

Precision, **Quality**, Innovation

# PRECISION TOOLS



**Electronic** Micrometers

Inside Micrometer **Sets** 

Depth Micrometers

**Dial Bore** Gauges

**Indicators** 

Indicator **Stands** 



# PRECISION, QUALITY, INNOVATION

Welcome to our new edition, Catalogue 33.1. We remain as dedicated today to the making of great tools for our customers as we were when L.S. Starrett founded the company in 1880. He created a business and a brand that has become synonymous with precision, quality and innovation, backed by unmatched service and support.

We accomplish this by offering application-designed precision tools, saws, and custom solutions that optimise job and process performance. Our confidence hinges on over 130 years of experience focusing on your needs and your success. We take great pride in manufacturing long-lasting, easy-to-use tools that provide consistent and reliable performance.

Today, Starrett offers five product categories: Precision Measurement Tools, Metrology Equipment, Granite-based Engineered Solutions, Saw Blades, and Jobsite and Shop Tools.

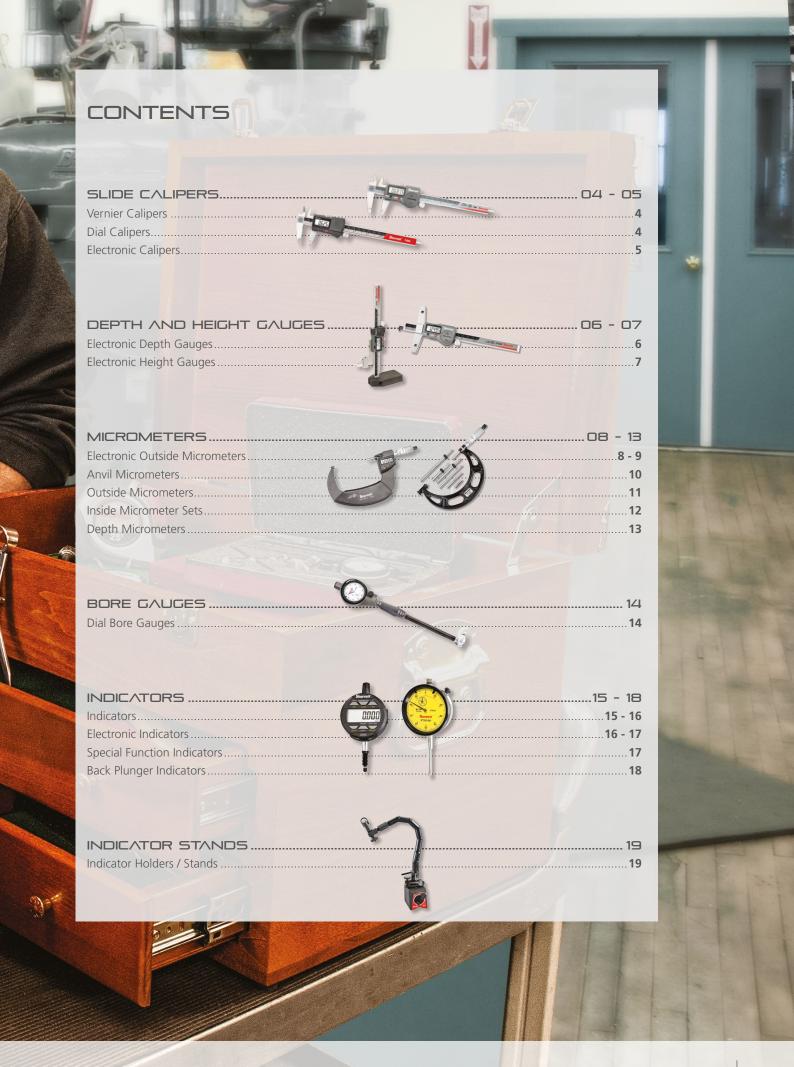
Whether you need to modify a standard tool, require assistance in selecting the best saw blade for your cutting application, or desire a custom solution for your business, we have the breadth of knowledge to assist you.

