GRAZER AT A GLANCE

Top Panel: OUT - Sound comes out here. 9V DC - plug the power in here! Grazer draws around 70ma. XP - Expression pedal input! IN - Sound goes in here!

THE THEORY MATTERS HERE.

please let me tell you about the Grazer in complete sentances.

BASIC GRAZING

Grazer takes tiny samples from your input signal and spits them right back out as you're playing. The "size" knob defines the length of these micro-samples (or "grains") which are repeated until a new sample is taken. Let's call this the Grain Pool.

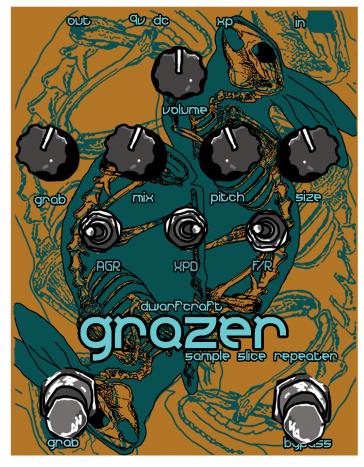
This process is all happening very quickly, allowing you to play freely and expressively as the Grazer grazes. Sometimes it sounds like an echo.

The "pitch" knob allows you to pitch the grain pool up... technically. It won't always sound like a perfect octave or fifth, due to the hard-sliced nature of the grains being repeated, but it is an audibly delicious effect and I didn't feel like giving it a zany name this time.

GRAB and AGR

Whenever you press and hold the "grab" switch, a portion of the gain pool will loop until you release the switch. You can manipulate the playback of this loop with the "pitch" "size" and "mix" knobs. You can sometimes dial in gaps in the audio, to create funky fresh new rhythms.

The AGR switch enables "automated grabbing" which is a regular grab command sent by an internal timer. The speed of this effect is controlled by the "grab" knob.



CONTROLS:

Volume - Adjust the overall loudness HERE.

Grab (knob) - Defines the speed of the "AGR" cycle described on the left half of the page

Mix - A wet/dry mixer (you're going to use this a lot.)

Pitch - Shifts the pitch of the grain-pool up

Size - Defines the length of the micro-samples, or "grains" to be repeated

AGR - enables the "Automated Grab" cycle

XPD - Chooses the destination for Expression Pedal control. In the right position the expression pedal will control "size." In the left position control is sent to "pitch."

F/R - Toggles between forward and reverse playback of grains. The effect can be subtle in some settings, it's most obvious with a percussive input and a large "size" setting.

Bypass - Engages or disengags the Grazer

Grab (stomp) - Forces a "grab and hold" cycle, which continues as long as the switch is held on.



IN AN EFFORT TO ANSWER QUESTIONS BEFORE THEY ARE ASKED...

The Grazer is a digital machine made to chop your audio up into tiny pieces. This creates a LOT of "sharp edges" which in audio terms means "gritty" textures or "clicking." That's what the Grazer is all about.

If it sounds like a broken computer, it's probably working. If you are intent on eradicating these artifacts, there are many settings that will render fewer of them. Also a distortion effect before or after the grazer will mask them, or a low pass filter after the grazer can be used to cutoff offensive high frequencies.

The "pitch" knob doesn't always sound in tune. When the grain pool is played back at normal speed any percussive artifacts present will sound like occasional clicks or pops. However, as the playback speed is multiplied these percussive elements become tonal as their frequencies reach audio rates. As this occurs you have multiple sources of pitch information (high frequency percussive elements, original signal, grain pool audio) combining in your ears to make new and exciting sound, but not always a recognizable interval. **The Grazer is not a pitch shifter.**

TRY THIS THOUGH:

If you have a small to medium sample size dialed in on your grazer you can send that to a high-gain distortion to transform the "pitch" control into a harmonic selector. It will take some fiddling with the mix, and the distortion controls, but when you get there... I think you'll enjoy it.