The BCI-CH41 will program your Chrysler / Dodge / Jeep / RAM radio to allow the addition of a reverse camera input if the vehicle is not equipped with one from the factory (reverse camera sold separately). The BCI-CH41 will allow the factory navigation features of your radio to be used by the passenger at anytime. The interface also offers extra features such as: Blind Spot Cameras, Front Camera, Rear Media Mode, Eco Mode Memory, Auto Start / Stop Memory, Sport Mode Memory, Remote Start Climate Restore, Steering Wheel Control (SWC) swap, EQ Presets and three programmable 12v outputs.

**Important Notes**

1. Vehicles without audio SWC, located on the back of the steering wheel, will not support the Navigation Unlock or SWC Swap features.
2. RAM trucks equipped with a manual transmission will not support the forced Reverse Camera or Reverse Output Trigger features.
3. The Jeep Cherokee and Chrysler 200 will not support the addition of Reverse Camera input or Rear Media Mode.
4. Vehicles equipped with the 5” screen do not support the addition of Rear Media Mode.

**Installation Steps**

1. Set DIP switches to the ON position that correspond with the features you want to add. Feature DIP switches (1-3) must be set before connecting the interface to the vehicle harness.
   a. DIP switch 4 - Turning ON DIP switch 4 will allow you to access the Feature Settings Menu to turn additional features On / Off.
   b. Please see Page 6 titled “BCI Feature Menu Table” for a full list and description of each of the BCI features.
2. Remove the factory radio and disconnect the factory harness(es).
3. Connect the factory harness into the female connector on the BCI-CH41 harness.
4. Connect the aftermarket reverse camera’s video output to the female camera input located on the radio side of the BCI-CH41 harness. If you are also adding blind spot and/or a front camera, the VS41 must be used (sold separately). See page 4 for VS41 wiring. You can also use any universal video switcher and utilize the programmable outputs to trigger as necessary.
5. Connect the trigger wire(s) as needed. Please see chart for trigger wire colors and functions.
6. If you are adding an additional A/V input: Connect the A/V outputs from the source to the Rear Media inputs on the radio side of the BCI-CH41 harness. If you have more than one source, the AVS21 must be used (sold separately).
7. Connect the male connector on the BCI-CH41 harness to the factory radio.
8. Turn the key to the ON position.
9. Plug the interface connectors on the BCI-CH41 harness into the factory.
10. Both LEDs will blink green while the module is initializing. Once initialized, one LED will begin to blink green. If the LED blinks red, there is a problem with the data connection to the factory radio.
11. At this point you will need to turn the ignition off and wait one minute for the vehicle to go to sleep. After one minute, turn the ignition back on and proceed to the next step.
12. Once the module has initialized you can access the Feature Settings Menu to turn on the features you want and set the programmable outputs. Please note that DIP switch 4 must be turned on in order to access the Feature Settings menu. See page 6 entitled “BCI Feature Menu Table” for a full list and description of each of the features and programmable outputs.
13. The module can be reset to factory default settings by pressing and holding the Programming button (on the side of the module) for 5 seconds. When pressing and holding the button, both LEDs will blink red while the module is resetting. Once reset, both LEDs will blink green, this indicates the module is initializing, release the programming button.

**Introduction & Features**

### Wire Color | Function | Note
--- | --- | ---
Prog. Output 1 Blue | 12v+ | 10 Amp positive output when user programmed feature is activated
Prog. Output 2 Blue/White | 12v+ | 1 Amp positive output when user programmed feature is activated
Prog. Output 3 Blue/Red | 12v+ | 1 Amp positive output when user programmed feature is activated
Left Camera Red | 12v+ | 1 Amp positive output when left blind spot camera is activated
Left Camera Black Ground | | Negative output when left blind spot camera is activated
Right Camera Red | 12v+ | 1 Amp positive output when right blind spot camera is activated
Right Camera Black Ground | | Negative output when right blind spot camera is activated
PLEASE NOTE:
• DIP switch 4 must be on in order to access the BCI Feature Settings Menu.
• Please see page 6 entitled “BCI Feature Menu Table” for a full list and description of each of the BCI-CH41 features.