We are committed to providing you with complete solutions created for your exact needs. Problem solving is part of what we do every day. If the right tool for your application does not exist, contact us – we would appreciate the opportunity to build it.

D.A. Storett

President and CEO





#### VERNIER CALIPERS

#### 125

#### VERNIER CALIPERS

High quality, basic vernier caliper that offers inch and metric measurement

- Standard: DIN 862
- Measure outside diameter, inside diameter, depth and step
- Stainless steel hardened, ground and lapped measuring surfaces
- Lock screw for sliding jaw

Cat No	Range	Graduation
125MB-150	150mm / 6"	0.05mm / 1/128"
125MB-200	200mm / 8"	0.05mm / 1/128"
125MB-300	300mm / 12"	0.05mm / 1/128"
125MA-150	150mm / 6"	0.02mm / 0.001"
125MA-200	200mm / 8"	0.02mm / 0.001"
125MA-300	300mm / 12"	0.02mm / 0.001"





#### DIAL CALIPERS

#### 3202

#### DIAL CALIPERS

With the ability to provide quick, accurate measurement of outside diameter, inside diameter, thickness and depth, the dial caliper is the most versatile precision measuring tool used in industry today.

- Standard: DIN 862
- Smooth sliding, anti shock new design dial movement
- Hardened stainless steel bar, measuring surfaces, rack, gears and depth bar
- Lock screws for dial bezel and for holding the sliding jaw in position
- Thumb-operated fine adjustment roll
- Positive split gear anti-backlash control

Cat No	Range	Resolution
3202M-150	150mm	0.02mm
3202M-200	200mm	0.02mm
3202M-300	300mm	0.02mm





#### ELECTRONIC CALIPERS

#### EC799 & 799

#### ELECTRONIC CALIPERS



The 799 Electronic Caliper is light, comfortable and easy-to-use, with a slim, streamlined profile and a large, LCD display.

- Standard: DIN 862
- High quality guide surfaces for smooth slider movement
- Hardened stainless steel measuring surfaces
- Fine adjustment thumb wheel
- Lock screw for sliding jaw
- Metric / inch conversion
- Zero set at any position
- Manual / auto off after 30 minutes of non use

Cat No	Range	Resolution
EC799A-6/150	150mm / 6"	0.01mm / 0.0005"
EC799A-8/200	200mm / 8"	0.01mm / 0.0005"
EC799A-12/300	300mm / 12"	0.01mm / 0.0005"
799AZ-24/600	600mm / 24"	0.01mm / 0.0005"
799AZ-40/1000	1000mm / 40"	0.01mm / 0.0005"
PT99492	3 Volt Battery, CR2032	
PT22431	Depth Attachment	

#### 798

#### IP67 ELECTRONIC CALIPERS

The 798 Electronic Caliper features a large, easy-to-read, high contrast LCD readout. Its induction type linear encoder system includes IP67 protection against coolants, water, chips, dust and dirt often found in machine shop environments.

- Standard: DIN 862
- High quality guide surfaces for smooth slider movement
- Hardened stainless steel measuring surfaces
- Fine adjustment thumb wheel
- Lock screw for sliding jaw
- Metric / inch conversion
- Zero set at any position
- Memory retention of last display setting
- Data output on 798B series
- Manual / auto off after 30 minutes of non use



Cat No.		Range	Resolution
798A-6/150		150mm / 6"	0.01mm / 0.0005"
798A-8/200		200mm / 8"	0.01mm / 0.0005"
798A	-12/300	300mm / 12"	0.01mm / 0.0005"
but	798B-6/150	150mm / 6"	0.01mm / 0.0005"
a Output	798B-8/200	200mm / 8"	0.01mm / 0.0005"
Data	798B-12/300	300mm / 12"	0.01mm / 0.0005"
PT99492		3 Volt Battery, CR2032, (2 Required)	
PT22431		Depth Attachment	



#### ELECTRONIC DEPTH GAUGES

#### 3753A

#### ELECTRONIC DEPTH GAUGES

The 3753A Electronic depth gauge is a versatile, easy to use tool for measuring depth, slot widths and positions and lengths.

