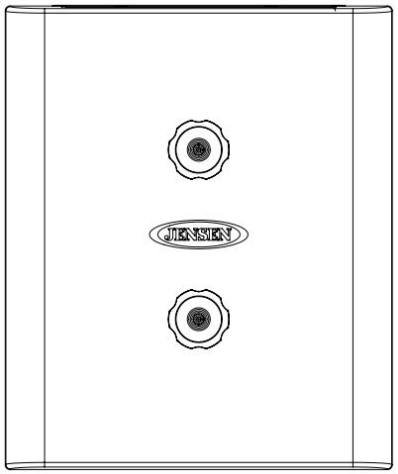
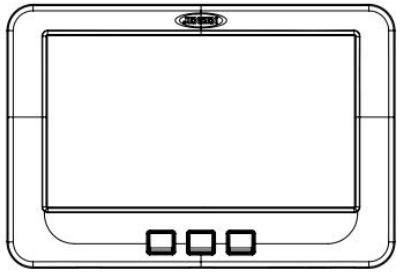
DESIGNED TO MOVE [YOU]

JRVCS1

RV CONTROL AND MONITORING SYSTEM

Installation and Operation Manual





CONTENTS

CONTENTS ii
Introduction 4
Thank You! 4
Features 4
Precautions 4
Packing List 4
Installation 5
Tools and Supplies 5
Disconnecting the Battery 5
Selecting the Mounting Location 5
Mounting the Digital Commander (DC) 5
Wiring 6
Troubleshooting 9
Specifications 11
FCC Notes 11

INTRODUCTION

Thank You!

Thank you for choosing a Jensen product. We hope you will find the instructions in this owner's manual clear and easy to follow. If you take a few minutes to look through it, you'll learn how to use all the features of your new Jensen JRVCS1 for maximum enjoyment.

Features

Features of Jensen JRVCS1 system include:

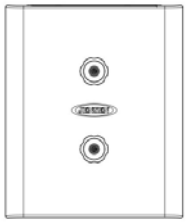
- Control four zones of lighting.
- Monitor all water tank levels.
- Control and monitor the Water Heater.
- Control and monitor the Generator.

Precautions

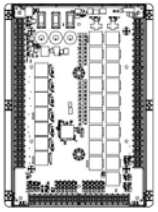
- **Use the Proper Power Supply.**
  This product is designed to operate with a 12 volt DC, negative ground battery system (the standard system in a North American vehicle).
- **Use Authorized Service Centers.**
  Do not attempt to disassemble or adjust this precision product; contact a professional for assistance.
- **Avoid Moisture.**
  To reduce the risk of fire or electric shock, do not expose this equipment to rain or moisture.
- **Avoid Cleaning Products.**
  The front of this unit should only be cleaned with a slightly damp cloth. Do not use cleansers.
- **Use Recommended Accessories.**
  TO REDUCE THE RISK OF FIRE OR ELECTRIC SHOCK AND ANNOYING INTERFERENCE, USE ONLY THE RECOMMENDED ACCESSORIES.

Packing List

1 Cover, 2 Thumb Screws



1 Body Control Module (BCM)



1 Display Commander (DC)

INSTALLATION

It's a good idea to read all of the instructions before beginning the installation. We recommend having your Jensen JRVCS1 installed by a reputable RV dealership

Tools and Supplies

You will need these tools and supplies to install your JRVCS1:

- Phillips screwdriver
- Wire cutters and strippers
- Electrical tape
- Crimping tool
- Volt meter/test light
- Fork Crimp connectors
- 10 gauge wire for power and slide connections
- 14 and 18 gauge wire for all other connections
- Four #8 PH (0.164" x 0.75") screws for the DC
- Six #8 PH (0.164" x 1.0") screws for the BCM

Disconnecting the Battery

To prevent a short circuit, be sure to turn off 12V power and remove the negative (-) battery cable prior to installation.

Selecting the Mounting Location

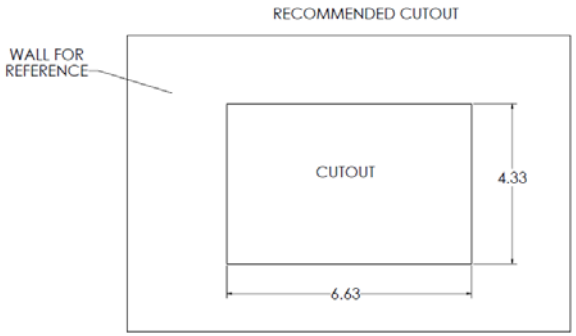
Select a mounting location, taking care to avoid the following:

- Places exposed to heat-radiating appliances such as electric heaters
- Adjacent to other equipment that radiates heat
- Poorly-ventilated or dusty places
- Moist or humid locations

Mounting the Display Commander (DC)

- Use the mounting hole diagram to measure and cut a mounting hole
- Route power wires through the hole and connect
- Check and ensure correct operation
- Mount the unit using four #8 PH (0.164" x 0.75") screws
- Attach Trim ring.

CUTOUT FOR DISPLAY COMMANDER (DC)



NOTE: Before cutting the mounting hole, make sure the area behind the mounting location is clear of wires, fuel and vacuum or water lines.

格式化: 字型: 粗體
格式化: 縮排: 左: 0.63 公分
格式化: 左 0 字元

WIRING

The wiring diagram depicts all the wiring connections required for proper operation of the unit.

DETAIL A

BODY CONTROL MODULE (BCM) CONNECTIONS

PIN NO.	WIRE COLOR/SIZE	DESCRIPTION	
1	BLUE (18)	FRESH TANK 1	(IN)
2		FRESH TANK 2	(IN)
3	BROWN (18)	BLACK TANK 1	(IN)
4	LIGHT BLUE (18)	BLACK TANK 2	(IN)
5	GRAY (18)	GRAY TANK 1	(IN)
6	RED (18)	GRAY TANK 2	(IN)
7	LIGHT BLUE (18)	GRAY TANK 3	(IN)
8	WHITE (18)	TANK SENSOR GROUND	(IN)
9	GREEN (14)	LIGHT GROUP 1 +	(IN)
10	WHITE (14)	LIGHT GROUP 1 -	(IN/OUT)
11	GREEN (14)	LIGHT GROUP 1 +	(OUT)
12	GREEN (14)	LIGHT GROUP 2 +	(IN)
13	WHITE (14)	LIGHT GROUP 2 -	(IN/OUT)
14	GREEN (14)	LIGHT GROUP 2 +	(OUT)
15	GREEN (14)	LIGHT GROUP 3 +	(IN)
16	WHITE (14)	LIGHT GROUP 3 –	(IN/OUT)
17	GREEN (14)	LIGHT GROUP 3 +	(OUT)
18	GREEN (14)	LIGHT GROUP 4 +	(IN)
19	~~LIGHT~~ WHITE (14)	LIGHT GROUP 4 -	(IN/OUT)
20	~~LIGHT~~ GREEN (14)	LIGHT GROUP 4 +	(OUT)
21	ORANGE (14)	EXTERIOR LIGHTS +	(IN)
22	WHITE (14)	EXTERIOR LIGHTS -	(IN/OUT)
23	~~LIGHT~~ ORANGE (14)	EXTERIOR LIGHTS +	(OUT)
24	~~LIGHT~~ ORANGE (14)	SECURITY LIGHTS +	(IN)
25	WHITE (14)	SECURITY LIGHTS -	(IN/OUT)
26	ORANGE (14)	SECURITY LIGHTS +	(OUT)
27	~~LIGHT~~ ORANGE (14)	AWNING LIGHTS +	(OUT)
28	~~LIGHT~~ WHITE (14)	AWNING LIGHTS -	(OUT)
29		AUX FUEL TANK +	(IN)
30		AUX FUEL TANK -	(OUT)
31	~~LIGHT~~	AUX TRIGGER 1	(OUT)
32	RED (18) ~~LIGHT~~	GEN START +12V	(OUT)

