

Upgrading to D-Show 1.1

For D-Show Systems

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Chapter 1: New Features in D-Show 1.1

This chapter provides an overview of new features in D-Show 1.1 software and their operation. Chapter 2 of this guide provides instructions for upgrading a system to D-Show 1.1.

 For complete instructions on operating a D-Show system, refer to the D-Show Guide.

New Features

D-Show version 1.1 provides the following new or enhanced features:

D-Show System

- Variable Groups Mode provides 24 fully variable mix busses
- Auxes/Variable Groups Follow AFL
- +12 dB Aux Send/Variable Group Send gain
- Support for a Second Stage Rack expands I/O capability to 96 mic/line inputs and 96 outputs
- Solo Safe and Auto Safe indication
- MMC Locate command capability
- On-screen controls for 2-Track, Talkback, and Oscillator
- Hardware status monitoring capability

New D-Show Hardware Options

- HDx TDM Record & Playback Option
- ECx Ethernet Control Option

Variable Groups Mode

D-Show 1.1 adds a new bus configuration, called *Variable Groups mode*, which allows the 8 Group busses to operate in much the same way as Aux busses. This bus configuration mode lets you send independently controllable signals to all 24 busses in the system.

When set to Variable Groups mode, the D-Show Output section has 16 available Aux busses and 8 available Variable Group busses.

Features of Variable Groups

Variable Groups have the following features in common with Auxes:

- Variable Groups can be fed by any Input Channel or FX Return, each with independent send level and on/off controls.
- Variable Groups can be configured as mono or as stereo linked busses.
- Variable Groups can have a Graphic EQ inserted on each bus output.
- Variable Groups can have up to four plug-in inserts and one hardware insert on each bus output.
- Stereo-linked Variable Group busses send true stereo signals to the Solo bus.
- Mono Variable Group busses send dual mono signals to the Solo bus.
- Variable Groups can be classified as monitor sends (“Mon”) or effects sends (“FX”) for purposes of scoping Snapshots.

Variable Groups differ from Auxes in the following ways:

- Variable Groups do not have variable output delays.

Variable Groups differ from normal Groups in the following ways:

- Variable Groups do not provide Simple or Expert mode operation.
- Variable Group outputs cannot be routed to the Mains.

Labeling of Variable Groups

Variable Groups retain the “Groups” label in the D-Show Patchbay page, in the Options > Pickoffs page, and in the rotary encoder displays on the D-Show control surface.

Variable Groups are labeled as “Var Groups” in the D-Show Inputs page.

Configuring Aux, Group, and Variable Group Busses

Auxes, Groups, and Variable Groups share the available system busses. Configuration options include the following:

16 Auxes + 8 Mono Groups Divides the available system busses between 16 mono Aux busses and 8 mono Group busses.

8 Auxes + 8 Stereo Groups Divides the available system busses between 8 mono Aux busses and 8 stereo Group busses.

16 Auxes + 8 Variable Groups (24 bus) Divides the available system busses between 16 mono Aux busses and 8 mono Variable Group busses (Variable Groups mode).

⚠ *Audio may be interrupted or may change levels during this configuration procedure*

To put D-Show in Variable Groups mode:

- 1 Put D-Show into Config mode.
- 2 Go to the Options page and click the System Config tab.
- 3 Click Edit.
- 4 Select the Variable Groups bus configuration.



Selecting the Variable Groups bus configuration

- 5 Click Apply. D-Show restarts with the new bus configuration.

Data Cleared When Changing Bus Configurations

When the bus configuration is changed, the following settings are cleared (or set to default) from the current console settings and from all stored snapshots, for all Groups (or Variable Groups):

- Group Bus Output levels
- Group Bus Plug-In routing
- Group Bus Graphic EQ assignments
- Group Bus Direct Output assignments
- Snapshot references to Groups
- Input channel routing to Groups
- Group Pan (mono) and Balance/Width (stereo) settings
- Group assignments to Mains

Displaying Variable Group Controls

When D-Show is in Variable Group mode, Variable Group controls are displayed in the following locations:

On-Screen Variable Group Send controls replace the Aux Send controls.

On the Control Surface Variable Group Sends are displayed on the ACS controls for Aux Sends 1–8. (ACS controls for Aux Sends 9–16 are unused in this display mode.) Variable Group controls also replace Aux controls in the Input Channel Encoder rows and Encoder assignment controls.

To display Variable Group controls from on-screen:

- 1 Go to the Inputs page and target a channel by selecting its on-screen channel fader strip. Select multiple strips by Shift-clicking.
- 2 Click the Var Groups button in the Bus Assign section. The Var Groups button flashes to indicate display of Variable Group controls.

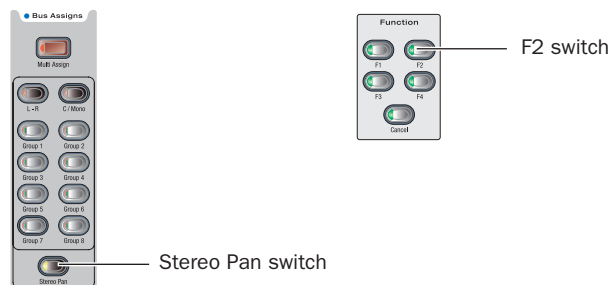


Variable Group controls displayed in the Inputs page

To display Variable Group controls from the control surface:

- 1 Target an Input Channel or FX Return by pressing its Select switch.
- 2 Do one of the following:
 - Press the Stereo Pan switch in the ACS Bus Assigns section.
 - Press the F2 switch in the Function section.

The Stereo Pan and F2 switches flash to indicate display of Variable Group controls.



Control surface switches for displaying Variable Groups

To change display back to Aux Sends:

- Click the flashing Var Groups button on-screen.
 - OR –
- Press the flashing Stereo Pan switch or F2 switch on the control surface.

Linking Aux Busses and Variable Group Busses for Stereo Operation

When working with Aux busses or Variable Group busses, you can link odd/even bus pairs and pan input signals into those bus pairs. Aux bus pairs and Variable Group bus pairs are linked on a global basis, and appear as linked on all channels.

To link Aux bus pairs or Variable Group bus pairs:

- 1 Put D-Show into Config mode.
- 2 Go to the Options page and click the Busses tab.



Linking bus pairs in the Options > Busses page

- 3 Click Edit.
- 4 Click the checkboxes above any of the bus pairs to link or unlink each pair.



Linking a Variable Group bus pair

- 5 Click Apply.

The checked Aux bus or Variable Group bus pairs appear as linked on all channels.

When an Aux bus pair or Variable Group bus pair is linked, the corresponding Stereo LED (marked “St”) lights in the ACS Aux Sends section.

With linked Aux bus or Variable Group bus pairs, the following controls operate in tandem, affecting both sides of the bus pair:

- Output faders
- Solo switches
- Mute switches
- Direct Output controls
- Delay Controls (Aux bus pairs only)
- Graphic EQ controls

Selecting Aux Send and Variable Group Send Pickoff Points

D-Show lets you set the pickoff point on Input Channels or FX Returns channels for Aux Sends and Variable Group Sends. The default pickoff point is Post-Fader, but can be switched to any of the following with the Aux Pre switches in the ACS Aux Sends section: Pre-EQ, Pre-Mute, Pre-Fader.

Pre Pickoff points are set for each Aux bus or Variable Group bus independently. If any Aux busses or Variable Group busses are linked, the pickoff point is set for the linked bus pair.