- Standard: Starrett factory specification
- Hardened stainless steel measuring surfaces
- Fine adjustment thumb wheel
- Lock screw for sliding base
- Hardened base measures 100mm (3-15/16"), with optional base extensions of 180mm (7-1/8"), 260mm (10-1/4") and 320mm (12-5/8")
- A hook attachment is supplied with the gauge, making it possible to take readings from the edge of slots, grooves and shoulders. The hook is removable if required
- Metric / inch conversion
- Zero set at any position
- Manual / auto off after 15 minutes of non use

3753A-6/150
3648-180 base extension

Cat No	Range	Resolution	Accuracy
3753A-6/150	150mm / 6"	0.01mm / 0.0005"	±0.03mm
3753A-8/200	200mm / 8"	0.01mm / 0.0005"	±0.03mm
3753A-12/300	300mm / 12"	0.01mm / 0.0005"	±0.03mm
3648-180	180mm base extension fo	or 3753A and 3753B	
3648-260	260mm base extension fo	or 3753A and 3753B	
3648-320	320mm base extension fo	or 3753A and 3753B	
PT99492	3 Volts battery CR2032		

#### 3753B

#### IP67 ELECTRONIC DEPTH GAUGES

The 3753B Electronic Depth Gauge features a large, easy-to-read, high contrast LCD readout. Its induction type linear encoder system includes IP67 protection against coolants, water, chips, dust and dirt often found in machine shop environments.

- Standard: Starrett factory specification
- Hardened stainless steel measuring surfaces
- Fine adjustment thumb wheel
- Lock screw for sliding base
- Hardened base measures 100mm (3-15/16"), with optional base extensions of 180mm (7-1/8"), 260mm (10-1/4") and 320mm (12-5/8"). Base extensions are as listed under 3753A above
- A hook attachment is supplied with the gauge, making it possible to take readings from the edge of slots, grooves and shoulders. The hook is removable if required
- Metric / inch conversion
- Zero set at any position
- Data output on 3753B series
- Manual / auto off after 30 minutes of non use



3753B-6/150



#### ELECTRONIC HEIGHT GAUGES

#### 3751

#### ELECTRONIC HEIGHT GAUGE

This height gauge is light, portable and easy to use for vertical measurements within its range.

- Standard: Starrett factory specification
- Hardened stainless steel measuring surfaces
- Fine adjustment thumb roll for precision measurement
- Lock screw for setting fixed height position
- Hardened, ground, and lapped base with finger grooves provides ease of movement
- Scriber can reference zero from the bottom of the base to get full 150mm usable range
- Depth attachment (PT08680A) available for measuring of depth of holes, slots and recesses
- Metric / inch conversion
- Zero set at any position
- Manual / auto off after 5 mins of non use

Cat No	Range	Resolution	Accuracy
3751AZ-6/150	150mm/6"	0.01mm/0.0005"	±0.02mm
PT08680A	Depth attachment f	or 150mm height gau	ge
PT99492	3 Volt battery CR2032		



3752-12/300



## 3752 ELECTRONIC HEIGHT GAUGES

The 3752 Electronic Height Gauge is a full featured, versatile and economic solution for most height measurement applications.

- Standard: Starrett factory specification
- Large positive action key pad
- Hardened stainless steel measuring surfaces
- Carrier and scriber designed to read from zero
- Metric / Inch conversion
- Zero set at any position
- Ability to retain and return to the true zero position
- Preset button to install any reading at any position
- "Hold" control feature retains a reading
- Plus or minus button to toggle polarity direction
- Minimum and maximum tolerance limits presetable
- Data output for 3752 series
- Manual / auto off after 30 mins of non use

Cat No	Range	Resolution	Accuracy
3752-12/300	0-300mm / 0-12"	0.01mm / 0.0005"	±0.04mm – 0-450mm
3752-24/600	0-600mm / 0-24"	0.01mm / 0.0005"	±0.05mm – 450mm-600mm
PT61120	3 Volt Battery CR24	50 (2 required)	

#### ELECTRONIC OUTSIDE MICROMETERS

#### 3732

#### ELECTRONIC OUTSIDE MICROMETERS

The 3732 Electronic Outside Micrometers are built with customary Starrett quality and workmanship, including a large, easy to ready, high contrast LCD digital display.