DETAIL A

BODY CONTROL MODULE (BCM) CONNECTIONS

PIN NO.	WIRE COLOR/SIZE	DESCRIPTION	
33	GREEN (18)	GEN PRIME/STOP +12V	(OUT)
34	BLUE (18)	GEN SERVICE +12V	(IN)
35	ORANGE (18)	GEN HOUR METER +12V	(IN)
36	BLACK (14)	GEN FUEL TANK LEVEL	(IN)
37	RED(14)/BROWN (18)	GEN GROUND	
38	GRAY (16)	LANDING GEAR +12V	(OUT)
39	WHITE (16)	LANDING GEAR GROUND	(OUT)
40	GRAY (16)	HYDRAULIC VALVE EXTEND	
41	WHITE (16)	HYDRAULIC VALVE RETRACT	
42	GRAY (16)	HYDRAULIC VALVE +12V	
43	WHITE (16)	HYDRAULIC VALVE GROUND	
44		AUX TRIGGER 2	(OUT)
45		AUX TRIGGER 3	(OUT)
46		AUX TRIGGER 4	(OUT)
47		AUX TRIGGER 5	(OUT)

48		AUX TRIGGER 6	(OUT)
49		AUX TRIGGER 7	(OUT)
50		AUX TRIGGER 8	(OUT)
51	BROWN (18)	LOCKOUT SIGNAL +12V	(IN)
52	W-HITE (18)	WATER HEATER GROUND	
53	BROWN (18)	WATER HEATER ON (GAS)	
54	ORANGE (18)	WATER HEATER ON (ELECTRIC)	
55	PINK (18)	WATER HEATER FAULT	
56	BLUE (14)	WATER PUMP +12V	(OUT)
57	WHITE (14)	WATER PUMP -12V	(IN/OUT)
58	BLUE (14)	WATER PUMP +12V	(OUT)
59	WHITE (14)	AWNING 2 -12V	(OUT)
60	YELLOW (14)	AWNING 2 +12V	(OUT)
61	WHITE (14)	AWNING 1 -12V	(OUT)
62	YELLOW (14)	AWNING 1 +12V	(OUT)
63	(10)	REAR JACKS	(OUT)
64	(10)	REAR JACKS	(OUT)

BODY CONTROL MODULE (BCM) CONNECTIONS

PIN NO.	WIRE COLOR/SIZE	DESCRIPTION	
65	(10)	FRONT JACKS	(OUT)
66	(10)	FRONT JACKS	(OUT)
67	WHITE (10)	ELECTRIC SLIDE 5 -12V	(OUT)
68	PURPLE (10)	ELECTRIC SLIDE 5 +12V	(OUT)
69	WHITE (10)	ELECTRIC SLIDE 4 -12V	(OUT)
70	PURPLE (10)	ELECTRIC SLIDE 4 +12V	(OUT)
71	WHITE (10)	ELECTRIC SLIDE 3 -12V	(OUT)
72	PURPLE (10)	ELECTRIC SLIDE 3 +12V	(OUT)
73	WHITE (10)	ELECTRIC SLIDE 2 -12V	(OUT)
74	PURPLE (10)	ELECTRIC SLIDE 2 +12V	(OUT)
75	WHITE (10)	ELECTRIC SLIDE 1 -12V	(OUT)
76	PURPLE (10)	ELECTRIC SLIDE 1 +12V	(OUT)
77	BLACK (10)	CHASSIE GROUND	(IN)
78	YELLOW (14)	AWNING +12V	(IN)
79	PURPLE (10)	ELECTRIC SLIDE +12V	(IN)
80	RED (10)	BCM +12V	(IN)

SETUP MENU LIST

ITEM	SELECTION
GENERATOR	PROPANE OR GAS
SLIDE 1	ELECTRIC OR HYDRAULIC
SLIDE 2	ELECTRIC OR HYDRAULIC
SLIDE 3	ELECTRIC OR HYDRAULIC
SLIDE 4	ELECTRIC OR HYDRAULIC
SLIDE 5	ELECTRIC OR HYDRAULIC
TRIGGER 1	MOMENTARY OR LATCH
TRIGGER 2	MOMENTARY OR LATCH
TRIGGER 3	MOMENTARY OR LATCH
TRIGGER 4	MOMENTARY OR LATCH
TRIGGER 5	MOMENTARY OR LATCH
TRIGGER 6	MOMENTARY OR LATCH
TRIGGER 7	MOMENTARY OR LATCH
TRIGGER 8	MOMENTARY OR LATCH
FRONT JACKS	ELECTRIC OR HYDRAULIC
REAR JACKS	ELECTRIC OR HYDRAULIC

TROUBLESHOOTING

Symptom	Solution
DC will not turn ON or No front panel operation	Try the ON/OFF button.
	Check main fuse in Distribution Panel.
	Check 12V+ on wire to DC (RED wire).
	Check Ground wire to DC.
No Power to the Body Control Module (BCM)	Check the Red power LED is off,
	Check the fuse in the Distribution Panel.
	Check 12V+ on wire at pin 80.
	Check Ground wire at pin 77.

SPECIFICATIONS

Display Commander (DC)

Operating Voltage 12vdc
Maximum Current Draw . . . . . 600ma@12vdc
Minimum Operating Voltage 9vdc
Maximum Operating Voltage 16vdc

Body Control Module (BCM)

Operating Voltage 12vdc
Maximum Current Draw . . . . . 600ma@12vdc
Minimum Operating Voltage 9vdc
Maximum Operating Voltage 16vdc

JRVCS1 System

EPROM Non-Volatile Memory . . . . . YES
Bluetooth Version . . . . . 4.0 BLE

General

Body Control Module . . . . . 14.7" (W) x 17.87" (D) x ~~1855mm~~ 1.75" (H)

Display Commander . . . . . 195mm (W) x 132mm (D) x36.5mm (H)

FCC Notes

WARNING! Changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

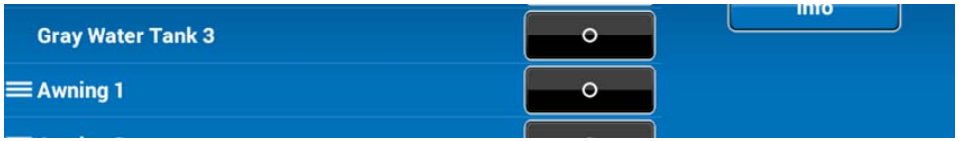
This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications.

