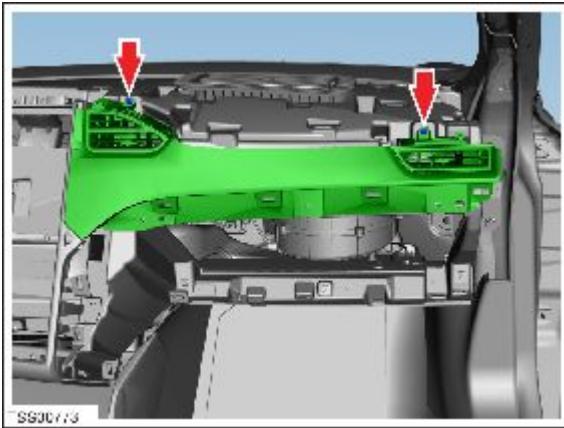
**Note:** Before disconnecting the 12V power supply, ensure that driver's door window is fully open. Failure to follow this instruction could result in vehicle lockout.

1. Disconnect 12V power ([refer to procedure](#)).

2. Remove the lower driver's side dash trim ([refer to procedure](#)).
3. Remove the RH lower instrument panel assembly ([refer to procedure](#)).
4. Remove the instrument panel top pad assembly ([refer to procedure](#)).
5. Remove the driver's inner trim and vent assembly by removing the 2 screws (torque 1 Nm) and 3 clips that secure the vent and trim panel.



6. Remove the 2 screws that secure the face vents to the carrier (torque 2 Nm).

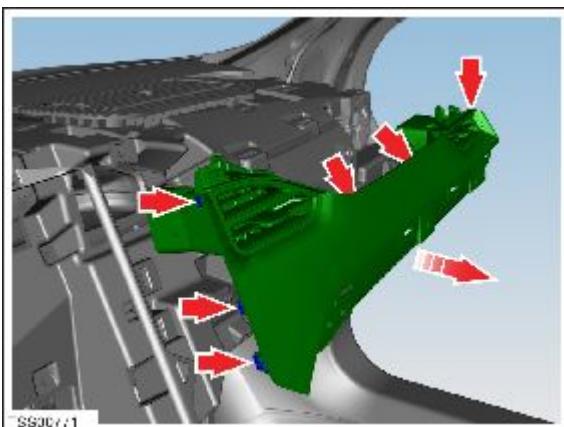


7. Use a suitable trim tool to carefully release the 6 clips that secure the instrument panel finisher to the carrier.

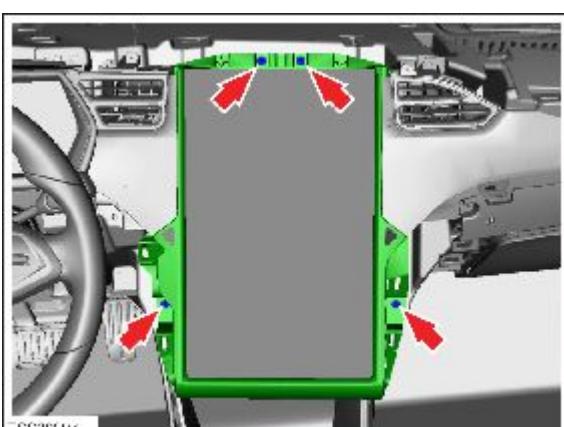
**Caution:** Take care not to damage component(s).

**Caution:** Replace any broken clips.

**Note:** Components have been removed in this graphic to aid clarity.



8. Remove the screws (x4) that secure the touch screen to the IP carrier.



**Caution:** To avoid damage to the circuit board, fully depress the connector release tab before pulling on a connector. Check all connectors on the MCU/touch screen to make sure they are still securely attached to board. If the connector bodies can be twisted, the MCU/touch screen must be replaced.

9. Gently tilt the top of the MCU/touch screen, then disconnect the Wi-Fi and camera harness connectors.

**Caution:** To prevent damage, ensure there is sufficient slack in the USB1 and USB2 wires. Excessive tension on these wires could damage the connector bodies on the MCU/touch screen.



10. Disconnect the USB1 and USB2 harness connectors.



11. Disconnect the remaining harness connectors.

**Caution:** To prevent damage, make sure that the cables are aligned correctly with no excessive twists or bends.

12. Remove the MCU/touch screen from the vehicle. Place it on a protective surface.

## Installation

Installation procedure is the reverse of removal, except for the following:

**Caution:** Do not install used MCUs that have not been remanufactured for diagnostic purposes. Installing a used, non-remanufactured MCU might result in corrupted odometer readings.

## Restore

1. Connect a laptop with Toolbox 1.5 or later to the vehicle.
2. Select Views > Gateway and Center Display > MCU Cloner.
3. Select MCU Restore to restore the MCU files.
4. Update the vehicle firmware.

## Calibration - Camera

FRT No: 21100100

### Check

Forward facing camera calibration can be carried out during headlamp adjustment. Position the vehicle to set distance and perpendicular to the calibration target.

### Align

1. Manually calibrate camera to tolerance  $\pm 0.3^\circ$ . When calibration is complete the camera will correct remaining error during road test (normally 6 miles of highway driving).
2. Calibration must be carried out with the vehicle at normal ride height.

## Camera - Forward Facing (Remove and Replace)

FRT No: 21101002

### Removal

1. Disconnect 12V power ([refer to procedure](#)).
2. Remove the front beauty cover by pulling straight down to release the clips.