- Standard: DIN 863
- Tungsten carbide measuring faces
- Starrett satin chrome finish for reduced glare and increased resistance to rust
- Ratchet controller giving uniform pressure and consistent measurements
- mm graduation on shell and thimble with 6.35mm spindle diameter
- Ring type locking nut for quick and sure locking
- Hardened one-piece spindle
- Measurement HOLD button
- PRESET button to install any reading at any position
- Metric / Inch conversion
- Zero set at any position
- Data output for 733 series
- Manual / Auto off after 30 minutes of non-use
- Complete with setting standard

Cat No	Range	Resolution
3732MEXFL-25	0-25mm / 0-1"	0.001mm / 0.00005"
3732MEXFL-50	25-50mm / 1-2"	0.001mm / 0.00005"
3732MEXFL-75	50-75mm / 2-3"	0.001mm / 0.00005"
3732MEXFL-100	75-100mm / 3-4"	0.001mm / 0.00005"
PT99492	3 Volt battery, CR2032	







#### ELECTRONIC OUTSIDE MICROMETERS

#### 795 & 796

IP67 ELECTRONIC OUTSIDE MICROMETERS

Starrett 796 and 795 IP67 Electronic Outside Micrometers feature a large, easy to ready, high contrast LCD digital display. IP67 protection makes them suitable for use in workshop conditions exposed to coolant, water, dust, or oil.

- Standard: DIN 863
- Tungsten carbide measuring faces
- Starrett satin chrome finish for reduced glare and increased resistance to rust
- Ratchet controller giving uniform pressure and consistent measurements
- mm graduation on shell and thimble,6.35mm spindle diameter
- Ring type locking nut for quick and sure locking
- Hardened one-piece spindle
- Measurement HOLD button
- PRESET button to install any reading at any position
- Metric / Inch conversion
- Zero set at any position
- Data output for 795 series
- Manual / Auto off after 30 minutes of non-use
- Complete with setting standard

Cat I	No	Range	Resolution
Ħ	795MEXFL-25	0-25mm / 0-1"	0.001mm / 0.00005"
Output	795MEXFL-50	25-50mm / 1-2"	0.001mm / 0.00005"
Data (	795MEXFL-75	50-75mm / 2-3"	0.001mm / 0.00005"
	795MEXFL-100	75-100mm / 3-4"	0.001mm / 0.00005"
	796MXFL-25	0-25mm / 0-1"	0.001mm / 0.00005"
PT99492		3 Volt battery, CR2032	







#### IP PROTECTION

An IP number is composed of two numbers, the first referring to protection against solid objects and the second against liquids.

First number 6: Totally protected against dust

**Second number 7:** Protection against submersion in water under standardised conditions of pressure for 30 minutes.

All 795 and 796 Micrometers include IP67 protection

#### **ANVIL MICROMETERS**

#### 224

#### INTERCHANGEABLE ANVIL MICROMETERS

Each micrometer is equipped with a series of easily interchangeable anvils, thus providing the full range in steps of 25mm. This makes 244 series micrometers very popular in machine or automotive repair shops.

