



# FLASH 25

## FLASH Series

Larson Systems redesigned the FLASH 25 from the ground up alongside its big brother, the FLASH 48. The 25 has a standard platform diameter of 12" and is capable of being outfitted with any of our Quick Change Load Cells, for an extremely versatile load capacity range from 2 lb to 15,000 lb. The FLASH 25 redesign has seen the addition of a variety of other optional features, like a light curtain guard for additional safety or a center length transducer for very accurate testing of small deflection, high-rate parts, like Belleville washers or wave springs.

### Standard Features:

- Compression & extension testing of force & length
- Adjustable travel / test speed
- Full color LCD touch screen FLASH interface
- Integrated Windows 7
- Up to 15,000 lb. capacity
- Smart load cells (choose from 6 FLASH 25 cells)
- Compatible with Quick Change Load Cells
- 240 volt Whisper Servo Drive
- NIST traceable digital calibration

### Mechanical Features:

- 4 preloaded / pretensioned ball screws
- Rigid preloaded linear bearings
- 12" Ø platforms
- 3 load cell platform for maximum off center loading
- Pneumatic thru-rod option with up to 6" Ø thru-rod
- Optional center length transducer

### Connectivity Features:

- Ethernet port for network data management
- USB for easy printing & software updates
- RS 232 & automation interfaces
- Remote support / diagnostic capability
- VGA output / remote start & operation capability

### Safety Features:

- Easy access to emergency stop button
- On-screen test abort button
- Fully interlocked enclosure
- Polycarbonate shields
- Thru-rod option for buckling springs
- Mechanical overload stops
- Software length & force limits
- Light curtain guard option

### Center Length Transducer

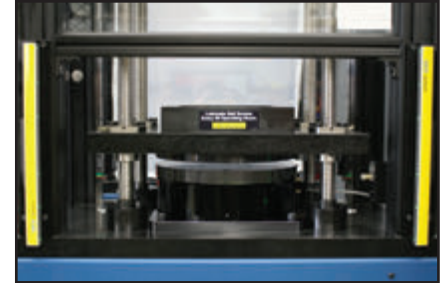
The Center Length Transducer is an optional secondary encoder used on the FLASH 25 to test small deflection, high-rate springs, like Belleville Washers or wave springs. When activated, the tester will switch over to this encoder to measure length for parts that are shorter than 0.850 inches, giving extremely accurate readings for small deflection parts with high spring rates.



*Pictured with optional light curtain guard for operator safety.*

### Light Curtain Guard Option

The perfect safety option for fast, repeated testing of small non-buckling parts that have no danger of being ejected from the tester, like Belleville Washers or wave springs. If something trips the Light Curtain Guard (the vertical yellow bars with green LED's in the photo) the upper platform's travel stops immediately and the user is required to reset from error via the touch screen, then restart the test. With a force capacity of up to 15,000 lb, keeping operators' hands away from pinch points is paramount on the FLASH 25. The optional Light Curtain Guard replaces the standard swinging polycarbonate door on the front of the tester.



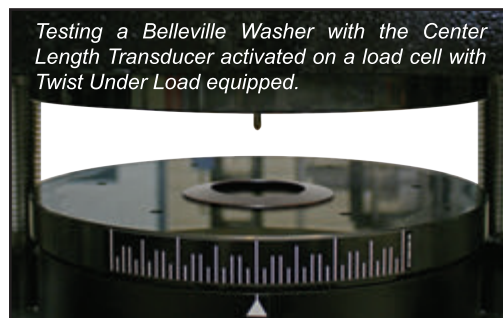
*Platform travel stops in milliseconds when the light curtain guard is tripped.*

### Quick Change Load Cells

The FLASH 25 is compatible with our Quick Change Load Cells, giving it a very versatile load capacity range. Test very low rate parts with a 2 lb load cell, then switch to a 2,000 lb cell for heavier loads. Quick Change Load Cells can be swapped very quickly, giving the FLASH 25 the ability to test a wide variety of parts with minimal set up time.



*Note: Pictured with a 4" Ø platform. FLASH 25 Quick Change Load Cells have an 8" Ø platform.*



*Testing a Belleville Washer with the Center Length Transducer activated on a load cell with Twist Under Load equipped.*



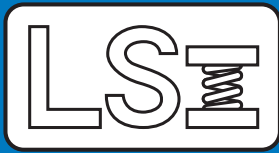
*Center length transducer clamp in the retracted position (left) and extended position (right).*



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## FLASH 25 Force Specifications