However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

格式化: 置中

格式化: 靠右



SETUP → Text Editing

1. Select “setup”

2. Long press “Awning1”

3. A device rename window will open. Press “OK” after completing the text editing.

Light Group 1
Light Group 2
Light Group 3
Light Group 4
Awning Light
Modify
Awning 1
Cancel
OK
ADC
Save
Bluetooth
Lock
q w e r t y u i o p
a s d f g h j k l
Done
z x c v b n m , .
?123
/
' -
:-)

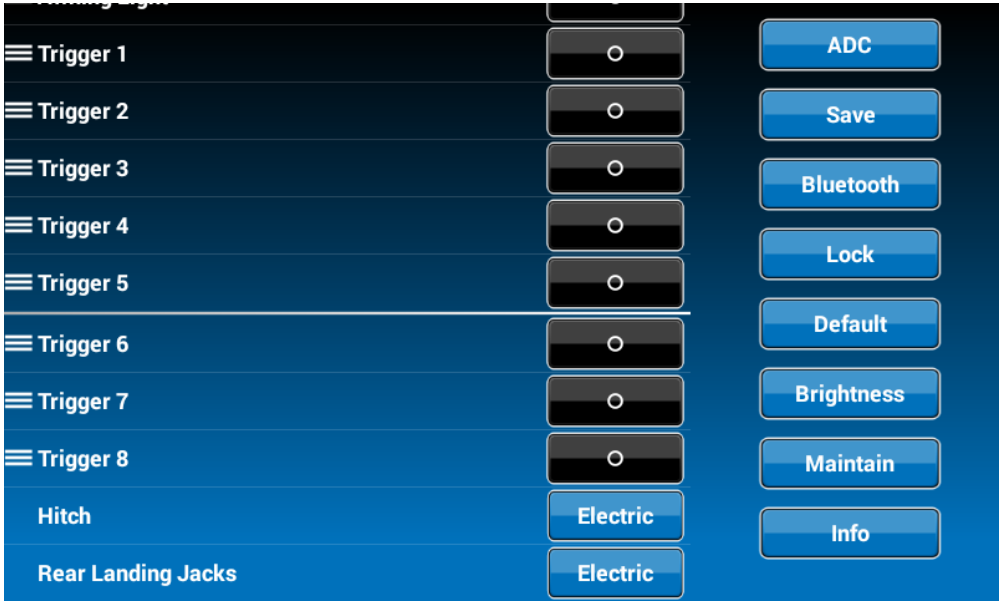
SETUP → Scroll List Editing

1. Select “setup”

2. Press the “Î” icon before the device name and move the device to a new location, “Electric Slide 1” as an example.

SETUP → Triggers

1. Triggers 1 through 8 can be added to the system.



2 Either “Momentary” or “Latch” can be selected for each Trigger.

SETUP →Tanks

1. Fresh water tanks, Black water tanks and Gray water tanks can be added to the system,

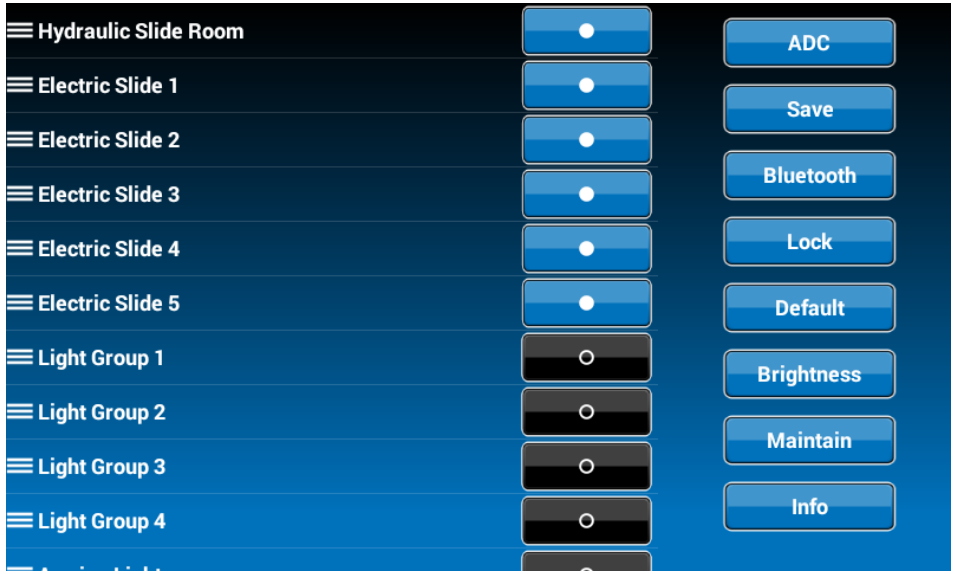
Fresh Water Tank 1
Fresh Water Tank 2
Black Water Tank 1
Black Water Tank 2
Gray Water Tank 1
Gray Water Tank 2
Gray Water Tank 3
Awning 1
Awning 2
Hydraulic Slide Room
ADC
Save
Bluetooth
Lock
Default
Brightness
Maintain
Info