3. Disconnect the rear view mirror harness.



4. Release the rear view mirror by turning it clockwise for a third of a full rotation.



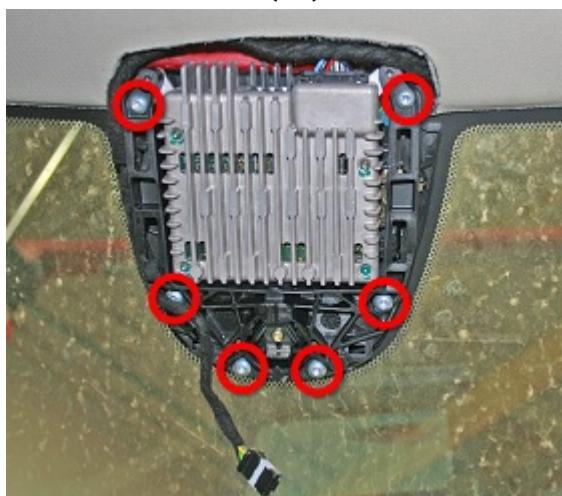
5. Remove the rear beauty cover by pulling down to release the clips (x4).

**Caution:** Do not damage the headliner when removing the rear beauty cover.

**Caution:** Replace any broken clips.



6. Release the screws (x6) that secure the forward facing camera bracket (torque 8 Nm).



7. Move the rear view mirror harness out of the way.

8. Disconnect the forward facing camera harness.



9. Remove the forward facing camera assembly.

## Installation

Installation procedure is the reverse of removal, except for the following:

**Caution:** Do not touch the camera lens at any point during this procedure.

- Clean the inside surface of the windshield with glass cleaner before installing the camera.
- Calibrate the camera after installation.
- If prompted to update the camera's firmware, select "Yes".

## Calibration

1. Connect the vehicle to Toolbox.
2. Navigate to XYZ and follow the instructions to calibrate the camera.

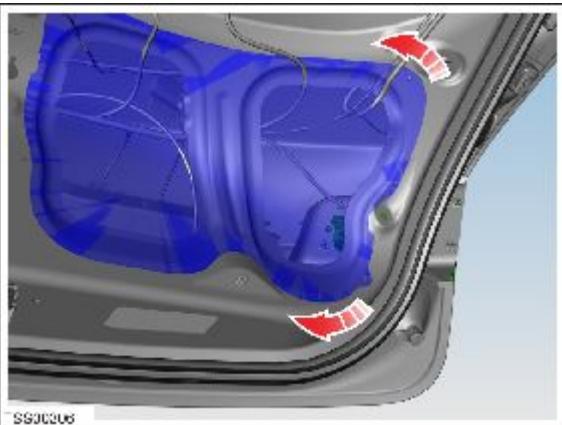
## Camera - Rear Facing (Remove and Replace)

FRT No: 21101102

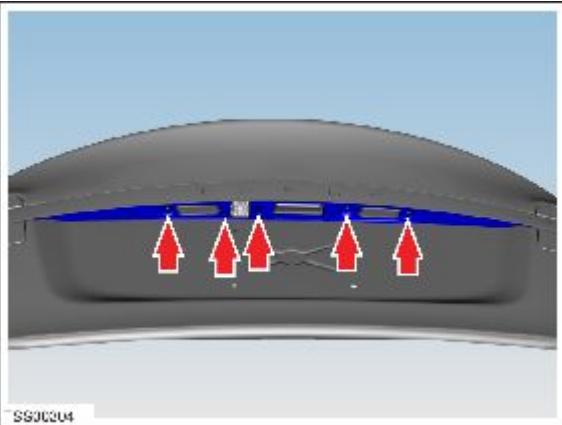
### Removal

1. Remove the tailgate lower finisher. [\(refer to procedure\)](#)

2. Pull back the watershield for access to the rear camera electrical connector.



3. Disconnect the rear camera electrical connector.
4. Release the screws that secure the rear applique bracket to the tailgate. Remove the applique bracket.



5. Release the grommet from the tailgate opening.
6. Remove the screws that secure the camera to the applique bracket (torque 2.4 Nm).
7. Remove the camera assembly.

## Installation

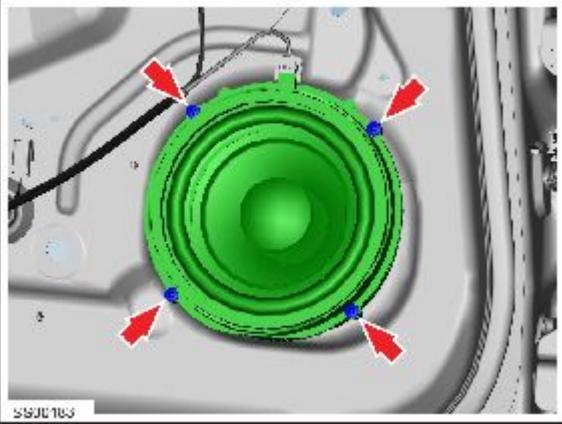
Installation procedure is the reverse of removal.

## Speaker - Front Door Premium Audio - LH/RH (Remove and Replace)

FRT No: 21210202

### Removal

1. Remove door trim panel ([refer to procedure](#))
2. Remove 4 screws securing speaker to spacer ring (torque 1.8 Nm).
3. Remove connector from door speaker.
4. Remove front door speaker.
5. Remove 4 screws securing trim ring to door shell (torque 1.8 Nm).



## Installation

Installation procedure is the reverse of removal.

**Note:** If reinstalling existing speaker and/or trim ring, inspect the seals on each. If seals are damaged, speaker/trim ring assembly must be replaced.

