

# User Instruction Manual

## **IQSDA35**

Dual 3G/HD/SD-SDI Reclocking Distribution Amplifier with Selectable Outputs

## Information and Notices

### Copyright and Disclaimer

Copyright protection claimed includes all forms and matters of copyrightable material and information now allowed by statutory or judicial law or hereinafter granted, including without limitation, material generated from the software programs which are displayed on the screen such as icons, screen display looks etc.

Information in this manual and software are subject to change without notice and does not represent a commitment on the part of Grass Valley. The software described in this manual is furnished under a license agreement and can not be reproduced or copied in any manner without prior agreement with Grass Valley or their authorized agents.

Reproduction or disassembly of embedded computer programs or algorithms prohibited.

No part of this publication can be transmitted or reproduced in any form or by any means, electronic or mechanical, including photocopy, recording or any information storage and retrieval system, without permission being granted, in writing, by the publishers or their authorized agents.

Grass Valley operates a policy of continuous improvement and development. Grass Valley reserves the right to make changes and improvements to any of the products described in this document without prior notice.

### Contact Details

#### Customer Support

For details of our Regional Customer Support Offices, please visit the Grass Valley website.

Customers with a support contract should call their personalized number, which can be found in their contract, and be ready to provide their contract number and details.

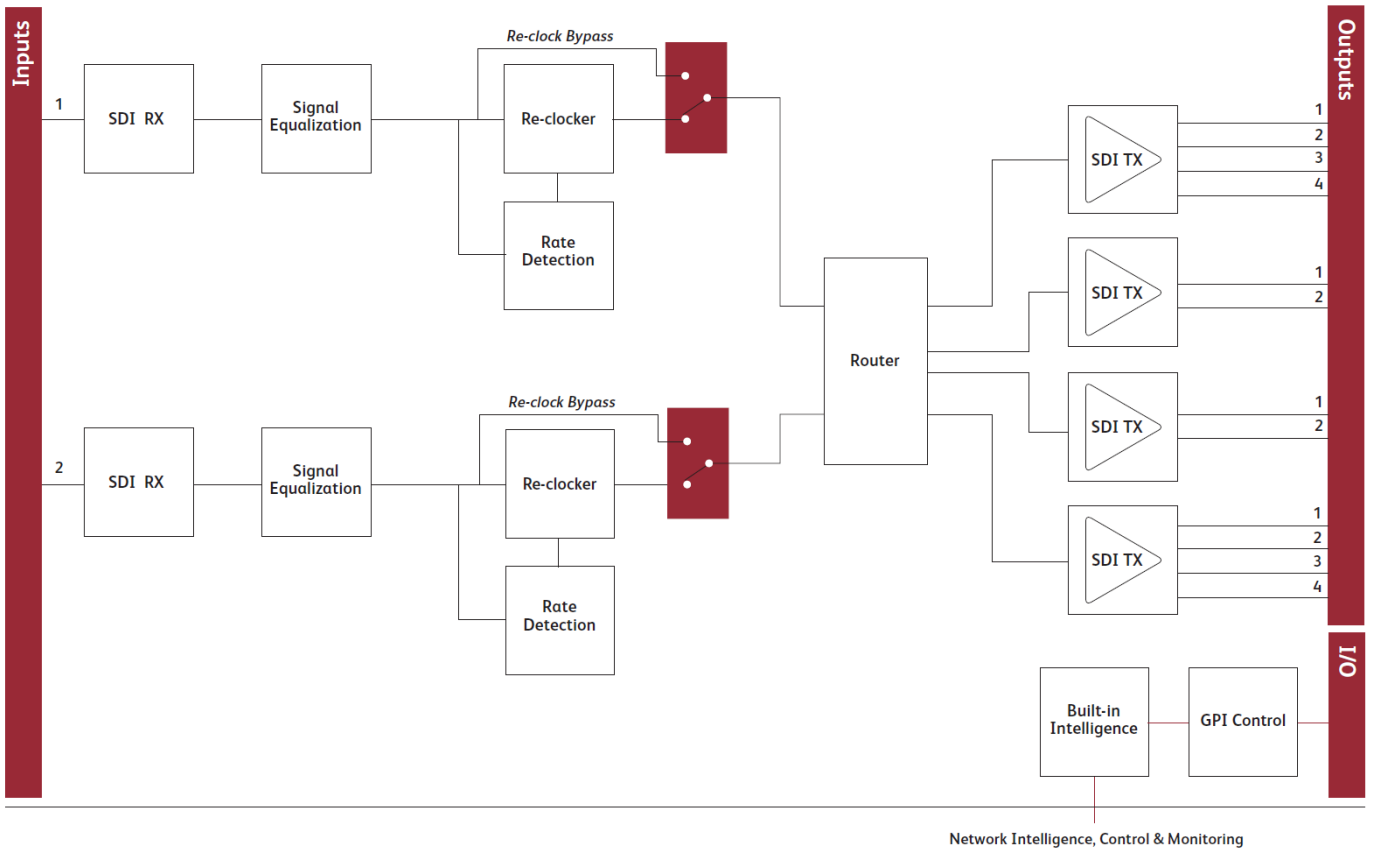
# Contents

- Information and Notices** ..... 2
- 1. Introduction** ..... 4
  - 1.1 Module Description ..... 4
  - 1.2 Order Codes ..... 5
  - 1.3 Rear Panel View ..... 6
  - 1.4 Enclosures ..... 7
    - 1.4.1 B-style Enclosure ..... 7
    - 1.4.2 A-style Enclosures ..... 7
  - 1.5 Feature Summary ..... 8
- 2. Technical Specification** ..... 9
- 3. Connections** ..... 11
  - 3.1 SDI Inputs .....11
  - 3.2 SDI Outputs .....11
  - 3.3 GPI .....11
- 4. Card Edge LEDs** ..... 12
- 5. Controlling the IQSDA35 from the RollCall Control Panel** ..... 13
  - 5.1 The Information Window ..... 13
    - 5.1.1 Unit Status ..... 13
  - 5.2 Input ..... 14
    - 5.2.1 Input 1 and 2 ..... 14
    - 5.2.2 Config 1 and Config 2 ..... 14
    - 5.2.3 Restart Config ..... 15
    - 5.2.4 Swap Config ..... 15
    - 5.2.5 Selected Config ..... 15
    - 5.2.6 Config Names ..... 15
    - 5.2.7 Mode ..... 15
    - 5.2.8 Rules ..... 15
    - 5.2.9 Input 1 Delay for Rules ..... 15
    - 5.2.10 Input 2 Delay for Rules ..... 15
    - 5.2.11 GPIO 1 and GPIO 2 ..... 15
  - 5.3 Memory ..... 16
    - 5.3.1 Recall Memory ..... 16
    - 5.3.2 Save Memory ..... 16
    - 5.3.3 Last Recalled ..... 17
    - 5.3.4 Save Memory Name ..... 17
  - 5.4 Logging ..... 18
    - 5.4.1 Log Field Descriptions ..... 19
  - 5.5 RollTrack ..... 20
    - 5.5.1 Disable All ..... 20
    - 5.5.2 RollTrack Index ..... 20
    - 5.5.3 RollTrack Source ..... 20
    - 5.5.4 RollTrack Address ..... 21
    - 5.5.5 RollTrack Command ..... 21
    - 5.5.6 RollTrack Sending ..... 21
    - 5.5.7 RollTrack Status ..... 21
  - 5.6 Setup ..... 22
    - 5.6.1 Default Settings ..... 22
    - 5.6.2 Factory Defaults ..... 22
    - 5.6.3 Restart ..... 22
    - 5.6.4 Input 1/2 Name ..... 23