The following Pre pickoff points are available for activation with the Aux Pre switch on the control surface:

Pre-EQ This pickoff point is post-HPF and pre-EQ, Dynamics and Channel Inserts, pre-Mute, and pre-Fader. The Aux or Variable Group Send is not affected by the channel mute.

Pre-Mute This pickoff point is post-HPF, post-EQ, Dynamics, and Channel Inserts, pre-Mute, and pre-Fader. The Aux or Variable Group Send is not affected by the channel mute.

Pre-Fader This pickoff point is post-HPF, post-EQ Dynamics, and Channel Inserts, post-Mute, and pre-Fader. The Aux or Variable Group Send is affected by the channel mute.

To set the Pre pickoff point for an Aux or Variable Group Send:

- 1 Go to the Options page and click the Busses tab.



Setting Aux bus pickoff points

- 2 Select a Pre pickoff point for any of the busses or linked bus pairs by clicking the Pre-EQ, Pre-Mute, or Pre-Fader button.

To activate a Pre pickoff point for an Aux Send or Variable Group Send on-screen:

- 1 Go to the Inputs page and target the channel with the pickoff point you want to activate by clicking its on-screen channel fader strip.
- 2 Do any of the following:
 - To activate an Aux Send Pre pickoff, click the corresponding Pre button in the Aux Sends section.
 - To activate a Variable Group Pre pickoff, click the Var Groups button in the Bus Assign section to display Var Groups, and click the corresponding Pre button in the Var Groups section.

When the Pre button is lit, the selected Pre pickoff point is used. When the Pre button is off, the pickoff point is Post-Fader.

To activate a Pre pickoff point for an Aux Send from the control surface:

- 1 Target the channel with the Aux Send pickoff point you want to activate by pressing its Select switch.
- 2 In the ACS section, press the Pre switch for the Aux Send.

When the Pre switch is lit, the selected Pre pickoff point is used. When the Pre switch is off, the pickoff point is Post-Fader.

To activate a Pre pickoff point for a Variable Group Send from the control surface:

- 1 Target the channel with the Variable Group Send pickoff point you want to activate by pressing its Select switch.
- 2 Press the Stereo Pan switch in the ACS Bus Assigns section. Variable Groups 1–8 are displayed on the controls for Aux Sends 1–8 in the ACS.
- 3 In the ACS Aux Sends section, press the Pre switch for the corresponding Variable Group Send. When the Pre switch is lit, the selected pickoff point is used. When the Pre switch is off, the pickoff point is Post-Fader.
- 4 Press the flashing Stereo Pan switch to return the ACS controls to Aux Sends display.

Assigning Inputs to Aux Busses and Variable Group Busses

You can send signals from any Input Channel or FX Return to any number of Aux busses or Variable Groups simultaneously.

To route channels to any number of Aux busses or Variable Groups from the ACS section:

- 1 Do one of the following to select input channels:
 - Target the channel you want to send to an Aux bus by pressing its Select switch.
 - or –
 - Hold the Multi Select switch in the Input Channel Fader Control section and press the Select switches on each of the channels you want to send to an Aux bus.
- 2 Do one of the following to assign sends for the selected channels:
 - To assign the channel to an Aux bus, press an Aux Send rotary encoder knob in the ACS section.
 - To assign the channel to a Variable Group, press the Stereo Pan switch in the ACS Bus Assigns section, and press an Aux Send rotary encoder knob in the ACS section.

When an Aux Send or Variable Groups Send is active, the encoder's "On" indicator LED lights, and send level is shown by an expanding series of LEDs.

When an Aux Send or Variable Group Send is inactive, send level is shown by a single LED.

- 3 Turn the Aux Send rotary encoder knob in the ACS to set the send level.

Managing Aux Bus and Variable Group Bus Assignments

Viewing Aux Bus and Variable Group Bus Assignments

When an Aux bus or Variable Group bus output channel is targeted on-screen, its members are shown in a list on the right side of the Outputs page.

To view input assignments to an Aux bus or Variable Group bus:

- 1 Go to the Outputs page.
- 2 Target an Aux bus or Variable Group bus output channel by selecting its on-screen channel fader strip. Variable Group channels are labeled "Groups" in the channel display.

Input channels routed to the selected bus are displayed in the Members list on the right side of the page.

To go to any assigned input channel from the Outputs page:

- Click the name of the input channel in the Members list.



Aux bus assignments shown in the Outputs page

Resetting Aux Bus and Variable Group Bus Assignments

You can remove input assignments from Aux bus or Variable Group bus output channels on-screen.

To remove an input assignment from an Aux bus or Variable Group:

- 1 Target the Aux bus or Variable Group bus output channel you want to change by selecting its on-screen channel strip. Variable Group channels are labeled “Groups” in the channel display.
- 2 In the list of member input channel assignments, right-click the input assignment you want to remove and choose Unassign.

To remove all input assignments from an Aux bus or Variable Group bus:

- 1 Target the Aux bus or Variable Group bus output channel you want to change by selecting its on-screen channel strip. Variable Group channels are labeled “Groups” in the channel display.
- 2 Click the pop-up menu at the bottom of the Members list and choose Reset Mix.

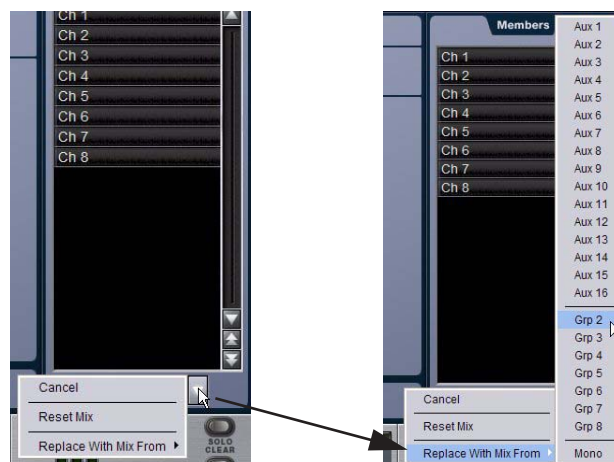
Copying Assignments Between Aux Busses and Variable Group Busses

You can copy the current input assignments from one Aux bus or Variable Group bus to another bus of either type. If the busses are linked, assignments can be copied from other linked busses. This lets you quickly duplicate monitor mixes.

⚠ Copying Aux or Variable Group bus assignments overwrites all the assignments on the destination Aux or Variable Group bus.

To copy input assignments between Aux/Variable Group busses:

- 1 Target the Aux bus or Variable Group bus that you want to be the destination of the copied assignments by selecting its on-screen channel strip.
- 2 Click the Input Assign pop-up menu at the bottom of the Members list, choose Replace With Mix From, then choose the Aux bus or Variable Group bus whose assignments you want to copy to the currently selected bus.



Copying input assignments between Aux busses

Copying Mains Assignments to Aux Busses and Variable Group Busses

You can copy the current Main bus assignments to Aux busses and Variable Group busses, which lets you build monitor mixes from a main mix. Assignments to the Main Left/ Right busses can be copied to linked Aux or Variable Group busses, and assignments to the Center/Mono bus can be copied to mono Aux or Variable Group busses.