## Speaker - Rear Door All, Front Door Base Audio (Remove and Replace)

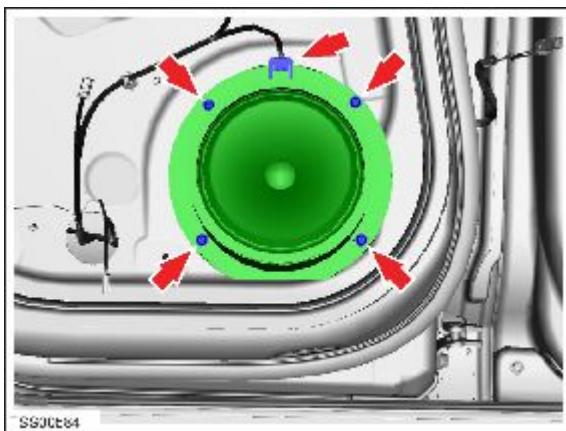
FRT No: 21211002

### Removal

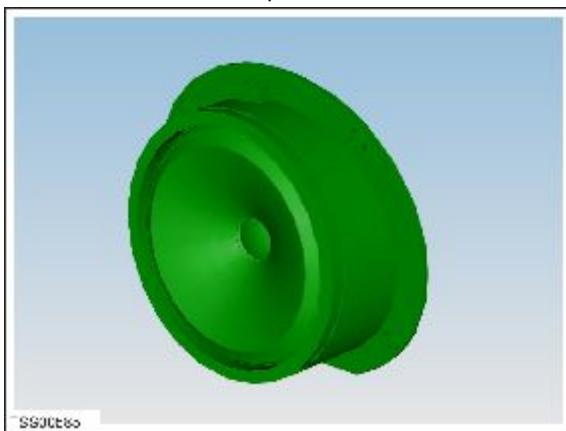
1. Remove rear door trim panel ([refer to procedure](#))
2. Disconnect speaker harness connector.

**Note:** Components have been removed in this graphic to aid clarity.

3. Remove screws (x4) securing speaker to rear door (torque 1.8 Nm).



4. Remove rear door speaker.



## Installation

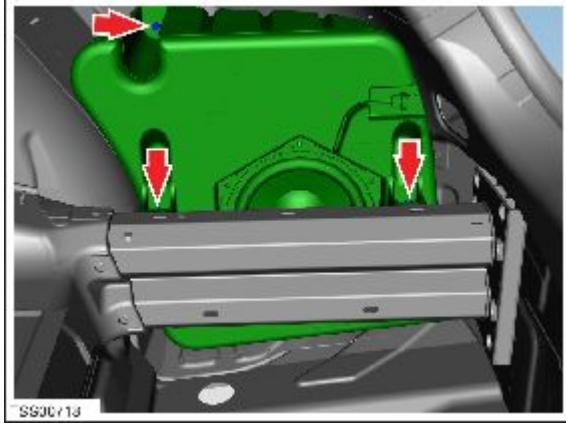
1. Installation procedure is the reverse of removal except for the following
2. Inspect and replace speaker screw grommets.

## Subwoofer Assembly (Remove and Replace)

FRT No: 21212002

### Removal

1. Remove RH side trunk trim ([refer to procedure](#))
2. Remove screws (x3) securing subwoofer enclosure to body (torque 7 Nm).



3. Disconnect subwoofer harness connection.
4. Remove subwoofer from vehicle.

### Installation

Installation procedure is the reverse of removal.

## Tweeter - 'A' Post - LH (Remove and Replace)

FRT No: 21212502

### Removal

Remove 'A' post trim ([refer to procedure](#))

### Installation

Installation procedure is the reverse of removal.

## Speaker - Rear - LH/RH (Remove and Replace)

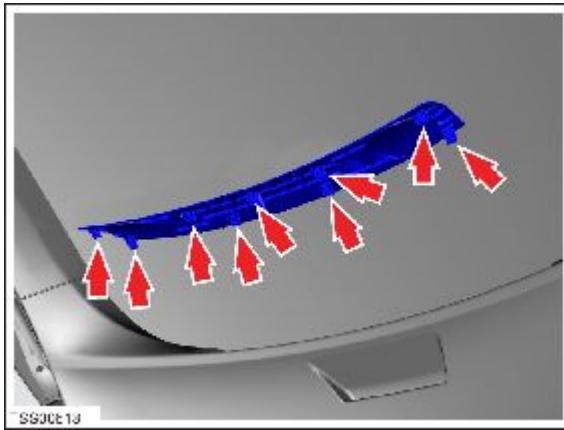
FRT No: 21213002

### Removal

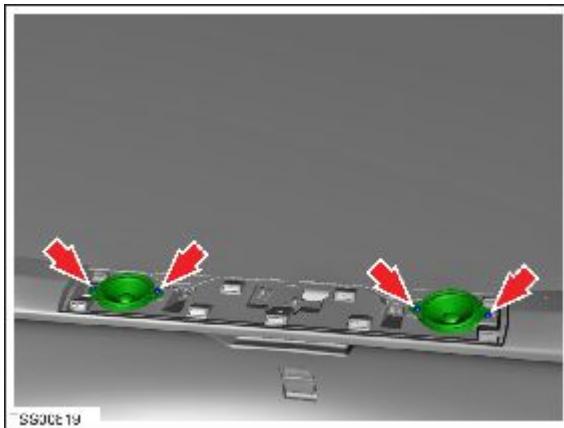
1. Open tailgate to suitable working height.
2. Carefully release speaker cover clips (x9) from tailgate.

