

Function	Command		Response			Notes
	External host to MCU	Local box	Destination box	All other boxes	MCU to external host	
<b>System information</b>						
Query system size	q	Max Tx=M ¶ Max Rx=N ¶ Me=Txm or Me=Rxñ ¶				Handled locally at daisy chain FW from local device list.
Unsolicited message when system status changes		Reset ¶	Reset ¶	Reset ¶		Host to send "q" after receiving this "Reset" from the device; this happens after device detects any changes in the daisy-chain or after daisy chain IC reboots and syncs the UART port.
<b>Signal routing commands</b>						
Send video and audio from source m to display n	m*s	AV Txm live ¶ AV Rxñ live ¶	AV Txm live ¶ AV Rxñ live ¶	AV Txm live ¶ AV Rxñ live ¶		Any device can send, daisy chain req is sent to Txm and Rxñ to create the video stream. The response is sent to all Tx and Rx boxes.
Send video from source Txm to all displays and audio from source Txm to audio sinks on the Audio Sink Distribution List, same behavior for Show Me' button when pressed from Txm	m*s	AV Txm live ¶	AV Txm live ¶	AV Txm live ¶		Any device can send, daisy chain req is sent to Txm to broadcast to all Rx. The response is sent to all Tx and Rx boxes. The next broadcast command will change the source but maintain the audio distribution list. The broadcast will be turned off by the next point to point route command in row 13.
Define devices Rxñ1, n2, n3 and n4 to be on the Audio Sink Distribution List	n1, n2, n3, n4 S	Audio Sink Rxñ1, n2, n3, n4 live ¶	Audio Sink Rxñ1, n2, n3, n4 live ¶	Rxñ1, n2, n3, n4 live ¶		This list needs to be setup repeatedly at each Tx device locally. Use pass thru command in row 18 to send to each Tx one by one if setup is done from an external controller at one location. The MCU of each Tx will then send the command locally to the daisy chain IC. The current list will be replaced by the next (new) list command. If not defined, Rx1, Rx2, Rx3, Rx4 will be the default list. The response is sent to all Tx and Rx boxes.
<b>Pass thru commands</b>						
The external host connected to Presenter™ x sending to the external device connected to Presenter™ y to control the functions of that external device	x * y {xxxxx}Q		xxxxx			Add a leading "0" in front of any number associated with a Rx device to distinguish from the Tx number. Response send back to the host device. Maximum 25 characters in bracket.
The external device connected to Presenter™ y sending the response back to the external host connected to Presenter™ x		rrrrr	rrrrr			Any message comes in to the RS-232 port on box y within 1 second from the command in row 19 is considered a response to command 19 and will be sent back to box x. MCU in box y will end the response reception mode when seeing 1st carriage return or 1s timer ending whichever happens first.
The external host connected to Presenter™ x sending to Presenter™ y to control the functions of that Presenter™	x * y {xxxxx}Q					Add a leading "0" in front of any number associated with a Rx device to distinguish from the Tx number. Response send back to the host device.
Presenter™ y sending response back to the external host connected to Presenter™ x		rrrrr				

All commands below are local commands when the control host is connected directly to the Presenter™ device.  
To control a Presenter™ device remotely, place the local commands and responses below into pass thru command in line 20.

Function	Command		Response			Notes
	External host to MCU	MCU to external host	Destination box	All other boxes	MCU to external host	
<b>Product information</b>						
Query device part number	p	xx-xxx-xx ¶				Numeric and dash only
Query device firmware version	P	x.xx ¶				Numeric and dash only
<b>System information commands</b>						
Query current live source and display	*s	AV Txm live ¶ AV Rxn live ¶				Numeric and dash only
Query current live audio sinks	S	Audio Sink Rxn1,n2,n3,n4 live ¶				If in AV broadcast mode (one source to all displays), no need for this response
EQ value reading	E	xx				Input EQ value reading

**RS-232 baud rate and protocol 9600 baud, 8 data bits, 1 stop bit, no parity**  
**RS-232 port pin configurations 1 = Tx, 2 = Rx, 3 = GND**

Note: - The italic and underlined letters represent decimal numeric numbers  
 - ¶ is CR/LF (carriage return/line feed) (HEX value 0D 0A)