# 1. Introduction

## 1.1 Module Description

The IQSDA35 provides dual-channel distribution for HD-SDI 3 Gbit/s, 1.5 Gbit/s or 270 Mbit/s SD-SDI signals with flexible routing of inputs to outputs. Input signal loss detection enables switching from a main to back-up feed automatically, providing emergency changeover functionality. Flexible output selection enables the IQSDA35 to be used either as a single-channel distribution amplifier (DA) with 12 outputs, or in dual-channel mode with 6 outputs per input. An HD/SD-SDI version is available for HD/SD only applications, with an option to upgrade firmware for 3 Gbit/s operation when required.



Block Diagram for IQSDA3548-2A

Network Intelligence, Control & Monitoring

## 1.2 Order Codes

**Note:**

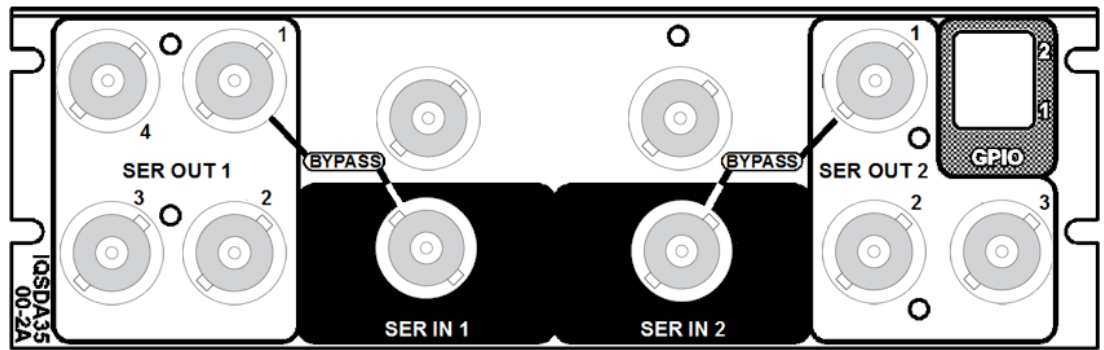
Modules with “A” order codes (for example, IQSDA3547-1**A**) can be fitted into either A- or B-style enclosures. Modules with “B” order codes (for example, IQSDA3547-1**B**) can only be fitted into B-style enclosures. See page 7.

The following product order codes are covered by this manual:

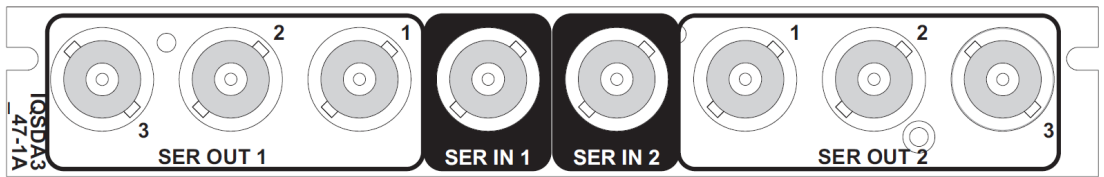
<b>IQSDA3500-2A3</b> <b>IQSDA3500-2B3</b>	Dual Channel HD/SD-SDI Distribution Amplifier with relay bypass and selectable outputs, to operate with 3 Gbit/s SDI signals. 2 inputs, up to 4 outputs per input.
<b>IQSDA3547-1A</b> <b>IQSDA3547-1B</b>	Dual Channel HD/SD-SDI Distribution Amplifier with selectable outputs. 2 inputs, 6 outputs selectable per input.
<b>IQSDA3547-1A3</b> <b>IQSDA3547-1B3</b>	Dual Channel 3G/HD/SD-SDI Distribution Amplifier with selectable outputs. 2 inputs, 6 outputs selectable per input.
<b>IQSDA3571-1A</b> <b>IQSDA3571-1B</b>	Dual Channel HD/SD-SDI Distribution Amplifier with selectable outputs and relay bypass. 2 inputs, 6 outputs selectable per input.
<b>IQSDA3571-1A3</b> <b>IQSDA3571-1B3</b>	Dual Channel 3G/HD/SD-SDI Distribution Amplifier with selectable outputs and relay bypass. 2 inputs, 6 outputs selectable per input.
<b>IQSDA3548-2A</b> <b>IQSDA3548-2B</b>	Dual Channel HD/SD-SDI Distribution Amplifier with selectable outputs. 2 inputs, 12 outputs selectable per input.
<b>IQSDA3548-2A3</b> <b>IQSDA3548-2B3</b>	Dual Channel 3G/HD/SD-SDI Distribution Amplifier with selectable outputs. 2 inputs, 12 outputs selectable per input.
<b>IQSDA3562-2A</b> <b>IQSDA3562-2B</b>	Dual Channel HD/SD-SDI Distribution Amplifier with selectable outputs and relay bypass. 2 inputs, 10 outputs selectable per input.
<b>IQSDA3562-2A3</b> <b>IQSDA3562-2B3</b>	Dual Channel 3G/HD/SD-SDI Distribution Amplifier with selectable outputs and relay bypass. 2 inputs, 10 outputs selectable per input.
<b>IQSDA35-3G</b>	Upgrade for IQSDA35 HD/SD-SDI Distribution Amplifier with selectable outputs to operate with 3 Gbit/s SDI signals.

