

## DIGITAL INSIDE MICROMETERS (ECONOMIC TYPE)

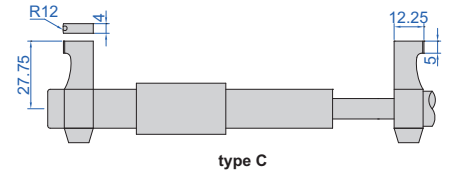
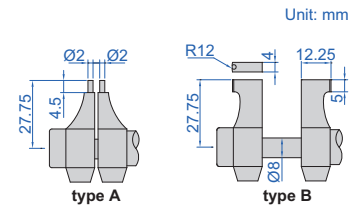
DATA  
OUTPUT

ATTENTION: LOW PARALLELISM  
OF TWO MEASURING FACES

- Resolution 0.001mm/0.00005"
- Button function: on/off, set, mm/inch, data transmit
- Data output
- Automatic power off
- Ratchet stop
- Carbide measuring faces
- Optional accessory: wireless transmitter code **7315-31** (receiver is needed) page 6, bluetooth transmitter code **7214-31** page 12, data output cable code **7302-31** page 20, setting ring (code **6312**)



3520-30



Code	Range	Type	Setting ring	Accuracy
3520-30	5-30mm/0.2-1.2"	A	5mm (included)	±5µm
3520-50	25-50mm/1-2"	B	25mm (included)	±6µm
3520-75	50-75mm/2-3"	B	50mm (optional)	±7µm
3520-100	75-100mm/3-4"	C	75mm (optional)	±8µm

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## INTERNAL GEAR TOOTH MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE

INSPECTION  
CERTIFICATE

- Measure over-pin diameter of gears
- Graduation: 0.01mm
- Ratchet stop
- Optional accessory: ball tips (code **7383**)

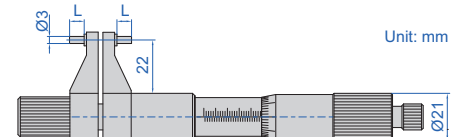
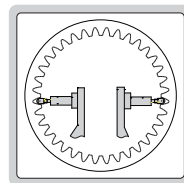
before ball tips  
are installed      ball tips are optional



3678-50

Code	Range	Accuracy	L
3678-50*	25-50mm	4µm	6mm
3678-75*	50-75mm	5µm	8mm

\*Supplied with manufacturer inspection certificate



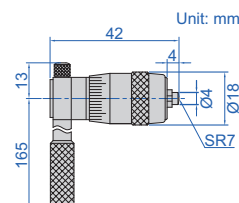
## TUBULAR INSIDE MICROMETERS

- Graduation 0.01mm
- Accuracy: (6+L/50)µm  
L=maximum measuring length (mm)
- Optional accessory: setting ring (code **6312**), gauge block accessory (code **6881**), cylinder gauge block (code **4001**), caliper/height gauge checker (code **6884**)

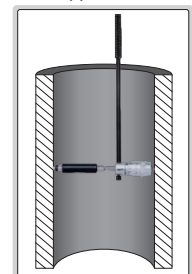


3221-200

Code	Range	Travel of micrometer head	Extension rods
3221-32	25-32mm	7mm	—
3221-50	25-50mm	7mm	2 pcs
3221-63	50-63mm	13mm	—
3221-200	50-200mm	13mm	6 pcs
3221-300	50-300mm	13mm	10 pcs
3221-225	200-225mm	25mm	—
3221-500	200-500mm	25mm	3 pcs
3221-1000	200-1000mm	25mm	8 pcs



application



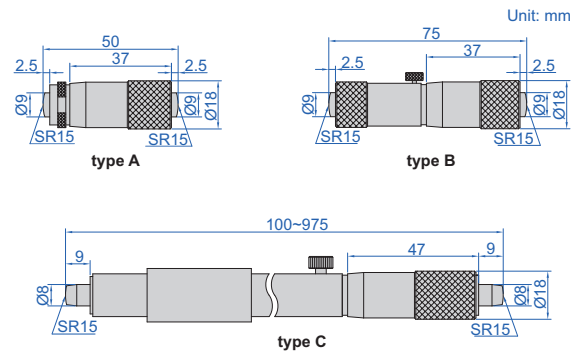
## TUBULAR INSIDE MICROMETERS

- Micrometers up to 500mm meet DIN863-4
- Graduation 0.01mm
- Carbide measuring faces
- Optional accessory: gauge block accessory (code **6881**), cylinder gauge block (code **4001**), caliper/height gauge checker (code **6884**)