To Access the Feature Settings Menu
1. Place the Multi Function Display into the mode that displays radio text.
2. Press and hold the Lock button on the driver door for approximately 5 seconds (see Fig. A). “BCI-CH41 Menu” followed by the product revision number will be displayed on the MFD in the gauge cluster.
3. Use the up / down buttons on either side of the back of the steering wheel to scroll through the features in the menu. Press the center button to scroll through options within the feature (Fig. B).
   a. If the vehicle is not equipped with SWC on the back of the steering wheel, you can use the forward and back arrows on the front of the steering wheel to navigate through the menu and use the VR button to change selections and turn features off / on (Fig. C).
4. Once all settings have been made, scroll to Exit & Save and press the selection button. The MFD will display “Saving”.
5. You can now either flip DIP switch 4 OFF to disable access to the menu, or leave it in the ON position to access the menu later.

Operation
Reverse Camera
If you have DIP switch 1 in the ON position, the factory screen will switch to the reverse camera whenever the vehicle is placed into reverse. You can also force the reverse camera at anytime by pressing and holding the center button on the back left side of the steering wheel for at least 4 seconds (Fig. D). If your vehicle does not have SWC on the back of the steering wheel, you can use the back button on the front of the steering wheel (Fig. E).

PLEASE NOTE: The OEM reverse camera will turn off when the vehicle exceeds 5 MPH. This is a limitation of the vehicle, not the BCI-CH41.
**Rear Media Mode**

If you have DIP switch 2 in the ON position, it will activate Rear Media mode on the factory screen (8.4” screens only).

**PLEASE NOTE:** In order to access Rear Media mode for the first time, you will need to turn the key ON, then OFF and let the vehicle go to sleep (about 1 minute), then turn the key ON again, then OFF again and let the vehicle go to sleep a second time (about 1 minute).

To access Rear Media mode follow these steps:
1. Press the “Media” icon in the bottom left corner of the screen (Fig. F).
2. Press the down arrow on the middle left of the screen (Fig. G).
3. Press the “AV1” icon on the middle left of the screen (Fig. H).
4. Press the “Full” icon on the right middle of the screen to view the video (Fig. I).

**Nav Unlock**

If you have DIP switch 3 turned ON, you can activate the navigation unlock which will enable any features that are normally locked out while the vehicle is in motion.

To activate the navigation unlock, follow these steps:
1. Place the MFD in the mode that displays radio text.
2. Press and hold the center button on the back right side of the steering wheel for at least 4 seconds, then release (Fig. J).
3. The MFD in the cluster will display “Confirm Safe Passenger Use”.
4. Press the same button again within 5 seconds to acknowledge “safe use”, agreeing that use will be performed only by the passenger whenever the vehicle is in motion, and activate the navigation unlock.
5. The MFD will display “Acknowledged”.
6. To de-activate the navigation unlock simply press and hold the same button for at least 4 seconds and then release.
7. The MFD will display “NU Deactivated”.

**Preset EQ**

- This feature is only available in vehicles equipped with a factory amplifier.
- If you are using preset 1, 2 or 3 and not “P”, the EQ shown on the radio may not be what you are hearing. The interface cannot force EQ settings that the user has stored onto the factory radio.

This feature can be enabled in the Feature Settings menu outlined on Page 2. Presets can be viewed on the MFD when it is set to audio mode and the Mute button is pressed.

To access / store presets follow the procedure below.
1. Presets can be recalled by simply pressing the Mute button located in the center of the volume knob (Fig. K). Repeatedly pressing this button will scroll through the presets and the pass through. The pass through is the one labeled “P” and will set the EQ to whatever is displayed on the radio screen.
2. To store a preset, press the Mute button until you get to the desired location. Next, go to the equalizer screen by pressing Audio > Equalizer and set it to the desired sound. Now press and hold the Mute button (Fig. I) until the MFD displays “Storing EQ”.

---

**Fig. F**  **Fig. G**  **Fig. H**  **Fig. I**
Connecting a VS41 (Sold separately)

If you are adding a front camera and two blind spot cameras, or any combination of the three, to the factory radio, a VS41 is needed (sold separately). Follow the example below to make all inputs work accordingly through the one camera input on the factory radio.

Connect the 10-pin harness from the VS41 harness into the Expansion Port on the BCI-CH41. Do not manually wire the trigger wires, or power and ground leads, when using the Expansion Port connector.