### 1.3 Rear Panel View

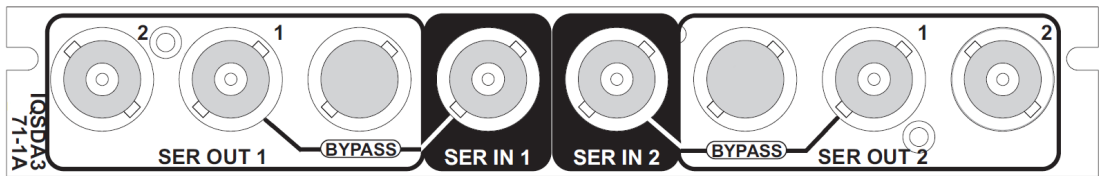
The following rear panel types are available:



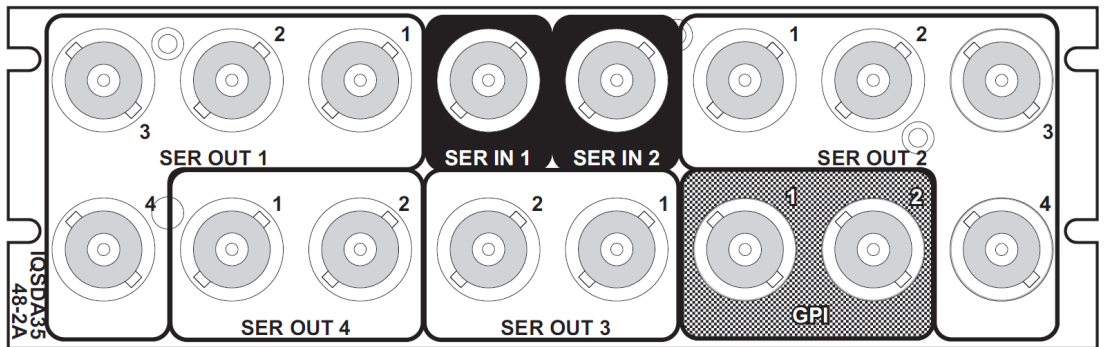
**IQSDA3500-2A(B)3**



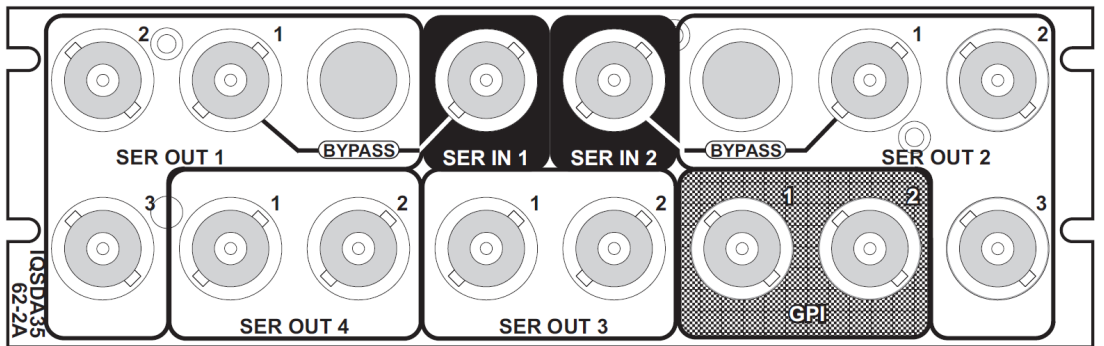
**IQSDA3547-1A(B) / IQSDA3547-1A(B)3**



**IQSDA3571-1A(B) / IQSDA3571-1A(B)3**



**IQSDA3548-2A(B) / IQSDA3548-2A(B)3**



**IQSDA3562-2A(B) / IQSDA3562-2A(B)3**

### 1.4 Enclosures

The module can be fitted into the enclosure types shown.

**Important:** Although IQ modules are interchangeable between enclosures, their rear panels are enclosure specific. An IQH3B enclosure accepts modules with either “A” or “B” order codes. An IQH3A or IQH1A enclosure accepts modules with “A” order codes only. See page 5.

#### 1.4.1 B-style Enclosure



Enclosure order codes: IQH3B-S-0, IQH3B-S-P

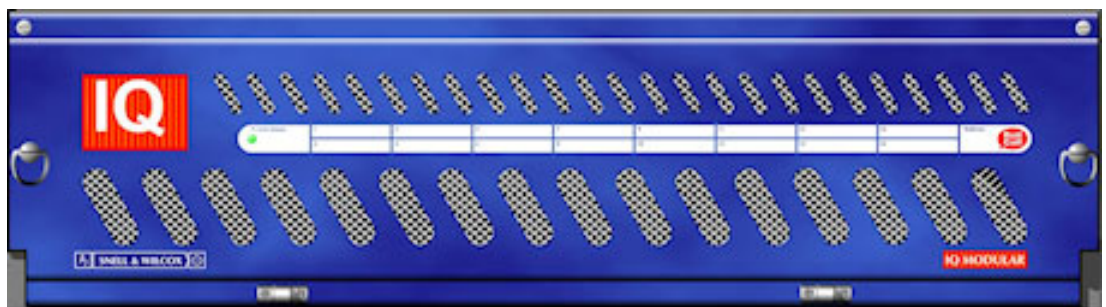
#### 1.4.2 A-style Enclosures



Enclosure order code: IQH1A-S-P



Enclosure order codes: IQH3A-S-0, IQH3A-S-P



Enclosure order codes: IQH3A-E-0, IQH3A-E-P, IQH3A-0-0, IQH3A-0-P



Enclosure order code: IQH1A-S-P

## 1.5 Feature Summary

The IQSDA35 provides the following features:

- Single or dual channel 3 Gbit/s SDI, HD-SDI and SD-SDI reclocking distribution amplifier
- Flexible selection of inputs allows single or dual channel operation
- Input signal monitoring allows auto-changeover functionality to provide emergency switching
- Provides distribution for DVB-ASI and other wide-band signals
- Equalizes up to 70 m at 3 Gbit/s, 140 m at 1.5 Gbit/s and 350 m at 270 Mbit/s when using Belden 1694A cable
- Standards supported:
  - 3G-HD to SMPTE 424M
  - HD-SDI to SMPTE 292M
  - SD-SDI to SMPTE 259M-C
  - DVB-ASI
- Emergency input bypass option enables the SDI input signal to be passed through to SDI output 1 in the event of frame power failure or module removal
- RollCall monitoring allows all signal paths to be managed