FLASH 25 Load Cells - Force Specifications				Quick Change Load Cells - Force Specifications			
Part No.	Capacity	Resolution		Part No.	Capacity	Resolution	
		0-20% FS	20-100% FS			0-20% FS	20-100% FS
<b>FLASH 25 - 500 lb</b> 025-0000-0262-03 (TUL) 025-0000-0262-16	<b>500 lb</b>	<b>0.02 lb</b>	<b>0.2 lb</b>	<b>QC Cell - 2 lb</b> 025-0000-0814-00	<b>2 lb</b>	<b>0.0001 lb</b>	<b>0.001 lb</b>
	227 kg	0.01 kg	0.1 kg		907 g	0.02 g	0.2 g
	2,224 N	0.1 N	1 N		8.9 N	0.0002 N	0.002 N
<b>FLASH 25 - 1,000 lb</b> 025-0000-0262-02 (TUL) 025-0000-0262-14	<b>1,000 lb</b>	<b>0.02 lb</b>	<b>0.2 lb</b>	<b>QC Cell - 11 lb</b> 025-0000-0814-01	<b>11 lb</b>	<b>0.0002 lb</b>	<b>0.002 lb</b>
	454 kg	0.01 kg	0.1 kg		5 kg	0.1 kg	1 g
	4,448 N	0.1 N	1 N		49 N	0.001 N	0.01 N
<b>FLASH 25 - 2,000 lb</b> 025-0000-0262-01 (TUL) 025-0000-0262-15	<b>2,000 lb</b>	<b>0.05 lb</b>	<b>0.5 lb</b>	<b>QC Cell - 22 lb</b> 025-0000-0814-02	<b>22 lb</b>	<b>0.05 lb</b>	<b>0.5 lb</b>
	907 kg	0.02 kg	0.2 kg		10 kg	0.2 kg	2 g
	8,896 N	0.2 N	2 N		98 N	0.002 N	0.02 N
<b>FLASH 25 - 3,000 lb</b> 025-0000-0262-00 (TUL) 025-0000-0262-10	<b>3,000 lb</b>	<b>0.1 lb</b>	<b>1 lb</b>	<b>QC Cell - 66 lb</b> 025-0000-0814-03	<b>66 lb</b>	<b>0.001 lb</b>	<b>0.01 lb</b>
	1,361 kg	0.05 kg	0.5 kg		30 kg	0.5 kg	5 g
	13,345 N	0.5 N	5 N		294 N	0.005 N	0.05 N
<b>FLASH 25 - 6,000 lb</b> 025-0000-0262-06 (TUL) 025-0000-0262-11	<b>6,000 lb</b>	<b>0.2 lb</b>	<b>2 lb</b>	<b>QC Cell - 110 lb</b> 025-0000-0814-04	<b>110 lb</b>	<b>0.002 lb</b>	<b>0.02 lb</b>
	2,722 kg	0.1 kg	1 kg		50 kg	0.001 kg	0.01 kg
	26,690 N	1 N	10 N		489 N	0.01 N	0.1 N
<b>FLASH 25 - 10,000 lb</b> 025-0000-0262-07 (TUL) 025-0000-0262-12	<b>10,000 lb</b>	<b>0.2 lb</b>	<b>2 lb</b>	<b>QC Cell - 200 lb</b> 025-0000-0814-05	<b>200 lb</b>	<b>0.005 lb</b>	<b>0.05 lb</b>
	4,536 kg	0.1 kg	1 kg		91 kg	0.002 kg	0.02 kg
	44,482 N	1 N	10 N		890 N	0.02 N	0.2 N
<b>FLASH 25 - 15,000 lb</b> 025-0000-0262-09 (TUL) 025-0000-0262-17	<b>15,000 lb</b>	<b>0.5 lb</b>	<b>5 lb</b>	<b>QC Cell - 550 lb</b> 025-0000-0814-08	<b>550 lb</b>	<b>0.01 lb</b>	<b>0.1 lb</b>
	6,804 kg	0.2 kg	2 kg		249 kg	0.005 kg	0.05 kg
	66,723 N	2 N	20 N		2,447 N	0.05 N	1 N

Accuracy = ± Full Scale Resolution x 2

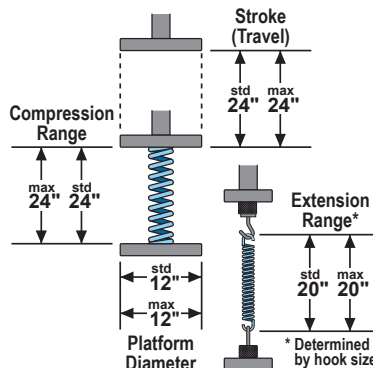
<b>QC Cell - 750 lb</b> 025-0000-0814-09	<b>750 lb</b>	<b>0.02 lb</b>	<b>0.2 lb</b>
	340 kg	0.01 kg	0.1 kg
	3,336 N	0.1 N	1 N
<b>QC Cell - 1,000 lb</b> 025-0000-0814-10	<b>1,000 lb</b>	<b>0.02 lb</b>	<b>0.2 lb</b>
	454 kg	0.01 kg	0.1 kg
	4,448 N	0.1 N	1 N
<b>QC Cell - 1,500 lb</b> 025-0000-0814-11	<b>1,500 lb</b>	<b>0.1 lb</b>	<b>1 lb</b>
	680 kg	0.05 kg	0.5 kg
	6,672 N	0.5 N	5 N
<b>QC Cell - 2,000 lb</b> 025-0000-0814-12	<b>2,000 lb</b>	<b>0.1 lb</b>	<b>1 lb</b>
	907 kg	0.05 kg	0.5 kg
	8,896 N	0.5 N	5 N

Accuracy = ± Full Scale Resolution x 2

## FLASH 25 Length Specifications

FLASH 25 - Length Specifications			
Standard Resolution		High Resolution*	
Resolution	Accuracy (±)	Resolution	Accuracy (±)
0.0005 in	0.001 in	0.0001 in	0.0005 in
0.01 mm	0.02 mm	0.001 mm	0.01 mm

\*Requires 025-1000-0234-02



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