**Caution:** Take care not to damage component(s).

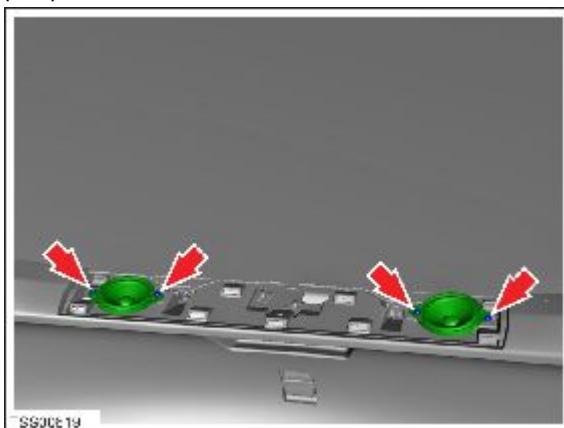
3. Remove speaker covers and position aside.



4. Remove screws (x4) securing speakers (x2) to tailgate (torque 1 Nm).



5. Release speakers and disconnect wiring harness connections (x2). Note: Mark speaker connectors before disconnecting for identification purposes.



6. Remove both speakers.

## Installation

1. Installation procedure is the reverse of removal except for the following
2. Inspect and replace speaker screw grommets.

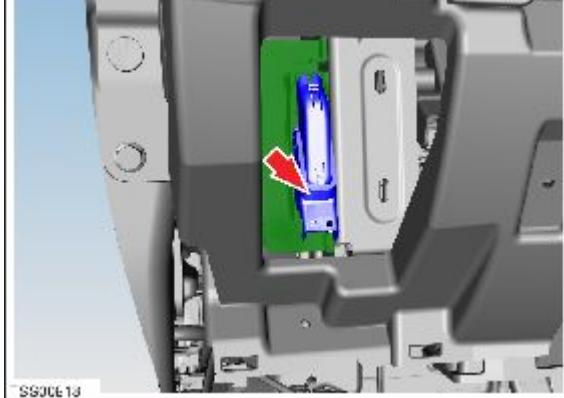
## Premium Boost Amplifier (Remove and Replace)

FRT No: 21213502

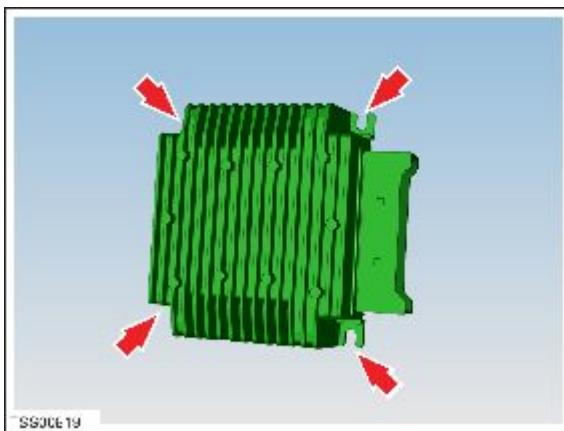
### Removal

1. Release latch, disconnect amplifier harness connector and position aside.

**Caution:** Take care not to damage component(s).



2. Remove AM/FM tuner module *(refer to procedure)*
3. Remove screws (x4) securing amplifier to bracket (torque 4 Nm).
4. Remove amplifier from bracket.



## Installation

Installation procedure is the reverse of removal.

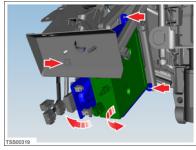
## Tuner - AM - FM (Remove and Replace)

FRT No: 21220102

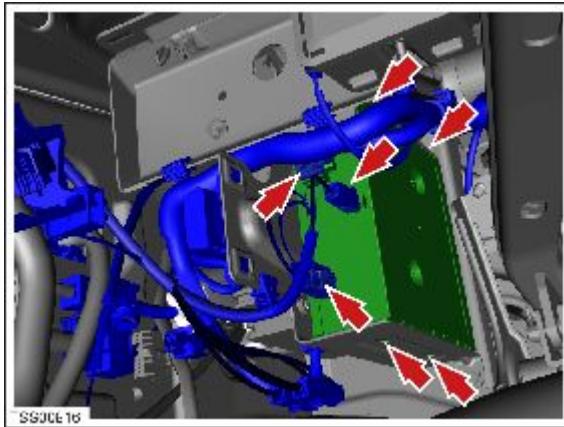
**Note:** This procedure applies to both base and premium tuners (premium pictured).

### Removal

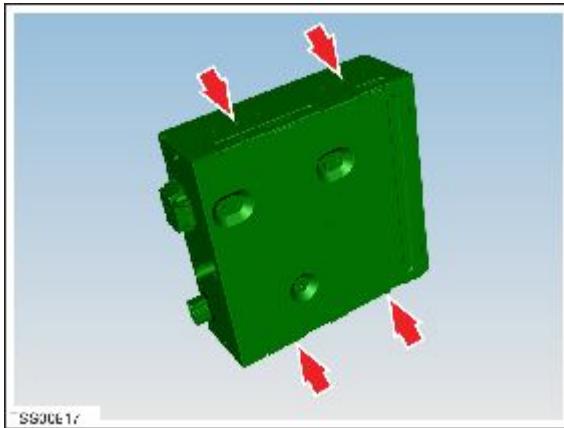
1. Remove the driver side lower dash trim ([refer to procedure](#)).
2. Remove the driver side dash footwell closing trim ([refer to procedure](#)).
3. Remove the 3 bolts that secure the retaining bracket to the cross car beam (torque 6 Nm).



4. Carefully lower the bracket into the footwell, to improve access to the tuner.
5. Disconnect the 3 wiring harness connectors.
6. Remove screws (x4) securing AM/FM module to bracket (torque 1 Nm).



7. Carefully remove the module.



## Installation

Installation procedure is the reverse of removal, except for the following:

Update or redeploy the firmware:

- If the vehicle is not running the latest firmware, perform a full firmware update.
- If the vehicle is running the latest firmware, perform a firmware redeploy:
  1. In Toolbox, select Views > Firmware and ECU Programming > Firmware Redeploy.
  2. Select the Service Redeploy tab.
  3. Click the Start Routine button.