- Standard: DIN 863
- Starrett satin chrome finish for reduced glare and increased resistance to rust
- Advanced sleeve design with staggered lines and distinct figures for easy readability
- Balanced frame and thimble design ensure easy handling
- Ratchet controller giving uniform pressure and consistent measurements
- Ring type lock nut for quick and sure locking
- Hardened one-piece spindle
- Rigid and stable special cast iron frame with appropriate perforations for lightness and ribbed for strength and stability
- Spindle diameter of 7.62mm
- Complete with setting standard



Cat No	Range	Resolution	Standards
224MAARLZ	0-100mm	0.01mm	25,50,75mm
224MARLZ	50-150mm	0.01mm	50,75,100,125mm
224MGRLZ	150-300mm	0.01mm	150,175,200,225,250,275mm
224MDRLZ	300-400mm	0.01mm	300,325, 350,375mm
224MERLZ	400-500mm	0.01mm	400,425,450,475mm
224MJRLZ	500-600mm	0.01mm	500,525,550,575mm





#### **OUTSIDE MICROMETERS**

#### 436

#### **OUTSIDE MICROMETERS**

Precision micrometers used by skilled workmen worldwide. They are accurate, rugged and easy to use

- Standard: DIN 863
- Tungsten carbide measuring faces
- Starrett satin chrome finish for reduced glare and increased resistance to rust
- Advanced sleeve design with staggered lines and distinct figures for easy readability
- Balanced frame and thimble design ensure easy handling
- Ratchet controller giving uniform pressure and consistent measurements.
- Ring type lock nut for quick and sure locking
- Hardened one-piece spindle
- Spindle diameter of 6.35mm / .250"
- Complete with standard for 0-150mm / 0-6" individual micrometers



Cat No	Range	Resolution
436.2MXRL-25	0-25mm	0.01mm
436.1MXRL-50	25-50mm	0.01mm
436.1MXRL-75	50-75mm	0.01mm
436.1MXRL-100	75-100mm	0.01mm
436.1MXRL-125	100-125mm	0.01mm
436.1MXRL-150	125-150mm	0.01mm
V436.2MXRL-25	0-25mm	0.001mm
V436.1MXRL-50	25-50mm	0.001mm
V436.1MXRL-75	50-75mm	0.001mm
V436.1MXRL-100	75-100mm	0.001mm



Cat No	Range	Resolution
436.1XRL-1	0-1"	0.001"
436.1XRL-2	1-2"	0.001"
436.1XRL-3	2-3"	0.001"
436.1XRL-4	3-4"	0.001"
436.1XRL-5	4-5"	0.001"
436.1XRL-6	5-6"	0.001"
T436.1XRL-1	0-1"	0.0001"
T436.1XRL-2	1-2"	0.0001"
T436.1XRL-3	2-3"	0.0001"
T436.1XRL-4	3-4"	0.0001"

#### 436

### OUTSIDE MICROMETER SETS WITH STANDARDS

Recommended for mechanics, automotive service and machine shops, toolrooms, inspection departments and wherever gauging involves a wide range of measurements. All sets come with attractive, protective cases which keep micrometers and setting standards together, and readily accessible

Cat No	Range	Resolution
S436.2MCXRLZ	0-150mm	0.01mm

Cat No	Range	Resolution
S436.1CXRLZ-1	0-6"	0.001"



#### INSIDE MICROMETER SETS

#### 124

#### SOLID-ROD INSIDE MICROMETER SETS

124 series are the most popular solid rod inside micrometer sets because of their lightness, ease of use, and range. They are useful for measuring inside diameters of cylinders and rings, measuring parallel surface, etc.

- Standard: DIN 863
- The desired range is obtained by assembling rods and spacing collars to the micrometer head
- Rod diameters are approx. 6mm on the A and B sizes, and approx. 8.5mm on the C size
- Measuring rods are solid and assembled on one side of the micrometer head
- Insulated rods marked with length
- Convenient handle is available to provide reach for use in deep holes. Handle screws into the micrometer head in place of the dummy screw, which is opposite a rod lock screw. Distance from the end of the handle to the centre line is 158mm

Cat No	Range	Resolution	Screw Movement	Measuring Rod	Spacing Collars
124MAZ	50-200mm	0.01mm	13mm	6	1 x 12mm
124MBZ	50-300mm	0.01mm	13mm	10	1 x 12mm
124MCZ	200-800mm	0.01mm	25mm	4	1 x 25mm and 2x50mm





#### 823

#### TUBULAR INSIDE MICROMETER SETS

The 823 micrometer is a highly useful tool for internal linear measurements such as measuring cylinders, rings, setting calipers, comparing gauges and measuring parallel surfaces.