## 2. Technical Specification

Inputs and Outputs	
<b>Signal Inputs</b>	
SDI Inputs	2x HD/SD-SDI
Electrical	1.5 Gbit/s HD-SDI, SMPTE 292M 270 Mbit/s SDDSI, SMPTE 259M-C
Connector / Format	BNC / 75 Ohm panel jack on standard Grass Valley connector panel
Input Cable Length	Up to 70 m Belden 1694A @ 3 Gbit/s Up to 140 m Belden 1694A @ 1.5 Gbit/s Up to 350 m Belden 1694A @ 270 Mbit/s
<b>Note:</b> When using mixed HD and SD inputs it is recommended that cable lengths do not exceed the HD specification of 140m.	
<b>Signal Outputs</b>	
SDI Outputs	x12 Group selectable per input
<b>Control Interface</b>	
GPI	Up to 2x GPI (I/O configurable)
Electrical	TTL-compatible, active-low driven
Connector / Format	BNC / 75 Ohm panel jack on standard Grass Valley connector panel
<b>Controls</b>	
<b>Indicators</b>	
Power	OK (Green)
CPU	OK (Green flashing)
Input 1	OK (Green), Bypass (Orange), Loss (Red)
Input 2	OK (Green), Bypass (Orange), Loss (Red)
Input 1 Bitrate	2 (Green) LEDs
Input 2 Bitrate	2 (Green) LEDs
<b>RollCall Features</b>	
Input 1 (2) Rate Select	3G, HD, SD, other
Reclock Bypass	On/Off
Output 1 Select	Input 1, 2
Output 2 Select	Input 1, 2
Output 3 Select	Input 1, 2
Output 4 Select	Input 1, 2
Input Status	Present, Loss, Unknown, Data Rate
Logging	Input 1 (2) Type Input 1 (2) Data Rate Input 1 (2) Present Input 1 (2) Error Input 1 (2) Loss
RollTrack Controls	On/Off, Index, Source, Address, Command, Status, Sending

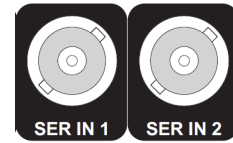
Roll Track Sources	Unused Input 1 (2) Present Input 1 (2) Rate Unknown Input 1 (2) Error Input 1 (2) Loss Input 1 (2) 3G Input 1 (2) HD Input 1 (2) SD
<b>Other Controls</b>	
GPI Input	Activates on contact closure: - select config 1 or 2
GPI Output	Produces an output for: Config 1 selected, Config 2 selected, Input 1 error, Input 2 error
User Memories	Name, save and recall 16 user memories
<b>Specifications</b>	
Electrical	3 Gbit/s SDI, SMPTE 424M 1.5 Gbit/s HD-SDI, SMPTE 292M 270 Mbit/s SDI, SMPTE 259M-C / DVB-ASI
Connector / Format	BNC/ 75 Ohm panel jack on standard Grass Valley connector panel
Return Loss	>-15 dB (270 Mbit/s, 1.5 Gbit/s) >-10 dB (3 Gbit/s)
Output Jitter	SD-SDI 0.2 UI (10 Hz) / 0.2 UI (1 kHz) 3G/HD-SDI 1.0 UI (10 Hz) / 0.2 UI (100 kHz)
Start-up Time	Active video passed within 1 second of power-up.
<b>Power Consumption</b>	
Module Power Consumption	4 W max (A Frames) 4 PR (B Frames)
With relay rear	5 PR max

## 3. Connections

This section describes the physical input and output connections provided by the IQSDA35.

### 3.1 SDI Inputs

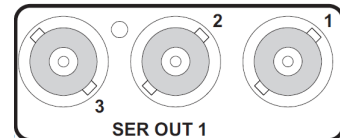
Serial digital inputs to the unit are made to the unit via two BNC connectors which terminate in 75 Ohms.



### 3.2 SDI Outputs

Serial digital outputs from the unit are made to the unit via BNC connectors which terminate in 75 Ohms.

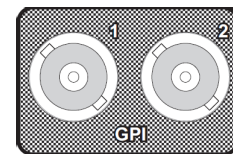
- 4 outputs: IQSDA3571
- 6 outputs: IQSDA3547
- 7 outputs: IQSDA3500
- 12 outputs: IQSDA3548
- 10 outputs: IQSDA3562



### 3.3 GPI

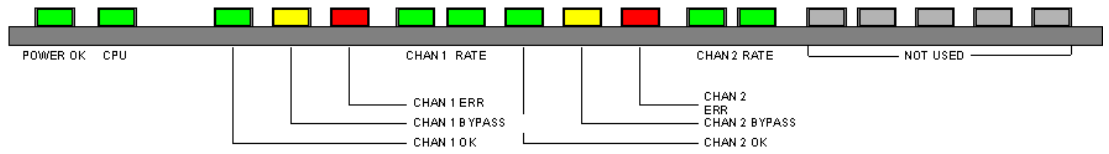
General Purpose Interface via BNC 75 Ohms connectors may be configured as inputs or outputs.

- 0 GPI: IQSDA3547, IQSDA3571
- 2 GPI: IQSDA3500
- 2 GPI: IQSDA3548
- 2 GPI: IQSDA3562



## 4. Card Edge LEDs

The LEDs on the edge of the module indicate its operating status:



LED	Color	Description
<b>Power OK</b>	Green	This indicator is illuminated when a positive power supply is present.
<b>CPU</b>	Green	This indicator will blink to indicate CPU activity.
<b>Channel 1 OK</b>	Green	This indicator is illuminated when input channel 1 is locked to the input signal.
<b>Channel 1 Bypass</b>	Yellow	This indicator is illuminated when the signal on input channel 1 is not being reclocked. That is, in reclock bypass mode.
<b>Channel 1 Error</b>	Red	This indicator is illuminated when there is unknown or no input on input channel 1.
<b>Channel 1 Rate</b>	Green	This indicator pair shows the rate on input channel 1 as follows: <ul style="list-style-type: none"> <li>• Both LEDs illuminated – 3 Gbit/s</li> <li>• Left LED only illuminated – 1.5 Gbit/s</li> <li>• Right LED only illuminated – 270 Mbit/s</li> <li>• Both LEDs off – Rate unknown</li> </ul>
<b>Channel 2 OK</b>	Green	This indicator is illuminated when input channel 2 is locked to the input signal.
<b>Channel 2 Bypass</b>	Yellow	This indicator is illuminated when the signal on input channel 2 is not being reclocked. That is, in reclock bypass mode
<b>Channel 2 Error</b>	Red	This indicator is illuminated when there is unknown or no input on input channel 2
<b>Channel 2 Rate</b>	Green	This indicator pair shows the rate on input channel 2 as follows: <ul style="list-style-type: none"> <li>• Both LEDs illuminated – 3 Gbit/s</li> <li>• Left LED only illuminated – 1.5 Gbit/s</li> <li>• Right LED only illuminated – 270 Mbit/s</li> <li>• Both LEDs off – Rate unknown</li> </ul>

## 5. Controlling the IQSDA35 from the RollCall Control Panel

### 5.1 The Information Window

The information window is displayed in the upper-right corner of each page and displays basic information about the input status, video, audio and reference status of the module.