## USB Socket - Center Console - Rear (Remove and Replace)

FRT No: 21260102

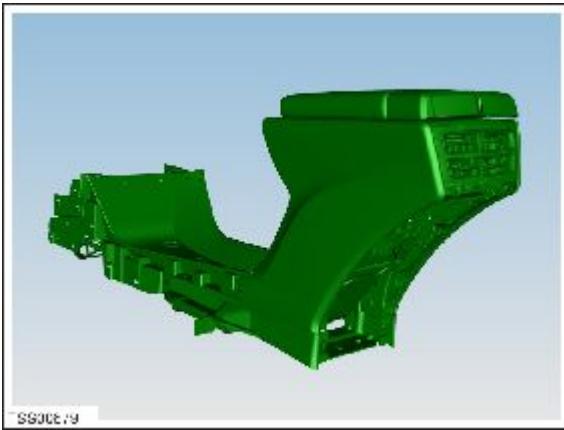
### Removal

1. Remove center console assembly ([refer to procedure](#))

**Caution:** Disconnect 2 USB harness connectors located at extreme front of center console before removing console from vehicle.

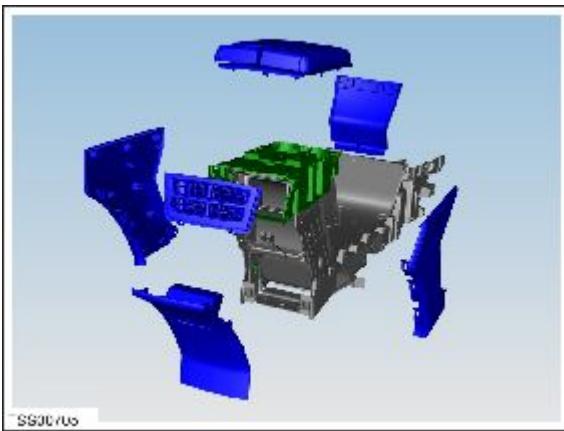
2. Position center console on suitable clean bench to prevent damage.

**Caution:** Take care not to damage component(s).

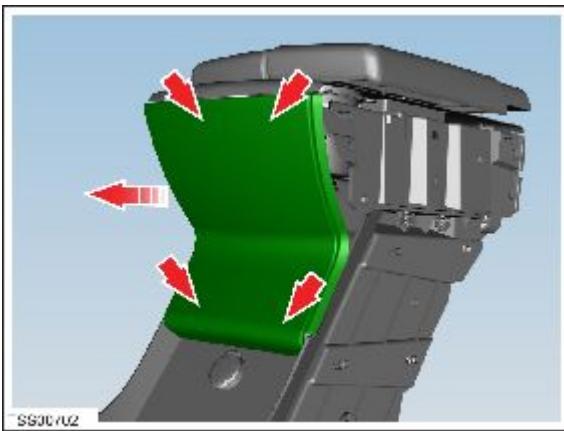


3. Remove center console vent (*refer to procedure*)

4. Remove screws (x2) securing cup holder front trim to chassis (torque 2 Nm).



5. Release clips (x2) and remove cup holder front trim.

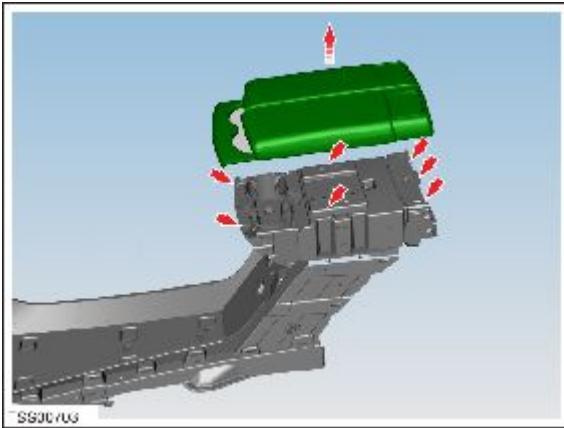


6. Remove cup holder mat to access screws.

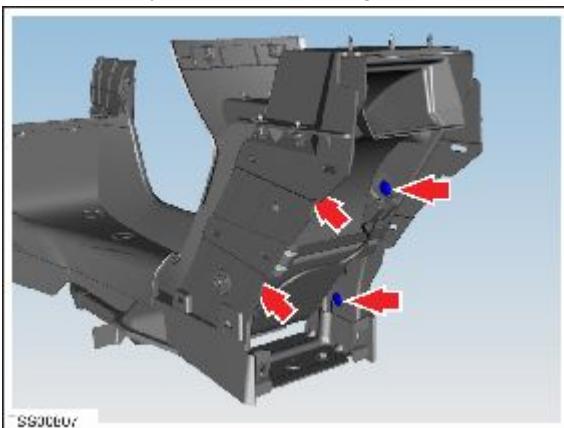
7. Carefully lift vertically to release clips (x7) securing arm rest and cup holder trim.

