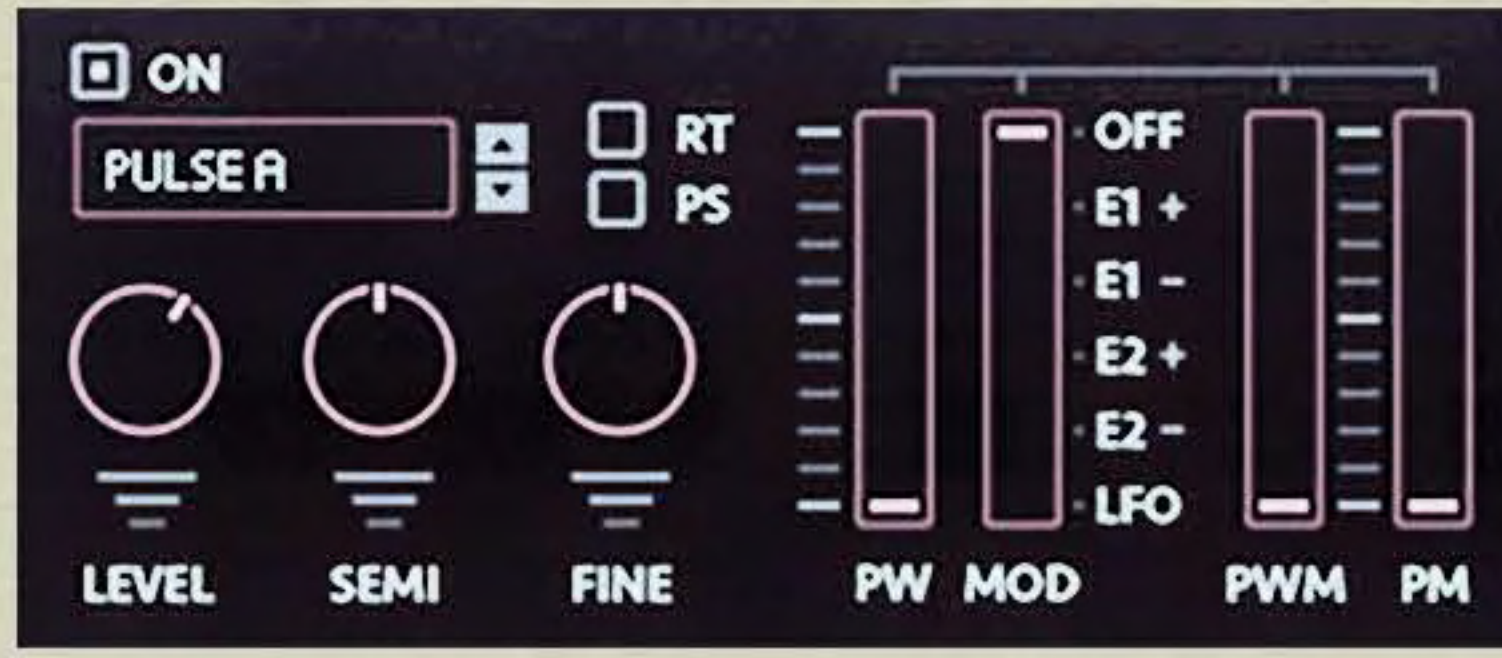




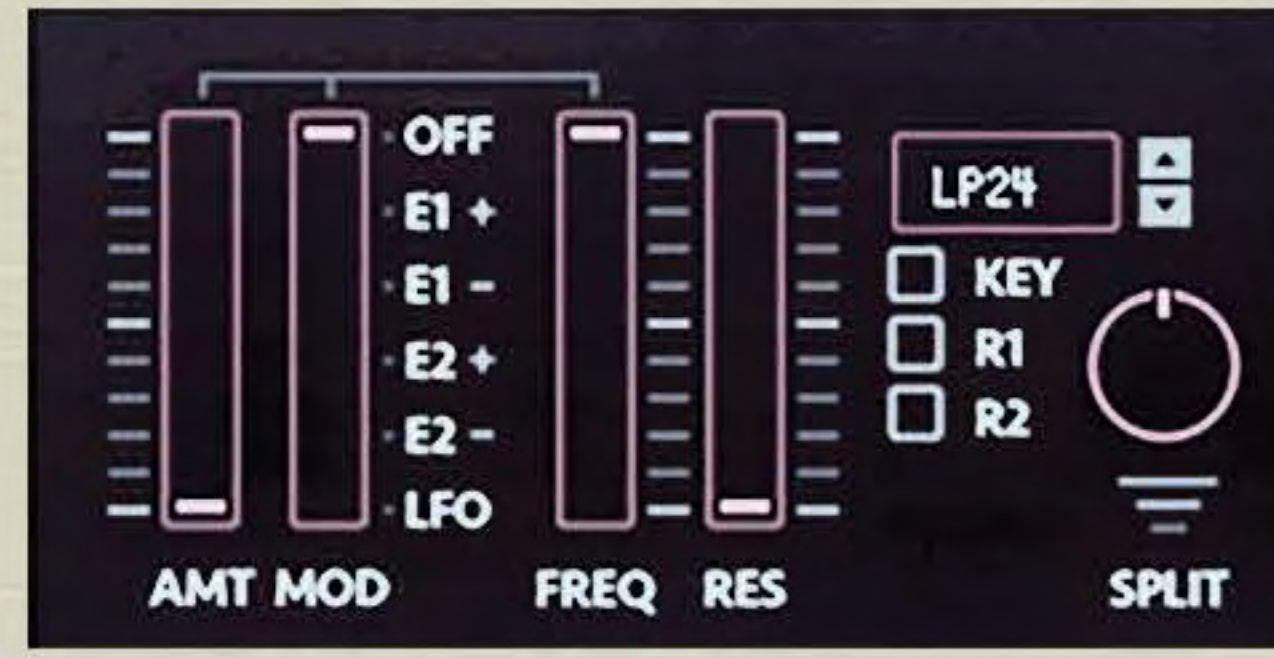
### OPERATION OF THE OSCILLATORS IN PULSE