- Standard: DIN 863
- Rod diameter is approx. 9.5mm
- Each rod is marked with length
- Interchangeable anvils on both 13mm and 25mm heads
- Lock nut furnished on 25mm heads
- 140mm length, convenient handle furnished on A and B micrometers may be clamped where it will provide correct balance and reach

Cat No	Range	Resolution	Screw Movement	Measuring Rod	Handle
823MAZ	40-200mm	0.01mm	13mm	6	Yes
823MBZ	40-300mm	0.01mm	13mm	8	Yes
823MEZ	100-1000mm	0.01mm	25mm	10	-





#### DEPTH MICROMETERS

#### 445M

#### **DEPTH MICROMETERS**

- The depths of holes, slots, shoulders and projections can be measured to 0.01mm with these tools
- Combination ratchet and speeder for uniform pressure and quicker adjustment
- Ring-type lock nut for quick and sure locking

Range	Base	Rods	Rod Dia.	Cat. No.
0-75mm	100mm	3		445MBZ-75RL
0-150mm		6	4mm	445MBZ-150RL
0-225mm		9		445MBZ-225RL

Millimetre Reading Rods Only				
Size	Fits 445M Models			
3126	Part No.			
0-25mm	PT99371			
25-50mm	PT99372			
50-75mm	PT99373			
75-100mm	PT99374			
100-125mm	PT99375			
125-150mm	PT99376			
150-175mm	PT99377			
175-200mm	PT99378			
200-225mm	PT99379			
Longer rods available by special order.				



#### 449M

#### MICROMETER DEPTH GAUGES WITH NON-ROTATING BLADES

By holding the base in one hand, the 1.2 x 3.2mm blade can be turned with the fingers and positioned at any angle relative to the base. In operation, blade does not turn, but moves perpendicularly only, permitting depth measurement of narrow shoulders without the blade rolling off. This is also ideal for slots and recesses as narrow as 1.2mm. Furnished with a 100mm base.

Available with three rods for measuring 0-75mm, or six rods for measuring 0-150mm in 0.01mm.

This tool comes with the combination ratchet and speeder for uniform pressure and quicker adjustment.





445MBZ-75RL



Range	Base	Rods	Rod Dia.	Cat. No.
0-75mm	100	3	1.2 x	449MBZ-75R
0-150mm	- 100mm	6	3.2mm	449MBZ-150R

Millimetre Reading Rods Only					
Size	Fits 449M Models				
3126	Part No.				
0-25mm	PT99306				
25-50mm	PT99307				
50-75mm	PT99308				
75-100mm	PT99309				
100-125mm	PT99310				
125-150mm	PT99311				
Longer rods available by special order.					

#### DIAL BORE GAUGES

#### 3089

#### DIAL BORE GAUGES

- Standard: Starrett factory specification
- Ergonomic design, non slip grip and dial gauge protection shroud
- Tungsten carbide measuring faces
- Two point contact able to measure diameter, ovality and taper
- All anvils laser marked for easy selection



3089M-181-50J

Cat No	Range	Resolution	Repeatability	Contacts	Spacers	Extension
3089M-181-10J	6-10mm	0.01mm	±0.01mm	9	-	-
3089M-181-18J	10-18mm	0.01mm	±0.01mm	9	1	-
3089M-181-35J	18-35mm	0.01mm	±0.01mm	9	2	-
3089M-181-50J	35-50mm	0.01mm	±0.01mm	4	4	-
3089M-181-160J	50-160mm	0.01mm	±0.01mm	12	4	1 x 55mm
3089M-181-250J	160-250mm	0.01mm	±0.01mm	5	5	1 x 50mm
3089M-181-450J	250-450mm	0.01mm	±0.01mm	5	5	1 x 50mm, 1 x 100mm

Extensions are available for bore gauges with range greater than 35mm. Extension sizes: 250mm, 500mm, 1000mm, 1500mm and 2000mm.