See the illustration on the next page for an overview of the BCI-CH41 and VS41 connections.

### Wiring Connection Chart

<table>
<thead>
<tr>
<th>Video Output</th>
<th>White Input 1 trigger (+)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Video 2 Input</td>
<td>White/Black Input 1 trigger (-)</td>
</tr>
<tr>
<td>Video 4 Input</td>
<td>Gray Input 2 trigger (+)</td>
</tr>
<tr>
<td>Video 1 Input Priority / Default</td>
<td>Gray/Black Input 2 trigger (-)</td>
</tr>
<tr>
<td>Video 3 Input</td>
<td>Green Input 3 trigger (+)</td>
</tr>
<tr>
<td></td>
<td>Green/Black Input 3 trigger (-)</td>
</tr>
<tr>
<td></td>
<td>Purple Input 4 trigger (+)</td>
</tr>
<tr>
<td></td>
<td>Purple/Black Input 4 trigger (-)</td>
</tr>
<tr>
<td></td>
<td>Purple/White Reverse trigger output (+)</td>
</tr>
<tr>
<td></td>
<td>Yellow Accessory 12v (+)</td>
</tr>
<tr>
<td></td>
<td>Black Ground (-)</td>
</tr>
</tbody>
</table>

10-Pin Plug - Connect to Expansion Port on BCI- or RP4.2 or RPS.2 Module. Do not manually wire input triggers when using this plug.
Using a VS41 along with the BCI-CH41 will provide 4 camera inputs, with CAN-Bus data controlled switching. In this configuration, there is no need to manually wire the input triggers on the VS41. Simply connect your camera leads into the video inputs on the VS41, and connect the 10-pin harness into the Expansion Port on the BCI-CH41.

