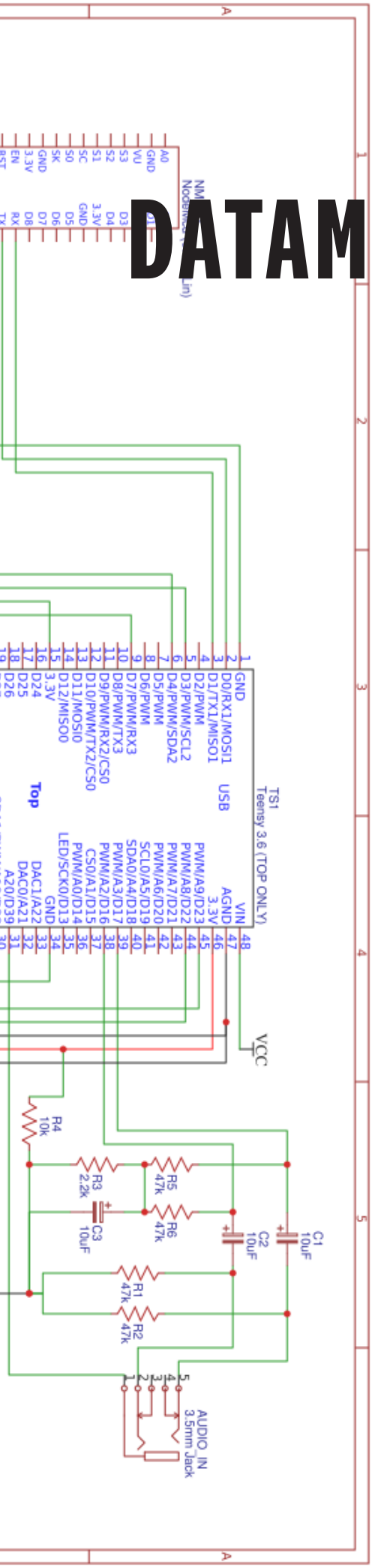
DATAMOSH

HARDWARE. ESP32 - TEENSY 3.6 - C++ & ARDUINO



DATAMOSH is a WiFi-enabled, digital, multi-effect guitar pedal.
Seemingly the first and only one of its kind, it was initially created to bridge the gap between wanting to jam and not being able to participate, either from inability or lack of physical proximity. The pedal is largely a proof of concept, capable or parameterizing effects from the Teensy Audio library and using an embedded WiFi chip (of ESP32 heritage) to communicate with a smartphone within radio range, or if provided a network to connect to, over the internet.

Used as a traditional effect pedal, the device is simple a web-interfaced audio engine with knob controls as usual. It is fully compatible with other audio signals via standard quarter inch jacks, so that it may work in concert with other pedals in an effects rack.

The potential to integrate network streams, or update the pedal's firmware in a user friendly way with more effects has not been fully explored, but the capabilities of the Teensy platform and WiFi connectivity have left a rather large door open for future iterations.

//www.michaelhemingway.com/projects/datamosh/