To copy bus assignments from the Mains to Auxes or Variable Groups:

- 1 Target the Aux bus or Variable Group bus that you want to be the destination of the copied assignments by selecting its on-screen channel strip.
- 2 Click the Input Assign pop-up menu at the bottom of the Members list, choose Replace With Mix From, then choose the available Main bus (Left-Right or Mono) whose assignments you want to copy to the currently selected bus.

The state of the Aux or Variable Group controls follows the state of the corresponding controls on the Input Channels assigned to the Mains: Channel Mute maps to Bus Send, Channel Pan maps to Bus Pan, and Channel Fader level maps to Bus Send level.

Classifying Aux Sends and Variable Groups

You can classify Aux Sends and Variable Groups as monitor sends (“Mon”) or as effects sends (“FX”), which lets you scope each type separately from the Snapshots page.



This option is for organizing Aux Sends and Variable Group Sends for snapshot control only, and does not directly affect Aux bus or Variable Group bus operation.

To classify Aux Sends and Variable Groups for snapshot scope:

- 1 Go to the Options page and click the Snapshots tab.
- 2 For each Aux Send or Variable Group bus or bus pair, click the “Aux Mon” or “Aux FX” buttons to classify it as a monitor send or effects send, respectively.



Classifying Aux Sends and Variable Groups

Aux Pre/Post State

Select this option to include the pickoff point pre-fader or post-fader state of each Aux Send or Variable Group in snapshots.

Variable Group Signal Flow Options

Routing Signals to Mono Variable Group Busses

To route a channel to an unlinked (mono) Variable Group bus from the Input section:

- 1 Target an Input Channel or FX Return by pressing its Select switch.
- 2 Press the Stereo Pan switch in the ACS Bus Assigns section to display Variable Groups.
- 3 In either Input Encoder Assignment section, press any of the switches marked Aux 1–2 through Aux 7–8 to assign control of the designated Variable Group bus to the corresponding row of rotary encoders.
 - The first press of an Aux switch assigns level control of the odd-numbered Variable Group send. The switch lights green to indicate an odd-numbered selection.
 - The second press of an Aux switch assign level control of the even-numbered Variable Group send. The switch lights yellow to indicate an even-numbered selection.
- 4 On each of the channels you want to send to the designated Variable Group bus, press the rotary encoder knob so that its “On” indicator LED lights.
- 5 Turn the rotary encoder knob on each channel to set the Variable Group Send level.

When Variable Group busses are not linked, they are fed as true mono busses. In this configuration, input signals are handled as follows:

Mono Input Signals Contributing mono signals are sent to the mono Variable Group bus. Any pan information from mono input channels feeding the bus is ignored.

Stereo Input Signals Contributing stereo signals are summed to the mono Variable Group bus. The balance and width information from each stereo input channel is ignored.

Routing Signals to Linked Variable Group Bus Pairs

To route a channel to a linked (stereo) Variable Group bus pair from the Input section:

- 1 Target an Input Channel or FX Return by pressing its Select switch.
- 2 Press the Stereo Pan switch in the ACS Bus Assigns section to display Variable Groups.
- 3 In either Encoder Assignment section, press any of the switches marked Aux 1–2 through Aux 7–8 to assign control of the designated Variable Group bus pair to the corresponding row of rotary encoders.
 - The first press of an Aux switch assigns level control of the linked Variable Group Sends. The switch lights green to indicate the bus pair is selected.
 - The second press of an Aux switch assigns pan control of the linked Variable Group Sends. The switch lights yellow to indicate pan control.
- 4 On each of the channels you want to send to the designated Variable Group bus pair, press the rotary encoder knob so that its “On” indicator LED lights.
- 5 Turn the rotary encoder knob on each channel to set the Variable Group level or pan.

When Variable Group busses are linked, input signals are handled as follows:

Mono Input Signals Contributing mono signals are panned across the linked odd/even Variable Group bus pair.

- When the Follows Channels Pan option is off, panning of the mono signal to the bus pair is controlled by the Variable Group Pan control.
- When the Follows Channels Pan option is on, the pan information from each mono input channel determines its pan position in the bus pair.

Stereo Input Signals Contributing stereo signals are panned across the linked odd/even Variable Group bus pair. Stereo width information from the input channel is applied to the Variable Group signal.

- When the Follows Channels Pan option is off, balance of the stereo signal to the bus pair is controlled by the Variable Group Pan control.
- When the Follows Channels Pan option is on, the balance from each stereo input channel determines its contribution to the odd and even sides of the bus pair.

Controlling Variable Group Send Pan

When Variable Group busses are linked, input signals are panned across the bus pair. Variable Group Send panning can be controlled from the Input section or from the ACS Aux Sends section.

To control panning of Variable Group bus pairs from the Input section:

- 1 Target an Input Channel or FX Return by pressing its Select switch.
- 2 Press the Stereo Pan switch in the ACS Bus Assigns section to display Variable Groups.
- 3 In the Input Encoder Assignment section, press the Aux switch for the Variable Group bus pair you want to pan, so that the switch lights yellow and the display shows a “P” before the odd-numbered send.
- 4 Turn the rotary encoder knob on each Input Channel or FX Return where you want to adjust the Variable Group Send pan.

To control panning of Variable Group bus pairs from the ACS Aux Sends section:

- 1 Target the channel whose Variable Group bus pair you want to pan by pressing its Select switch.
- 2 Press the Stereo Pan switch in the ACS Bus Assigns section to display Variable Groups. In a linked bus pair, the ACS Aux Send controls show the following:
 - Odd-numbered rotary encoders control Variable Group Send level
 - Even-numbered rotary encoders control Variable Group Send pan
- 3 Turn the even-numbered rotary encoders in the Aux Sends section to adjust the Variable Group Send pan.

Setting Variable Group Send Pan to Follow Channel Pan

Panning of the input signal can be set to follow the pan or balance values of the Input Channel or FX Return feeding the Variable Group Send.

To set the Variable Group Send pan to follow Channel pan:

- 1 Go to the Options page and click the Busses tab.
- 2 On any linked Variable Group bus pairs, select the Follows Channel Pan option. This setting is applied globally to the corresponding Variable Group Sends.

Adjusting Variable Group Bus Output Controls

Variable Group bus output level, polarity, solo, and mute controls operate in the same manner as with normal Groups, and are accessed by pressing the Groups switches in the Assignable Output Fader and Assignable Output Encoder sections of the control surface.

Routing Variable Group Busses to Direct Outputs


Any of the Variable Group bus outputs can be routed to the Direct Outputs, in the same manner as with normal Groups, up to the maximum of 32 Direct Outputs. (Default names for Variable Group channels are the same as for Groups in the Patchbay.)

Using Inserts on Variable Group Bus Outputs

You can insert D-Show software plug-ins or hardware inserts on Variable Group bus outputs, in the same manner as with normal Groups. (Variable Groups appear as “Groups” in Plug-In window menus.)

Inserting the Built-In Graphic EQ on Variable Group Bus Outputs

A built-in 31-band Graphic EQ can be inserted on Variable Groups bus outputs, in the same manner as with normal Groups.


 For complete instructions on working with bus outputs, see Chapter 8 of the D-Show Guide.

Auxes/Variable Groups Follow AFL

D-Show 1.1 adds a new Solo Operation option, “Auxes/Variable Groups Follow AFL” that is especially useful for monitor mixing, because it provides instant access to any mix by the soloing the mix output (in AFL mode).