#### 5.1.1 Unit Status

When **Metadata Status** is selected, the status of the embedded audio input is displayed where:

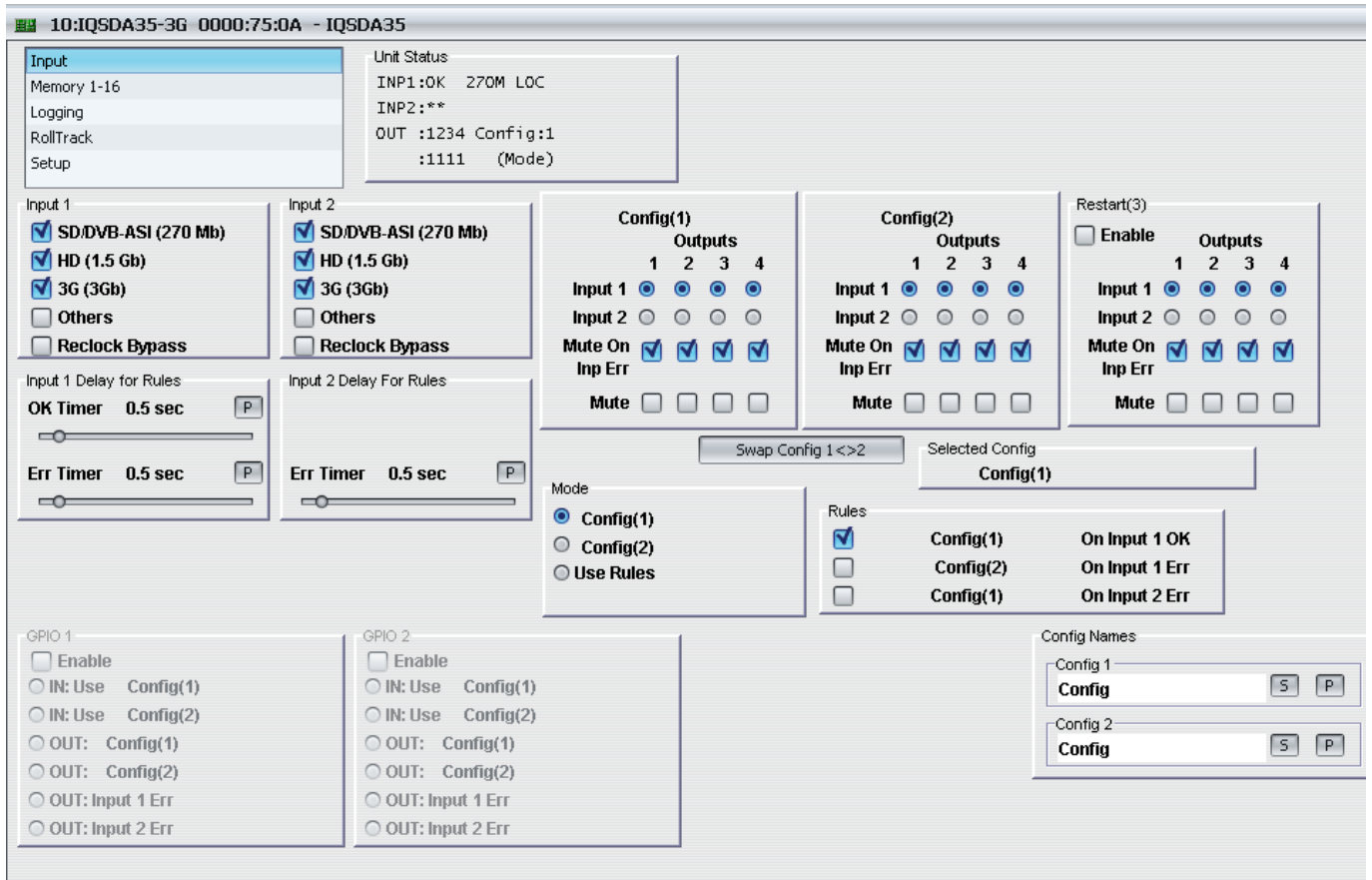
```
Unit Status
INP1:OK 270M LOC
INP2:**
OUT :1234 Config:1
      :1111 (Mode)
```

Name	Status	Description
(Line 1)		Displays the status of Input 1, the detected rate, and whether the signal is locked or in bypass mode. If no Input is detected, asterisks (**) are displayed.
(Line 2)		Displays the status of Input 2, the detected rate, and whether the signal is locked or in bypass mode. If no input is detected, asterisks (**) are displayed.
(Lines 3 and 4)		<p>The first string in line three represents the outputs (1 to 4). The second string in line three indicates the Config that is currently is use.</p> <p>The first string in line four (directly below each output in line three) indicates the input that is routed to that output. If no valid input signal is detected for the output, an E is displayed. The second string indicates whether the config has been determined by selecting a specific mode or if rules are being used to determine the config usage.</p> <p><b>Example</b> In the Unit Status shown above:</p> <ul style="list-style-type: none"> <li>• Input 1 is OK, has a bit rate of 270 Mb, and is locked.</li> <li>• Input 2 is not present or is not recognized.</li> <li>• Input 1 is routed to outputs 1, 2, and 3 and there is currently no signal on output 4.</li> <li>• The configuration in use is Config:1 and this mode has been specifically selected.</li> </ul>

## 5.2 Input

The **Input** page enables:

- Inputs and outputs to be configured.
- The configuration mode to be used selected.
- The rules governing configuration use to be specified.
- GPIOs to be configured.



### 5.2.1 Input 1 and 2

- **SD/DVB-ASI (270 Mb):** When selected, the unit will reclock SD/DVB-ASI (270 Mb) signals.
- **HD (1.5 Gb):** When selected, the unit will reclock HD (1.5 Gb) signals.
- **3G (3 Gb):** When selected, the unit will reclock 3G (3 Gb) signals.
- **Others:** When selected, signals that are not of any of the above rates will be reclocked.
- **Reclock Bypass:** When selected, the unit will not reclock the input signal. If a supported rate is detected, the Unit Status will display the detected rate, otherwise, \*\*\* will be displayed.

### 5.2.2 Config 1 and Config 2

Use the radio buttons to specify the input for each of the outputs (1 to 4), i.e. create a crosspoint.

Select **Mute On Inp Err** to apply a mute to the output if any rate other than those specified as valid in the Input 1 and Input 2 sections is detected.

Select **Mute** to manually apply a mute to the output.

### 5.2.3 Restart Config

A restart configuration can be specified in the same way as the operational configurations described above to be automatically invoked when the module is restarted.

To use the restart configuration, enable the checkbox. This will become active only after a restart. The Mode control will show config (3).

### 5.2.4 Swap Config

Click Swap Config to swap the Config 1 setup with the Config 2 setup.

### 5.2.5 Selected Config

Displays the name of the selected configuration.

### 5.2.6 Config Names

This option enables the pre-set configuration names to be changed (to something more memorable or meaningful), if required.

**To change a configuration name:**

In the **Config 1/Config 2** field, type the new name, and then click the **S** button. To return the memory to its default preset value, click **P** button.

