RE920X-03-00 Interactive Gateway Module, IP Flex ZWave

Features

• Connects panels to Ethernet
• Compatible with:
  o Honeywell Vista® 15P and 20P
  o DSC PowerSeries
  o CADDX NX
  o UTC Concord 4
• Enables:
  o Alarm Reporting
  o Interactive Control Functions
  o Ethernet data reliability
  o Z-Wave Communicator included

Key Instructions

• The same unit works for Vista, Power Series, CADDX NX & UTC Concord 4
• Selectable switch determines panel compatibility.
• Mount anywhere convenient between Ethernet Router and Control Panel
• DO NOT MOUNT INSIDE METAL CAN - there are radios on the boards that need to be in free-air to communicate.
• The communicator must be connected to a 12V nominal power supply with battery backup, such as the control panel's aux power output.
• RE920X communicates with the Vista 15P/20P via AUI device 2. Enable AUI 2 in the Vista.

Wiring Instructions

NOTE: Some programming must be done PRIOR to connection
Maximum cable lengths shown in the table below, this assumes the communicator is the only device attached to the cable. If multiple devices share the same cable, the maximum cable length must be derated accordingly.
### Wire Size (AWG) vs. Maximum Cable Length to Control Panel

<table>
<thead>
<tr>
<th>Wire Size (AWG)</th>
<th>Maximum Cable Length to Control Panel</th>
</tr>
</thead>
<tbody>
<tr>
<td>18</td>
<td>600</td>
</tr>
<tr>
<td>22</td>
<td>250</td>
</tr>
<tr>
<td>24</td>
<td>150</td>
</tr>
</tbody>
</table>

#### PANEL WIRING

**Honeywell Vista**

![Honeywell Vista Diagram]

**DSC PowerSeries**

![DSC PowerSeries Diagram]

**Caddx NX**

![Caddx NX Diagram]

**Interlogix Concord 4**

![Interlogix Concord 4 Diagram]
**Vista 20P and Vista 15P Programming:**

Compatible Honeywell Panels:
- Vista 20P (version 4.0 or later) (controls partition 1 only)
- Vista 15P (version 4.0 or later)

1. Refer to server setup instructions and set up the account on the Dealer Portal.
2. Be sure to add a contact that uses the system MASTER CODE to the account before connecting the module. This will ensure the module can properly communicate with and configure required system settings.
3. Disarm the system (all partitions).
4. The RE920X automatically communicates with the Vista using AUI device 2. The panel is probably defaulted to this. If not, enable AUI 2 in the *189 field. If a device is already using AUI 2, that device must be moved to another AUI address (AUI 1, for Vista 15P, AUI 1, 3 or 4 for Vista 20P).
5. If Vista system has a *91 field that supports RIS, then RIS will need to be disabled. Refer to panel programming instructions for details. If RIS is not supported no action is required.
6. Vista 15p and 20p panel versions 10.21 and later have the keypad lockout feature enabled by default. It is recommended that this feature be disabled to prevent possible keypad lockout conditions if the system master code in the IGM is not synchronized with the master code in the Vista panel. Use programming option *188 to disable keypad lockout.

   NOTE: If it is required to have the keypad lockout feature enabled, it is critical that the system master code be set up as a contact for this account before connecting the module to the panel (see Step 2 above). Also all changes to the system master code must be done at the user portal or dealer portal, not at the keypad. Failing to do this may result in a keypad lockout condition.
7. Power down the Vista system.
8. Set RE927X panel selector switch to Honeywell: DSC CDX [HW] UTC
9. Connect the Vista and RE927X as shown in the Wiring Instructions above.
10. Apply power to the Vista 15P/20P system. It will automatically program.
   a) Be sure ALL partitions are disarmed.
   b) First, the Vista control panel will be busy for 50-60 seconds after powerup.
   c) Then, the module will enable the following settings automatically:
      - IP/GSM device (*29) = 1 (enabled)
      - Communicate to IP/GSM device first (*55) = 1 (IP/GSM first)
      - Opening Report (*65) = 1 (enabled)
      - Closing reports (*66) = 1, 1 (stay closing & away closing reports enabled)
      - Alarm cancel report (*68) = 1 (enabled)
      - AC Power restoral report (*73) = 1 (enabled)
      - Low Battery restoral report (*74) = 1 (enabled)
      - Phone Monitor (*92) = 0 (disabled)