When this option is selected, soloing an Aux output bus or Variable Group output bus (by pressing its AFL switch) causes the Send level and pan controls for that bus to be displayed on the Input Channel Encoder rows.

- ◆ Soloing a Variable Group bus automatically toggles display of Variable Groups on the Input Encoders.
- ◆ With mono Aux or Variable Group busses, Send level is displayed on the top row of Input Encoders.
- ◆ With stereo (linked) Aux or Variable Group busses, Send level is displayed on the top row, and Send pan is displayed on the bottom row of Input Encoders.

 If an Input Encoder row is flipped to the faders, flipped status is maintained when an Aux or Variable Group bus is soloed.

To set Auxes and Variable Groups to display send controls when soloed:

- 1 Go to the Options page and click the Busses tab.
- 2 Under Solo operation, select the “Auxes Follow AFL” or “Auxes/Variable Groups Follow AFL” option.



Solo Operation options in the Options > Busses page

- 3 Solo an Aux or Variable Group output bus by pressing its AFL switch.

To cancel display of Aux and Variable Group send controls, do one of the following:

- Unsolo the Aux or Variable Group output bus. The Input Encoder rows return to the previous display.
– or –
- Select any other parameter for the Input Channel Encoder row to override the Aux follows AFL display. The Input Encoder row displays the selected parameter until another output is soloed.

+12 dB Aux Send Gain

D-Show 1.1 adds gain capability to Aux Sends and Variable Group Sends. Aux Send and Variable Group Send level controls on-screen and on the control surface provide a full range of -INF to +12 dB. D-Show 1.0 Aux Sends provided attenuation capability only (-INF to 0 dB).

Support for a Second Stage Rack

D-Show 1.1 supports the connection of a second Stage Rack, expanding the D-Show system I/O capacity to a total of 96 mic/line inputs and 96 line outputs on the Stage Racks.

Stage Rack Components

Included Components

The following components are included in a second Stage Rack configuration:

- Stage Rack unit (with no input or output cards)
- AC power cord

Additional Requirements

The following components are required to use a second Stage Rack:

- A second Snake card installed in the FOH Rack
- At least two DSP Mix Engine cards in the FOH Rack
- At least one input card (such as an SRI card) or one output card (such as an SRO card) installed in the second Stage Rack
- Digital Snake cable: this cable can be purchased directly from Digidesign or assembled by your preferred vendor.

⚠ *The primary and redundant Snake cables for each Stage Rack must be the same length.*

Expansion Options

Stage Rack I/O Each Stage Rack can be expanded up to a total of 6 input cards and 6 output cards, for a total of up to 48 inputs or 48 outputs. The first 6 slots (A-F) of the Stage Rack accept input cards (such as SRI cards) only. The last 6 slots (G-M) accept output cards (such as SRO cards) only.

Redundant Digital Snake An optional redundant Digital Snake cable can be run between the FOH Rack and the second Stage Rack. This redundant Snake automatically takes over communication if the primary Snake cable fails.

Compatibility Information

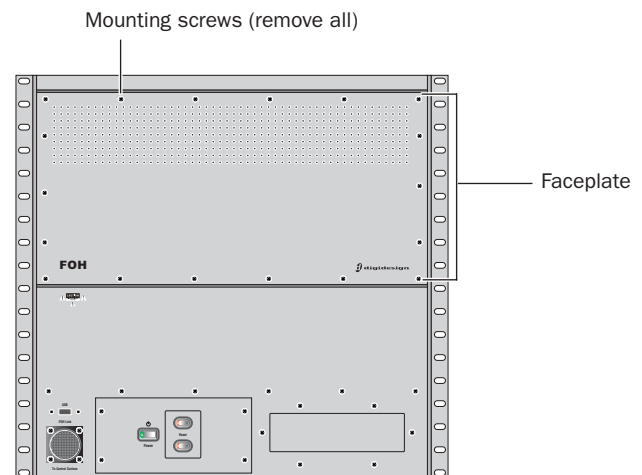
For a list of system requirements, cable requirements, and expansion options, refer to the latest compatibility information on the Digidesign Web site (www.digidesign.com/compato).

Installing a Snake Card

To connect a second stage rack to a D-Show system, a second Snake card (purchased separately) must first be installed in the FOH Rack.

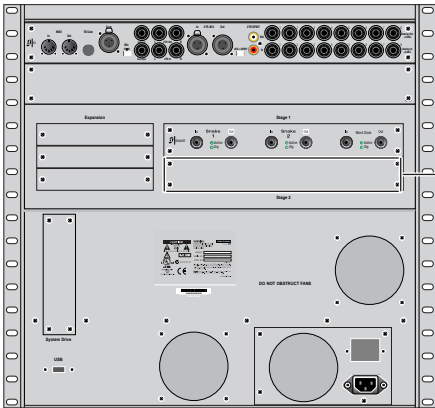
To install the Snake card:

- 1 Shut down the D-Show system.
- 2 Disconnect all audio and power cables attached to the FOH Rack.
- 3 Remove the FOH Rack front panel faceplate by unscrewing its mounting screws (#1 Phillips).



Front panel of the FOH Rack

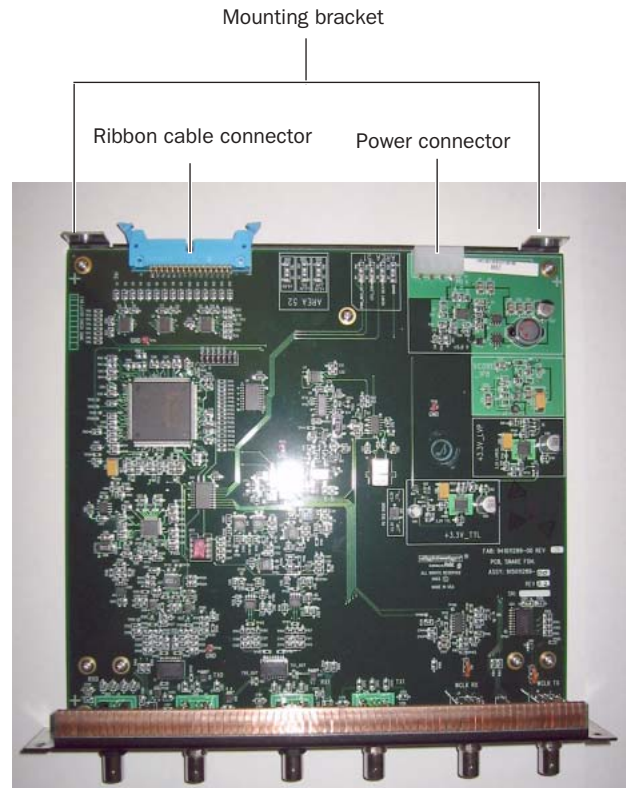
4 On the back panel of the FOH Rack, remove the Snake card expansion slot cover by removing the four screws holding it in place.