**3229-225**

Code	Range	Type	Accuracy
3229-75	50-75mm	A	5μm
3229-100	75-100mm	B	5μm
3229-125	100-125mm	C	6μm
3229-150	125-150mm	C	6μm
3229-175	150-175mm	C	7μm
3229-200	175-200mm	C	7μm
3229-225	200-225mm	C	8μm
3229-250	225-250mm	C	8μm
3229-275	250-275mm	C	9μm
3229-300	275-300mm	C	9μm
3229-325	300-325mm	C	9μm
3229-350	325-350mm	C	9μm
3229-375	350-375mm	C	10μm
3229-400	375-400mm	C	10μm
3229-425	400-425mm	C	10μm
3229-450	425-450mm	C	10μm
3229-475	450-475mm	C	11μm
3229-500	475-500mm	C	11μm
3229-525	500-525mm	C	11μm
3229-550	525-550mm	C	11μm
3229-575	550-575mm	C	11μm
3229-600	575-600mm	C	12μm
3229-625	600-625mm	C	12μm
3229-650	625-650mm	C	12μm
3229-675	650-675mm	C	13μm
3229-700	675-700mm	C	13μm



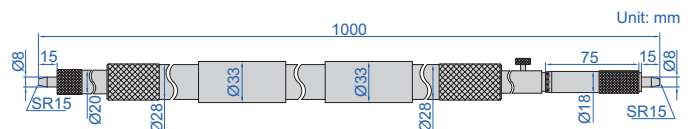
Code	Range	Type	Accuracy
3229-725	700-725mm	C	13μm
3229-750	725-750mm	C	14μm
3229-775	750-775mm	C	14μm
3229-800	775-800mm	C	14μm
3229-825	800-825mm	C	15μm
3229-850	825-850mm	C	15μm
3229-875	850-875mm	C	15μm
3229-900	875-900mm	C	16μm
3229-925	900-925mm	C	16μm
3229-950	925-950mm	C	16μm
3229-975	950-975mm	C	17μm
3229-1000	975-1000mm	C	17μm

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## TUBULAR INSIDE MICROMETERS



**3224-2000**



Code	Range	Extension rods
3224-2000	1000-2000mm	50mm, 100mm (2 pcs), 200mm, 500mm
3224-3000	1000-3000mm	50mm, 100mm (2 pcs), 200mm, 500mm, 1000mm
3224-4000	1000-4000mm	50mm, 100mm (2 pcs), 200mm, 500mm, 1000mm (2 pcs)
3224-5000	1000-5000mm	50mm, 100mm (2 pcs), 200mm, 500mm, 1000mm (3 pcs)

- Micrometer head: 1000-1050mm
- Graduation 0.01mm
- Accuracy:  $(7+n+L/50)\mu\text{m}$   
n=number of rods  
L=maximum measuring length (mm)
- Travel of micrometer head 50mm
- Carbide measuring faces

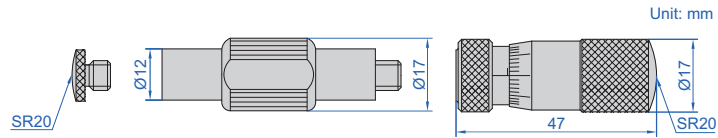
## TUBULAR INSIDE MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE



3684-100

- Micrometer head: 50-75mm
- Graduation: 0.01mm
- Carbide measuring faces



Code	Range	Accuracy	Travel of micrometer head	Extension rods
3684-75	50-75mm	5µm	25mm	—
3684-100	50-100mm	5µm	25mm	25mm
3684-150	50-150mm	6µm	25mm	25mm, 50mm
3684-250	50-250mm	8µm	25mm	25mm, 50mm, 100mm
3684-300	50-300mm	9µm	25mm	25mm, 50mm (2 pcs), 100mm
3684-350	50-350mm	10µm	25mm	25mm, 50mm, 100mm (2 pcs)
3684-450	50-450mm	10µm	25mm	25mm, 50mm, 100mm, 200mm
3684-650	50-650mm	12µm	25mm	25mm, 50mm, 100mm, 200mm (2 pcs)
3684-850	50-850mm	15µm	25mm	25mm, 50mm, 100mm, 200mm, 400mm
3684-1250	50-1250mm	20µm	25mm	25mm, 50mm, 100mm, 200mm, 400mm (2 pcs)
3684-1450	50-1450mm	22µm	25mm	25mm, 50mm, 100mm, 200mm, 400mm, 600mm

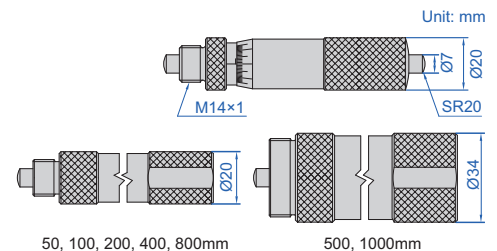
## TUBULAR INSIDE MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE



3683-200

- Micrometer head: 100-150mm
- Graduation: 0.01mm
- Carbide measuring faces
- Heat insulation extension rods



Code	Range	Accuracy	Travel of micrometer head	Heat insulation extension rods
3683-150	100-150mm	6µm	50mm	—
3683-200	100-200mm	7µm	50mm	50mm
3683-300	100-300mm	9µm	50mm	50mm, 100mm
3683-500	100-500mm	13µm	50mm	50mm, 100mm, 200mm
3683-900	100-900mm	16µm	50mm	50mm, 100mm, 200mm, 400mm
3683-1300	100-1300mm	22µm	50mm	50mm, 100mm, 200mm, 400mm (2 pcs)
3683-1700	100-1700mm	27µm	50mm	50mm, 100mm, 200mm, 400mm, 800mm
3683-2000	100-2000mm	32µm	50mm	50mm, 100mm, 200mm (2 pcs), 500mm, 1000mm
3683-2100	100-2100mm	32µm	50mm	50mm, 100mm, 200mm, 400mm (2 pcs), 800mm
3683-2500	100-2500mm	40µm	50mm	50mm, 100mm, 200mm, 400mm, 800mm (2 pcs)
3683-3000	100-3000mm	50µm	50mm	50mm, 100mm, 200mm (2 pcs), 500mm, 1000mm (2 pcs)
3683-4000	100-4000mm	60µm	50mm	50mm, 100mm, 200mm (2 pcs), 500mm, 1000mm (3 pcs)
3683-5000	100-5000mm	72µm	50mm	50mm, 100mm, 200mm (2 pcs), 500mm, 1000mm (4 pcs)
3683-6000	100-6000mm	90µm	50mm	50mm, 100mm, 200mm (2 pcs), 500mm, 1000mm (5 pcs)

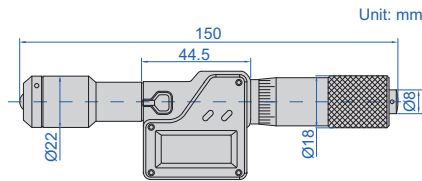


## DIGITAL TUBULAR INSIDE MICROMETERS

**IP65**  
WATERPROOF

**DATA**  
OUTPUT

- Micrometer head: 150-175mm
- Resolution: 0.001mm/0.00005"
- Accuracy:  $(3+n+L/50)\mu\text{m}$   
n=number of rods  
L=maximum measuring length (mm)
- Carbide measuring faces
- Diameter of extension rods is 22mm
- IP65 dust/waterproof
- Button function: on/off, set, mm/inch, data transmit
- Data output
- Automatic power off
- Supplied with setting standards
- Optional accessory: wireless transmitter code **7315-31** (receiver is needed) page 6, bluetooth transmitter code **7214-31** page 12, data output cable code **7302-31** page 20



