MSD Digital Multi Switcher
## The Right Timing

IDK Corporation debuted its very first MSD switcher back in 2009, quickly placing IDK on the map to becoming a well-known Japanese manufacturer in the Pro AV market. Fast forward to today, IDK now offers nearly 20 different MSD models, varying in size from our smaller MSD-402 (4x2 switcher) to our larger MSD-6200 series (up to 8x8) with a diverse I/O configuration to help suit any project or application. Starting January 2021, IDK is pleased to introduce the newest addition to the MSD family; the MSD-S50 and MSD-S70. The new MSD-S Series will continue to build upon the MSD legacy while offering new and even more exciting features.
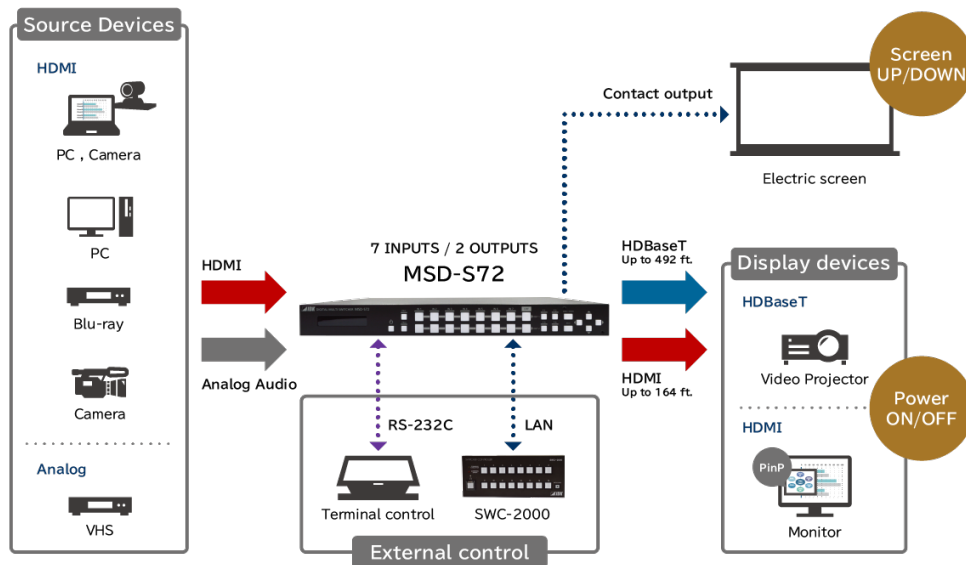

Model	Video									
	Resolution			HDCP		HDBaseT			Automatic Switching	Motion Adaptive I/P Conversion	PinP
	1080p	4K@30	4K@60 (4:4:4)	1.4	2.2	Input	Output	PoH			
MSD-402	○	-	-	○	-	○	○	Input: ○ Output: -	○	-	○
MSD-S50	○	-	-	○	-	-	○	-	○	○	○
MSD-S70	○	-	-	○	-	-	○	-	○	○	○
MSD-701AMP	○	-	-	○	-	○	○	Input: ○ Output: -	○	○	○
MSD-6200	○	○	-	○	-	○	○	Input: ○ Output: -	○	○	○
MSD-800UHD	○	○	○	○	○	○	○	Input: ○ Output: -	○	○	-
MSD-700UHD	○	○	○	○	○	-	○	-	○	○	-
MSD-7200UHDTB	○	○	○	○	○	-	-	-	○	-	-