Snake card expansion slot (remove cover)

Back panel of the FOH Rack

5 Remove the Snake card from its packing material. Hold the card by its edges.



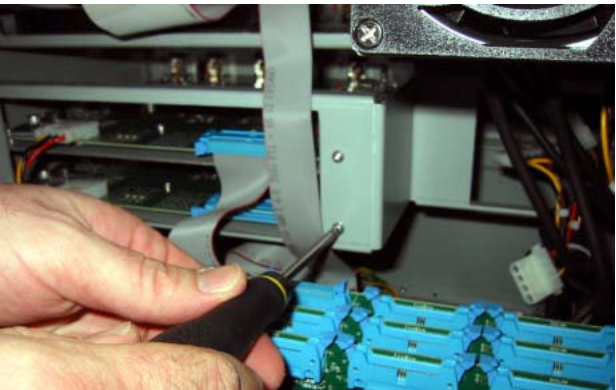
Snake card showing brackets and connectors

6 Gently slide the card into the Snake card expansion slot.



Installing the Snake card in the FOH Rack

7 When the card is seated in its slot, secure it to the inside of the FOH Rack chassis with two provided mounting screws at both sides of the Snake card (accessible from the open front panel of the FOH Rack).



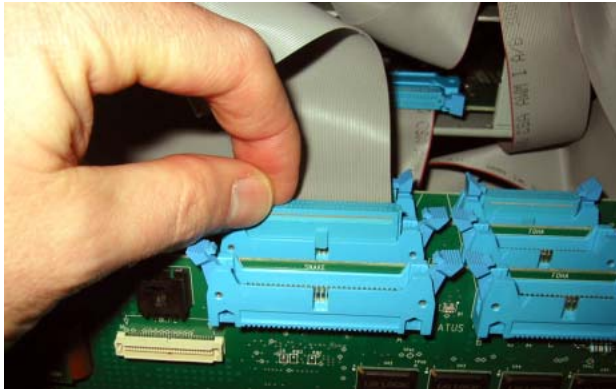
Securing the Snake card to the FOH Rack chassis

8 Secure the Snake card to the back panel of the FOH Rack using four of the provided surface mount screws.

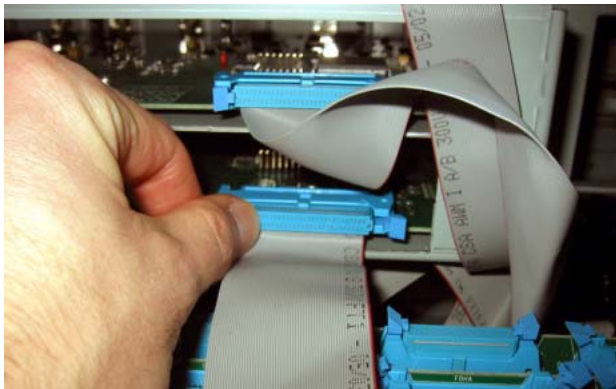


Securing the Snake card to the back panel of the FOH Rack

9 Attach the provided ribbon cable from the connector labeled “Snake” on the second Mix Engine card (the card *just in front of* the rear-most Mix Engine card) to the ribbon connector on the Snake card. Make sure the keyed connector is oriented correctly in each socket. Secure each connection by moving the tabs on each side of the connector inward. Check to make sure the cable is connected securely.



Connecting the Ribbon cable to the Mix Engine card



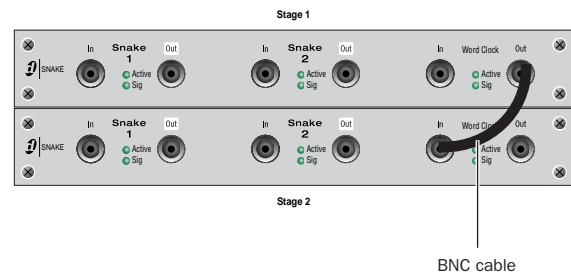
Connecting the Ribbon cable to the Snake card

10 Plug an available power connector in the FOH Rack into the power socket on the Snake card. Make sure it is connected securely.



Power connection to the Snake card

11 Using the included BNC cable, connect the Word Clock Out port on the first Snake card to the Word Clock In port on the second Snake card.



Word Clock connection between Snake cards

12 Reattach the FOH Rack faceplate.

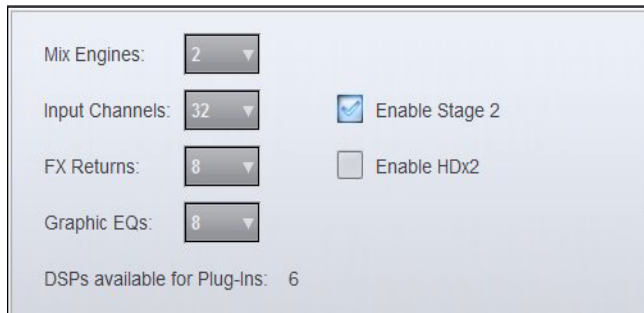
13 Reconnect the power, FOH Link, and any audio and MIDI cables to the FOH Rack.

14 Connect the second Stage Rack to the FOH Rack with a Digital Snake cable. See “Connecting the Stage Rack to the FOH Rack” on page 13.

15 Turn on the D-Show system.

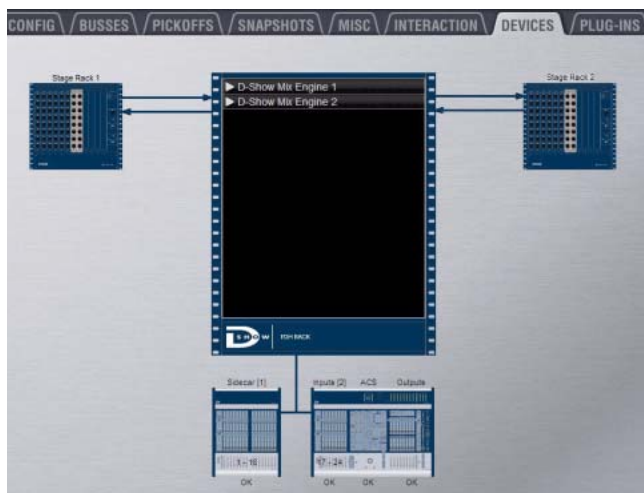
To enable and confirm communication with the second Stage Rack:

- 1 Put D-Show in Config mode.
- 2 Go to the Options page and click the System Config tab.
- 3 Click Edit.
- 4 Select Enable Stage 2, and click Apply. D-Show restarts.



Enabling the second Stage Rack

- 5 Go to Options > Devices to view D-Show hardware status. The connection to the second Stage Rack should be displayed in the FOH Rack graphic.



Detail of Devices page showing connection to second Stage Rack

Connecting the Stage Rack to the FOH Rack

The Stage Rack is connected to the FOH Rack with the Digital Snake cable (purchased separately).

To connect the Stage Rack to the FOH Rack:

- 1 On the Stage Rack, connect the Digital Snake cable lead with the white connector sleeve to the Snake 1 In port (this port label is outlined in white), and the Digital Snake cable lead with the red connector sleeve to the Snake 1 Out port.
- 2 On the FOH Rack, connect the Digital Snake cable lead with the white connector sleeve to the Snake 1 Out port (this port label is outlined in white), and the Digital Snake cable lead with the red connector sleeve to the Snake 1 In port.
- 3 If you are using a second, redundant Digital Snake, connect it to the Snake 2 ports on each unit in the same manner, matching the white connector sleeves to the ports whose labels are outlined in white.

⚠ The redundant Digital Snake must be the same length as the primary Digital Snake for each Stage Rack.

When the units are turned on, the Snake Signal LEDs (marked “Sig”) on the FOH Rack and the Stage Rack light solid to indicate the Snake connection. If the Snake Signal LEDs flash, a Snake connection has not been established.