11. Finally, the keypad(s) should display “DISARMED Ready to Arm”.
12. Installation is complete.
**DSC Power Series Programming:**

Compatible DSC Panels:

- PC580 (Power 432)
- PC1555 (Power 632)
- PC1555MX (Power 632)
- PC5010 (Power 832)
- PC5015 (Power 832)
- PC5020 (Power 864)
- PC1616
- PC1832
- PC1864
- PC5010 (Power 832)
- PC1832
- PC1864

1) Refer to server setup instructions and set up the account on the Dealer Portal.

2) Be sure to add a contact that uses the system MASTER CODE to the account before connecting the module. This will ensure the module can properly communicate with and configure required system settings.

3) Using the system’s Installer Code:
   - a) Disable the Communicator ([380]:[1])
   - b) Disable the Telephone Line Monitor ([015]:[7])
   - c) Delete Telephone Numbers (programming section 301-303)
   - d) Verify Alt Comm ([351]:[5]) is enabled
   - e) Verify T-Link is Disabled ([382]:[5])
   - f) Verify Master Code Not Changeable is Disabled ([015]:[6])
   - g) Verify Access Code Required for *1, *2, *3 menus is disabled ([022]:[1])
   - h) Verify that keypad lockout is either zero(disabled) or higher than 6 ([012])
   - i) If you have removed any bus devices, perform a Module Supervision Reset ([902])

4) Verify Alarm report codes are setup properly for zones that are being used, 1-64 (programming section 320-349). System will report as Burg(130) if programmed as FF.

5) If using Aux input (PGM2) verify Aux input report codes are setup properly (programming section 329:4). System will report as Fire (110) if programmed as FF.

6) To enable reporting of the Period Test Transmission, program the “periodic Test Transmission” ([348]:[4]) and the “Periodic Test Transmission with Trouble” ([348]:[3]) reporting codes to “02”

7) All other reports are hardcoded in the gateway and cannot be changed regardless of what is entered in the programmed location.

8) Format and account number have no effect on reporting.

9) Disarm the system (all partitions)

10) Power down the DSC system.

11) Set RE920X panel selector switch to DSC: DSC

12) Connect the DSC Panel and RE920X as shown in the Wiring Instructions above.

13) Connect an Ethernet cable to the local router.

14) Apply power to the DSC system.

15) The DSC control panel will begin automatic configuration. This can take up to 2 minutes.

16) Installation complete.
### Reporting Codes for DSC panels:

The following table shows all events reported when connected to a DSC Panel.

<table>
<thead>
<tr>
<th>Event</th>
<th>Report Code</th>
</tr>
</thead>
<tbody>
<tr>
<td>AC Fail/Restore</td>
<td>301</td>
</tr>
<tr>
<td>Panel Low Battery/Low Battery Restore</td>
<td>302</td>
</tr>
<tr>
<td>Opening/Closing Report</td>
<td>400</td>
</tr>
<tr>
<td>Cancel Report</td>
<td>406</td>
</tr>
<tr>
<td>Zone Alarm</td>
<td>See below</td>
</tr>
<tr>
<td>keypad fire panic</td>
<td>110</td>
</tr>
<tr>
<td>keypad aux panic</td>
<td>100</td>
</tr>
<tr>
<td>keypad police panic</td>
<td>120</td>
</tr>
<tr>
<td>Duress</td>
<td>121</td>
</tr>
<tr>
<td>Periodic Test Transmission</td>
<td>602</td>
</tr>
<tr>
<td>Periodic Test with Trouble Transmission</td>
<td>608</td>
</tr>
</tbody>
</table>

Automatic Contact ID is not supported. Manually programmed reporting codes are only supported for alarms on zones 1-64 ([320] - [324]) and for alarms on the PGM2/Aux input ([329]:[4]). The PGM2/Aux input is reported as zone number 99.