SETUP →Lights

1. Light Groups can be added to the system,

SETUP →Slides

1. Slides can be added to the system,

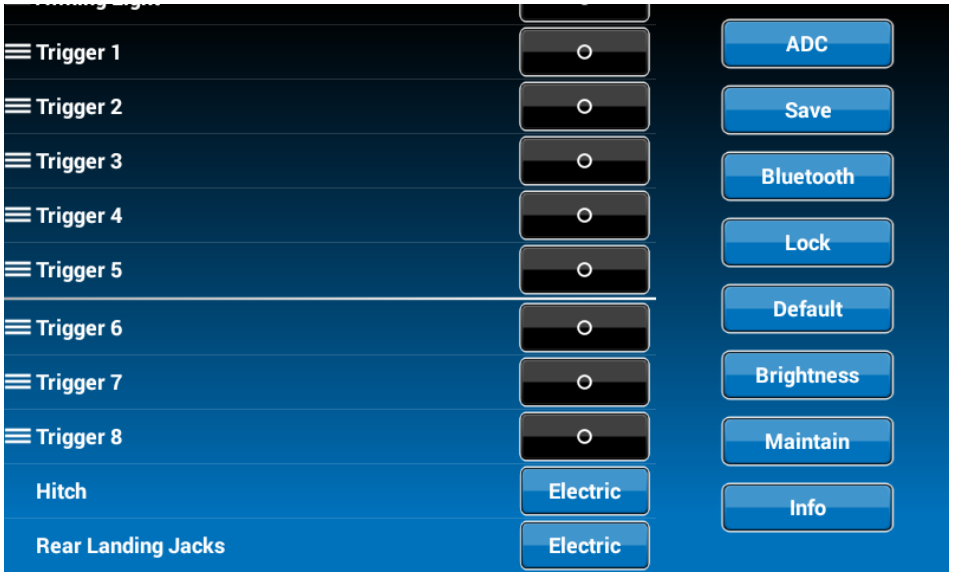


SETUP →Awnings

1. Awnings can be added to the system,

SETUP →Jacks

1. Jacks can be added to the system,



SETUP → Passcode

1. Select “Setup”.

2. Press “Lock” to enter passcode setup.

3. The passcode setup window will open. (DEFAULT FACTORY SETTING IS “ON”)

3.1 Turn on Passcode Protection

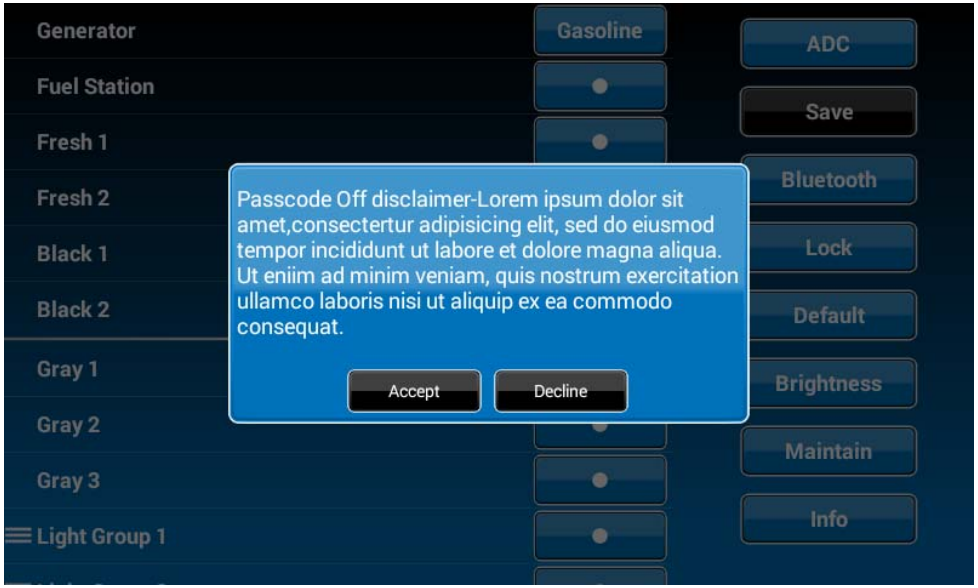
3.1.1. Press “On” to turn on passcode protection. The system will request a passcode. (5391)

3.1.2. Select the idle time to activate the passcode protection.

3.1.3 Passcode protection is activated.

3.2 Turn OFF Passcode protection

3.2.1. When passcode protection is ON, press “On” button to turn off passcode protection



3.2.2. Read the passcode ”Off” disclaimer statement and press “Accept” to proceed.

3.2.3 Enter passcode to proceed

3.2.4. Passcode protection is now turned off.

3.3 Change Passcode

3.3.1. Press the “Edit” button to change to a new passcode.

3.3.2. Enter the old passcode.

3.3.3. Enter the new passcode.

Generator
Fuel Station
Fresh 1
Fresh 2
Black 1
Black 2
Gasoline
Enter New Passcode
Cancel
OK
ADC
Save
Bluetooth
Lock
Default
1
2 ABC
3 DEF
4 GHI
5 JKL
6 MNO
7 PQRS
8 TUV
9 WXYZ
0
Done

3.3.4. Confirm new passcode.

PAIRING INSTRUCTIONS

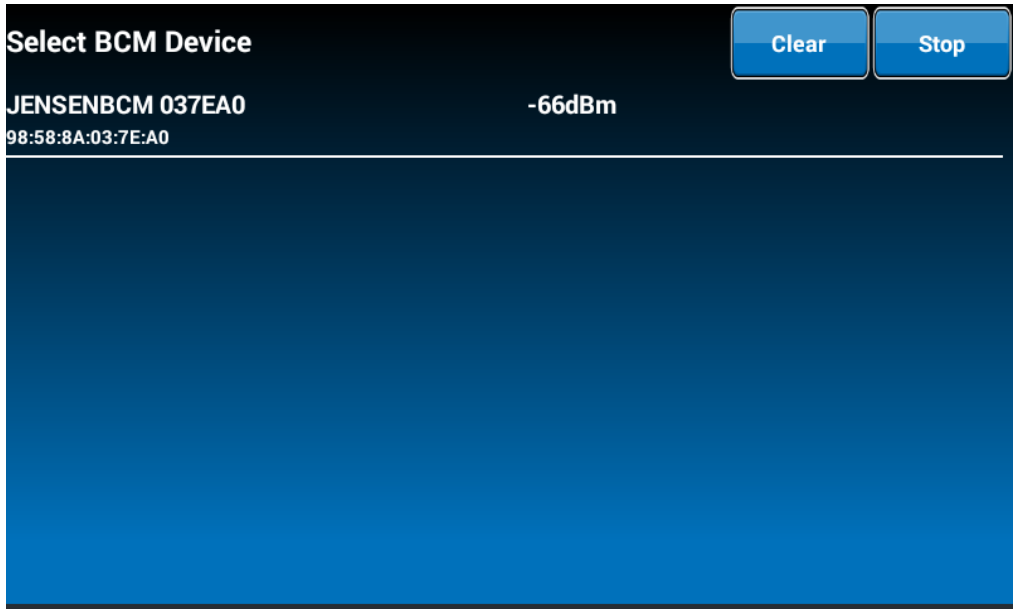
DC to BCM

1. Select “Setup”

2. Select “Maintain”

3. Currently, it shows no Bluetooth Low Energy device connected to this DC. Press the “Select” button across from the “BLE Device”.