### 5.2.7 Mode

These controls specify which configuration is to be used, or whether the configuration choice should be made by the rules configured in the Rules section.

### 5.2.8 Rules

These controls specify which configuration is to be used if the Use Rules option is selected in the Mode section.

- **Config 1 On Input 1 OK:** this selection will use Config 1 if the Input 1 is receiving a valid input signal.
- **Config 2 On Input 1 Err:** this selection will switch to Config 2 if Input 1 is not receiving a valid input signal.
- **Config 1 On Input 2 Err:** this selection will switch to Config 1 if Input 2 is not receiving a valid input signal.

### 5.2.9 Input 1 Delay for Rules

- **OK Timer:** this specifies the time that Input 1 must be receiving a valid signal in order to be considered 'OK' by any rules.
- **Err Timer:** this specifies the time that Input 1 must be receiving an invalid (or lost) signal in order to be considered in error by any rules. This timer is cumulative. If a signal is fluctuating, when the total time in error reaches the specified time, any rules regarding Input 1 will consider the signal in error.

### 5.2.10 Input 2 Delay for Rules

- **Err Timer:** this specifies the time that Input 1 must be receiving an invalid (or lost) signal in order to be considered in error by any rules. This timer is cumulative. If a signal is fluctuating, when the total time in error reaches the specified time, any rules regarding Input 1 will consider the signal in error.

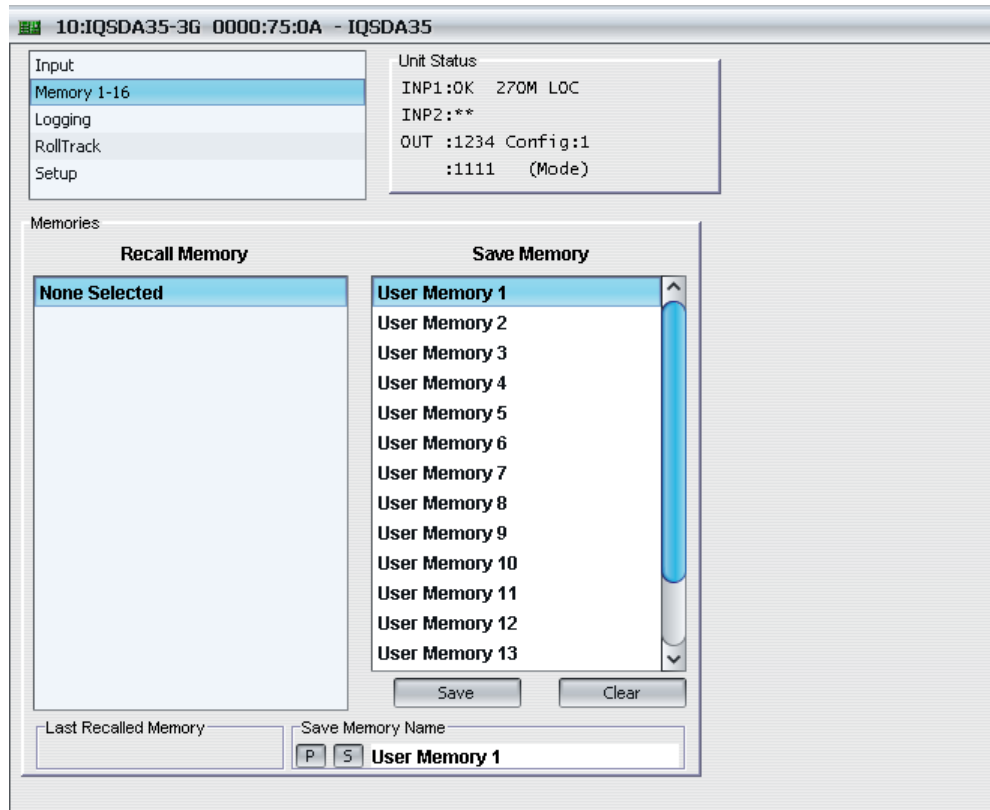
### 5.2.11 GPIO 1 and GPIO 2

These controls configure and enable the GPIOs.

Click enable to activate the GPIO and then select the state that will trigger a GPIO signal.

### 5.3 Memory

The **Memory** page enables up to 16 setups to be saved and recalled later. Default memory names can be changed to provide more meaningful descriptions.



#### 5.3.1 Recall Memory

This column lists the settings that have been previously saved. If no settings have been saved, **None Selected** is displayed.

**To recall the settings saved in a memory:**

In the **Recall Memory** column, select the memory to recall by clicking on it. The recalled settings will be applied and the memory name will appear in the **Last Recalled Memory** section.

**Note:** User memories do not recall log field states. I.e., whether a log value has been enabled or disabled.

#### 5.3.2 Save Memory

This column lists the 16 pre-set memory names that are available for use.

**To save settings:**

In the **Save Memory** column, select a memory location, and then click **Save**. The current settings are saved and the memory appears in the **Recall Memory** column.

**To clear a memory location:**

In the **Save Memory** column, select a memory location, and then click **Clear**. The current settings stored for that memory are cleared. After you clear a memory location, it disappears from the **Recall Memory** list.



### 5.3.3 Last Recalled

The **Last Recalled** pane displays the most recently recalled memory. If any of the settings have been changed since it was recalled, an asterisk will be displayed after the memory name.

### 5.3.4 Save Memory Name

This option enables the pre-set memory names to be changed (to something more memorable or meaningful), if required.

#### To change a memory name:

In the **Save Memory Name** field, type the new memory name, and then click the **S** button. To return the memory to its default preset value, click **P** button.

## 5.4 Logging

Information about several parameters can be made available to a logging device that is connected to the RollCall network.

Each logging page comprises three columns:

- **Log Enable:** Select the check boxes that correspond to the parameters for which log information should be collected.
- **Log Field:** Displays the name of the logging field.
- **Log Value:** Displays the current log value.

