Installing the Cisco 2x2 Remote PHY Solution

Installing the Cisco GS7000 Node

For more information, see the Cisco 1.2 GHz GS7000 Remote PHY Module Compatible 2X2 Segmentable Node Installation and Configuration Guide.

Opening the Cisco GS7000 Node

For more information, see the Cisco 1.2 GHz GS7000 Remote PHY Module Compatible 2X2 Segmentable Node Installation and Configuration Guide.
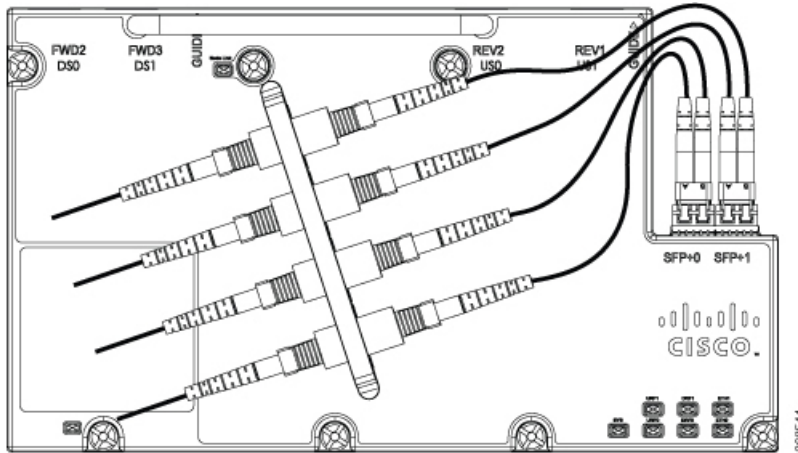
Installing Cisco 2x2 Remote PHY Device in the Cisco GS7000 Node

Step 1 Open the Cisco GS7000 node; remove all the transmitter and receiver modules (if any).

Step 2 Remove the fiber handler containing the 4 SC-SC adapters from the R-PHY packing material, and snap into the R-PHY top cover.

Step 3 Insert the location pin on the OIB of the Cisco GS7000 node into the location hole on the Cisco RPD. Tighten the screws on the Cisco RPD with recommended torque.
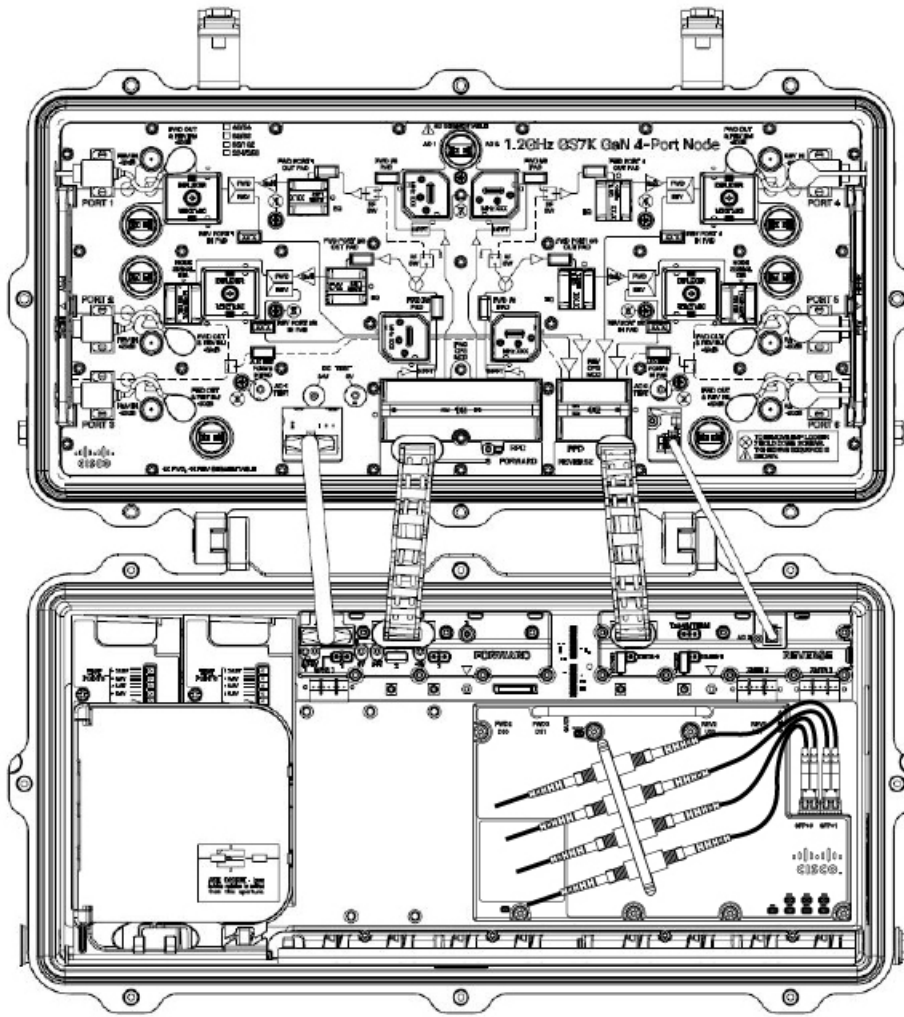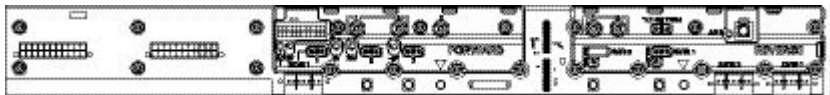
Figure 1: Cisco 2x2 RPD