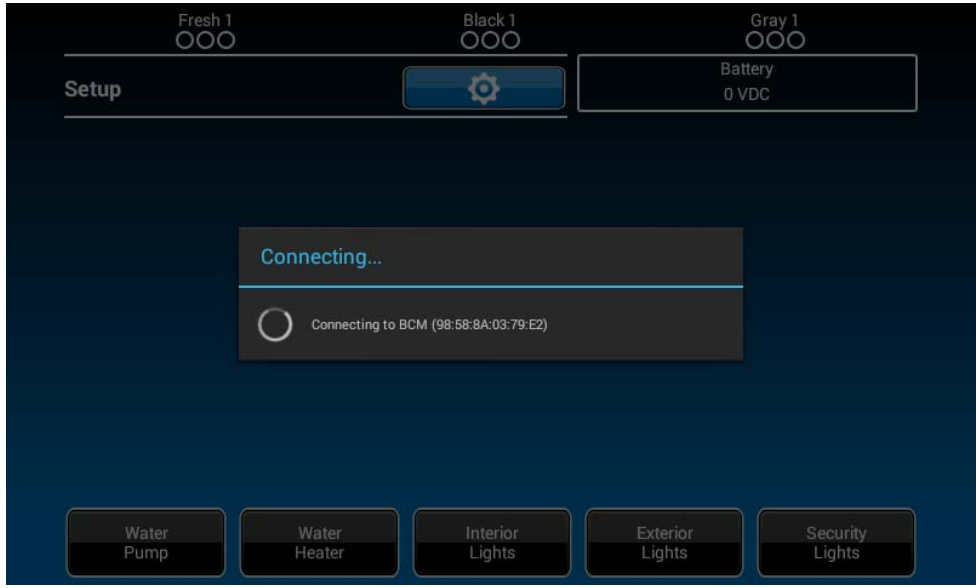
4. The DC will find and list all available devices.



5. Press the target BCM to connect, “JENSENBCM 037EA0” as an example.

6. The DC will automatically return to the previous page and show the paired BCM.

7. Press the hot key to exit the “Maintain” setup page and the DC will start to connect to the selected BCM.



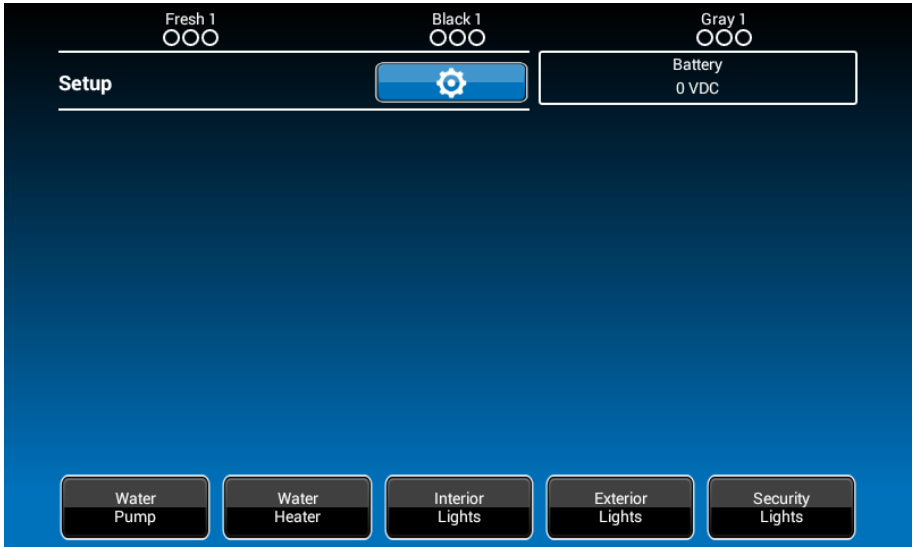
BCM to DC

BLE connection is activated by the DC. The BCM only needs to power up. There is no action needed from the BCM.

PAIRING INSTRUCTIONS → Mobile Device to DC

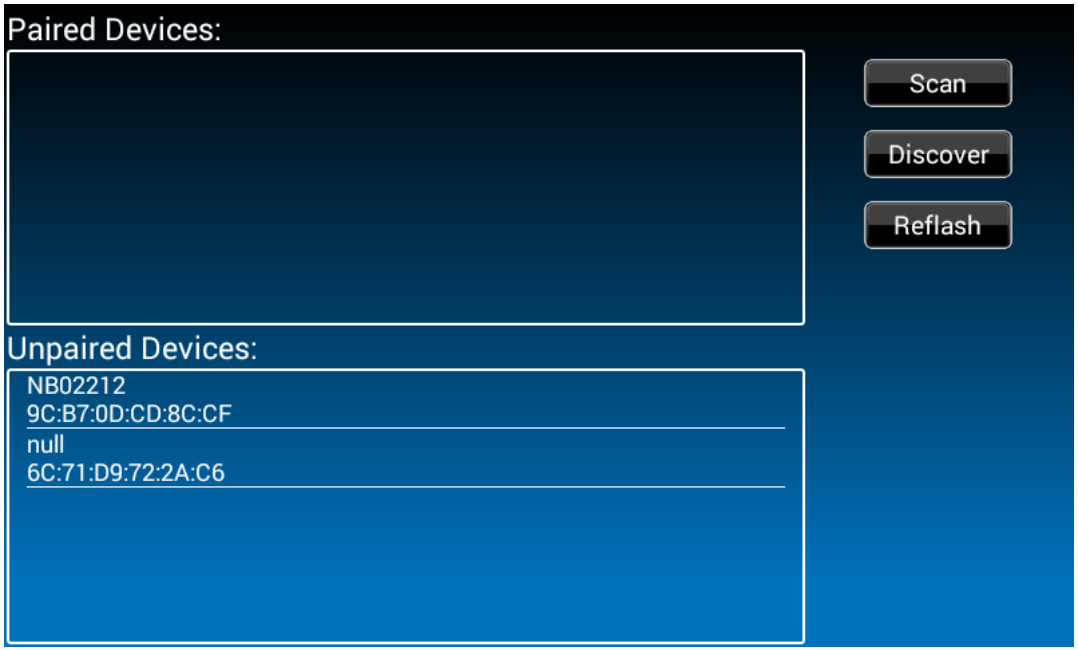
1. DC side.