#### **INDICATORS**

#### 3808, 3809 & 3909

#### MECHANICAL TEST INDICATORS

- Standard: DIN 2270
- Precision gear driven design with smooth, jewelled movement
- Frictionally adjustable contact point reverses automatically, always maintaining clockwise hand specification
- All items with cat no. ending 'A' are supplied with 9.5mm and 4mm dovetail clamps – two attachments
- All items with cat no ending 'AC' are supplied with 9.5mm and 4mm dovetail clamps, 4mm swivel post holder, tool post holder, universal snug and post assembly – six attachments





Cat No	Range	Resolution	Dial Reading	Dial Face
3809MA	0.8mm	0.01mm	0-40-0	40mm
3809MAC	0.8mm	0.01mm	0-40-0	40mm
3909MA	0.8mm	0.01mm	0-40-0	32mm
3909MAC	0.8mm	0.01mm	0-40-0	32mm
3808MA	0.2mm	0.002mm	0-100-0	40mm
3808MAC	0.2mm	0.002mm	0-100-0	40mm





#### **INDICATORS**

#### 3081 & 3025

#### MECHANICAL DIAL INDICATORS

- Standard: DIN 878
- Precision gears and pinions
- Upper protective cap on measuring spindle
- Adjustable tolerance markers and bezel lock

Cat No I	Range	Resolution	Stem Dia	Dial Reading	Dial Face
3081-481/5	5mm	0.01mm	8mm	0-100	43mm
3025-481/5	5mm	0.01mm	8mm	0-100	57mm
3025-481	10mm	0.01mm	8mm	0-100	57mm
3025-681	20mm	0.01mm	8mm	0-100	57mm
3025-257J	1mm	0.001mm	8mm	0-200	57mm



#### ELECTRONIC INDICATORS

#### 2900

#### IP67 ELECTRONIC INDICATORS

- Standard: Starrett factory specification
- Plus or minus travel direction
- Metric / Inch conversion
- Zero at any spindle position
- Selectable resolution models available.
- Data output for 2900 series
- IP67 protection
- Manual / auto off after 10 minutes of non use

Cat No		Range	Accuracy	
Data Output	2900-1ME	12mm / 0.5"	±0.003mm	
	2900-4ME	12mm / 0.5"	±0.003mm	
	2900-6ME	12mm / 0.5"	±0.003mm	
PT99492		3 Volt Battery, CR2032 (2 required)		

Fun	actions	2900-1ME	2900-4ME	2900-6ME
ution	0.001mm / 0.00005"	X		
	0.01mm / 0.001mm / 0.0005" / 0.0001" / 0.00005"		X	X
Resolution	0.02mm/0.01mm/0.0002mm/0.0001mm/0.001"/0.0005"/0.0001"/0.0005"			
4	0.02mm / 0.01mm / 0.002mm / 0.001" / 0.0005" / 0.0001"			
Origin set, Zero Set		X	X	X
Counting Direction Switching (±)		X	Χ	X
SPC Output		X	X	X
Limit Set			X	X
Valu	ue Preset		Χ	X
Rea	ding Hold		X	X
Feature lock			X	X
Max/Min/Runout Value Holding			X	Χ
TIR Runout Value Holding				X
IP67 Protection		X	Χ	X
True	True Absolution Sensor Tech		Χ	Χ
Programmable Ratio				
Lug	Lug on Centre		X	

# An IP number is composed of two numbers, the first referring to protection against solid objects and the second against liquids. First number 6: Totally protected against dust Second number 7: Protection against submersion in water under standardized conditions of pressure for 30 minutes



#### ELECTRONIC INDICATORS

#### 3600

#### ELECTRONIC INDICATORS

The 3600 Electronic Indicators have simple, powerful, easy-to-use functions, all at an attractive price. Versions are available for inch/metric and metric only.