3521-1000

Code	Range	Travel of micrometer head	Extension rods
3521-175	150-175mm	25mm	—
3521-1000	150-1000mm	25mm	25mm, 50mm (2 pcs), 100mm, 200mm, 400mm
3521-1500	150-1500mm	25mm	25mm, 50mm (2 pcs), 100mm (2 pcs), 200mm, 400mm (2 pcs)
3521-2000	150-2000mm	25mm	25mm, 50mm (2 pcs), 100mm, 200mm (2 pcs), 400mm (3 pcs)

## TUBULAR INSIDE MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE

- Carbide measuring faces for micrometer head and extension rods
- Points of extension rods are spring loaded
- Optional accessory:  
gauge block accessory (code **6881**),  
cylinder gauge block (code **4001**),  
caliper/height gauge checker (code **6884**)



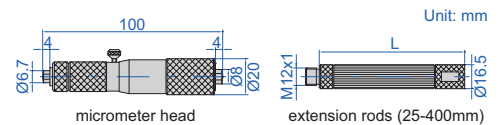
3634-1300

### Micrometer head

Range	Graduation	Accuracy	Weight
100-125mm	0.01mm	$\pm 4\mu\text{m}$	154g

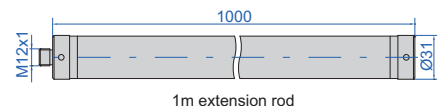
### Extension rods

Length (L)	Accuracy	Weight	Material
25mm	$\pm 1.25\mu\text{m}$	37g	steel
50mm	$\pm 1.25\mu\text{m}$	65g	steel
100mm	$\pm 2\mu\text{m}$	113g	steel
200mm	$\pm 3.5\mu\text{m}$	208g	steel
400mm	$\pm 4.5\mu\text{m}$	402g	steel
1000mm	$\pm 7.5\mu\text{m}$	909g	carbon fiber



micrometer head

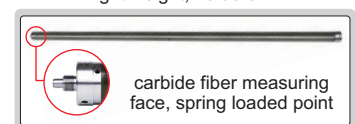
extension rods (25-400mm)



1m extension rod

Code	Range	Extension rods
3634-350	100-350mm	25mm, 200mm
3634-500	100-500mm	25mm, 50mm, 100mm, 200mm
3634-1300	100-1300mm	25mm, 50mm, 100mm, 200mm, 400mm (2 pcs)
3634-1500	100-1500mm	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm (2 pcs)
3634-2100	100-2100mm	25mm, 50mm, 100mm, 200mm, 400mm (4 pcs)
3634-3100	100-3100mm	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (2 pcs)
3634-4100	100-4100mm	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (3 pcs)
3634-5100	100-5100mm	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (4 pcs)
3634-6100	100-6100mm	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (5 pcs)

1m carbon fiber extension rod,  
light weight, no deform



carbide fiber measuring face, spring loaded point



DATA  
OUTPUT

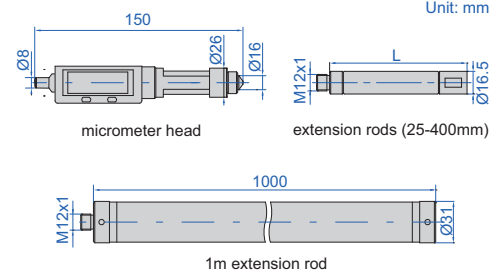
SPRING LOADED  
MEASURING POINT

## DIGITAL NON-ROTATING SPINDLE INSIDE MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE

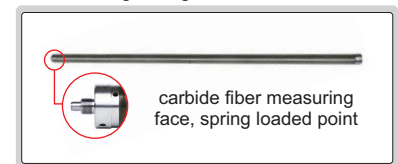


NON-ROTATING  
SPINDLE

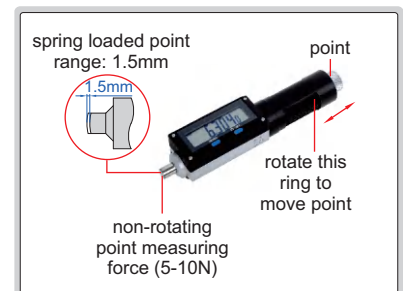


- Carbide measuring faces for micrometer head and extension rods
- Points of extension rods are spring loaded
- Data output
- Button function: mm/inch, max./min. value tracking, preset value, hold, on/off, zero
- CR2032 battery, automatic power off, turn the sleeve to turn on
- Optional accessory: wireless transmitter code **7315-80** (receiver is needed) page 7, data output cable code **7302-80**, gauge block accessory (code **6881**), cylinder gauge block (code **4001**), caliper/height gauge checker (code **6884**)