**Caution:** Take care not to damage component(s).

**Caution:** Replace any broken clips.



8. Remove clips for air ducting to allow more movement for access.

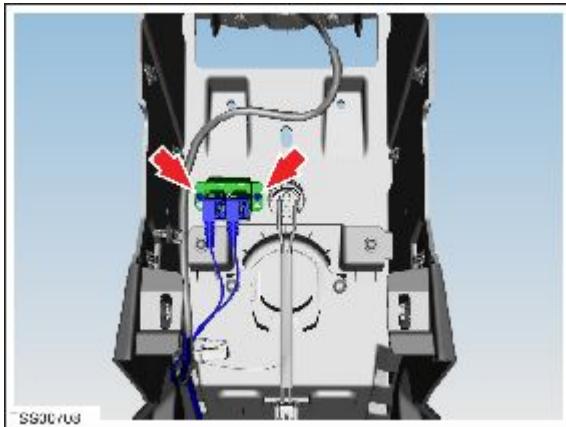


9. Remove screws (x4) securing air ducting framework to center console chassis (torque 2 Nm).

10. Disconnect USB socket connectors (x2).

11. Remove screws (x2) securing USB socket to center console (torque 1 Nm).

12. Remove USB socket.



### Installation

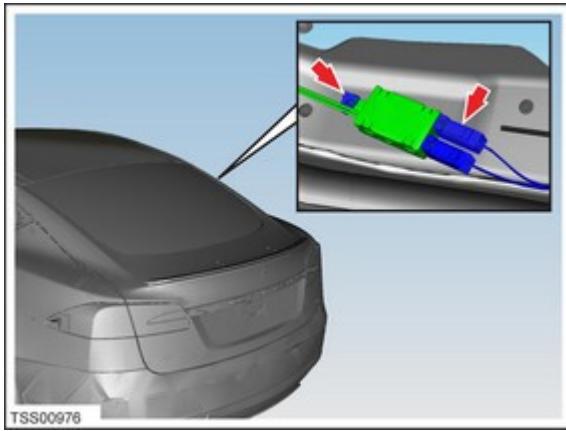
Installation procedure is the reverse of removal.

## Antenna Amplifier - AM/FM and RKE (Remove and Replace)

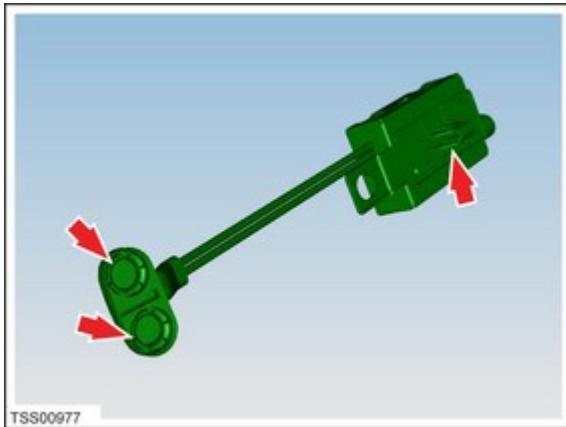
FRT No: 21300602

### Removal

1. Remove LH liftgate trim ([refer to procedure](#))
2. Remove screw securing amplifier to liftgate.
3. Carefully disconnect amplifier connector.
4. Release clip securing amplifier to liftgate. *aeriaRH* illustrated.



5. Carefully release antenna lead from glass connectors (x2) and adhesive strip securing amplifier to liftgate glazing antenna. Remove component from vehicle. *RH* illustrated.



### Installation

1. Installation procedure is the reverse of removal except for the following
2. Replace adhesive strip if required.

**Note:** Clean the affected areas before installation.

**Caution:** Apply contact adhesive to mating faces if bond has been broken.

3. Ensure contacts are clean and bond to surface mounted antenna.

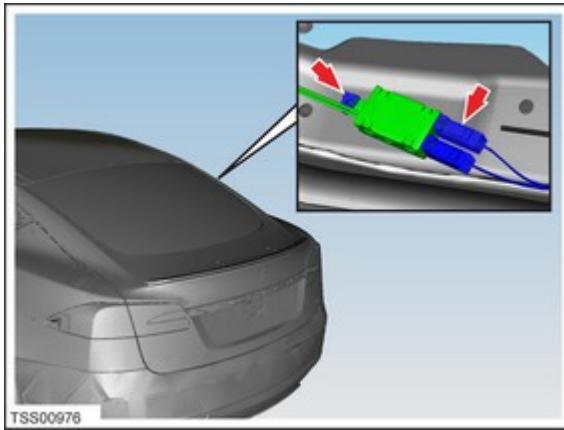
**Note:** Listen for an audible click when connecting harness connectors.

## Antenna Amplifier - FM2/Satellite/DAB (Remove and Replace)

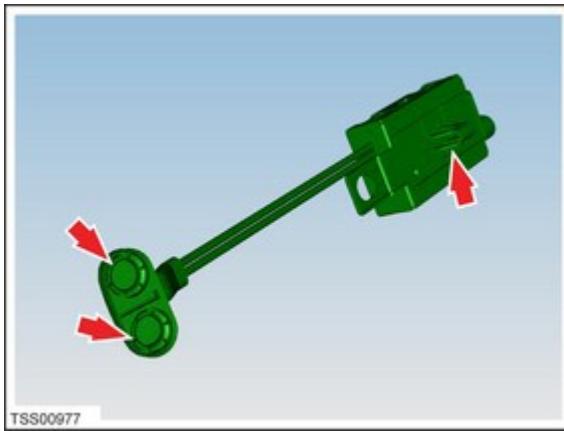
FRT No: 21300702

### Removal

1. Remove RH liftgate trim ([refer to procedure](#))
2. Remove screw securing amplifier to liftgate (torque 1.2 Nm).
3. Carefully disconnect amplifier connector. Note: Second connector for EU markets only.
4. Release clip securing amplifier to liftgate.



