

# IQSDA30

## Dual Channel 3G/HD/SD-SDI Re-clocking Distribution Amplifier with RollCall

The IQSDA30 provides dual inputs with 3 outputs per input for distribution of HD-SDI 3 Gbit/s, 1.5 Gbit/s or 270 Mbit/s SD-SDI signals in a single width package. Its 80m 3G, 180m HD input equalization performance and non re-clocking distribution of wide-band signals make it ideal for all distribution applications. For HD/SD only applications a HD/SD-SDI version is available, with an option to upgrade firmware for 3Gbps operation when required.

### Features

- Dual channel Intelligent 3Gbps SDI, HD-SDI and SD-SDI re-clocking distribution amplifier
- Will distribute DVB-ASI and other wide-band signals
- Equalizes up to 80m at 3 Gbit/s, 180m at 1.5 Gbit/s and more than 350m at 270 Mbit/s when using Belden 1694A cable
- Standards supported:
  - 3G-HD to SMPTE424M
  - HD-SDI to SMPTE292M
  - SD-SDI to SMPTE259M-C
  - DVB-ASI
- RollCall monitoring allows all signal paths to be managed
- Extremely compact – up to 32 channels in 3RU - for use where space is at a premium

### Why should you choose this module?

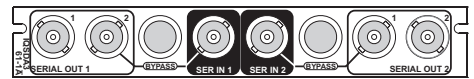
- The IQSDA30 is extremely space efficient providing an incredible density of HD/SD-SDI outputs and distribution channels at 32 per rack unit and 10.6 per rack unit respectively
- Useful for critical installation thanks to outstanding input equalization capability
- Can be used for current HD/SD systems that will later upgrade to 1080p50/60 workflows

### Order codes



#### **IQSDA3047-1A3, IQSDA3047-1B3**

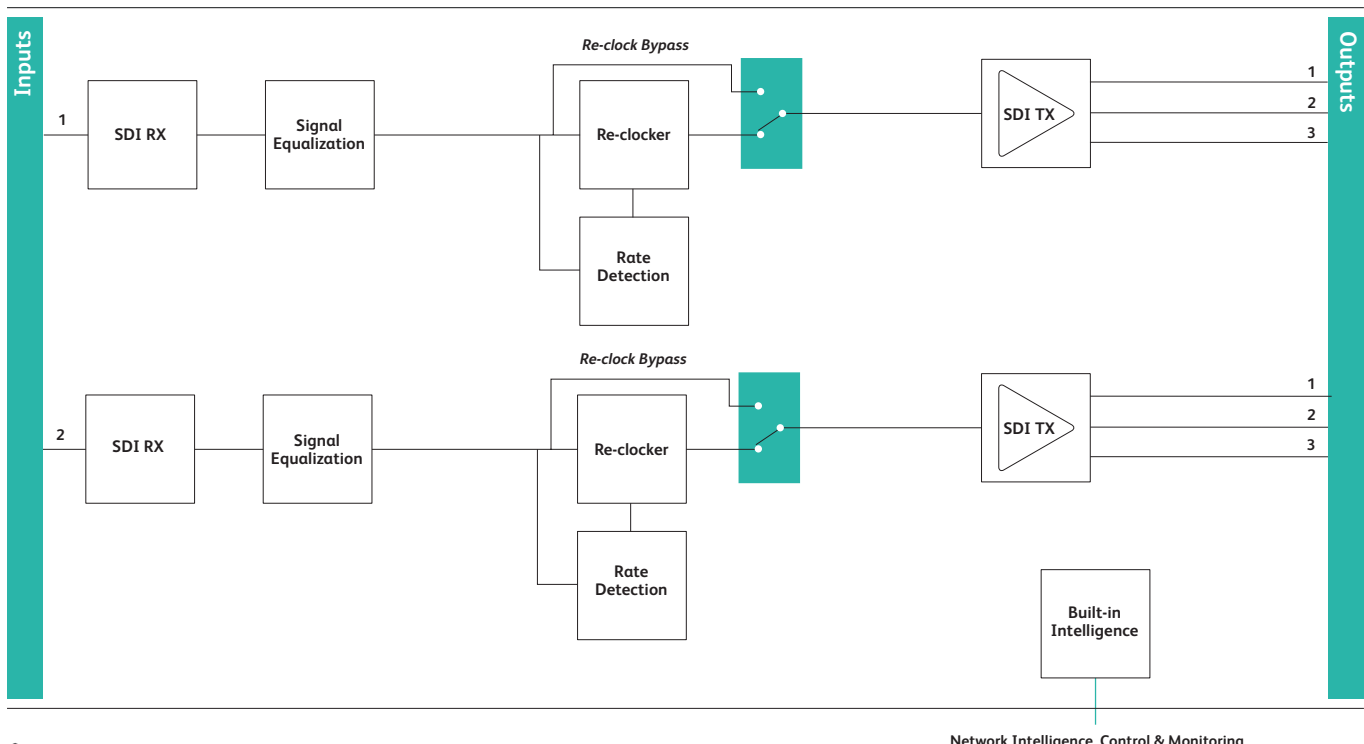
Dual Channel 3G/HD/SD-SDI Re-clocking Distribution Amplifier. 2 inputs, 3 outputs per input.