When the appropriate CAN-Bus signals are detected (ie. reverse, or turn signal) the corresponding camera input will be automatically selected, and it's video feed will be routed to the factory radio display.
<table>
<thead>
<tr>
<th>Feature</th>
<th>Option</th>
<th>Description</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Blind Spot Camera</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Double tap turn signal</td>
<td></td>
<td>This will activate the camera input when you double tap either the left or right turn signal within 2 seconds.</td>
<td></td>
</tr>
<tr>
<td>When turn signal on</td>
<td></td>
<td>This will activate the camera input whenever a turn signal is on.</td>
<td></td>
</tr>
<tr>
<td>&gt;10-40 mph</td>
<td></td>
<td>This will activate the camera input when a turn signal is active and the vehicle is going more than the designated number.</td>
<td></td>
</tr>
<tr>
<td><strong>Front Cam</strong></td>
<td>Manual Only</td>
<td>This will allow you to activate the camera input manually by pressing the forward arrow button on the SWC.</td>
<td>This feature is not available in the Chrysler 300, Dodge Challenger, Dodge Charger, 2016 Dodge Durango &amp; 2016 Jeep Cherokee.</td>
</tr>
<tr>
<td>MPH &gt;0 &amp; &lt;3-7</td>
<td></td>
<td>This will activate the camera input whenever the vehicle is going more than 0 mph or less than the designated number.</td>
<td></td>
</tr>
<tr>
<td>Front Park Assist</td>
<td></td>
<td>You can also activate the camera input manually by pressing the forward arrow button on the SWC.</td>
<td>You must trigger the front park assist before this feature will show up in the menu.</td>
</tr>
<tr>
<td><strong>Prog Out 1</strong></td>
<td>Reverse</td>
<td>This will provide a 12v+ trigger whenever the vehicle is placed in reverse.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Accessory</td>
<td>This will provide a 12v+ trigger whenever the key is in the accessory or run position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Force Camera</td>
<td>This will provide a 12v+ trigger whenever the reverse camera is forced on using the SWC.</td>
<td></td>
</tr>
<tr>
<td>Reverse or Force Camera</td>
<td></td>
<td>This will provide a 12v+ trigger whenever the vehicle is placed in reverse or the reverse camera is forced on using the SWC.</td>
<td>This is the default setting for Prog Out 1.</td>
</tr>
<tr>
<td>Any Camera</td>
<td></td>
<td>This will provide a 12v+ trigger whenever any camera input is activated.</td>
<td></td>
</tr>
<tr>
<td><strong>Prog Out 2 &amp; 3</strong></td>
<td>Accessory</td>
<td>This will provide a 12v+ trigger whenever the key is in the accessory or run position.</td>
<td>This is the default setting for Prog Out 2 &amp; 3.</td>
</tr>
<tr>
<td></td>
<td>Reverse</td>
<td>This will provide a 12v+ trigger whenever the vehicle is placed in reverse.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Force Camera</td>
<td>This will provide a 12v+ trigger whenever the reverse camera is forced on using the SWC.</td>
<td></td>
</tr>
<tr>
<td>Reverse or Force Camera</td>
<td></td>
<td>This will provide a 12v+ trigger whenever the vehicle is placed in reverse or the reverse camera is forced on using the SWC.</td>
<td></td>
</tr>
<tr>
<td>Blind Spot</td>
<td></td>
<td>This will provide a 12v+ trigger whenever the blind spot camera is activated.</td>
<td></td>
</tr>
<tr>
<td>Front Camera</td>
<td></td>
<td>This will provide a 12v+ trigger whenever the front camera is activated.</td>
<td></td>
</tr>
<tr>
<td>Rear Media</td>
<td></td>
<td>This will provide a 12v+ trigger whenever the radio is placed into rear media mode.</td>
<td>Rear Media mode must be enabled by turning on dipswitch 2.</td>
</tr>
<tr>
<td><strong>Swap Source and Preset SWC</strong></td>
<td>On/Off</td>
<td>This will allow you to swap the Source and Preset SWC around.</td>
<td>Vehicle must be equipped with audio SWC on the back of the steering wheel.</td>
</tr>
<tr>
<td><strong>Swap Track and Volume SWC</strong></td>
<td>On/Off</td>
<td>This will allow you to swap the Track and Volume SWC around.</td>
<td>Vehicle must be equipped with audio SWC on the back of the steering wheel.</td>
</tr>
<tr>
<td><strong>Remote Start Restore Climate</strong></td>
<td>On/Off</td>
<td>This will restore the climate controls to the last known setting on remote start.</td>
<td>Vehicle must be equipped with remote start.</td>
</tr>
<tr>
<td><strong>Preset EQ</strong></td>
<td>On/Off</td>
<td>This will give you 3 user programmable presets for the factory EQ.</td>
<td>See page 4 of instruction manual for operation.</td>
</tr>
<tr>
<td><strong>Auto Start/Stop Memory</strong></td>
<td>On/Off</td>
<td>This will force the vehicle to remember the Auto Start/Stop mode setting once the vehicles key has been cycled.</td>
<td>Only available in vehicles equipped with Auto Start/Stop system. Must turn Auto Start/Stop feature on/off before it will appear in the BCI menu.</td>
</tr>
<tr>
<td><strong>Sport Mode Memory</strong></td>
<td>On/Off</td>
<td>This will force the vehicle to remember the Sport mode setting once the vehicles key has been cycled.</td>
<td>Only available in vehicles equipped with Sport Mode. Must turn Sport Mode on/off before it will appear in the BCI menu.</td>
</tr>
<tr>
<td><strong>ECO Memory</strong></td>
<td>On/Off</td>
<td>This will force the vehicle to remember the ECO mode setting once the vehicles key has been cycled.</td>
<td>Only available in the 2014 Dodge Durango and Jeep Grand Cherokee.</td>
</tr>
<tr>
<td><strong>Exit &amp; Save</strong></td>
<td></td>
<td>Saves settings and exits the menu.</td>
<td></td>
</tr>
</tbody>
</table>
Introduction & Features

The BCI-CH41 will program your Chrysler / Dodge / Jeep / RAM radio to allow the addition of a reverse camera or Rear Media input if the vehicle is not equipped with these features from the factory (reverse camera and video source sold separately). The BCI-CH41 will also allow the factory navigation features of your radio to be used by the passenger at anytime. The interface can also be configured via PC to add even more features, such as: Blind Spot Cameras, Front Camera, Performance Pages, Eco Mode Memory, Auto Start / Stop Memory, Sport Mode Memory, Remote Start Climate Restore, Steering Wheel Control (SWC) swap, EQ Presets, and three programmable 12v outputs. The BCI-CH41 also has on-demand activation of rear or front camera.