1m carbon fiber extension rod,  
light weight, no deform



non-rotating spindle, spring loaded point  
and max./min. value tracking make it  
easy to find the right measuring position



### Extension rods

Length (L)	Accuracy	Weight	Material
25mm	±1.25µm	37g	steel
50mm	±1.25µm	65g	steel
100mm	±2µm	113g	steel
200mm	±3.5µm	208g	steel
400mm	±4.5µm	402g	steel
1000mm	±7.5µm	909g	carbon fiber

### Micrometer head

Range	Resolution	Accuracy	Repeatability	Measuring force	Weight
150-180mm/6-7"	0.001mm/0.00005" 0.01mm/0.0005" 0.0005mm/0.00002" (switchable)	±4µm	1µm	5-10N	275g

Code	Range	Extension rods
<b>3635-350</b>	150-350mm/6-14"	25mm, 50mm, 100mm
<b>3635-550</b>	150-550mm/6-22"	25mm, 50mm, 100mm, 200mm
<b>3635-950</b>	150-950mm/6-38"	25mm, 50mm, 100mm, 200mm, 400mm
<b>3635-1550</b>	150-1550mm/6-62"	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm (2 pcs)
<b>3635-2150</b>	150-2150mm/6-86"	25mm, 50mm, 100mm, 200mm, 400mm (4 pcs)
<b>3635-3150</b>	150-3150mm/6-126"	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (2 pcs)
<b>3635-4150</b>	150-4150mm/6-166"	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (3 pcs)
<b>3635-5150</b>	150-5150mm/6-206"	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (4 pcs)
<b>3635-6150</b>	150-6150mm/6-246"	25mm, 50mm, 100mm, 200mm (2 pcs), 400mm, 1000mm (5 pcs)

## INTERNAL GEAR TOOTH MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE



3638-200

- Measure over-pin diameter of gears
- Points of extension rods are spring loaded
- Optional accessory: ball tips (code 7383)

### Micrometer head

Range	Graduation	Accuracy
100-115mm	0.01mm	±4µm
150-175mm	0.01mm	±4µm

### Extension rod

Length (L)	Accuracy
15mm	±1µm
25mm	±1.25µm
30mm	±1.25µm
50mm	±1.25µm
100mm	±2µm
200mm	±3.5µm
400mm	±4.5µm

Code	Range	Micrometer head	Extension rod (L)
3638-200	100-205mm	100-115mm	15mm, 25mm, 50mm
3638-500	100-505mm	100-115mm	15mm, 25mm, 50mm, 100mm, 200mm
3638-900	100-905mm	100-115mm	15mm, 25mm, 50mm, 100mm, 200mm, 400mm
3638-1100	150-1150mm	150-175mm	25mm, 50mm, 100mm, 200mm, 200mm, 400mm

## INTERNAL SCREW THREAD MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE



3641-200

- Measure pitch diameter of screw thread
- Points of extension rods are spring loaded
- Optional accessory: measuring tips for internal screw thread micrometer (code 7385, L=13.5mm)

### Micrometer head

Range	Graduation	Accuracy
100-115mm	0.01mm	±4µm
150-175mm	0.01mm	±4µm

### Extension rod

Length (A)	Accuracy
15mm	±1µm
25mm	±1.25µm
50mm	±1.25µm
100mm	±2µm
200mm	±3.5µm
400mm	±4.5µm

Code	Range	Micrometer head	Extension rod (A)	Applicable tips
3641-200	100-205mm	100-115mm	15mm, 25mm, 50mm	stem length L=13.5mm
3641-500	100-505mm	100-115mm	15mm, 25mm, 50mm, 100mm, 200mm	stem length L=13.5mm
3641-900	100-905mm	100-115mm	15mm, 25mm, 50mm, 100mm, 200mm, 400mm	stem length L=13.5mm
3641-1100	150-1150mm	150-175mm	25mm, 50mm, 100mm, 200mm, 200mm, 400mm	stem length L=13.5mm

