

# CMG-54T

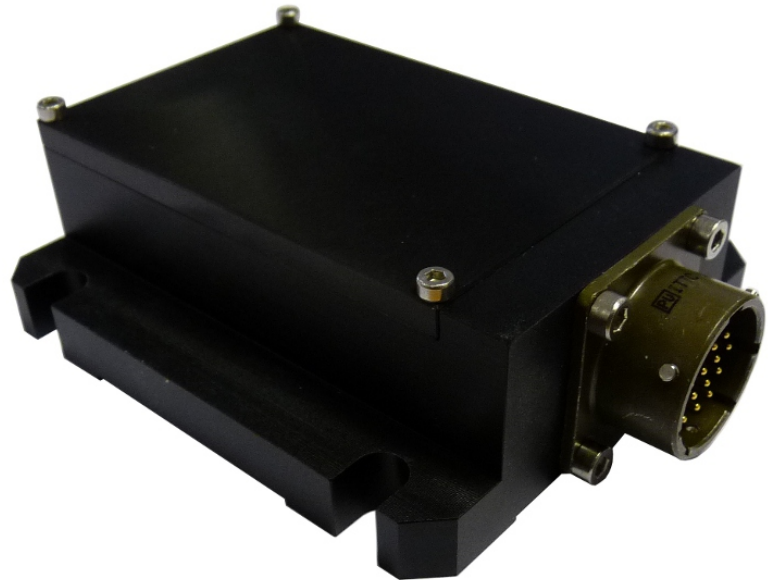


## Triaxial strong motion accelerometer

The Guralp Systems CMG-54T is an extremely compact, robust accelerometer based on MEMS technology, suitable for civil engineering, hazard mitigation and structure monitoring applications.

### Key Features:

- Three axes of acceleration with high dynamic range
- Compact, hard anodized aluminium case
- Full-scale sensitivity from 2 g to 6 g
- 282Hz high frequency corner
- Highly robust, with no moving parts
- Response to DC as standard
- 19-way mil-spec connector
- Cables provided for connection to all Guralp Systems digitizers
- Combine with Guralp Systems feedback accelerometers for high-density, high performance arrays
- Simple installation - bolts directly to any flat surface
- Clamps available for secure attachment to cables or rods of any diameter



# Specifications

CMG-54T



Output sensitivity	$\pm 2g$ to $\pm 6g$
Acceleration output low corner	DC
Acceleration output high corner	100 to 1000Hz
Peak output	0-5V single ended (separate reference voltage)
Maximum shock	10 000g
Nominal output impedance	47 $\Omega$
Lowest spurious resonance	> 1000Hz
Nonlinearity	0.5 % full scale
Cross-axis rejection	0.02 g/g (or $\pm 2\%$ )
Dynamic range	3 to 30Hz Vertical: 72dB Horizontal: 76dB
Noise level	Vertical: 17 $\mu g$ /Hz <sup>1/2</sup> Horizontal: 11 $\mu g$ /Hz <sup>1/2</sup>
Operating temperature	-40 to +85 °C
Temperature shift	100 ppm / °C
Materials	Hard anodized aluminium case Mil-spec connector
Case depth/height	102.5mm
Case width	80mm
Case depth	33mm
Weight	< 0.5kg
Power supply	7 – 14VDC
Current at 12 V DC	7.5mA
Power consumption at 12 V DC	90mW