Important Notes

1. These instructions only apply to firmware version 14 and harness version 3. The versions can be found on a small white sticker on the interface and harness.
2. RAM trucks equipped with a manual transmission will not support the forced Reverse Camera or Reverse Output Trigger features.
3. The Jeep Cherokee and Chrysler 200 will not support the addition of Rear Media Mode.
4. 2017 Dodge Charger, Challenger, Chrysler 300 and vehicles equipped with the 5” screen do not support the addition of Rear Media Mode.
5. It is very important to follow the exact sequence of installation steps as listed below. Failure to do so will result in the interface not working as intended.
6. If you change the DIP switch settings, you must disconnect and reconnect power for the change to take effect.
7. The navigation unlock feature must be activated by the SWC every time the key is cycled.
8. The VS41 video switcher, AVS21 A/V switcher, or any other universal video switcher must be used in order to use more than one video source with the BCI-CH41.
9. If navigation is being used and the camera input is engaged UNDER 20 MPH, it will affect the navigation guidance until the camera input is switched off.
10. Vehicles without audio SWC (located on the back of the steering wheel) will not support the Navigation Unlock or SWC Swap features.

Installation Steps

1. Set DIP switches to the ON position that correspond with the features you want to add. Feature DIP switches (1-3) must be set before connecting the interface to the vehicle harness.
   a. DIP switch 4 - Turning ON DIP switch 4 will allow you to access the Feature Settings Menu through the vehicles Multi Function Display to turn additional features On / Off. These features can also be set using the BCI App. Please see Page 6 for a full list and description of each of the BCI features.
2. At this point, you can plug the BCI into a Windows PC and set up the programmable outputs, blind spot and / or front camera operation, as well as enable any other features of the BCI using the BCI App. See page 6 for more details on the BCI app.
3. Remove the factory radio and disconnect the factory harness(es).
4. Connect the factory harness into the female connector on the BCI-CH41 harness.
5. Connect the aftermarket reverse camera’s video output to the female camera input located on the radio side of the BCI-CH41 harness. If you are also adding blind spot and / or a front camera, the VS41 must be used (sold separately). See page 2 for VS41 wiring. You can also use any universal video switcher and utilize the programmable outputs to trigger as necessary.
6. Connect the trigger wire(s) as needed. Please see chart on next page for trigger wire colors and functions.
Connecting a VS41 (sold separately)

If you are adding a front camera and two blind spot cameras, or any combination of the three, to the factory radio, a VS41 (sold separately) can be used in conjunction with the BCI. Follow the example below to make all inputs work accordingly through the one camera input on the factory radio. Connect the 10-pin harness from the VS41 harness into the Expansion Port on the BCI-CH41. Do not manually wire the trigger wires, or power and ground leads, when using the Expansion Port connector. When the appropriate CAN-Bus signals are detected (ie. reverse, or turn signal) the corresponding camera input will be automatically selected, and it’s video feed will be routed to the factory radio display.

The behaviors of the cameras and output wires can be configured using the BCI app. Please see page 6 for full details on using the BCI app.
Common Use Examples w/Setup

Set DIP switches to the ON position to activate the corresponding features. Set DIP switches to the OFF position for any features that are not desired.

<table>
<thead>
<tr>
<th>Reverse Camera</th>
<th>Rear Media Mode</th>
<th>Rear Media</th>
<th>Feature Settings Menu</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

Adding Reverse Camera Only
- DIP switch 1 = ON
- DIP switch 2 = OFF
- DIP switch 3 = OFF
- DIP switch 4 = User Preference
- No additional programming needed as Programmable Output 1 (10A) is set to “Accessory” by default (use to power cameras)

Adding Reverse Camera and Navigation Unlock
- DIP switch 1 = ON
- DIP switch 2 = OFF
- DIP switch 3 = OFF
- DIP switch 4 = User Preference
- No additional programming needed as Programmable Output 1 (10A) is set to “Accessory” by default (use to power camera)

Adding Reverse Camera and Rear Media
- DIP switch 1 = ON
- DIP switch 2 = ON
- DIP switch 3 = User Preference
- DIP switch 4 = User Preference
- No additional programming needed as Programmable Output 1 (10A) is set to accessory by default (use to power cameras and video source)

