

## Application Note 1

Sequencer designs based on Universal Tap Tempo Control Chip MV-52

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Molten Voltage's Universal Tap Tempo Control Chip MV-52 lends itself perfectly to sophisticated sequencer designs.

In the example below, we have constructed a tap tempo controlled volume sequencer based around a 4017 Decade Counter. MV-52 sends tempo pulses to the Decade Counter. On each pulse, the 4017 increments the counter until reaching step 9, which is tied to the Reset pin [15].

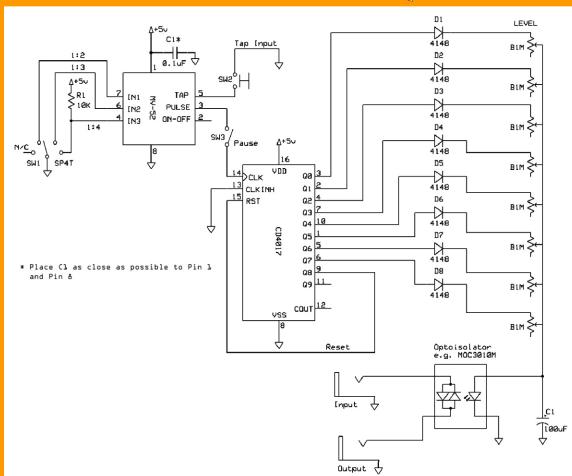
By varying the current to an optoisolator, the signal level can be modulated. As configured, the sequencer steps through eight different output volume settings determined by the eight potentiometers.

As you can see, it is a simple matter to connect the 4017 outputs to any other type of current-controlled circuit.

Refer to http://www.MoltenVoltage.com/downloads/Universal\_Tap\_Tempo\_Control\_Chip\_MV-52\_-\_Datasheet\_v2.pdf

For technical support, email us at Service@MoltenVoltage.com

## TAP TEMPO VOLUME SEQUENCER



The sequencer is paused by blocking the output from MV-52.

The sequence length is selectable by connecting pin 15 of the 4017 to one of the outputs. If pin 15 is unconnected, the 4017 goes through 10 steps.

Refer to the 4017 datasheet for more details.

Different pot values can be used according to taste, and may be necessary with other optoisolators.

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