Setting Up Cisco 2x2 Remote PHY Device on the Cisco GS7000 Node

Step 1 Change the Forward Control Switch in launch amp to Rphy option.

Step 2 Change the Reverse Control Switch to 4x1 or 4x2 based on your network.

Step 3 Place the ≥6dB pad at forward path and 0dB pad at reverse path on the OIB.

Note For the Cisco GS7000 node to work in RPHY mode, plug in the pad in the reverse path on the OIB vertically.

Step 4 For Reverse Path (4x2 mode):

a) RF Port 1 and 2 will be routed to RPD US2 Port

b) RF Port 4 and 5 will be routed to RPD US1 Port

Configuration Definition

Table 1: Launch FWD CNTRL SW Configuration

Mode Selection	Description
Rphy+Overlay	Routing both Rphy RF signal and Overlay RF signal to launch board
Overlay	Routing only Overlay RF signal to launch board
Rphy	Routing only Rphy RF signal to launch board

Table 2: Launch REV CNTRL SW Configuration

Mode Selection	Description
4x2	Routing Port1 and Port2 RF signal to XMTR2 or RPD US2 (depends on the OIB PAD direction). Routing Port4 and Port5 RF signal to XMTR1 or RPD US1 (depends on the OIB PAD direction)
4x1	Routing Port1, Port2, Port4, Port5 RF signal to XMTR1, XMTR2 or RPD US1, US2 (depend on the OIB PAD direction)

Table 3: OIB FWD Pad Configuration

FWD Attenuator Pads	Description
Pad 1	Bridging RCVR1 RF signal to launch board, the loss (in dB) produced by an attenuator pad is equal to the value printed on the top of the attenuator pad.
Pad 2	Bridging RPD RF signal to launch board, the loss (in dB) produced by an attenuator pad is equal to the value printed on the top of the attenuator pad.
Pad 3	Reserved

Table 4: OIB REV Pad Configuration

REV Pads	Description
Pad 1 (horizontal)	Bridging launch board RF signal to XMTR1, the loss (in dB) produced by an attenuator pad is equal to the value printed on the top of the attenuator pad.
Pad 2 (horizontal)	Bridging launch board RF signal to XMTR2, the loss (in dB) produced by an attenuator pad is equal to the value printed on the top of the attenuator pad.
Pad 1 (vertical)	Bridging launch board RF signal to RPD US1, the loss (in dB) produced by an attenuator pad is equal to the value printed on the top of the attenuator pad.
Pad 2 (vertical)	Bridging launch board RF signal to RPD US2, the loss (in dB) produced by an attenuator pad is equal to the value printed on the top of the attenuator pad.
Tx2 SM TERM Pad	Only used as a terminator with 75 Ω printed on the top when both XMTR1 and XMTR2 are installed.

Powering Up the Cisco GS7000 Node

For more information, see the Cisco 1.2 GHz GS7000 Remote PHY Module Compatible 2X2 Segmentable Node Installation and Configuration Guide.

Closing the Cisco GS7000 Node

For more information, see the Cisco 1.2 GHz GS7000 Remote PHY Module Compatible 2X2 Segmentable Node Installation and Configuration Guide.