- OSC WAVEFORM (12 WAVES)
- OSC PHASE RETRIG (RT)
- OSC PHASE SHIFT (PS)
- OSC PULSE - WIDTH (PW)
- OSC LEVEL, SEMI AND FINE TUNING
- OSC MOD SOURCE (MOD)
- OSC PULSE - WIDTH MOD AMT (PWM)
- OSC PITCH MOD AMT (PM)
- TWO SUB OSCS ON THE RIGHT OF THE PANEL
- TWO NOISE OSCS ON THE RIGHT OF THE PANEL



### OPERATION OF THE FILTER IN PULSE

- FILTER (FREQ)
- FILTER (RES)
- FILTER TYPE (5 MODE)
- FILTER KEYTRACK (KEY)
- SLIGHT DIGITAL DOWNSAMPLING (R1)
- MORE DIGITAL DOWNSAMPLING (R2)
- FILTER MOD (AMT)
- FILTER SOURCE (MOD)
- FILTER (SPLIT) SHIFTS THE CUTOFF IN OSC 1 AND OSC 2 IN OPPOSITE DIRECTIONS



### OPERATION OF THE LFO IN PULSE

- LFO ATTACK TIME (ATK)
- LFO SPEED (RATE)
- LFO WAVEFORM (7 WAVES)
- LFO KEYTRACK (KEY)
- RETRIG LFO (RT)
- INVERT THE LFO PHASE 180 DEGREES (PS)
- LFO (SPLIT) SHIFTS THE LFO AMOUNT TO OSC 1 AND OSC 2 IN OPPOSITE DIRECTIONS



### OPERATION OF THE MIXER / FX IN PULSE

- OSC OCTAVE -1 / 0 / +1 (OCT)
- OSC DRIFT MODE (DR)
- CHORUS ON / OFF (CH)
- DELAY (LOCKED TO 1/4T) (DELAY)
- PAN OSC 1 AND 2 LEFT / RIGHT (SPREAD)
- PLACE THE SUB/NOISE OSCS IN MONO REGARDLESS OF (SPREAD) CONTROL (CENTER SUB)
- ON / OFF BUTTONS FOR OSC 1, 2 AND THE SUB/NOISE OSCILLATORS



### OPERATION OF THE GLIDE / POLY IN PULSE

- MODE (POLY / MONO)
- MONO / LEGATO (ON / AUTO)
- PORTAMENTO AMOUNT (GLIDE)
- PITCH WHEEL BEND RANGE (BEND)
- LOOSE NOTES. WHEN ENABLED, NOTE INPUTS ARE RANDOMLY IMPERFECTLY TUNED (LN)



### OPERATION OF THE MW AND VELOCITY IN PULSE

- VELOCITY CONTROL FOR VOLUME (AMP)
- VELOCITY CONTROL FOR FILTER (FLTR)
- VELOCITY CONTROL FOR (PW)
- MOD WHEEL CONTROL FOR (LFO)
- MOD WHEEL CONTROL FOR FILTER (FLTR)
- MOD WHEEL CONTROL FOR PULSE-WIDTH (PW)



THIS INFORMATION SHOULD BE TREATED AS TOP SECRET EYES ONLY.

THIS MEMO/DOCUMENT APPEARED IN FEBRUARY 7TH 1957 DURING A TEST RUN OF OUR MAGNETO PLASMA TIME DILATION DEVICE. ENGINEERS AND SENIOR SCIENTISTS ARE NOW WORKING AROUND THE CLOCK TO FIGURE OUT WHAT KIND OF DEVICE THIS MIGHT BE.