If Report Codes have not been manually programmed for zone alarms, zone alarm reporting codes default to:
- Any zone alarm (zones 1-64): Code 1130 (Burglary)
- PGM2/Aux input (zone 99, likely a 2-wire Smoke): Code 1110 (Fire)

Be sure to verify that all codes are being properly reported to the central station after you have installed the communicator module or modified any reporting program settings in the DSC installer programming menu.

### Caddx NX Programming:

Compatible with all NX series panels

1) Refer to server setup instructions and setup account on the Dealer Portal.
2) Be sure to add a contact that uses the system MASTER CODE to the account before connecting the module. This will ensure the module can properly communicate with and configure required system settings.
3) Disarm the system (all partitions).
4) Power down the NX system.
5) Set the RE920X panel selector switch to CDX: DSC CDX HW UTC
6) Connect the NX panel and the RE920X as shown in the Wiring Instructions above.
7) Apply power to the NX system. During this process, the communicator will program the following settings:
   - Enable Opening and Closing reports
   - Set Telephone Line Cut delay to 0 (no TLM)
8) Installation complete.

**Important:** Do not attempt to enter program mode until the CS and Platform LEDs have stopped flashing.

### Additional Notes for NX installations:

1. Some NX panels limit the number of non-keypad devices they support. Be sure that the panel you are connecting the communicator to does not have more than the number of support devices connected.
2. User codes that are added to the system or edited thru the communicator will have the default or previous partitions enabled. If you desire the users to have different partitions enabled, you will need to modify the partitions thru the NX keypad.
3. 6-digit access codes are not supported.
Concord Programming

Compatible with Concord 4.

1) Refer to server setup instructions and set up the account on the Dealer Portal.
2) Be sure to add a contact that uses the system MASTER CODE to the account before connecting the module. This will ensure the module can properly communicate with and configure required system settings.

3) Using the System’s Installers Code:
   a. Turn off ACCESS CODE LOCK (0003).
   b. Delete phone numbers for CS1-CS3 (01000 - 01020).
   c. Turn on OPENING REPORTS for partition 1 (06100).
   d. Turn on CLOSING REPORTS for partition 1 (06101).

4) If there is an automation or wireless reporting device (i.e. automation module, cell backup module) already connected to the panel, remove the device and delete from the panel. Concord 4 only supports 1 automation bus device.

5) Disarm the System (all partitions).

6) Power down the Concord System.

7) Set the RE920X selector switch to UTC: DSC CDX HW UTC

8) Connect the Concord panel and the RE920X as shown in the Wiring Instructions above.

9) Apply power to the Concord System.

10) If this is the first time the module is powered with the panel:
    a. Do not press any keys on the keypad for the first 2 minutes after power up.
    b. After 2 minutes, initiate a bus scan (8+installer code+01)
    c. Do not press any keys on the keypad for 1 minute after you have performed the bus scan.

11) If the CS or Platform LED is still blinking refer to “Trouble Shooting the Panel Connection”.

12) It is normal for the keypad to display “Enter Light Key” a few times after connecting the module to the panel. If the keypad continues to display “Enter Light Key”, verify you have the correct system master code setup in the account.

13) Installation is complete.

IMPORTANT: Be sure to turn Off ACCESS CODE LOCK before adding the module!

Trouble Shooting the Panel Connection:
If the “CS” or “Platform” LEDs are blinking, here are possible problems:

- Incorrect wiring
- Incorrect panel switch position
- Unsupported panel version
- Unsupported panel model
- Panel is in Installer Program mode
- Vista Specific:
  - AUI not enabled
  - AUI used for some other function
  - LRR not enabled
  - Another LRR or IP/GSM device connected to panel bus
**Factory Default Button**
This button has two functions:

a) Holding this button for approximately 5 seconds will reset the RE920X Communicator.

b) Holding this button for approximately 10 seconds (LEDs will flash off twice) will set the RE920X to factory defaults.