TIPS FOR TRAPEZOIDAL, ACME  
THREAD ARE ALSO AVAILABLE

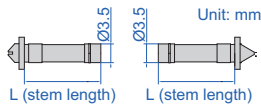
## MEASURING TIPS FOR INTERNAL SCREW THREAD MICROMETERS

**INSIZE PLUS**  
MADE IN EUROPE

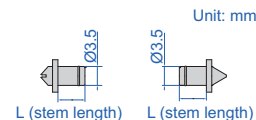
- Supplied in pair
- Made of hardened steel
- Suitable for **3641** series micrometers



7385-T106A



7385-T106B



### 60° thread angle

Code		Applicable pitch (mm)
L=13.5mm	L=5mm	
7385-T101A	7385-T101B	0.35
7385-T102A	7385-T102B	0.4/0.45
7385-T103A	7385-T103B	0.5/0.6
7385-T104A	7385-T104B	0.7/0.75/0.8
7385-T105A	7385-T105B	1/1.25
7385-T106A	7385-T106B	1.5/1.75
7385-T107A	7385-T107B	2.0/2.5
7385-T108A	7385-T108B	3.0/3.5
7385-T109A	7385-T109B	4.0/4.5/5.0
7385-T110A	7385-T110B	5.5/6.0

### 55° thread angle

Code		Applicable pitch (TPI)
L=13.5mm	L=5mm	
7385-T201A	7385-T201B	60/48
7385-T202A	7385-T202B	40/32
7385-T203A	7385-T203B	28/26/24/22
7385-T204A	7385-T204B	20/19/18/16
7385-T205A	7385-T205B	14/12/11
7385-T206A	7385-T206B	10/9/8
7385-T207A	7385-T207B	7/6
7385-T208A	7385-T208B	5/4.5/4
7385-T209A	7385-T209B	3.5/3.25/3/2.875/2.75
7385-T210A	7385-T210B	2.625/2.5/2

## INTERNAL SCREW THREAD MICROMETERS

- Graduation: 0.01mm
- Optional accessory: measuring tips for internal screw thread micrometer (code 7321)



measuring tips for screw thread (optional)

measuring tips for screw thread (optional)

3226-1001

measuring tips for internal screw thread micrometer (optional)



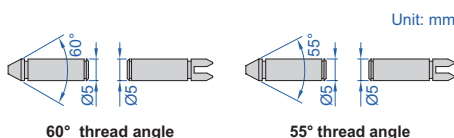
Code	Range	Code	Range
3226-1001	75-100mm	3226-2251	200-225mm
3226-1251	100-125mm	3226-2501	225-250mm
3226-1501	125-150mm	3226-2751	250-275mm
3226-1751	150-175mm	3226-3001	275-300mm
3226-2001	175-200mm		

## MEASURING TIPS FOR INTERNAL SCREW THREAD MICROMETERS

- Supplied in pair
- Suitable for **3226** series micrometers



7321-T1S



60° thread angle

55° thread angle

### Metric and unified screw (60° thread angle)

Code	Pitch
7321-T11	0.4-0.5mm/64-48TPI
7321-T12	0.6-0.9mm/44-28TPI
7321-T13	1-1.75mm/24-14TPI
7321-T14	2-3mm/13-9TPI
7321-T15	3.5-5mm/8-5TPI
7321-T16	5.5-7mm /4.5-3.5TPI
7321-T1S	6 pairs/set, including all above tips

### Whitworth screw (55° thread angle)

Code	Pitch
7321-T21	60-48TPI
7321-T22	48-40TPI
7321-T23	40-32TPI
7321-T24	32-24TPI
7321-T25	24-18TPI
7321-T26	18-14TPI
7321-T27	14-10TPI
7321-T28	10-7TPI
7321-T29	7-4.5TPI
7321-T210	4.5-3.5TPI
7321-T2S	10 pairs/set, including all above tips