If there are problems with the Snake connection, double check that all the BNC connectors are fully secured. If the problem persists, try reversing the red and white connectors on one end.

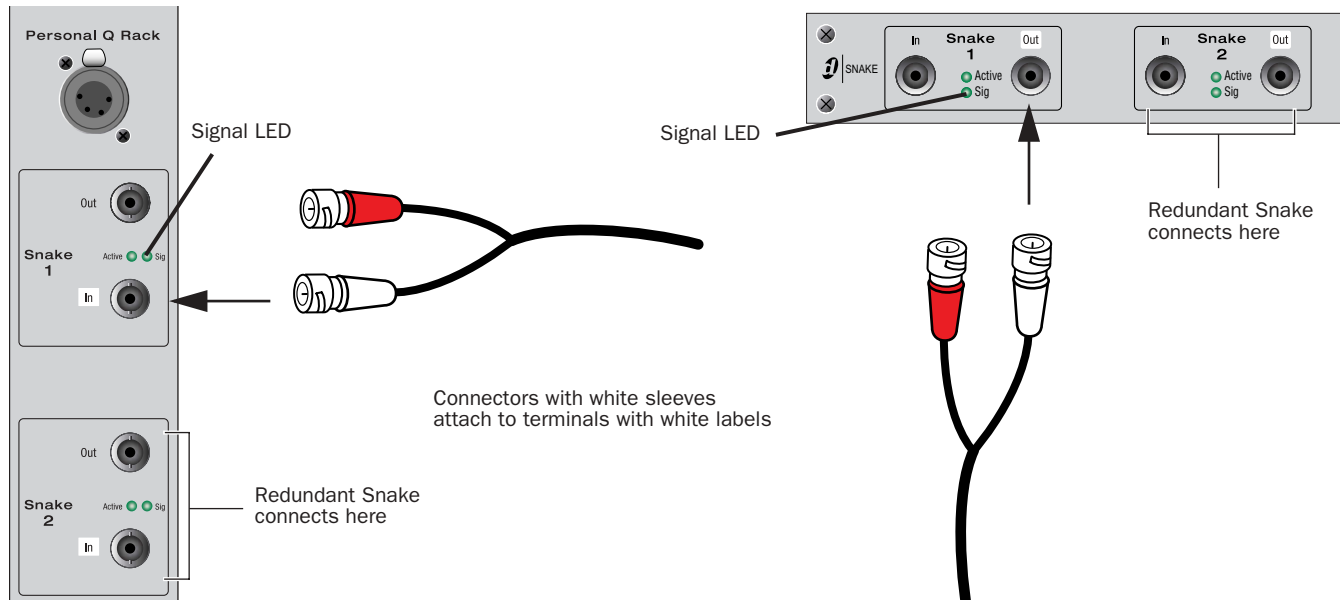


Figure 1. Detail of Digital Snake cable connection between Stage Rack (left) and FOH Rack (right)

When connecting two Stage Racks with redundant snake connections, make sure each Stage Rack is connected to a single Snake card on the FOH Rack, as shown in Figure 2 on page 14.

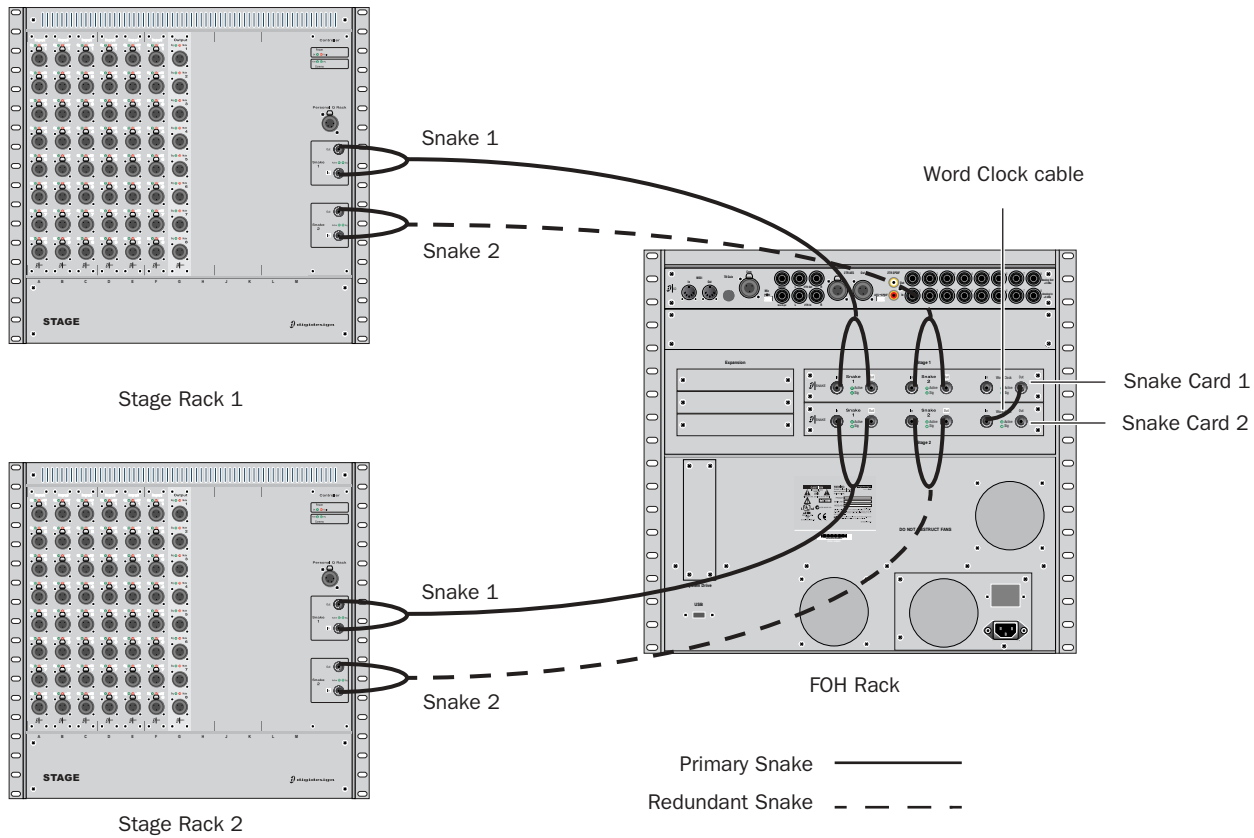


Figure 2. Digital Snake cable and word clock connections for fully redundant system with 2 Stage Racks

Solo Safe and Auto Safe Indication

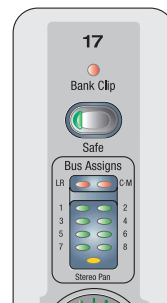
D-Show 1.1 indicates the operational mode of the Safe switch on Input Channels and FX Returns in the following manner:

Act As Solo Safes Safe switch and on-screen Safe button flash when a Solo safe is activated.

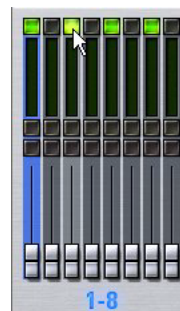
Act As Automation Safes Safe switch and on-screen Safe button light solid when Automation Safe is activated.

To change the operational mode of the Safe switch:

- 1 Go to the Options page and click the Interaction tab.
- 2 Under Input Safe Switches, select Act As Solo safes or Act As Automation Safe.
- 3 Toggle the selected safe status of a channel doing one of the following:
 - Press the channel's Input Safe switch on the control surface.
 - or –
 - Click the channel's on-screen Safe button.