**Operation**

*Event Reporting:*
Events are reported to both the monitoring receiver and the interactive server. All events use Contact ID reporting codes. The following events are reported by default:

- **Alarms**
- **System Low Battery**
- **Alarm cancels**
- **System Low Battery Restoral**
- **Openings**
- **AC Power Fail (0-4 hour random delay)**
- **Closings**
- **AC Power Restoral (0-4 hour random delay)**

Vista Only:
Additional events can be enabled for reporting if desired, by enabling the desired event reports in system programming.

*Interactive Control:*
The system may be controlled remotely through the interactive platform.

The arm/disarm control and status applies to partition 1 only.

*Z-Wave*
Z-Wave devices can be controlled via the Interactive function.

*Siren (Future capability)*
Wireless Siren will be useable to indicate alarm and statuses.
### LEDs

<table>
<thead>
<tr>
<th>Bus Board LEDs</th>
<th>Indication</th>
</tr>
</thead>
<tbody>
<tr>
<td>Green</td>
<td>On when the board is powered and running</td>
</tr>
<tr>
<td>Red</td>
<td>Flickers when module talks to panel</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Ethernet LEDs</th>
<th>Indication</th>
</tr>
</thead>
<tbody>
<tr>
<td>Power</td>
<td>ON and Flashing once per second when the board is powered and running</td>
</tr>
<tr>
<td>Local</td>
<td>ON when the unit is registered with the local ethernet router</td>
</tr>
<tr>
<td>CS</td>
<td>ON when the connection to the central station is established</td>
</tr>
<tr>
<td></td>
<td>Flashes when there is a problem detecting the Panel type</td>
</tr>
<tr>
<td>Platform</td>
<td>ON when the connection to the Panel and connection to the interactive</td>
</tr>
<tr>
<td></td>
<td>server is established</td>
</tr>
<tr>
<td></td>
<td>Flashes when there is a problem communicating with the panel</td>
</tr>
</tbody>
</table>

![Diagram of LED indicators and components](image)
Specifications

Current Draw: 120 mA Nominal
Temperature Range: 0F to 120F
Housing dimensions: 4x6x1 inches

Specifications subject to change without notice.

Revision Functionality Table

<table>
<thead>
<tr>
<th>Revision on TOP board</th>
<th>Functionality</th>
</tr>
</thead>
<tbody>
<tr>
<td>57-0012-02_RevA01</td>
<td>Vista15P/20P Compatibility Only</td>
</tr>
<tr>
<td>57-0012-02_RevA06 Or Later</td>
<td>Vista15P/20P, DSC PowerSeries, CADDX NX &amp; UTC Concord 4 Compatible</td>
</tr>
</tbody>
</table>

Notices


Alula products will function with one of either GE, Honeywell, DSC or Napco systems. However, no Alula product is produced by, endorsed by, nor is officially associated with GE, Honeywell, DSC or Napco. Alula recommends verifying proper enrollment and operation, per control panel installation instructions, at installation.

Warranty

Alula will replace products that are defective in their first five (5) years.

FCC Notice

This device complies with Part 15 of the FCC rules. Operation is subject to the following two conditions:

This device may not cause harmful interference.

This device must accept any interference that may be received, including interference that may cause undesired operation.

Changes or modifications not expressly approved by Alula could void the user’s authority to operate this equipment.

FCC ID: U5X-RE920A

IC Notice

This device complies with Industry Canada license-exempt RSS standard(s). Operation is subject to the following two conditions:

(1) This device may not cause interference, and
(2) This device must accept any interference, including interference that may cause undesired operation of the device.

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes :

(1) L'appareil ne doit pas produire de brouillage, et
(2) Il utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

IC: 8310A-RE920A