1.1 Select “Setup”.

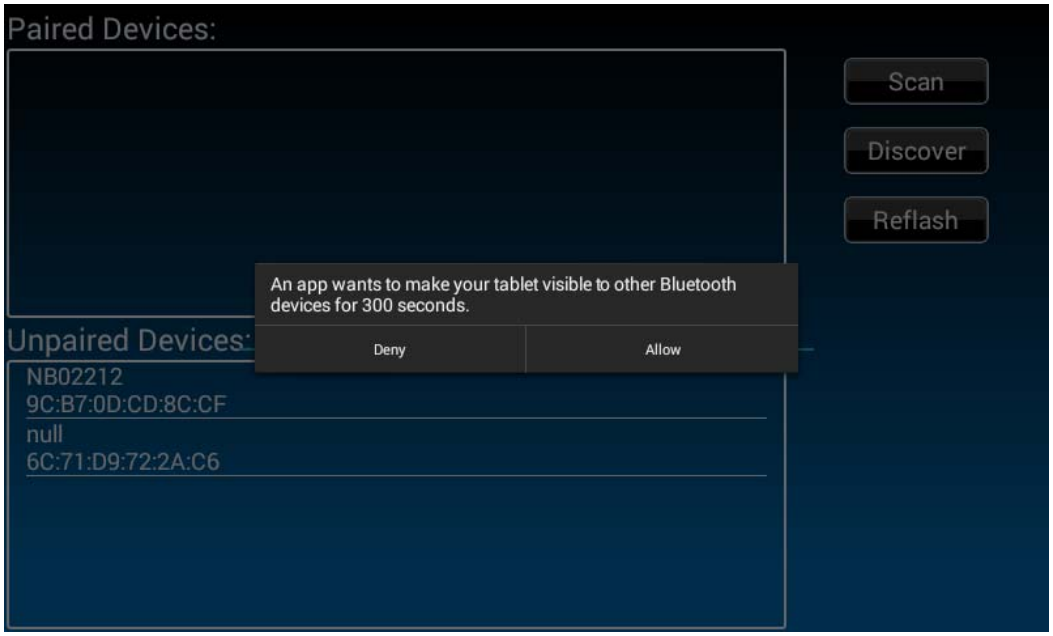


1.2. Select “Bluetooth”.

1.3. Currently, it shows no BT paired device connected to this DC. Press the “Discover” button to activate the BT pairing mode.



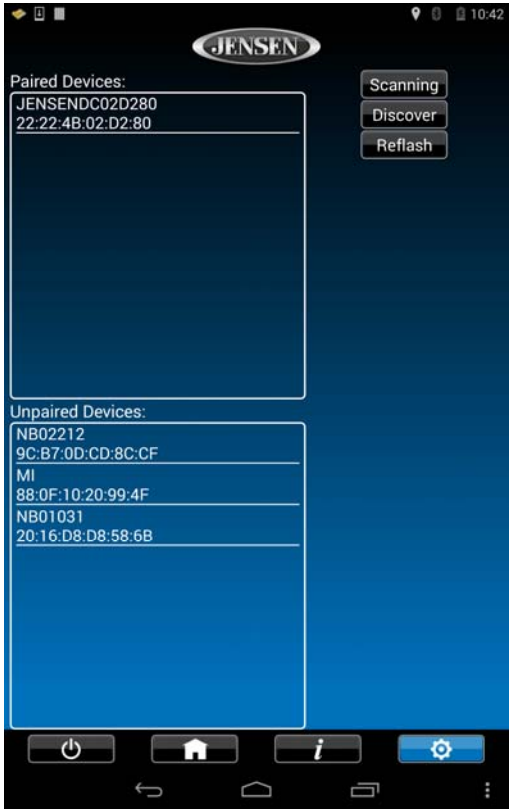
1.4. Press “Allow”.



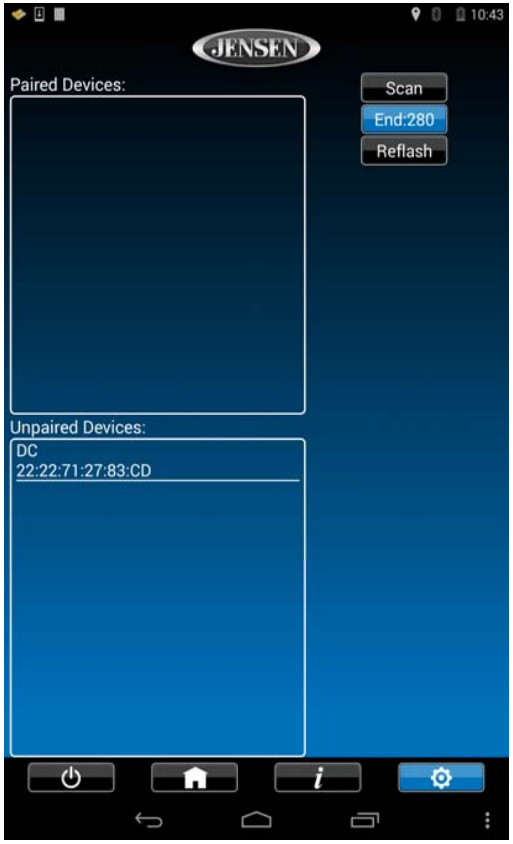
2. Mobile Device side.

2.1 Press “Bluetooth” on the “Setup” page to find the DC device.

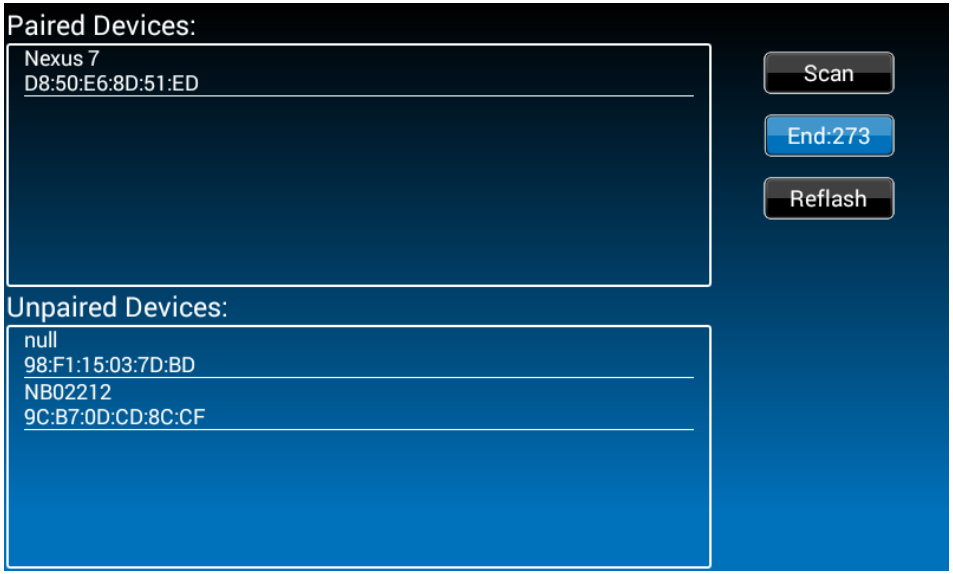
2.2. The Mobile APP will scan for the DC device.