MSD Series model selection guide

The MSD line may look like your average presentation switcher, but once you dive in, you'll soon see why IDK coined the term "Digital Multi-Switcher" to best describe the product line. The built-in web GUI gives users access to setting and configuration tools such as changing the scaled output resolution, forcing a desired EDID, and advanced HDCP managment. More advanced features include access to output timing which allows the user to manipulate the position, size, masking, and aspect ratio of the video image. With these more advanced features, the MSD becomes versitle and gives designers more flexibility to configure their AV system.
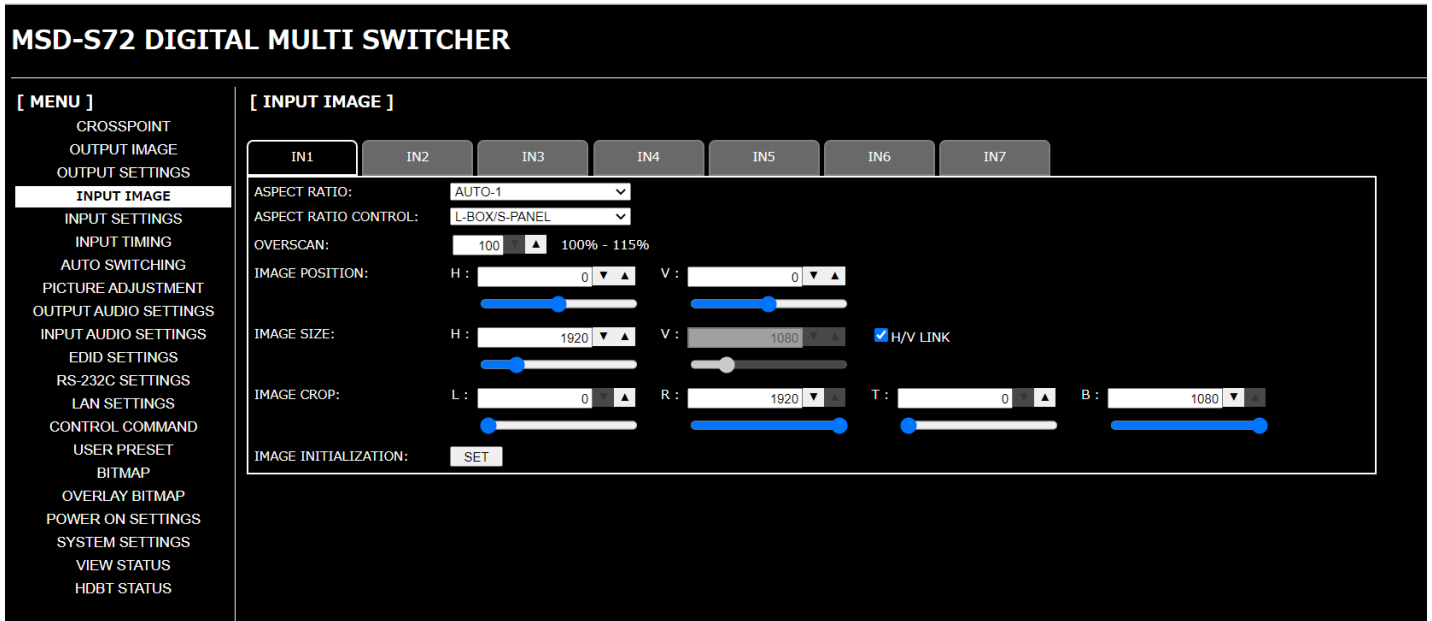
MSD-S72 input image settings GUI
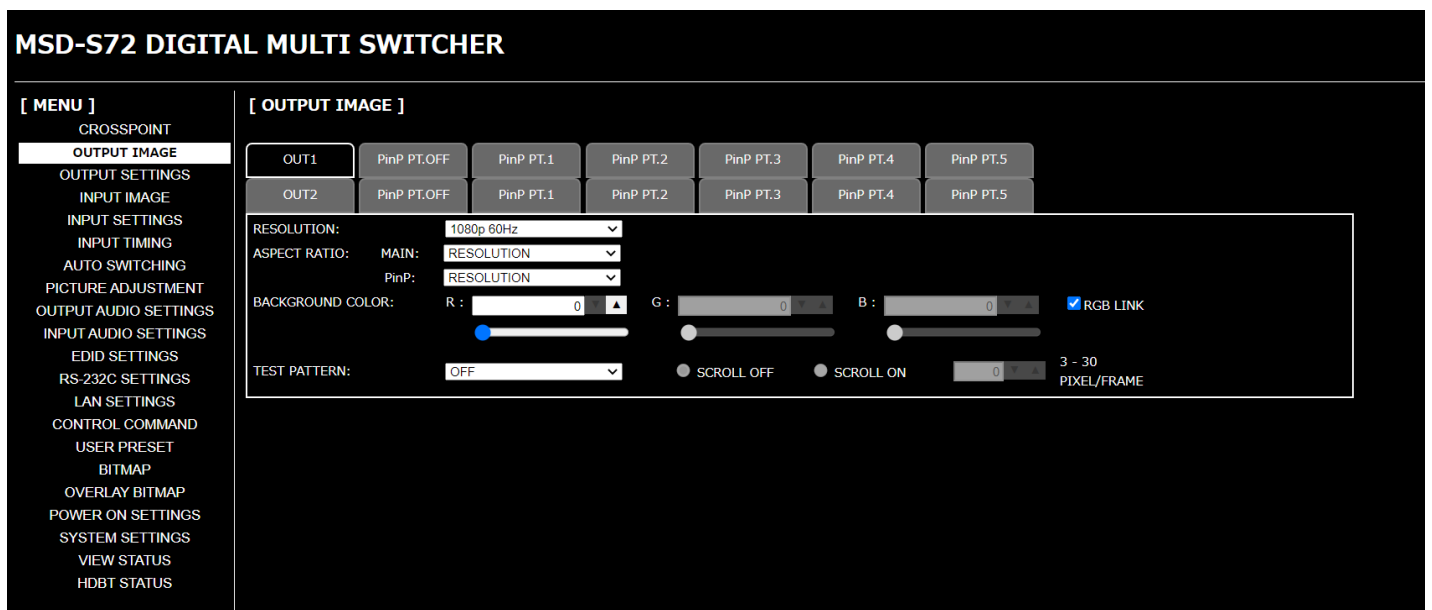
MSD-S72 output image Settings GUI