Input Safe switch



On-screen Safe button

MIDI Machine Control Locate Message

D-Show 1.1 adds the MMC Locate message to the list of MIDI messages that can be added to Snapshots. This lets you specify a target device ID and Time Code address for the Locate message that is sent when the snapshot is recalled.

To add an MMC Locate message to a snapshot:

- 1 Go to the Snapshots page.
- 2 Target the snapshot you want to modify.
- 3 Double-click the word “MIDI” in the MIDI/:Plug-Ins list header to expand the MIDI list.
- 4 Click Add and choose MMC Locate from the pop-up menu.

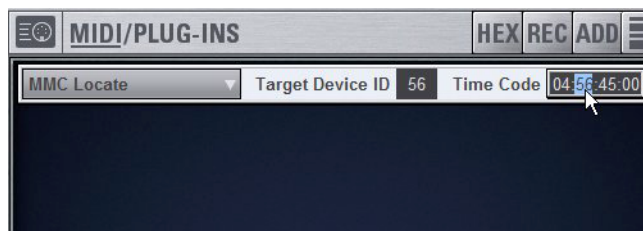


Adding an MMC Locate message to the Snapshot MIDI list

A MIDI plug icon appears in the Snapshots List for each snapshot that contains MIDI messages.

To edit an MMC Locate message in the MIDI list:

- 1 Double-click the message text to display the pop-up menu bar for the message.
- 2 Enter the device ID and a Time Code value for the message by clicking the corresponding fields and typing or dragging up or down to change the values.



Editing an MMC Locate message in the Snapshot MIDI list

- 3 Click in the MIDI list area to dismiss the pop-up menu bar.


Talkback, 2-Track and Oscillator Controls

D-Show 1.1 adds on-screen On/Off and level controls for Talkback, 2-Track and Oscillator inputs. These controls mirror the state of the corresponding controls on the D-Show control surface.

You can route D-Show Talkback microphone input, Intercom (“Com”) microphone input, or 2-Track source input to any Input Channel or FX Return from the Patchbay.

In addition, you can route Talkback microphone input, 2-Track source input and built-in Oscillator output directly to any output busses from the D-show control surface.

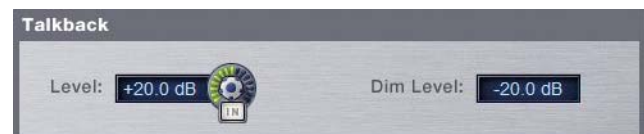
You can also route any Output bus or Direct Output to the 2-Track output on the FOH rack.

 For complete instructions on routing Talkback, 2-Track and Oscillator signals, refer to the D-Show Guide.

Activating Talkback Input and Setting Level

To activate and set the level for Talkback input:

- 1 Press the Talkback switch in the Talkback/Osc section so that it is lit.
- 2 Activate Talkback by doing any of the following:
 - Press the On/Talk switch in the Talkback/Osc section.
 - Press the Talkback switch to the left of the Trackball.
 - Click the on-screen “In” button in the Talkback section of the Options > Misc page.
- 3 Set the Talkback input level by doing any of the following:
 - Turn the Level knob in the Talkback/Osc section.
 - Drag the on-screen Level knob in the Talkback section of the Options > Misc page.



Talkback controls in the Options > Misc page

Setting Talkback Dim Level

When a Talkback signal is sent to an Output bus, the gain on the corresponding bus is automatically reduced by the amount specified in the Dim Level setting.

To set the Talkback Dim Level:

- 1 Go to the Options page and click the Misc tab.
- 2 In the Talkback section, double-click the Dim Level text box and enter a Dim Level value in the range -60 dB (maximum gain reduction) to 0 dB (no gain reduction).



Setting Talkback Dim Level in the Options > Misc page

Activating 2-Track Input and Setting Level

To activate and set the general level for 2-Track Input:

- 1 Press the 2-Track switch in the Talkback/Osc section so that it is lit.
- 2 Activate 2-Track input by doing any of the following:
 - Press the On/Talk switch in the Talkback/Osc section.
 - Click the on-screen “In” button in the 2-Track section of the Options > Misc page.
- 3 Set the 2-Track input level by doing any of the following:
 - Turn the Level knob in the Talkback/Osc section.
 - Drag the on-screen Level knob in the 2-Track section of the Options > Misc page.



2-Track controls in the Options > Misc page

Activating the Oscillator and Setting Level

To activate and set the level for the oscillator:

- 1 Press the Oscillator switch in the Talkback/Osc section so that it is lit.
- 2 Activate the oscillator by doing any of the following:
 - Press the On/Talk switch in the Talkback/Osc section.
 - Click the on-screen “In” button in the Oscillator section of the Options > Misc page.
- 3 Set the oscillator level by doing any of the following:
 - Turn the Level knob in the Talkback/Osc section.
 - Drag the on-screen Level knob in the Oscillator section of the Options > Misc page.



Oscillator controls in the Options > Misc page

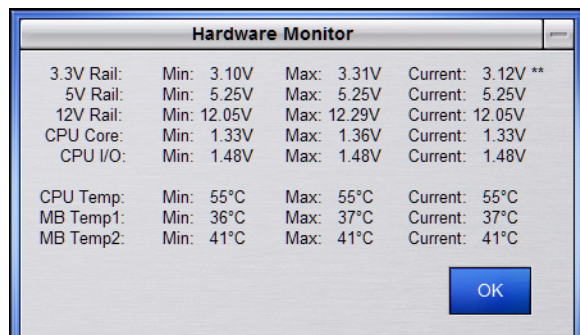
Hardware Status Monitoring

D-Show 1.1 adds hardware status reporting capability.

Automatic Display of Hardware Status

If D-Show detects a hardware error, it posts a warning dialog that offers a “Show Hardware Monitor” button. Click this button to display the Hardware Monitor window, which reports system voltages and temperatures.

The reading that caused the warning is indicated in the Hardware Monitor window.



Hardware Monitor window showing excessive voltage on 3.3V rail

Manual Display of Hardware Status

The Hardware Monitor window can be displayed at any time by pressing Control+Shift+M.

New D-Show Options


HDx TDM Record/Playback Option

D-Show 1.1 adds support for the HDx TDM Record/Playback Option, which lets you integrate a Digidesign Pro Tools TDM system with D-Show for multitrack recording and playback.

HDx Capabilities and Features

The HDx Option provides the following:

- Direct digital connection (24-bit, 48 kHz) between D-Show and a Pro Tools TDM system
- Up to two HDx cards can be installed in a D-Show system
- Recording of up to 128 channels of D-Show audio (up to 96 Stage inputs and up to 32 assignable channels) into Pro Tools (with two HDx cards)
- Playback of up to 128 Pro Tools tracks directly into D-Show (with two HDx cards)
- Support for Windows XP and Mac OS X-based systems
- Connects to Pro Tools HD with DigiLink cables (purchased separately)

 For complete information, see the *HDx TDM Record/Playback Option Guide*.


ECx Ethernet Option

The ECx Ethernet Option lets you control a D-Show system remotely over an Ethernet network, using compatible wired or wireless network equipment.