2.3. Find the “DC” in the unpaired device list. Press “DC device” to pair with it.


10:43
JENSEN
Paired Devices:
Scan
End:280
Reflash
Unpaired Devices:
DC
22:22:71:27:83:CD

3.2 The DC now shows the Mobile device is paired.



Software Update

1. Select “Setup”.

2. Attach the update software USB Drive before selecting “Maintain”.

3. The system will look for specific file names for software updates and turn on "Select" action buttons accordingly.

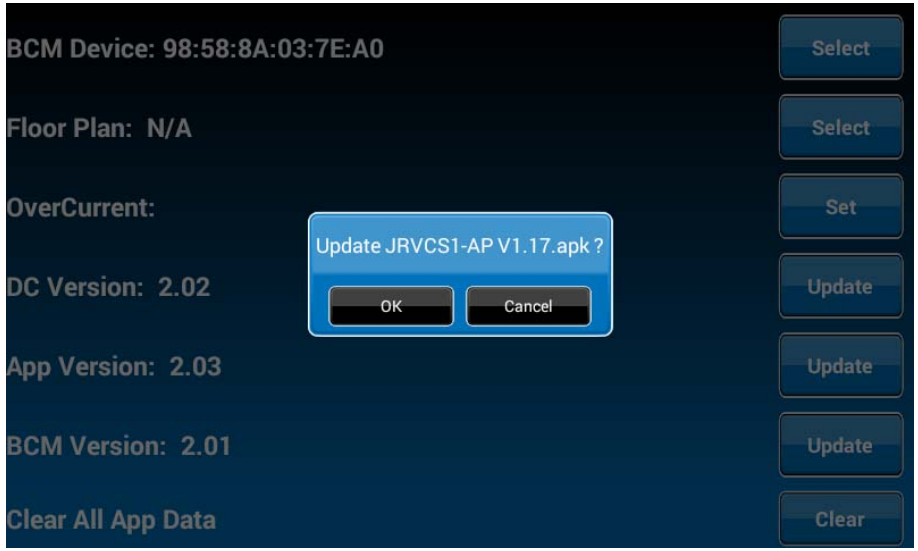
- File name: "JRVCS1_AP Vxxxx.apk" → DC APP update, (xxxx is version number)

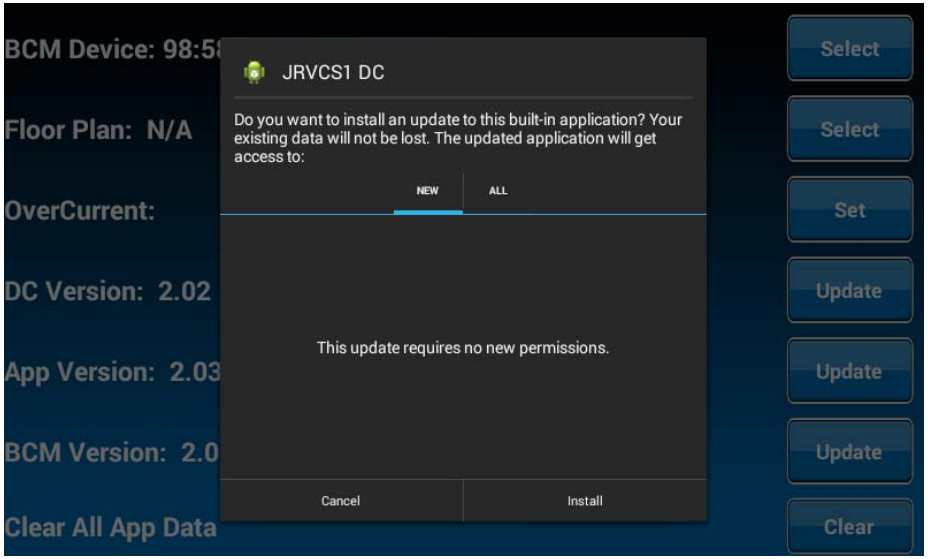
- File name: "JRVCS1_CM Vxxxx.bin" → BCM update, (xxxx is version number)

- File name: "update.zip" → DC Android OS update

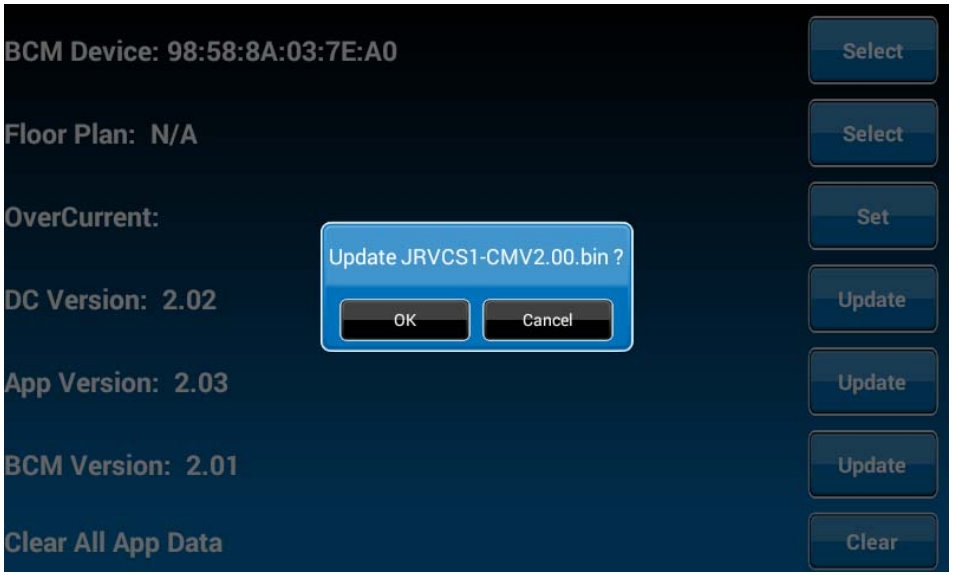
BLE Device:
Select
Floor Plan: N/A
Select
OverCurrent:
Set
DC Version: 2.02
Update
App Version: 2.03
Update
BCM Version: Unknow
Update
Clear All App Data
Clear

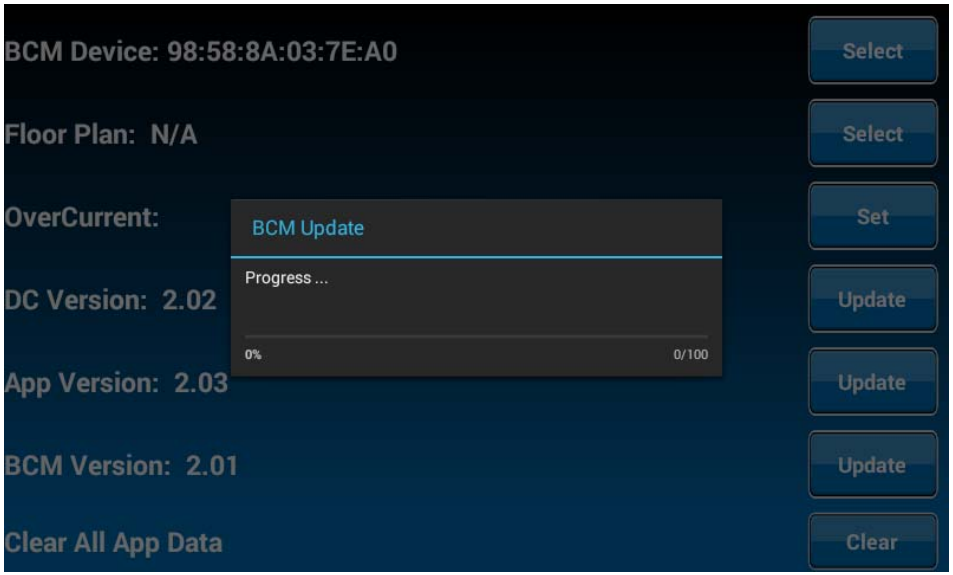
3.1. Press the APP “Update” button to update DC APP.