Most MSD models also support a window processing mode, where users can create different Picture-in-Picture (PinP) layouts that can be recalled through preset commands. Through the output timing menu, the individual windows can be manually sized and positioned anywhere on the screen to create desired layout effects, such as, side by side for videoconferencing applications.

All of these innovative features and benefits show the true engineering brilliance within IDKs products and IDK's commitment to offer problem solving solutions to our customers.

MSD-S72 DIGITAL MULTI SWITCHER

[MENU]
- CROSSPOINT
- OUTPUT IMAGE
- OUTPUT SETTINGS
- INPUT IMAGE
- INPUT SETTINGS
- INPUT TIMING
- AUTO SWITCHING
- PICTURE ADJUSTMENT
- OUTPUT AUDIO SETTINGS
- INPUT AUDIO SETTINGS
- EDID SETTINGS
- RS-232C SETTINGS
- LAN SETTINGS
- CONTROL COMMAND
- USER PRESET
- BITMAP
- OVERLAY BITMAP
- POWER ON SETTINGS
- SYSTEM SETTINGS
- VIEW STATUS
- HDBT STATUS

[OUTPUT IMAGE]

OUT1 | PinP PT.OFF | PinP PT.1 | PinP PT.2 | PinP PT.3 | PinP PT.4 | PinP PT.5
OUT2 | PinP PT.OFF | PinP PT.1 | PinP PT.2 | PinP PT.3 | PinP PT.4 | PinP PT.5

[MAIN1]

IMAGE POSITION: H : 0   V : 0

IMAGE SIZE: H : 1920   V : 1080   ☑ H/V LINK

IMAGE CROP: L : 0   R : 1920   T : 0   B : 1080

IMAGE INITIALIZATION: SET

[PinP1]

IMAGE POSITION: H : -62   V : 45

IMAGE SIZE: H : 807   V : 454   ☑ H/V LINK

IMAGE CROP: L : 0   R : 745   T : 45   B : 499

IMAGE INITIALIZATION: SET

MSD-S72 PinP image & pattern settings GUI

Subwindow   Main window

① PinP disabled
"PinP" button does not light.

② PATTERN1
"PinP" button lights green.

③ PATTERN2
"PinP" button lights green.

④ PATTERN3
"PinP" button lights green.

