

Tri-Axial Shock Data Logger with Extended Battery Life Part of the NOMAD® Family

OM-CP-SHOCK101-EB



- ✓ Shipment Monitoring
- ✓ Assembly Line Monitoring
- ✓ Brake Testing
- ✓ Fragility Testing
- ✓ Laboratory Drop Testing
- ✓ Aircraft Turbulence Measurement
- ✓ Machinery Monitoring
- ✓ Railcar Coupling Impacts

The OM-CP-SHOCK101-EB is a battery powered, stand alone 3-axis shock recorder which offers a battery life of up to 60 days typical. The unit measures and records shock as the peak acceleration levels over the user defined interval.

The OM-CP-SHOCK101-EB is specifically designed for documenting dynamic environments such as moving vehicles, trucks, containers, ships, etc. The device is also valuable in characterizing environments such as production and assembly lines of delicate equipment, IC fabrication, communications and computer components.

This is an all-in-one compact, portable, easy to use device that will measure and record up to 349,525 measurements per axis. The storage medium is non-volatile solid state memory, providing maximum data security even if the battery becomes discharged. The user can start and stop directly from the computer and it's small size allows it to fit almost anywhere.

The OM-CP-SHOCK101-EB makes data retrieval quick and easy. Simply plug it into an empty COM or USB port and our user-friendly software does the rest.



OM-CP-SHOCK101-50-EB data logger shown smaller than actual size.

Specifications

Acceleration Range (g)	±5	±50	±100	±250
Acceleration Resolution (g)	±0.01	±0.05	±0.1	±0.2
Calibrated Accuracy (g)	±0.2	±1.0	±2.0	±4.0

Channels: Shock (3 axes)

Sample Rate: 1.953 ms/512 Hz

Reading Interval: 64 Hz to 5 min

Memory: 349,525 readings per axis, for a total of 1,398,100 readings

Start Time: Software programmable start time and date, up to 180 days in advance

Status Indicators:

Red:

Blinks to indicate sleep mode

Red & Green:

Blinks to indicate delay start

Green:

Blinks to indicate taking samples (blinks at sample rate)

Password Protection:

An optional password may be programmed into the device to restrict access to configuration options. Data may be downloaded without the password

Real Time Recording: Record instantaneous acceleration in real time (1 second or slower reading rate)

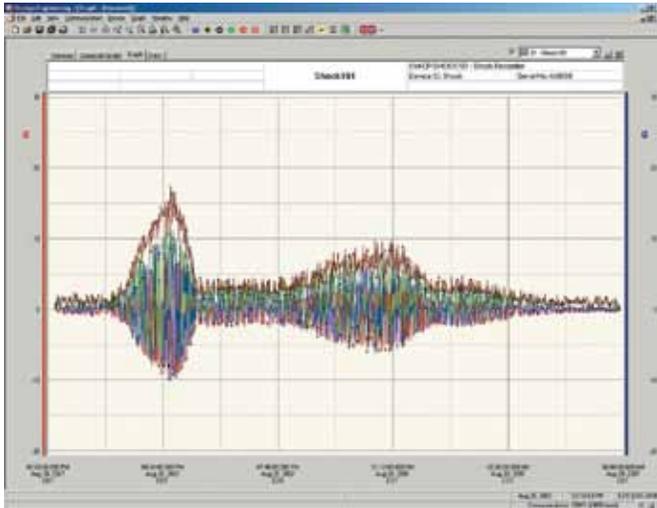
Calibration: Digital calibration through software

Calibration Date: Automatically recorded within device

Power: 6 D-cell alkaline batteries (included), user replaceable

Replaceable Battery: 60 days typical @25°C, 1 minute reading rate

Data Format: Date and time stamped gravities (g and mg)



