

# Digital Force Gauges with 180° reversible display & dual labeled keypad for both push, pull applications

The Series FGE-XY Digital Force Gauges combine a rugged, ergonomic and compact design with exceptional accuracy to provide a solid force testing instrument. These instruments are utilized in a variety of applications such as, incoming quality inspection, finished goods testing, R&D or almost any portable or force stand testing requirement.

Simple one button adjustment alters units, while pressing the peak button quickly produces the highest recorded value during the test. The 180° reversible display combined with the adjustable force direction and dual labeled keypad enable the FGE-XY to excel in both compression and tension applications in any direction. Models are available from 0.5 lbs to 200 lb ranges providing a large offering for various testing requirements.

Typical applications include wallboard, wire pull, wire crimps, trigger pull, brake pedal, aerospace ceramic, springs, food ripeness, corrugated paper strength, blister pack, medical component, muscle strength, ergonomic testing, adhesives, syringe plunger, needle sharpness and many more.



### **FGE-XY Digital Force Gauges**



#### **Features**

- 1000 Hz Sample Rate provides faster sampling producing better resolution and more accurate results
- Ideal for strict tolerances with its high accuracy +/-0.2% F.S.
- Measure and record compression and tension tests- permits true "push-pull" testing
- Real time or Peak Hold mode easily selectable with a single button push
- 180° Reversible display and dual printed keypad allows usage as a portable gauge or mounted upside down on a test stand.
- 1 million operation load cell with superior overload protection provides a long-life, damage free product
- Rugged, ergonomic die cast aluminum construction allows usage on production floor
- Variable display response rate aids viewing readings
- Flexible user preference with one button selection of engineering units
- Dual power capable with rechargeable battery or AC line voltage
- · CE Mark & RoHS Approval



FGE-XY with Accessories in Protective Carrying Case





170 Shields Court Unit 2 Markham, ON L3R 9T5 TEL: (905) 475-5880 ext. 226 EAX: (905) 475-1231

# **FGE-XY Specifications**

FGE-XY Model	FGE-0.5XY	FGE-1XY	FGE-2XY	FGE-5XY	FGE-10XY	FGE-20XY	FGE-50XY	FGE-100XY	FGE-200XY
Capacity	8 oz 0.5 lb 200.0 g 2.000 N	16 oz 1 lb 500.0 g 5.000 N	32 oz 2 lb 1,000 g 10.00 N	5 lb 2.000 Kg 20.00 N	10 lb 5.000 Kg 50.00 N	20 lb 10,00 Kg 100.0 N	50 lb 20,00 Kg 200.0 N	100 lb 50.00 Kg 500.0 N	200 lb 100 Kg 1000N
Resolution	0.01 oz 0.001 lb 0.1 g 0.001 N	0.01 oz 0.001 lb 0.1 g 0.001 N	0.01 oz 0.001 lb 1 g 0.01 N	0.001 lb 0.001 Kg 0.01 N	0.01 lb 0.001 Kg 0.01 N	0.01 lb 0.01 Kg 0.1 N	0.01 lb 0.01 Kg 0.1 N	0.1 lb 0.01 Kg 0.1 N	0.1 lb 0.1 Kg 1N
Accuracy	±0.2% F.S. @ 73°F (23°C)								
Display	4-Digit LCD, 0.5" (12 mm) high, Units 0.29" (7 mm). Reversible. Minus sign for tension								
Display Update	0.05, 0.1, 0.2, 0.3, 0.5, 1 sec								
Sampling Rate	1000 Hz								
Overload Capacity	200% of F.S. (200 lb.: 150% F.S.)								
Power	Rechargeable Ni-MH battery or universal AC adapter/charger (100 - 240 VAC, 50/60 Hz)								
Auto Power Shut-Off	Yes (not active if adapter/charge is in use)								
Battery Charge	12 hours (when fully charged)								
Recharge Time	Approximately 18 hours (when fully discharged)								
Temperature Limits	32 - 104°F (0 - 40°C)								
Dimensions	5.8 x 3 x 1.5" (147 x 75 x 38 mm)								
Product Weight	Approx. 1 lb (450 g); FGE-200XY Approx. 1.1 lb (500 g)								
Package Weight	Approx. 2.25 lb (1.02 kg) for 0.5 lb and 1 lb ranges; 2.4 lb (1.09 kg) for 2 to 100 lb ranges; 2.75 lb (1.25 kg) for 200 lb range.								
Certification	CE, RoHS								
Included Accessories	AC adapter/charger, carrying case, hook, chisel, flat head, notched head, hanger, cone head, metric to inch thread adapter, extension rod								

# **Ordering Details**

FGE-0.5XY	0.5 lb capacity digital force gauge		
FGE-1XY	1 lb capacity digital force gauge		
FGE-2XY	2 lb capacity digital force gauge		
FGE-5XY	5 lb capacity digital force gauge		
FGE-10XY	10 lb capacity digital force gauge		
FGE-20XY	20 lb capacity digital force gauge		
FGE-50XY	50 lb capacity digital force gauge		
FGE-100XY	100 lb capacity digital force gauge		
FGE-200XY	200 lb capacity digital force gauge		
NIST-FG	NIST traceable certificate of calibration for ranges from 0.5 to 100 lbs		
NIST-FG-HX	NIST traceable certificate of calibration for ranges from 200 to 1000 lbs		
FGE-PT100	100 lb capacity FGE-XY in ergonomic testing kit. Kit includes all of the standard FGE-XY accessories but comes with larger, heavy duty case and adds padded ERGO accessories, handle, and NIST traceable certificate		
FGE-PT200	200 lb capacity FGE-XY in ergonomic testing kit. Kit includes all of the standard FGE-XY accessories but comes with larger, heavy duty case and adds padded ERGO accessories. handle, and NIST traceable certificate		

