

# DGE2000 Series Waveform Generator



- + Max 70MHz frequency output and 300MSa/s Sample rate,
- + 14 bits Vertical Resolution, Vertical resolution 1 $\mu$ Hz
- + 8K waveform length
- + Comprehensive waveform output : 5 basic waveforms, and 160 built-in arbitrary waveforms
- + Comprehensive modulation functions : AM、FM、PM、FSK、and Sweep、Burst
- + SCPI, and LabVIEW supported
- + 3.6 inch (480 × 272 pixels) LCD

## + Performance Specifications

Model	DGE2035	DGE2070
Channel	2	
Frequency Output	35MHz	70MHz
Sample Rate	125MSa/s	300MSa/s
Vertical Resolution	14 bits	

### Waveform

Standard Waveform	sine, square, pulse, ramp, noise
Arbitrary Waveform	exponential rise, exponential fall, sin(x)/x, step wave, and others total 160 built-in waveforms

### Frequency

Sine	1 $\mu$ Hz-35MHz	1 $\mu$ Hz -70MHz
Square	1 $\mu$ Hz ~ 15MHz	1 $\mu$ Hz ~ 20MHz
Pulse	2mHz ~ 15MHz	1 $\mu$ Hz ~ 20MHz
Ramp	2mHz ~ 1MHz	1 $\mu$ Hz ~ 2MHz
Noise	20MHz (-3dB, typical)	
Arbitrary Waveform	2mHz ~ 10MHz	
Frequency resolution	1 $\mu$ Hz or 7 significant figures	
Frequency stability	$\pm$ 30 ppm at 0 $\pm$ 40 $^{\circ}$ C	
Frequency aging rate	$\pm$ 30 ppm per year	

### Arbitrary

Waveform Length	2 points – 8K points	
Sample Rate	125Ma/s	300Ma/s

### Amplitude

Amplitude	1mVpp ~ 10Vpp ( $\leq$ 10MHz) 1mVpp ~ 4Vpp ( $\leq$ 70MHz)	
DC Offset Range (AD+DC)	$\pm$ (10 Vpk – Amplitude Vpp/2) high resistance $\pm$ (5 Vpk – Amplitude Vpp/2) 50 $\Omega$	
DC offset resolution	1mV or 4digits	
Load Impedance	50 $\Omega$ (typical)	
DC offset Accuracy	$\pm$ (1 % of  setting  + 1 mV + amplitude Vpp * 0.5%)	

### Modulation

Type	AM、FM、PM、FSK
Internal Modulation Frequency	2 mHz to 100 kHz

### Sweep characteristic

Carrier	Sine, rectangular wave, ramp wave, arbitrary wave(Except DC)
Minimum/maximum starting frequency	2mHz (minimum) / maximum frequency of corresponding carrier
Minimum/maximum termination frequency	2mHz (minimum) / maximum frequency of corresponding carrier
Trigger source	Internal, external,

### Burst characteristic

Waveform	Sine wave, square wave, ramp wave, pulse wave and arbitrary wave (Except DC)
Types	N-Cycle
Trigger source	Internal, manual
Carrier frequency	$1 \mu\text{Hz} \leq \text{Offset} \leq \text{Maximum frequency of corresponding carrier} / 2$

### Input / Output

Display	3.6" 480 x 272 pixels LCD
Communication Interface	USB Device

### Mechanical specifications

Size	200mm*68.5mm*75mm
Weight	0.5kg

Specifications subject to change without prior notice

### + Accessories

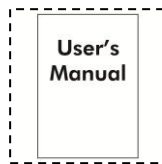
The accessories subject to final delivery.



Power Cord



Adapter



Manual



USB Cable



BNC Cable



BNC to Alligator Clip