Reading	X-axis	Y-axis	Z-axis	Max	Min	Date and Time	Annotation
1	0.07	-0.01	-0.05	0.05		May 02, 2000 12:54:41 PM	
2	0.07	-0.01	-0.05	0.05		May 02, 2000 12:54:43 PM	
3	0.04	-0.05	-0.02	0.02		May 02, 2000 12:54:45 PM	
4	0.04	-0.05	-0.02	0.02		May 02, 2000 12:54:47 PM	
5	0.10	-0.01	-0.02	0.02		May 02, 2000 12:54:49 PM	
6	0.17	-0.05	-0.02	0.04		May 02, 2000 12:54:51 PM	
7	0.04	-0.08	-0.08	0.08		May 02, 2000 12:54:53 PM	
8	0.07	-0.05	-0.02	0.02		May 02, 2000 12:54:55 PM	
9	0.04	-0.01	-0.02	0.02		May 02, 2000 12:54:57 PM	
10	0.04	-0.01	-0.02	0.02		May 02, 2000 12:54:59 PM	
11	0.17	-0.01	-0.05	0.07		May 02, 2000 12:55:01 PM	
12	0.07	-0.14	-0.08	0.09		May 02, 2000 12:55:03 PM	
13	0.04	-0.11	-0.02	0.03		May 02, 2000 12:55:05 PM	
14	0.07	-0.05	-0.05	0.05		May 02, 2000 12:55:07 PM	

OM-CP-IFC200 Windows software displays data in graphical or tabular format.

	Min	Max
Peak X	-34.40 G	13.12 G
Peak Y	-33.04 G	13.58 G
Peak Z	-42.87 G	38.63 G



OM-CP-SHOCK101-50-EB data logger shown smaller than actual size.

Time Accuracy: ±1 minute/month (at 20°C, RS232 port not in use)
Computer Interface: PC serial or USB (interface cable required); 115,200 baud
Software: XP SP3/Vista/7 and 8 (32-bit and 64-bit)

Operating Environment: -20 to 54°C, (-4 to 129°F)
 0 to 95% RH non-condensing
Dimensions: 140 x 137 x 80 mm (5.5 x 5.4 x 3.2")
Weight: 2.3 kg (5 lbs)
Materials: Anodized aluminum

To Order	
Model No.	Description
OM-CP-SHOCK101-5-EB	Tri-axial shock data logger, ±5 g, extended battery life
OM-CP-SHOCK101-5-EB-CERT	Tri-axial shock data logger, ±5 g, extended battery life with NIST calibration certificate
OM-CP-SHOCK101-50-EB	Tri-axial shock data logger, ±50 g, extended battery life
OM-CP-SHOCK101-50-EB-CERT	Tri-axial shock data logger, ±50 g, extended battery life with NIST calibration certificate
OM-CP-SHOCK101-100-EB	Tri-axial shock data logger, ±100 g, extended battery life
OM-CP-SHOCK101-100-EB-CERT	Tri-axial shock data logger, ±100 g, extended battery life with NIST calibration certificate
OM-CP-SHOCK101-250-EB	Tri-axial shock data logger, ±250 g, extended battery life
OM-CP-SHOCK101-250-EB-CERT	Tri-axial shock data logger, ±250 g, extended battery life with NIST calibration certificate
OM-CP-IFC200	Windows software and 1.8 m (6') USB interface cable
MN1300	Replacement 1.5V D cell alkaline battery for extended battery life
OM-CP-SVP-SYSTEM	FDA 21 CFR part 11 compliant IQ/OQ/PQ secure software validation workbook and software package (unlimited users, license per computer)
OM-CP-SHOCK-EB-MAG-KIT	Magnet mount kit for tri-axial shock data loggers with extended battery life

Comes complete with 6-D cell alkaline batteries. Operator's manual and USB interface cable are included with the OM-CP-IFC200 Windows software (required to operate the data logger and sold separately).
Ordering Example: OM-CP-SHOCK101-50-EB tri-axial shock data logger, ±50 g range, and OM-CP-IFC200 Windows software with USB interface cable.