ECx Capabilities and Features

The ECx Ethernet Option provides the following:


- Remote control of a D-Show system from a laptop computer or Tablet PC
- Exact duplication of D-Show user interface on the remote client
- Support for Windows and Mac OS X remote clients

 For complete information, see the *ECx Ethernet Option Guide*.

Chapter 2: Upgrading to D-Show 1.1

Show File Compatibility

D-Show 1.1 uses a new version of the Show file format to support the new features.

 *D-Show 1.1 format Show files cannot be opened on D-Show 1.0 systems.*

Opening 1.0 Show Files on D-Show 1.1

D-Show 1.1 loads Show files created with D-Show 1.0. It does not automatically convert the Show file saved on disk. This saved version 1.0 Show file can still be opened on a D-Show 1.0 system, if needed.

To update a Show file created with D-Show 1.0, you need to save the Show file as a new file, or overwrite the existing Show file.

To load a D-Show 1.0 Show file in D-Show 1.1:

- 1 Transfer the Show file to the system if necessary.
- 2 Go to the Filing page and click the Load tab.
- 3 In the Show Folders column, click the name of the Show Folder containing the show file you want to load.
- 4 In the Shows column, click the name of the Show file you want to load. The Show file version appears in the Info window.
- 5 Click the Load button.

D-Show loads the file without updating the file version of the saved Show file.

To update a D-Show 1.0 Show file to D-Show 1.1 format.


- 1 Load the Show file.
- 2 Do one of the following:
 - From the Load tab or the Save tab, Right-click the name of the loaded Show file, and choose Overwrite.
 - From the Save tab, select the loaded Show file, click New, enter a name for the new file, and press Enter.

D-Show saves the file in D-Show 1.1 format.

Opening 1.1 Files on D-Show 1.0

D-Show 1.1 format Show files cannot be opened on D-Show 1.0 systems.

If necessary, any 1.0 version Show files that have not been updated to 1.1 format can be transferred from a D-Show 1.1 system to a D-Show 1.0 system.

 *For complete instructions on transferring Show files, see Chapter 20 of the D-Show Guide.*

Installing D-Show 1.1 Software

You can install D-Show 1.1 software by two methods:

Update Upgrades the D-Show software and leaves Settings, Shows and Presets intact

Restore Completely erases the D-Show system drive and places a new install of D-Show software on the drive

Backing Up Current Settings

Whether you are performing an update or a full system restore, you should back up any Console Settings, Show files or Presets on your system before installing D-Show 1.1. software.

To back up the current D-Show settings:

- 1 Go to the Filing page and click the Transfer tab.
- 2 Connect a portable storage device (such as a USB key disk) to D-Show. The device appears above the right column of the Transfer page.
- 3 Do one of the following to select the type of data to transfer:
 - To transfer all data, click the Console icon.
 - To transfer Console Settings, click the Settings icon.
 - To transfer Show Folders, click the Show Folders icon.
 - To transfer individual Shows, click the Shows icon.
 - To transfer Preset Folders, click the Preset Folders icon.
 - To transfer Presets for individual items, click the Built-In icon or the Plug-In icon and choose a processor or plug-in from the pop-up menu.


4 In the left column, select the items you want to transfer from D-Show to the portable storage device.



Show files selected for transfer from D-Show to USB key disk

5 Click the Transfer button.

Large transfers may take time. Transfer status is shown by a progress bar. A transfer may be cancelled by clicking Cancel.


 Cancelled transfers may result in partial folder contents, which will have to be deleted manually.

6 Remove the portable storage device from D-Show.

Installing D-Show 1.1 software

To install D-Show 1.1 software:

- 1 Make sure outputs, speakers, and power amps are off or muted.
- 2 Insert the D-Show 1.1 System Restore CD into the D-Show CD-ROM drive on the FOH Rack.
- 3 Press the two Reset switches on the front of the FOH Rack simultaneously to restart the system, then press and hold F10 on the keyboard until Restore CD text screen appears.


 Some models of USB keyboards require repeated pressing of F10 (holding it down in between pressings) to register.

4 Use the Up and Down Arrow keys to select the CD drive and press Enter. This launches using the software on the inserted System Restore CD.

5 Do one of the following to update or restore D-Show software:

- To update D-Show software while keeping any Show files and Preset files on the system, press U. Follow the on-screen instructions to begin installation. The installer begins replacing D-Show software on the CPU of the FOH Rack.
- or –
- To fully restore the system (completely removing all files on the system), press R. (Or press P to return to the previous screen.) A warning dialog appears on-screen asking you to confirm. Press Shift+R (uppercase R) to begin, then follow on-screen instructions to complete the system restore operation.

When finished updating or restoring, the system restarts.

 When you perform an Update from 1.0 to 1.1, a backup of the current 1.0 Console Settings file is automatically saved in the Preserved Shows folder, accessible from the History tab.

Updating Firmware

During an update or system restore, D-Show checks for new firmware. If newer firmware is found on the System Restore CD, it is installed while D-Show starts up.

Reinstalling Plug-Ins

The System Restore CD installs D-Show system software only. DigiRack Plug-ins and any additional plug-ins from DigiDesign or its Development Partners must be re-installed separately.

After an Update You can use the Previous Installs feature to re-install any plug-in with a compatible D-Show installer stored on the user drive partition. Any plug-ins without compatible D-Show installers that were manually installed must be manually re-installed.

After a Full System Restore All plug-ins must be installed from their original CD-ROM.

To reinstall plug-ins:

- 1 Put D-Show into Config mode.
- 2 If installing from a CD-ROM, insert the installer disc into the CD-ROM drive in the D-Show FOH Rack.
- 3 Go to the Options page and click the Plug-Ins tab.
- 4 Choose any of the following options in the Device Selector pop-up menu:
 - Choose Previous Installs to access any plug-in installers stored on the user drive partition.
 - Choose an external storage device to access plug-in installers on any inserted USB media.
 - Choose CD-ROM to access a D-Show compatible plug-in installer loaded in the FOH Rack CD-ROM drive.
- 5 Select a plug-in from the Plug-Ins to Install list on the left by doing any of the following:
 - Click to select a single installer.
 - Shift-click to select multiple contiguous installers.
 - Control-click to select or deselect installers one at a time.

Click Install to install the selected plug-ins. Once installed, the plug-in appears in the Installed Plug-Ins list on the right.

Installing Plug-Ins Manually

If a plug-in does not appear in the Plug-Ins to Install list, it may not have a fully compatible D-Show installer and must be manually installed.



A plug-in without a D-Show installer may still be compatible with D-Show. Consult the plug-in manufacturer for compatibility information.

To install a plug-in manually:

- 1 Make sure all sound systems are shut down or muted.
- 2 Insert the plug-in installer disc into the CD-ROM drive on the FOH Rack.
- 3 Go to the Options page and click the System Config tab.
- 4 Hold the Control key and click Shutdown Console on-screen. Follow on-screen directions to exit to the Desktop.
- 5 Copy the plug-in installer to the partition named User Data.
- 6 Launch the plug-in installer application and follow any on-screen directions. If prompted, do not restart the system from a plug-in installer. (Doing so will not harm the system, but will take longer, especially if you have multiple plug-ins to install manually.)
- 7 Quit the installer application and eject the installer disc.
- 8 Click the Return to D-Show shortcut on the desktop to re-launch D-Show.
- 9 Go to the Options page and click the Plug-Ins tab. Verify that the manually installed plug-in appears in the Console list of available plug-ins.