Adding Reverse Camera and a Bed Camera using the AVS21 (sold separately)
- DIP switch 1 = ON
- DIP switch 2 = OFF
- DIP switch 3 = OFF
- DIP switch 4 = User Preference
- PC Settings
  - Blind Spot Camera = OFF.
  - Front Camera = OFF
  - Programmable Output 1 (10A) = Any Camera Active or Accessory (use to power cameras)
  - Programmable Output 2 (1A) = Forced Reverse Camera (use to trigger AVS21 when the forced reverse camera feature is triggered via the SWC or the on-demand switch)
  - Programmable Output 3 (1A) = OFF

Adding Blind Spot Cameras using the VS41 (sold separately)
- DIP switch 1 = ON if adding rev cam; OFF if already equipped
- DIP switch 2 = OFF
- DIP switch 3 = User Preference
- DIP switch 4 = User Preference
- PC Settings
  - Blind Spot Camera = User Preference, can’t be OFF
  - Front Camera = Off
  - Programmable Output 1 (10A) = Any Camera Active or Accessory (use to power cameras)
  - Programmable Output 2 = OFF
  - Programmable Output 3 = OFF

Adding Blind Spot Cameras and a Front Camera using the VS41 (sold separately)
- DIP switch 1 = ON if adding reverse camera; OFF if already equipped
- DIP switch 2 = OFF
- DIP switch 3 = User Preference
- DIP switch 4 = User Preference
- PC Settings
  - Blind Spot Camera = User Preference, can’t be OFF.
  - Front Camera = User Preference, can’t be OFF.
  - Programmable Output 1 (10A) = Any Camera Active or Accessory (use to power cameras)
  - Programmable Output 2 = OFF
  - Programmable Output 3 = OFF

Adding Reverse Camera, Blind Spot Cameras, and a Front Camera using the VS41 (sold separately), a bed camera using the AVS21 (sold separately), Navigation Unlock, and Rear Media
- DIP switch 1 = ON
- DIP switch 2 = ON
- DIP switch 3 = ON
- DIP switch 4 = User Preference
- PC Settings
  - Blind Spot Camera = User Preference, can’t be OFF.
  - Front Camera = User Preference, can’t be OFF.
  - Programmable Output 1 (10A) = Accessory (use to power cameras and video source)
  - Programmable Output 2 (1A) = Forced Reverse Camera (use to trigger AVS21 when the forced reverse camera feature is triggered via the SWC or the on-demand switch)
  - Programmable Output 3 (1A) = OFF
Reverse Camera Input and Navigation Unlock Interface for Chrysler / Dodge / Jeep / RAM Vehicles

BCI-CH41 (v2)

Operation

Feature Settings Menu

PLEASE NOTE:
- DIP switch 4 must be on in order to access the BCI Feature Settings Menu through the vehicle.
- Please see page 6 for a full list and description of each of the BCI-CH41 features.
- These features can also be set using the BCI App. Please see page 6 for more info on the BCI App.

To Access the Feature Settings Menu

1. Place the Multi Function Display into the mode that displays radio text.
2. Press and hold the Lock button on the driver door for approximately 5 seconds (see Fig. A). “BCI-CH41 Menu” followed by the product revision number will be displayed on the MFD in the gauge cluster.
3. Use the up / down buttons on either side of the back of the steering wheel to scroll through the features in the menu. Press the center button to scroll through options within the feature (Fig. B).
   a. If the vehicle is not equipped with SWC on the back of the steering wheel, you can use the forward and back arrows on the front of the steering wheel to navigate through the menu and use the VR button to change selections and turn features off / on (Fig.C).
4. Once all settings have been made, scroll to Exit & Save and press the selection button. The MFD will display “Saving”.
5. You can now either flip DIP switch 4 OFF to disable access to the menu, or leave it in the ON position to access the menu later.

Reverse Camera

If you have DIP switch 1 in the ON position, the factory screen will switch to the reverse camera whenever the vehicle is placed into reverse. You can also force the reverse camera at anytime by pressing and holding the center button on the back left side of the steering wheel for at least 4 seconds (Fig. D). If your vehicle does not have SWC on the back of the steering wheel, you can use the back button on the front of the steering wheel (Fig. E) or the included on-demand activation switch.