- Large, easy-to-read LCD
- Range: .500" or 12.7mm
- Resolution: .0005" or .01mm
- Power On/Off button
- Reverse travel (± control indicates direction)
- Zero setting at any position
- Long battery life
- 3/8" diameter stem for inch/mm model (8mm on metric-only model)
- 4-48 spindle thread on inch/mm model (M2.5 X .45 thread on metric-only model)
- Lug-on-centre back with additional flat back
- Dust cap
- Plastic storage case with clear cover



Inch/mm					
Range		Resolutio	n		
Inch	mm	Inch	mm	Cat. No.	
.500	12.7	.0005	0.01	3600-5	
Metric-Only					
	12.7		0.01	3600M-5	
Accessory					
Description	1			Cat. No.	
SR44 Batte	ry			PT61918	

#### SPECIAL FUNCTION INDICATORS

#### 3015

#### PORTABLE DIAL THICKNESS GAUGES

- Standard: Starrett factory specification
- Lever to lift upper measuring spindle
- With flat measuring surface





#### BACK PLUNGER INDICATORS

#### 196

#### UNIVERSAL BACK PLUNGER DIAL INDICATORS

- Standard: Starrett factory specification
- Smooth and accurate operation
- Shank diameter is 6.3mm / 1/4"

Cat No	Range	Resolution	Accuracy	Dial Reading	Contents
196MA1Z	5mm	0.02mm	±0.02mm/ ±0.001" (one graduation) anywhere on dial	0-100	1,2,3,4,A,B,C,G in case

Cat No	Description	Ref No
196MR	Adapter (mm thread)	1
196R	Adapter (4-48 thread)	2
PT05471	Hardness steel contact point	3
PT05472	Hardness steel contact point	4









PT05472



#### **ATTACHMENTS**

A. Clamp PT99437 With a 33mm / 1-5/16" flat or round capacity – 8mm / 5/16" post (PT03709-1/2) used with PT18718 Snug

196MB1

- B. Tool Post Holder PT99438 9.5 x 19 x 150mm / 3/8" x 3/4" x 6" with upright spindle (PT03820-0) 8 dia. x 114mm length / 5/16" x 4-1/2". Use with PT18718 Snug
- C. Snug Complete PT18718. Post hole has an 8mm / 5/16" diameter and 2.4 - 6.3 mm / 3/32-1/4" holding capacity. Can be used on our 252 Height Transfer Gauge, 57 and 257A and B Surface Gauges, on 657A Magnetic Base and Swivel Post Assembly
- G. Hole Attachment 196F. allows indicator be used over obstructions and inside holes to a depth of approximately 40mm / 1-5/8"

#### INDICATOR HOLDERS / STANDS

- The compact and versatile 660 magnetic base indicator holder has 3 adjustable pivots controlled by a single knob for fast, easy indicator positioning
- The 661 mini magnetic tool holder is a simple, versatile, effective and economical tool for a verity of indicator holder task
- The rigid design **3657AA** magnetic base indicator holder has a support arm with one joint and with fine adjustment
- The 3657MTW flex-o-post indicator holder with magnetic base is an assembly of short tubular steel sections and precision ball joints, linked by an internal steel cable. It can be adjusted to any position and locked by turning a level near the magnetic base
- The 3206 outside micrometer stand converts an outside micrometer to a study bench gauge for batch inspection of small parts. The ball joint construction allows the head to be positioned as much as 30° off perpendicular in any direction.







Cat No	Description	Dimension
660M	Magnetic stand with articulating arm, 8mm stem hole. 320N holding force	36 x 30 x 35mm Base with overall height of 200mm
661M	Mini magnetic stand with 6mm and 8mm stem hole. 170N holding force	30mm dia. Base with overall height of 103mm
3657AA	Magnetic stand with find adjustment, 3/8" and 8mm stem hole. 800N holding force	63 x 55 x 50mm Base with overall height of 230mm
3657MTW	Flex O post magnetic stand with fine adjustment. 800N holding force	67 x 50 x 55mm base with overall height of 352mm
3206	Outside micrometer stand	162 x 89 x 19mm base with tilting head capacity of 19mm thickness x 25mm throat depth



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