DISTRI	BUT	ED	BY:	

#### Accessories

FG-M4ADP Standard adapter set with M4 threads for ranges 0.5 lb and 1 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M4CL Chisel adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4CN Cone head adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4FL Flat head adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4GV Notched head adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4HK Hook adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4RD Extension rod adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M6ADP Standard adapter set with M6 threads for ranges 2 lb to 200 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M6CL Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  FG-M6RD Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  FG	Accessories			
FG-M4CN Cone head adapter with M4 thread for ranges 0.5 lb and 1 lb. FG-M4FL Flat head adapter with M4 thread for ranges 0.5 lb and 1 lb. FG-M4GV Notched head adapter with M4 thread for ranges 0.5 lb and 1 lb. FG-M4HK Hook adapter with M4 thread for ranges 0.5 lb and 1 lb. FG-M4RD Extension rod adapter with M4 thread for ranges 0.5 lb and 1 lb. FG-M6ADP Standard adapter with M6 threads for ranges 2 lb to 200 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod FG-M6CL Chisel adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6RD Extension rod adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6RD PG-M9Y120UC Universal chager adapter for 120/240V AC FRGO-KIT Padded accesory kit for ergonomic testing	FG-M4ADP	1 lb. Includes: chisel, cone, flat head, notched head, hook,		
FG-M4FL Flat head adpater with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4GV Notched head adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4HK Hook adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4RD Extension rod adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4RD Standard adapter with M6 threads for ranges 2 lb to 200 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M6CL Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6CN Cone head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M9TL Universal chagter with M6 thread for ranges 2 lb to 200 lb.  FG-M9TL Padded accesory kit for ergonomic testing	FG-M4CL	Chisel adapter with M4 thread for ranges 0.5 lb and 1 lb.		
FG-M4GV  Notched head adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M4HK  Hook adapter with M4 thread for ranges 0.5 lb and 1 lb.  Extension rod adapter with M4 thread for ranges 0.5 lb and 1 lb.  Standard adapter with M6 threads for ranges 2.b to 200 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M6CL  Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6CN  Cone head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL  Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK  Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK  Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  Universal chaqter with M6 thread for ranges 2 lb to 200 lb.  FG-O9V120UC  Universal chaqer adapter for 120/240V AC  ERGO-KIT  Padded accesory kit for ergonomic testing	FG-M4CN	Cone head adapter with M4 thread for ranges 0.5 lb and 1 lb.		
FG-M4HK Hook adapter with M4 thread for ranges 0.5 lb and 1 lb.  Extension rod adapter with M4 thread for ranges 0.5 lb and 1 lb.  Extension rod adapter with M6 thread for ranges 0.5 lb and 1 lb.  Standard adapter set with M6 threads for ranges 2 lb to 200 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M6CL Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6CN Cone head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RW Notched head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb.  Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-09V120UC Universal chager adapter for 120/240V AC  ERGO-KIT Padded accesory kit for ergonomic testing	FG-M4FL	Flat head adpater with M4 thread for ranges 0.5 lb and 1 lb.		
FG-M4RD Extension rod adapter with M4 thread for ranges 0.5 lb and 1 lb.  FG-M6ADP Standard adapter set with M6 threads for ranges 2 lb to 200 lb. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M6CL Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6CN Cone head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6GV Notched head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-09V120UC Universal chager adapter for 120/240V AC  ERGO-KIT Padded accesory kit for ergonomic testing	FG-M4GV			
and 1 ib.  Standard adapter set with M6 threads for ranges 2 lb to 200 lb.  Ib. Includes: chisel, cone, flat head, notched head, hook, extension rod  Ge-M6CL Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6CN Cone head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL Notched head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-09V120UC Universal chager adapter for 120/240V AC  ERGO-KIT Padded accesory kit for ergonomic testing	FG-M4HK	Hook adapter with M4 thread for ranges 0.5 lb and 1 lb.		
FG-M6ADP  Ib. Includes: chisel, cone, flat head, notched head, hook, extension rod  FG-M6CL  Chisel adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6CN  Cone head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6FL  Flat head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6QV  Notched head adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6HK  Hook adapter with M6 thread for ranges 2 lb to 200 lb.  FG-M6RD  Extension rod adapter with M6 thread for ranges 2 lb to 200 lb.  FG-09V120UC  Universal chager adapter for 120/240V AC  ERGO-KIT  Padded accesory kit for ergonomic testing	FG-M4RD			
FG-M6CN Cone head adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6FL Flat head adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6GV Notched head adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6HK Hook adapter with M6 thread for ranges 2 lb to 200 lb. FG-M6RD Extension rod adapter with M6 thread for ranges 2 lb to 200 lb. FG-09V120UC Universal chager adapter for 120/240V AC ERGO-KIT Padded accesory kit for ergonomic testing	FG-M6ADP	lb. Includes: chisel, cone, flat head, notched head, hook,		
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FG-9W120UC Universal chager adapter for 120/240V AC  ERGO-KIT Padded accesory kit for ergonomic testing	FG-M6HK	Hook adapter with M6 thread for ranges 2 lb to 200 lb.		
ERGO-KIT Padded accesory kit for ergonomic testing	FG-M6RD			
	FG-09V120UC	Universal chager adapter for 120/240V AC		
FG-HANDLE Handle adapter for larger loads	ERGO-KIT	Padded accesory kit for ergonomic testing		
	FG-HANDLE	Handle adapter for larger loads		