PLEASE NOTE: The OEM reverse camera will turn off when the vehicle exceeds 5 MPH. This is a limitation of the vehicle, not the BCI-CH41.
Reverse Camera Input and Navigation Unlock Interface for Chrysler / Dodge / Jeep / RAM Vehicles

Operation (cont.)

Rear Media Mode

If you have DIP switch 2 in the ON position, it will activate Rear Media mode on the factory screen (8.4” screens only).

PLEASE NOTE: In order to access Rear Media mode for the first time, you will need to turn the key ON, then OFF and let the vehicle go to sleep (about 1 minute), then turn the key ON again, then OFF again and let the vehicle go to sleep a second time (about 1 minute).

To access Rear Media mode follow these steps:
1. Press the “Media” icon in the bottom left corner of the screen (Fig. F).
2. Press the down arrow on the middle left of the screen (Fig. G).
3. Press the “AV1” icon on the middle left of the screen (Fig. H).
4. Press the “Full” icon on the right middle of the screen to view the video (Fig I). PLEASE NOTE: If you have any of the programmable outputs set to “Rear Media Full Screen”, this is the point at which it will become active.

Nav Unlock

If you have DIP switch 3 turned ON, you can activate the navigation unlock which will enable any features that are normally locked out while the vehicle is in motion.

To activate the navigation unlock, follow these steps:
1. Place the MFD in the mode that displays radio text.
2. Press and hold the center button on the back right side of the steering wheel for at least 2 seconds, then release (Fig. J).
3. The MFD in the cluster will display “Confirm Safe Passenger Use”.
4. Press the same button again within 5 seconds to acknowledge “safe use”, agreeing that use will be performed only by the passenger whenever the vehicle is in motion, and activate the navigation unlock.
5. The MFD will display “Acknowledged”.
6. To de-activate the navigation unlock simply press and hold the same button for at least 4 seconds and then release.
7. The MFD will display “NU Deactivated”.

Preset EQ

- This feature is only available in vehicles equipped with a factory amplifier.
- If you are using preset 1, 2 or 3 and not “P”, the EQ shown on the radio may not be what you are hearing. The interface cannot force EQ settings that the user has stored onto the factory radio.

This feature can be enabled in the Feature Settings menu outlined on Page 3, or by using the PAC app. Presets can be viewed on the MFD when it is set to audio mode and the Mute button is pressed.

To access / store presets follow the procedure below.
1. Presets can be recalled by simply pressing the Mute button located in the center of the volume knob (Fig K). Repeatedly pressing this button will scroll through the presets and the pass through. The pass through is the one labeled “P” and will set the EQ to whatever is displayed on the radio screen.
2. To store a preset, press the Mute button until you get to the desired location. Next, go to the equalizer screen by pressing Audio > Equalizer and set it to the desired sound. Now press and hold the Mute button (Fig K) until the MFD displays “Storing EQ”.

Fig. F  Fig. G  Fig. H  Fig. I

Fig. J  Fig. K
Please note:
The BCI must be programmed with revision 12 or higher to support app programmability. You can program the BCI either on the bench or in the car (with ignition on). To program the BCI module with the BCI App, follow these steps:

1. Download and install the BCI App. Once installed, open the app.
2. Connect the interface to the PC.
3. When first connected, the revision info for both the app and the interface should be displayed. Select “Configure” (Fig A).
4. You may now choose between “Camera Settings” and “Interface User Options” on the left, then make selections within those categories on the right (Fig B). Please reference the chart below for all available features and descriptions.
5. Once all selections have been made, you can simply disconnect the interface and install it.

Please note: The features outlined in Fig B may or may not be available in your vehicle. Once the interface has been connected to your vehicle, it will determine what is there, and show the correct options in the Vehicle Setting menu available through the MFD.