10:IQSDA35-3G 0000:75:0A - IQSDA35

<div style="border: 1px solid gray; padding: 2px;"> <p>Input</p> <p>Memory 1-16</p> <p style="background-color: #add8e6;">Logging</p> <p>RollTrack</p> <p>Setup</p> </div>	<div style="border: 1px solid gray; padding: 2px;"> <p>Unit Status</p> <p>INP1:OK 270M LOC</p> <p>INP2:**</p> <p>OUT :1234 Config:1</p> <p style="text-align: right;">:1111 (Mode)</p> </div>
--	---

Logging Misc	Log Field	Log Value
<b>Log Enable</b>	<b>SN=</b>	<b>S39123269</b>
<input checked="" type="checkbox"/> OS Version	OS_VERSION=	V115 Release
<input checked="" type="checkbox"/> Build No.	BUILD_NUMBER=	0000300325
<input checked="" type="checkbox"/> Hardware Ver.	HARDWARE_VERSION=	RDGCD1C
<input checked="" type="checkbox"/> Rear ID	REAR_ID=	84
<input checked="" type="checkbox"/> Rear Status	REAR_STATUS=	OK
<input checked="" type="checkbox"/> Slot Width	SLOT_WIDTH=	1
<input checked="" type="checkbox"/> Slot Start	SLOT_START=	10
<input checked="" type="checkbox"/> Up Time	UPTIME=	133:15:11:00
<input checked="" type="checkbox"/> Licensed Options	LICENSED_OPTIONS=	SDHD;3G

Logging Input 1	Log Field	Log Value
<b>Log Enable</b>	<b>INPUT_1_IDENT=</b>	<b>SER IN 1</b>
<input checked="" type="checkbox"/> Input Ident	INPUT_1_NAME=	INPUT 1 SERIAL IN
<input checked="" type="checkbox"/> Input Name	INPUT_1_TYPE=	HD/SD/3G SDI
<input checked="" type="checkbox"/> Input Type	INPUT_1_STATE=	OK
<input checked="" type="checkbox"/> Input State	INPUT_1_SDIRATE=	270Mb/s
<input checked="" type="checkbox"/> Input SDI Bitrate		

Logging Input 2	Log Field	Log Value
<b>Log Enable</b>	<b>INPUT_2_IDENT=</b>	<b>SER IN 2</b>
<input checked="" type="checkbox"/> Input Ident	INPUT_2_NAME=	INPUT 2 SERIAL IN
<input checked="" type="checkbox"/> Input Name	INPUT_2_TYPE=	HD/SD/3G SDI
<input checked="" type="checkbox"/> Input Type	INPUT_2_STATE=	FAIL:Lost
<input checked="" type="checkbox"/> Input State	INPUT_2_SDIRATE=	UNKNOWN
<input checked="" type="checkbox"/> Input SDI Bitrate		

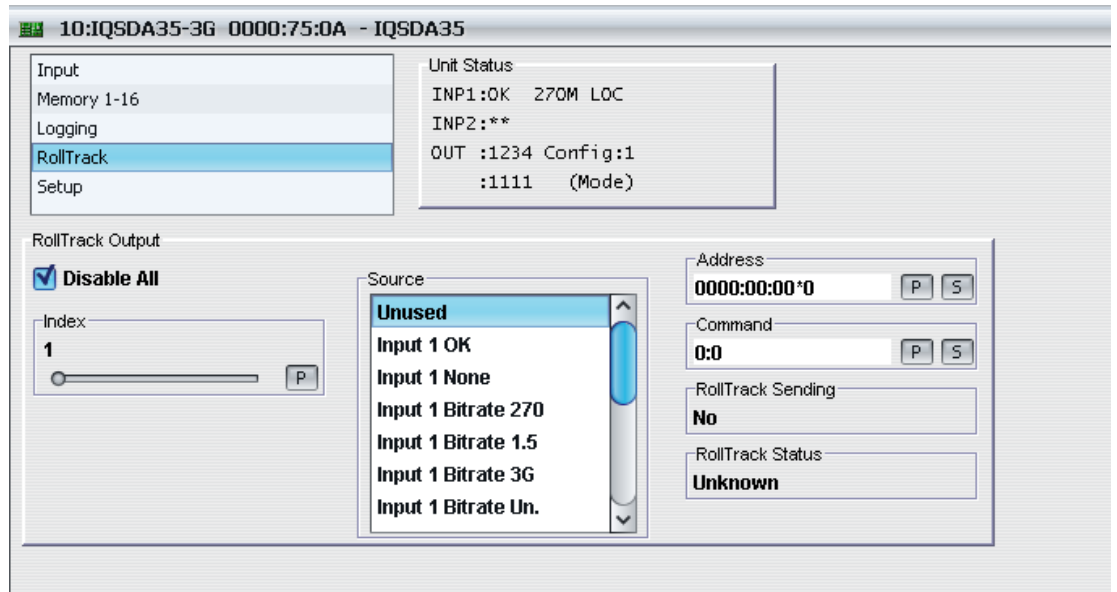
Selected Config	Log Field	Log Value
<b>Log Enable</b>	<b>CONFIG_INUSE=</b>	<b>Config(1)</b>
<input checked="" type="checkbox"/> Config In Use		

### 5.4.1 Log Field Descriptions

Log Field	Description
SN=	Displays the module serial number, which consists of an S followed by eight digits.
OS_VERSION=	Displays the operating system name and version. For example, KOS V115.
BUILD_NUMBER=	Displays the build number.
HARDWARE_VERSION=	Displays the hardware version number.
REAR_ID=	Displays the rear panel type.
REAR_STATUS=	Displays the status of the rear panel.
SLOT_WIDTH=	Displays the slot width (1 or 2).
SLOT_START=	Displays the slot start number.
LICENSED_OPTIONS=	Displays the licensed features installed in the module.
UPTIME=	Displays the time since the last restart in the format ddd:hh:mm:ss.
INPUT_N_IDENT=	Displays the identifier of the serial data input.
INPUT_N_NAME=	Displays the name of the serial data input.
INPUT_N_TYPE=	This displays the type of input as specified by the unit's configuration. Valid values are HD /SD SDI.
INPUT_N_STATE=	<p>Displays the current input state. Valid values are:</p> <ul style="list-style-type: none"> <li>• OK</li> <li>• WARN:Mismatch</li> <li>• FAIL:Lost</li> <li>• FAIL:Error</li> </ul> <p><b>Note:</b> WARN:Mismatch indicates that the input and output standards are not the same.</p>
INPUT_N_SDRATE=	Displays the current bit rate for the serial data input.
CONFIG_INUSE=	Displays the name of the current configuration in use.

## 5.5 RollTrack

The **RollTrack** page allows information to be sent, via the RollCall™ network, to other compatible units connected on the same network.



### 5.5.1 Disable All

When checked, all RollTrack items are disabled.

### 5.5.2 RollTrack Index

This slider enables up to 16 RollTrack outputs to be setup. Dragging the slider selects the RollTrack Index number, displayed below the slider. Clicking the **P** button selects the default preset value.

### 5.5.3 RollTrack Source

This slider enables the source of information that triggers the transmission of data to be selected. Dragging the slider selects the RollTrack source, displayed below the slider. Clicking the **P** button selects the default preset value. When no source is selected, **Unused** is displayed.

