



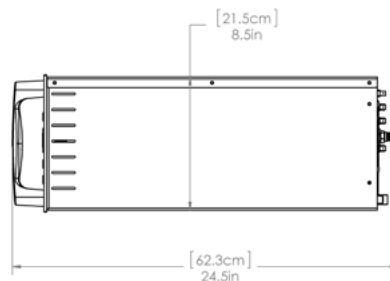
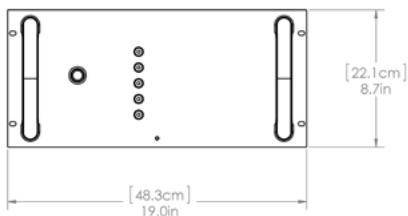
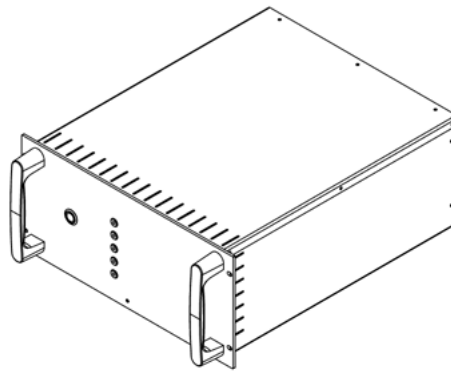
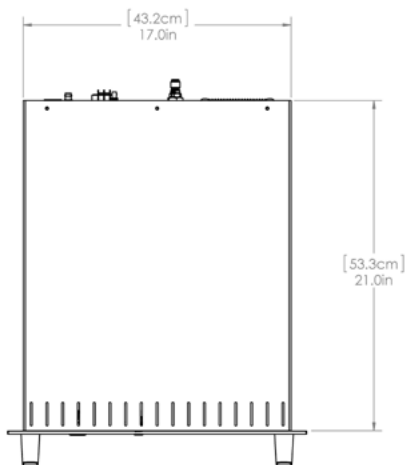
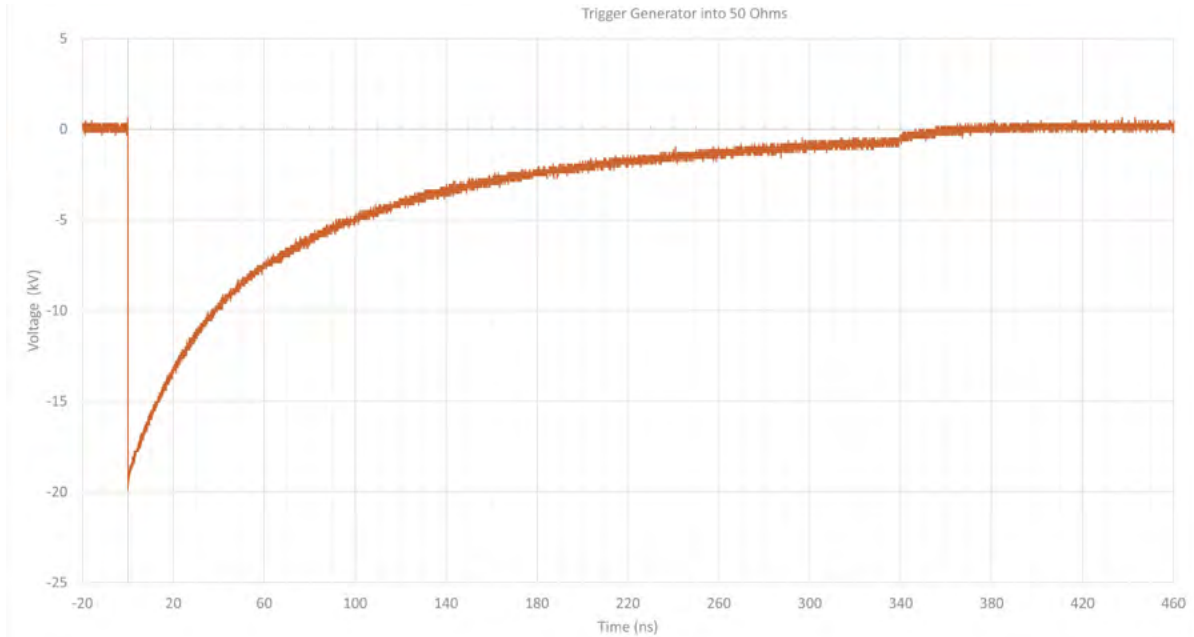
Utilizing a pulse forming circuit, the APELC high-PRF trigger generator provides an 18 kV trigger pulse (into 50 Ohms) at up to 1 kHz pulse repetition frequency (PRF) to a Marx Generator unit.

Specification	Value
Peak pulsed output voltage	18 kV
Output voltage risetime	30 ns
Control interface	Handheld fiber-optic remote or Delay Generator
Input wavelength (FO)	820 nm
Input power	90-250 VAC, 47-63 Hz
Line current	90-140 Hz: 12A 180-250 Hz: 6A
Requirements	An optical 820 nm delay generator (e.g. Berkeley Nucleonics 575) is required to operate this trigger generator.

LED indicators on the front panel notify users of trigger-circuit HVPS conditions. Additional front panel options include: diagnostics, thyatron HVPS analog out, Marx analog out (V), Marx current out, and Marx V peak. Signals can be monitored on any 1-M Ω oscilloscope channel or handheld DVM through front panel BNC jacks.

The unit also conditions and routes optical signals from a delay generator (BNC 575) to control the charge and inhibit cycles of the thyatron HVPS and Marx HVPS (typically Lambda 802L or 402L). This functionality allows pulse charging of both the thyatron and the Marx Generator. The pulse charging mode minimizes high-voltage DC degrading effects (e.g. corona) and provides a safer high-voltage environment by inhibiting the default state of all power supplies.

Waveform



Design

- Brushed stainless steel construction
- EMI shielded
- Standard mains input power
- Quick connect output cable