⑤ PATTERN4
"PinP" button lights green.

⑥ PATTERN5
"PinP" button lights green.
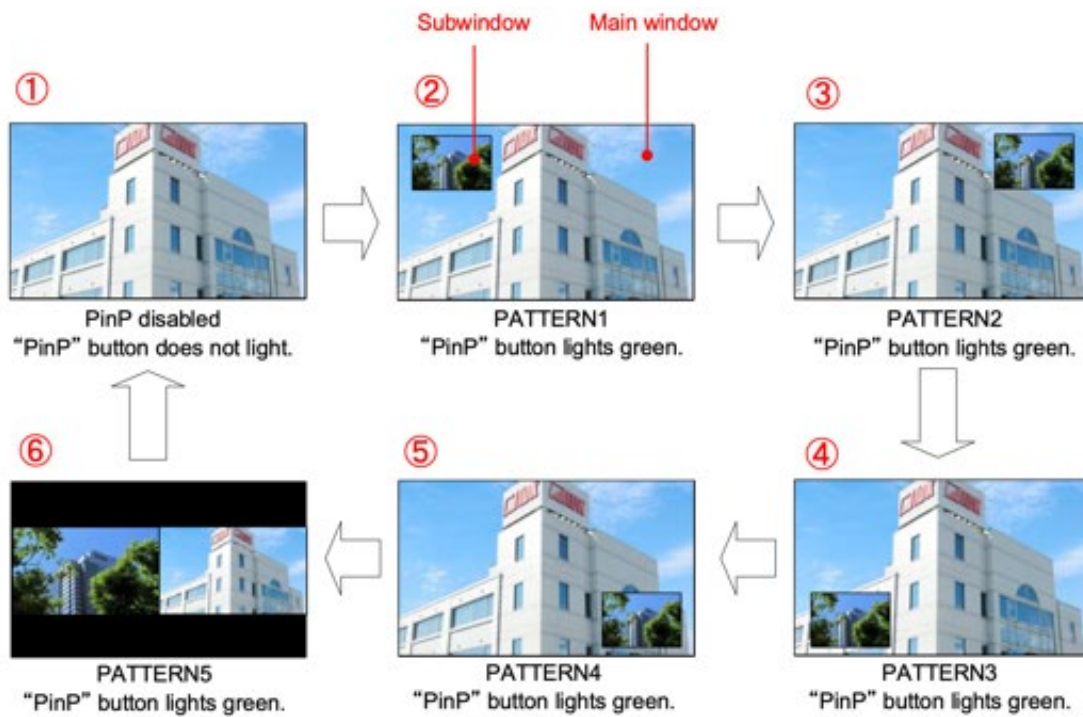
PinP pattern examples

Application Story:

During the summer of 2020, several MSD switchers were installed in a New England area college's athletic training facility to provide fast, seamless video switching for the team to use during film reviews. A number of rooms were outfitted with IDK's MSD-700 series switcher which boasts 7 inputs and up to two (2) independent outputs. Sources included PCs running playback software, cable TV tuner, tablet input, and a document camera. Control of the MSD-700 was executed through a 3rd party push button system provided by the System Integrator, allowing the user to select and route video with just the push of a button. Communication between the push button controller and MSD was done via the LAN port.

The more complicated configuration came for the head coaches' room. Here, the integrator was challenged with splitting a single image between two projectors and providing a mode using both projectors to display separate images. The MSD-6203 was chosen specifically to handle this job. With the ability to manipulate the output timing, and the preset memory commands, the integrator was able to provide multiple modes for the coaches to use. For the main command, the MSD would take an input signal and split the image in half, with the right half of the image appearing on one projector, and the left half on the other. Using the projectors built in edge blending feature, the image would then appear as one single image across both projectors.

With the quick hit of a button, the user could then switch into a "side by side" mode, displaying two separate images on each projector. Since the MSD-6203 has three (3) independent outputs, video sources can be routed individually to up to three displays.

Working alongside the System Integrator, IDK was able to provide a robust AV system to meet the client's needs and provide a budget friendly solution. For more information contact IDK America at sales@idkav.com