<b>Unused</b>	No RollTracks sent.
<b>Input N OK</b>	Valid serial data input received.
<b>Input N None</b>	No serial data input received.
<b>Input N Bitrate 270</b>	Received bitrate is 270 Mbit/s.
<b>Input Bitrate 1.5</b>	Received bitrate is 1.5 Gbit/s.
<b>Input N Bitrate 3G</b>	Received bitrate is 3 Gbit/s.
<b>Input N Bitrate Un.</b>	Received bitrate is unknown.
<b>Using Config 1</b>	Configuration 1 is selected.
<b>Using Config 2</b>	Configuration 2 is selected.
<b>Using Restart Conf</b>	Restart configuration (3) is selected.

### 5.5.4 RollTrack Address

This item enables the address of the selected destination unit to be set.

The address may be changed by typing the new destination in the text area and then selecting the **S** button to save the selection. Clicking the **P** button returns to the default preset destination.

The RollTrack address consists of four sets of numbers, for example, **0000:10:01\*99**.

- The first set (**0000**) is the network segment code number.
- The second set (**10**) is the number identifying the (enclosure/mainframe) unit.
- The third set (**01**) is the slot number in the unit
- The fourth set (**99**) is a user-settable number that is a unique identification number for the destination unit in a multi-unit system. This ensures that only the correct unit will respond to the command. If left at 00 an incorrectly fitted unit may respond inappropriately.

### 5.5.5 RollTrack Command

This item enables a command to be sent to the selected destination unit.

The command may be changed by typing a code in the text area and then selecting the **S** button to save the selection. Clicking the **P** button returns to the default preset command.

The RollTrack command consists of two sets of numbers, for example: **84:156**.

- The first number (**84**) is the actual RollTrack command.
- The second number (**156**) is the value sent with the RollTrack command.

### 5.5.6 RollTrack Sending

A message is displayed here when the unit is actively sending a RollTrack command. Possible RollTrack Sending messages are:

<b>String</b>	A string value is always being sent.
<b>Number</b>	A number value is always being sent.
<b>No</b>	The message is not being sent.
<b>Yes</b>	The message is being sent.
<b>Internal Type Error</b>	Inconsistent behavior. Please contact your local Grass Valley agent.

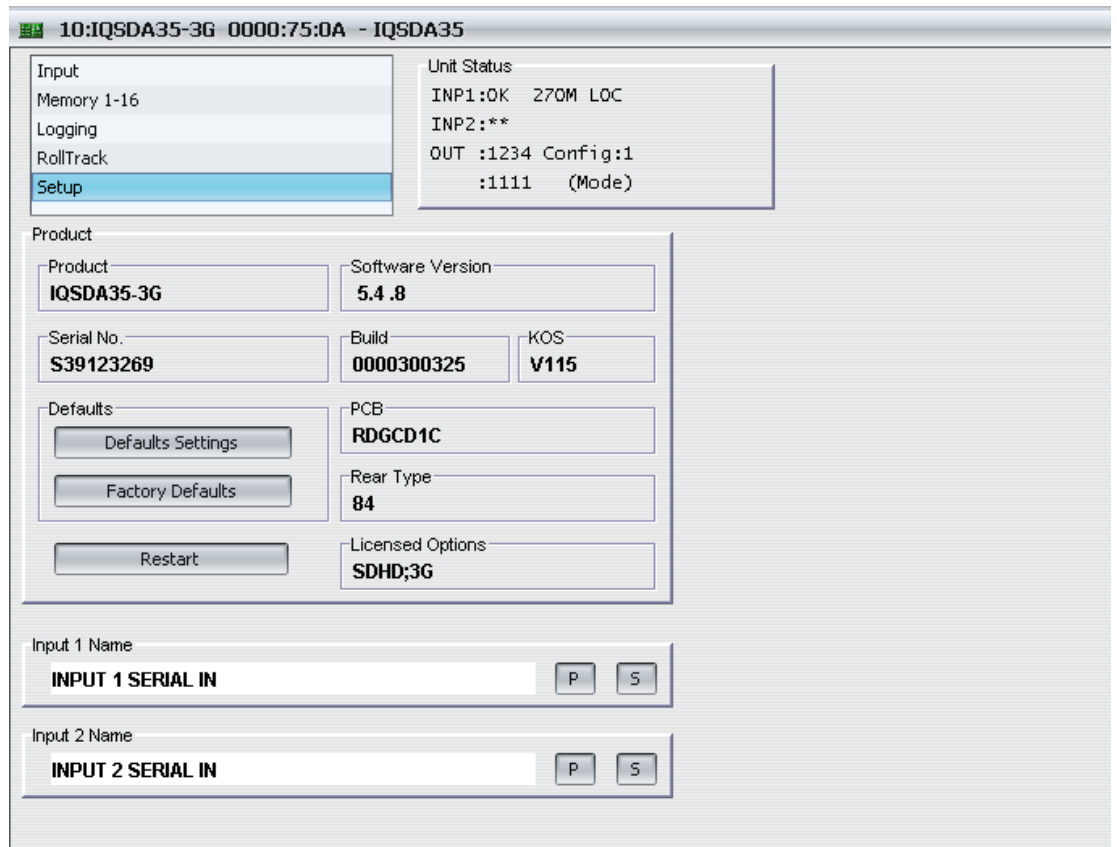
### 5.5.7 RollTrack Status

A message is displayed here to indicate the status of the currently selected RollTrack index. Possible RollTrack Status messages are:

<b>OK</b>	RollTrack message sent and received OK.
<b>Unknown</b>	RollTrack message has been sent but it has not yet completed.
<b>Timeout</b>	RollTrack message sent but acknowledgement not received. This could be because the destination unit is not at the location specified.
<b>Bad</b>	RollTrack message has not been correctly acknowledged at the destination unit. This could be because the destination unit is not of the type specified.
<b>Disabled</b>	RollTrack sending is disabled.

## 5.6 Setup

The **Setup** page displays basic information about the module, such as the serial number and software versions. Use the functions on the page to restart the module or return all settings to their factory or default settings.



- **Product:** The name of the module.
- **Software Version:** The currently installed software version number.
- **Serial No:** The module serial number.
- **Build:** The factory build number. This number identifies all parameters of the module.
- **KOS:** The operating system version number.
- **PCB:** The Printed Circuit Board revision number.
- **Rear Type:** The rear panel type.
- **Licensed Options:** The installed licensed options.

### 5.6.1 Default Settings

The **Default Settings** button enables module settings to be reset to their factory defaults, leaving user memories intact.

### 5.6.2 Factory Defaults

The **Factory Defaults** button enables the module settings to be reset to their factory defaults.

**Note:** Resetting the module to its factory defaults also clears all the saved memory settings.

### 5.6.3 Restart

The **Restart** button enables the module to be rebooted, simulating a power-up/power-down cycle.

#### 5.6.4 Input 1/2 Name

These are the input names displayed in logging.

To change the name of Input 1 or Input 2, type the name in the text field and click **S**. To return the name to its factory default, click **P**.