#### **IQSDA3061-1A3, IQSDA3061-1B3**

Dual Channel 3G/HD/SD-SDI Re-clocking Distribution Amplifier with relay input bypass. 2 inputs, 2 outputs per input.

For more details on enclosure types please refer to Frames and Hardware section.



Block Diagram for IQSDA3047-1A3

Network Intelligence, Control & Monitoring

### Technical Specification

#### Inputs and Outputs

##### Signal Input

|                    |  |
|--------------------|--|
| SDI inputs         | 2 x  |
| Input cable length | Up to 80m Belden 1694A @ 3 Gbit/s<br>Up to 180m Belden 1694A @ 1.5 Gbit/s<br>>350m Belden 1694A @ 270 Mbit/s |

##### Signal Outputs

|             |               |
|-------------|---------------|
| SDI outputs | x 3 per input |
|-------------|---------------|

#### Controls

##### Indicators

|         |   |
|---------|---|
| Power   | OK (Green)                              |
| CPU     | OK (Green flashing)                     |
| Input 1 | OK (Green), Bypass (Orange), Loss (Red) |
| Input 2 | OK (Green), Bypass (Orange), Loss (Red) |

##### RollCall Functions

|                    |   |
|--------------------|---|
| Input 1 (2) select | Auto, 3G, HD, SD, DVB-ASI, Bypass (re-clocking off) |
|--------------------|---|

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

##### RollTrack outputs

|                          |
|--------------------------|
| Unused                   |
| Input 1 (2) Present      |
| Input 1 (2) Rate Unknown |
| Input 1 (2) Loss         |
| Input 1(2) 3G            |
| Input 1(2) HD            |
| Input 1(2) SD            |

##### Other Controls

|               |  |
|---------------|--|
| User memories | Name, save and recall 16 user memories |
|---------------|--|

#### Specifications

##### Electrical

|   |   |
|---|---|
| 3Gbit/s SDI, SMPTE 424M                               |   |
| 1.5Gbit/s HD-SDI, SMPTE 292M                          |   |
| 270 Mbit/s SDI, SMPTE 259M-C / DVB-ASI                |   |
| BNC/ 75ohm panel jack on standard SAM connector panel |   |
| Return loss   | >-15dB (270Mbit/s, 1.5Gbit/s)             |
|   | >-10dB (3Gbit/s)                          |
| Output jitter   | SD-SDI 0.2 UI (10Hz) / 0.2 UI (1KHz)      |
|   | 3G/HD-SDI 1.0 UI (10Hz) / 0.2 UI (100KHz) |

##### Power Consumption

##### Module power consumption

|                                     |
|-------------------------------------|
| 3 W Max (A frames)                  |
| 4 W Max with relay rear (A frames)  |
| 3 PR Max (B Frames)                 |
| 3 PR Max with relay rear (B frames) |