5. Carefully release antenna lead from liftgate glass and remove antenna.



## Installation

1. Installation procedure is the reverse of removal except for the following
2. Replace adhesive strip if required.

**Note:** Clean the affected areas before installation.

**Caution:** Apply contact adhesive to mating faces if bond has been broken.

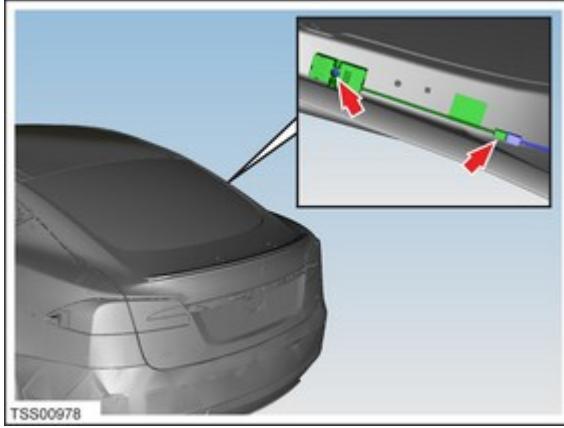
3. Ensure contacts are clean and bond to surface mounted aerial.

## Antenna - RF Filter - RH (Remove and Replace)

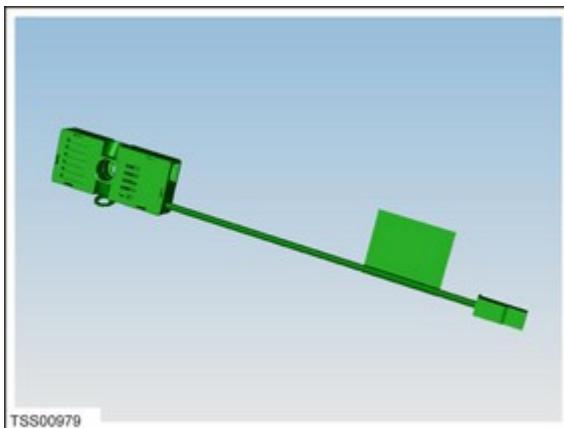
FRT No: 21301002

### Removal

1. Remove RH liftgate trim ([refer to procedure](#))
2. Remove screw securing RF filter to liftgate. Torque - 1 Nm.



3. Remove RF filter from vehicle.



## Installation

1. Installation procedure is the reverse of removal except for the following
2. Replace adhesive strip if required.

**Note:** Clean the affected areas before installation.

**Caution:** Apply contact adhesive to mating faces if bond has been broken.

## Antenna - AM/FM/RKE (Remove and Replace)

FRT No: 21300102

**Removal**

1. Remove liftgate glass ([refer to procedure](#))
2. AM antenna is part of liftgate glass, if elements are damaged renew liftgate glazing.

**Installation**

Installation procedure is the reverse of removal.

**Antenna - FM2 and Defrost Grid (Remove and Replace)**

FRT No: 21300202

**Removal**

1. Remove liftgate glass ([refer to procedure](#))
2. DAB and defrost grid are part of liftgate glass, if elements are damaged renew liftgate glazing.

**Installation**

Installation procedure is the reverse of removal.

**Antenna - DAB (Remove and Replace)**

FRT No: 21300302

**Removal**

1. Remove liftgate glass ([refer to procedure](#))
2. DAB and defrost grid are part of liftgate glass, if elements are damaged renew liftgate glazing.

**Installation**

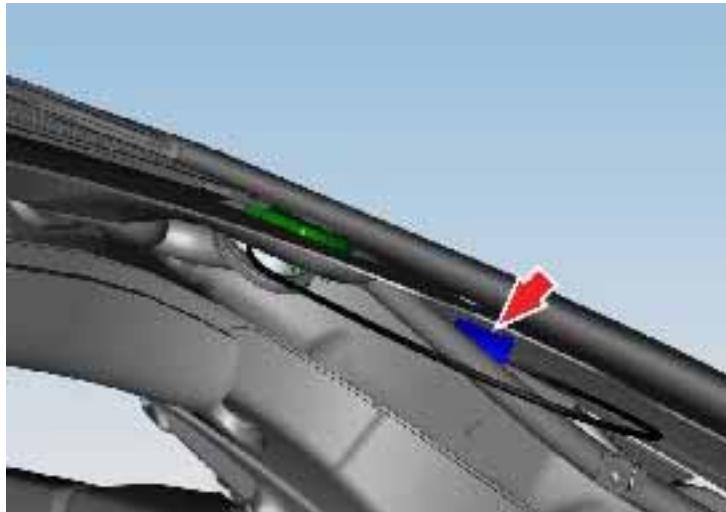
Installation procedure is the reverse of removal.

**Antenna - Satellite Radio (Remove and Replace)**

FRT No: 21310102

**Removal**

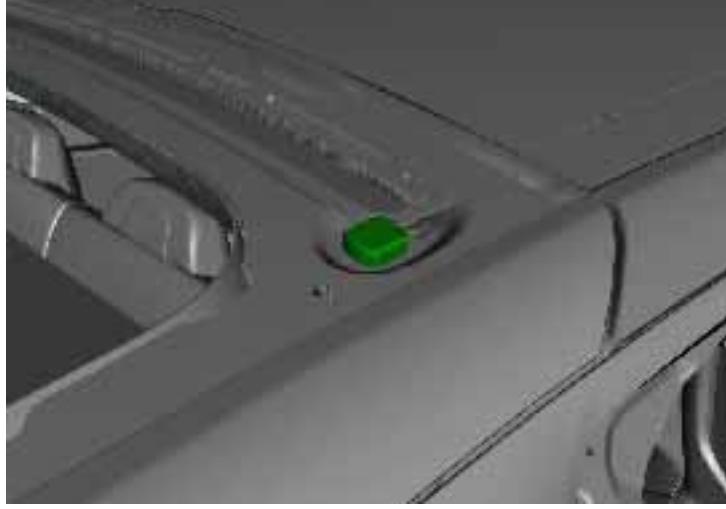
1. Remove liftgate glazing ([refer to procedure](#))
2. Disconnect XM antenna connector.