### Available BCI-CH41 Features

- **Camera Settings**
  - **Nav Unlock**
    - **On/Off**
      - Turns the navigation unlock feature off or on.
      - Once this has been turned on you will still need to activate it by using the back-right SWC.
  - **Toggle Switch**
    - **Reverse/Forward**
      - On-Demand toggle switch will activate the Reverse or Front cameras.
  - **Blind Spot Camera**
    - **Double tap turn signal**
      - This will activate the camera input whenever you double tap the turn signal within 2 seconds.
    - **Turn Signal**
      - This will activate the camera input whenever a turn signal is on.
    - **Turn signal and moving above sMPH**
      - This will activate the camera input when a turn signal is active and the vehicle is going faster than the designated number.
  - **Front Cam**
    - **Greater than sMPH and less than eMPH**
      - This will activate the camera input whenever the vehicle is going faster than 0 MPH or less than the designated number.
    - **Manual Only**
      - This will allow you to activate the camera input manually by using the on-demand activation toggle switch or the SWC.
    - **On when shift into D until eMPH or 30 seconds**
      - This will activate the camera input whenever the vehicle is placed into Drive. The camera input will turn off once the vehicle's MPH is faster than eMPH, or after 30 seconds.
    - **On when shift out of R until sMPH or 30 seconds**
      - This will activate the camera input whenever the vehicle is shifted out of reverse. The camera input will turn off once the vehicle's MPH is faster than sMPH, or after 30 seconds.

- **Interface User Options**
  - **Prog Out 1**
    - **Any Camera Active**
      - This will provide a 12v trigger whenever any camera is triggered.
    - **Reverse Camera Image**
      - This will provide a 12v trigger whenever the vehicle is in reverse.
    - **Reverse Gear**
      - This will provide a 12v trigger whenever the vehicle is in reverse.
  - **Prog Out 2 & 3**
    - **Accessary**
      - This will provide a 12v trigger whenever the key is in the accessory or run position.
    - **Blind Spot Camera**
      - This will provide a 12v trigger whenever the blind spot camera is activated.
    - **Front Camera Image**
      - This will provide a 12v trigger whenever the front camera is activated.
    - **Reverse Camera Image**
      - This will provide a 12v trigger whenever the vehicle is placed in reverse.
    - **Reverse Gear**
      - This will provide a 12v trigger whenever the vehicle is in reverse.

- **Remote Source & Preset SWC**
  - **On/Off**
    - This will allow you to swap the Source and Preset SWC around.
    - Vehicle must be equipped with remote start.
- **ECO Memory**
  - **On/Off**
    - This will force the vehicle to remember the ECO mode setting once the vehicle has been cycled.
    - Only available in the 2014 Dodge Durango and Jeep Grand Cherokee.
- **Start/Stop Memory**
  - **On/Off**
    - This will force the vehicle to remember the Auto Start/Stop mode setting once the vehicle has been cycled.
    - Only available in vehicles equipped with Auto Start/Stop system.
- **Sport Mode Memory**
  - **On/Off**
    - This will force the vehicle to remember the Sport mode setting once the vehicle has been cycled.
    - Must turn Sport Mode on/off before it will appear in the BCI menu.
- **EQ Presets**
  - **On/Off**
    - This will give you 3 user programmable presets for the factory EQ.
    - See page 4 if instruction manual for operation. This will only show up if the vehicle is equipped with a factory amplified system.
Troubleshooting

1. The module can be reset to factory default settings by pressing and holding the Programming button (on the side of the module) for 5 seconds. When pressing and holding the button, both LEDs will blink red while the module is resetting. Once reset, both LEDs will blink green, this indicates the module is initializing, release the programming button.

2. The LEDs on the module can tell you what the BCI-CH41 is doing. Please refer to the chart below for LED status patterns and possible troubleshooting actions.

<table>
<thead>
<tr>
<th>LED Pattern</th>
<th>State</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dual flashing green</td>
<td>Initializing</td>
<td>Turn on ignition Wait for BCI to finish initializing</td>
</tr>
<tr>
<td>LED 1 solid green</td>
<td>Active</td>
<td>N/A</td>
</tr>
<tr>
<td>LED 2 flashing green</td>
<td>CAN Activity</td>
<td>N/A</td>
</tr>
<tr>
<td>LED 1 solid red</td>
<td>Programmable output 1 active</td>
<td>N/A</td>
</tr>
<tr>
<td>LED 2 flashing red</td>
<td>No CAN communication</td>
<td>Check harness and connector pins for proper connection or change status of loop (cut or re-connect)</td>
</tr>
<tr>
<td>LED 1 flashing red</td>
<td>Resetting</td>
<td>N/A</td>
</tr>
<tr>
<td>LED 2 flashing amber</td>
<td>USB connected</td>
<td>N/A</td>
</tr>
</tbody>
</table>

Discover other OE integration interfaces on our website.