



160A

The BWD160A is a very moderately priced generator providing 12 different waveforms and 5 simultaneous outputs. It can be swept over any section of its frequency range up to 4 decades wide by the BWD170 log or linear ramp output. Pulse or ramp outputs of either polarity have a fixed mark-space ratio of approx 20:1 thus maintaining a constant calibration at 1/10th the indicated frequency.

Sine, Square and Triangle outputs at a fixed 1V p-p level are available on the rear panel and a 20 load capacity TTL output at the front. Main output is 20V O/C with variable offset to $\pm 10V$ or 10V into 50Ω .

Freq. Range:	0.02Hz to 2MHz in 7 ranges.
Freq. Dial:	1-20 with uncalibrated point at 0.2 Accuracy $\pm 3\%$ of full scale above 2Hz.
Waveforms:	Sine, Square, Triangle, +Pulse, -Pulse, +Ramp & -Ramp.
Output Voltages:	1. Main Output (front panel BNC) 0-20V O/C or 0-10V p-p into 50Ω via two step 40db attenuator and 100-1 vernier. 2. Auxiliary Outputs: (rear panel) Sine, Square & Triangle or Pulse/Ramp if selected for main output. 1V p-p fixed, $1k\Omega$ output impedance. 3. TTL 0 to +3V O/C to drive 20 loads. $<50\text{nSec}$ rise time.
DC offset:	0 to $\pm 10V$ O/C or $\pm 5V$ into 50Ω
Sine Wave:	$<1\%$ distortion 10Hz-200kHz $<2\%$ 5Hz to 1MHz.
Square Wave:	100nSec rise time into 50Ω
Triangle Wave:	2% symmetry. 99% linearity 1Hz to 100kHz.
Pulse or Ramp:	1/10th indicated frequency. $\pm 10\%$ of full scale. + or -pulse or ramp by switch selection.
Isolated Ground:	Operation permissible up to $\pm 200V$ DC from ground.
Operating Temp:	Calibration specified $+10^\circ$ to $+35^\circ\text{C}$. 0 to 50°C specification tolerances $\times 2$
Power Requirement:	200-270V 6W 100-137V available as option. 48 to 440Hz.
Dimensions and weight:	210 x 100 x 210mm 1.8kg Net.

0.02Hz to 2MHz