3. Release XM antenna from adhesive bond.
4. Release wiring harness from liftgate.

**Note:** Note installed position of components before removal.

5. Remove XM antenna.

**Installation**

Installation procedure is the reverse of removal.

**Note:** Clean the affected areas before installation.

**Caution:** Apply contact adhesive to mating faces if bond has been broken.

**Warning:** Only use cleaning agents and solvents in a well-ventilated area.

## Microphone - Bluetooth (Remove and Replace)

FRT No: 21250102

### Removal

1. Release the front of the exterior overhead console and pull downward.

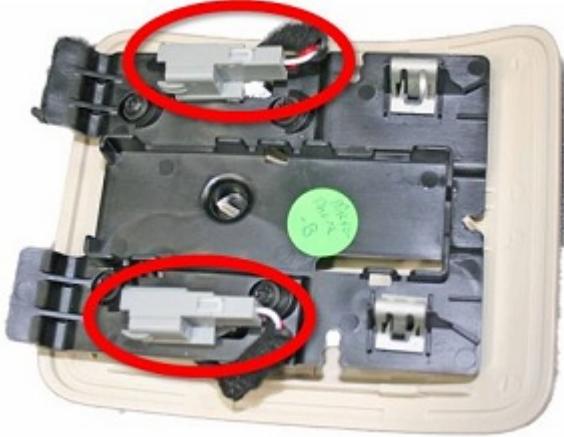


2. Disconnect the 2 harness connections from the inside of the overhead console.



3. Remove the overhead console.

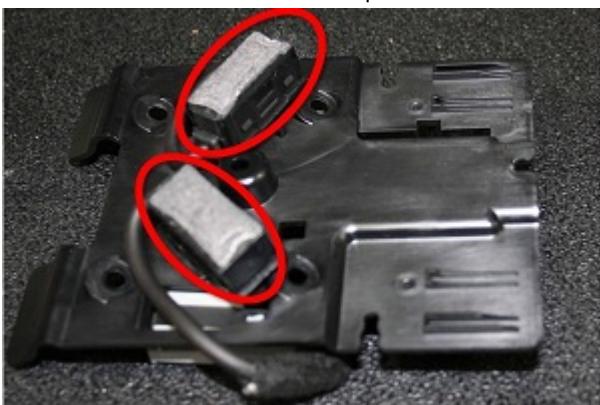
4. Slide the connectors off of the microphone bracket.



5. Release the screws (x4) that secure the microphone bracket to the overhead console.



6. Remove the affected microphone.



### Installation

Installation procedure is the reverse of removal, except for the following:

Before securing the microphone bracket to the overhead console, ensure that the microphones are correctly positioned in the cutouts on the overhead console.

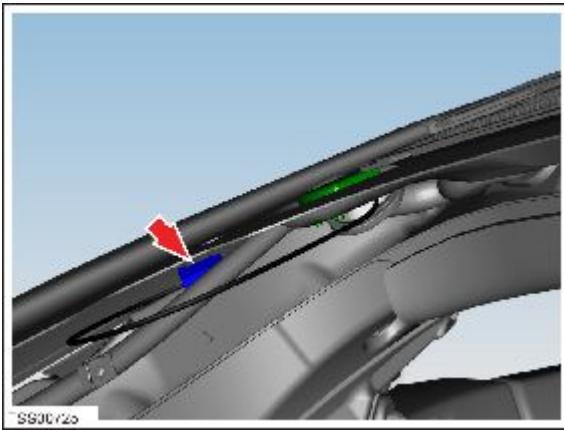


## Antenna - GPS (Remove and Replace)

FRT No: 21320102

### Removal

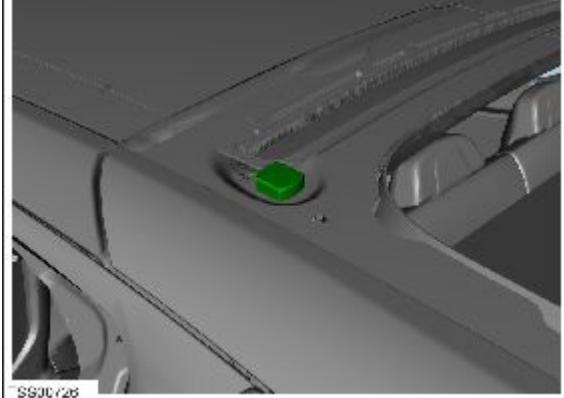
1. Remove liftgate glazing ([refer to procedure](#))
2. Disconnect GPS harness connector.



3. Release GPS antenna from adhesive bond.
4. Release wiring harness from liftgate.

**Note:** Note installed position of components before removal.

5. Remove GPS antenna.



### Installation

Installation procedure is the reverse of removal.

**Note:** Clean the affected areas before installation.

**⚠ Warning:** Only use cleaning agents and solvents in a well-ventilated area.

## Antenna - WiFi (Remove and Replace)

FRT No: 21330102

**Note:** Antennae are an integral part of the door mirror assembly. If an antenna develops a fault, the whole mirror assembly must be changed.

### Removal

Remove door mirror assembly ([refer to procedure](#))

### Installation

Installation procedure is the reverse of removal.

## Antenna - GSM - LH (Remove and Replace)

FRT No: 21350102

**Note:** Antennae are an integral part of the door mirror assembly. If an antenna develops a fault, the whole mirror assembly must be changed.

### Removal

Remove door mirror assembly ([refer to procedure](#))

## Installation

Installation procedure is the reverse of removal.