

## THE BPMC HDK-01 USER MANUAL

For the videofreex, the good people, from the Big Pauper for Big Pauper Modified Circuitry.

#### BPMCGLITCH.COM @BPMC GLITCH

#### **PRODUCTION HISTORY:**

HDK-01 Manufactured December 2023.

MANUAL HISTORY: First published March 13th 2024

#### HANDLING & CARE:

Please handle the HDK-01 with care. Never force a cable head into an HDMI port . It is not something I repair myself and it will need to be shipped overseas which takes considerable time. Do not drop the unit or expose it to the elements. Also do not leave the unit powered on for considerable lengths of time (days/weeks/months etc). This lowers it's lifespan considerably over time. A 110-240v auto-switchable power supply is supplied for international use. Please simply adapt the plug for use in your country. BPMC is not responsible for damage sustained via improperly powering this device.

## POWER SUPPLY:

Do not use with anything but the original power supply supplied. If you must replace it please note that it is a 12V 2A Center positive power supply.

#### **USB POWER:**

You may power the HDK-01 with USB power. Please note that 2A is kind of a heavy pull. If you run into intermittent power loss or other disruptions it means the HDK is not recieving enough power. Consider unplugging items sharing the USB bus or reverting to a conventional power supply.

## SOCIAL CONTRACT:

Social media is merciless, please, before outing me as a piece of shit who builds crappy instruments hit me up with your problem or concern and I will do my best to get back to you asap. In my experimentations with this device I was limited to the scenarios I could afford as an individual. It is possible you may find a piece of gear that the HDK-01 does not work well with. Or a scenario that creates an issue. I could only test so much. If you're having an issue please know that it's important to me and I'll do my best to get it handled as quickly as possible.

#### **BUILT FOR ANY DISPLAY:**

The HDK-01's data transmission corruption exists within a buffer that allows for stable usage across any and all displays. Please see the 'INCOMPATIBILITIES' section for known incompatibilities or issues. If you discover an issue or an incompatibility please let me know and I will document it here in the manual.

#### AUTHOR'S NOTE:

"The HDK was a long time coming. I started working on this back in 2017, christ.... in my early thirties i guess, ugh! I worked through a major engineering hurdle in 2019 that led me to finally pursue manufacturing. Not being an engineer myself, rather an agent of chaos, meant there would be a lot to stumble through and a lot of time to spend....But here it is, in my hands, HD glitch for the masses. One thing that's been on my mind in relation to the HDK is that I've not actually created anything here. I simply curated the ghosts as usual. I did not invent these looks, I simply unearthed them. When designing glitch gear none of us design these effects, we simply give the pre-existing ghosts relevance. THIS is what HDMI looks like when it's corrupted in real time, love it or leave it. The only avenue where I added a little aesthetic flourish is on the blue channel which acts as sort of a happy accident generator. But even that is just exploiting a relationship between two elements in hardware. It is true, you never know exactly what it's going to do when the starved signal hits the buffer, but you can bet your arse it's going to be glitchy. The blue channel is where I get lost and have the most fun. After your initial explorations you may be wondering ..... Whats the deal with the pushbuttons? Why the positive and negative channels when they create such similar effects? I'll get into that all below. To get the most out of your HDK please read this manual in full and consider this a starting point in your HD explorations. The HDK-01 is greatly expanded upon by utilizing other HD video mixers. If you like what you're getting into here then please, do yourself a favor and get a two channel or 4 channel HD mixer. They've never been cheaper and your aesthetic language will expand considerably. I was originally hoping to develop an effects unit to pair with the HDK-01, but in all honesty I just dont think there is enough interest there. By all means let me know if I'm wrong. In the meanwhile enjoy what is at your fingertips, speak through it and keep pushing. Stay strong video comrades."

Paup 2024

#### JACKING INTO TO THE MAINFRAME:

SETUP: You've got one source option and two outputs. A clean output (HDMI LOOP) & your glitched output (HDMI OUT). This split setup is ideal for using your HDK with a 2 channel mixer. Pretty straight forward.



#### **GENERAL OPERATION:**

The layout is exceptionally simple. HDMI data transmission is organized by color, each with a positive and negative channel. Each positive and negative color channel has a corruption mode selection switch.

UP - Normal knob operation DOWN - Knob through a pushbutton operation.

Follow the GUI lines to ensure you are pressing the correct button for the matching channel. In the case of R & G channels pushbutton operation allows you to stage very precise levels of corruption . Fantastic in the context of a performance. Pushbutton operation on the B channel actually triggers glitches not easily accessed in knob mode. Pressing a pushbutton in quick succession with the knob dialed in on a sweet spot often gets you into tucked away aesthetics, just out of reach in knob mode.



# TIPS & TRICKS FOR MAXIMUM GLITCHABILITY:

EXPERIMENT WITH DIFFERENT CONTENT: Glitch effects are based off of both color information, subject/object positioning within an image and brightness/contrast. I adore using content rich in blacks, often just appearing on a black background. For this reason I often output video from Resolume with some sort of proc amp in place to better suit the content to the HDK-01's strengths. Explore different content.

USE WITH A 2 CHANNEL MIXER: I cannot stress enough how dope the HDK-01 is being run into a 2 channel mixer like the V-02HD, the V-01HD, the Panasonic AG-HMX100P or some of the cheap generic mixers i see on ebay. Being able to mix/key between your clean output and your glitch output is when things really start to come together. Beyond mixing/keying mixers also have onboard effects that are often super useful For instance the AG-HMX has strobe and the V-02HD has all manner of color processing effects. It also pays to combine with other HD glitch effects. I will say, running an HDK-01 into a BPMC modified V-02HD is superb! ;-)

USE THE PUSHBUTTONS ON THE BLUE CHANNEL: You will more easily access some of the effect variations locked away on this channel when you get playing with the pushbuttons in quick succession. I've not really gotten that cool freeze glitch cascade effect any other way.

COLLECTIVELY STARVE POSITIVE AND NEGATIVE: Positive and negative corruptions produce similar results but there are some instances beyond piano preparation where they come in handy. If on the green channel for instance you incrementally starve each channel equally all the while trying to maintain a solid image you will eventually get some nice variations. With the image degraded yet still intact try activating some of the other channel's glitch effects. Slight variations should occur.

USE QUALITY KIT: I've seen HDMI kit on ebay and amazon get cheaper and cheaper as the years have gone on. A couple of things to know. Thin ass HDMI cables mean less insulation and a higher likelihood of them having issues. Also do not excessively bend or twist your HDMI cables. Most importantly you want good well constructed connectors. HDMI splitters are not created equally and a lot of them are too cheap to breath. Spend the extra buck for better reliability down the road.

#### KNOWN COMPATABILITY ISSUES:

HDMI2AV: If for some god forsaken reason you are using an HDMI2AV post HDK to adapt back down to composite you may run into an issue where the unit resets itself with knob twiddling. To help resolve this simply be sure you're using USB power on the HDMI2AV. The HDMI2AV units will function without power but it will be less dependable.

## **REPAIRS AND QUESTIONS:**

Drop me a line at <a href="mailto:bpmc@glitchart.com">bpmc@glitchart.com</a> and NOT on Instagram and I'll do my best to get back to you in a timely manner.

I do not look at my computer every day (often only a couple times a week to ensure that orders are being knocked out) and BPMC is a one man show so please do not take it personally if I do not write back promptly.

I will get to your concerns as soon as I can.