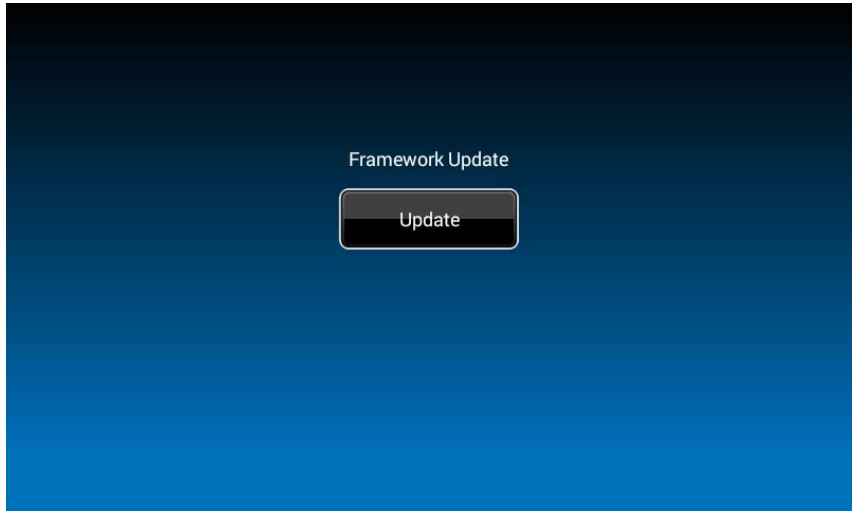


3.2. Press the BCM “Update” button to update the BCM firmware.


BCM Device: 98:58:8A:03:7E:A0
Select
Floor Plan: N/A
Select
OverCurrent:
Set
Update JRVCS1-CMV2.00.bin ?
OK
Cancel
DC Version: 2.02
Update
App Version: 2.03
Update
BCM Version: 2.01
Update
Clear All App Data
Clear



3.3 Press the DC “Update” button to update DC Android OS.

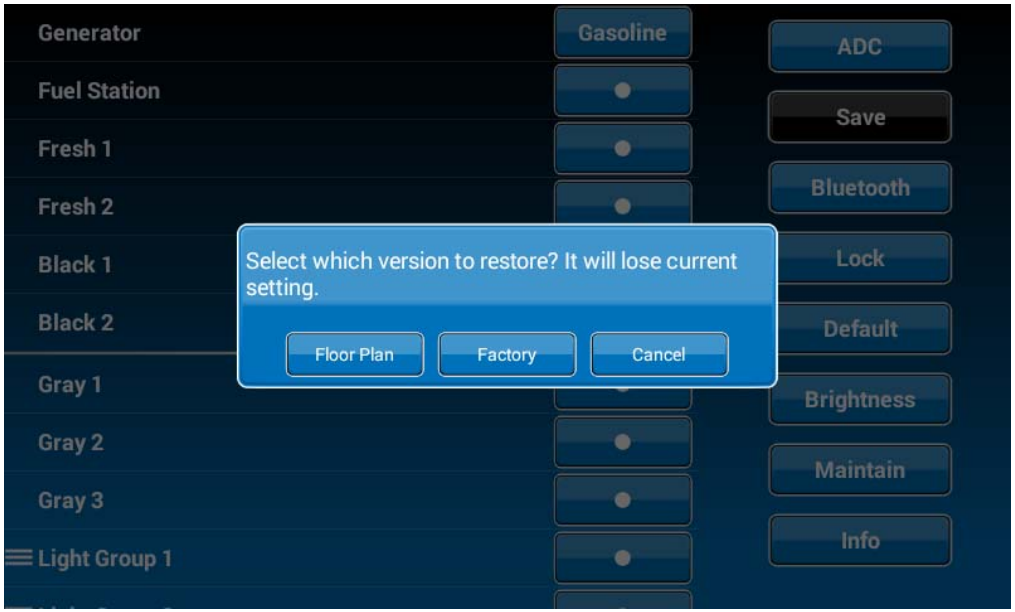

Framework Update
Update

Reset → Floor Plan

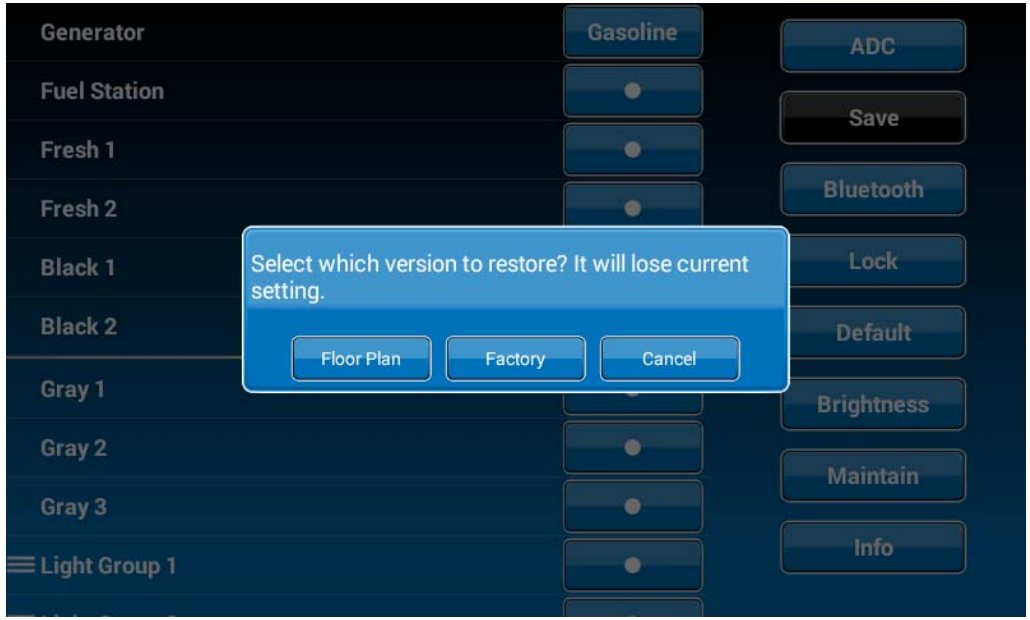
1. Select “Setup”.

2. Press “Default” to restore the system to previous settings.

3. Select “Floor Plan” to restore the previous floor plan setting. Current settings will be lost.



4. Select “Factory” to restore back to ASA default settings. Current settings will be lost.



ASA electronics
THE MOBILE ELECTRONICS COMPANY SINCE 1977

ASA Electronics Corporation
www.asaelectronics.com
www.jensenrvdirect.com
©2015 ASA Electronics Corporation