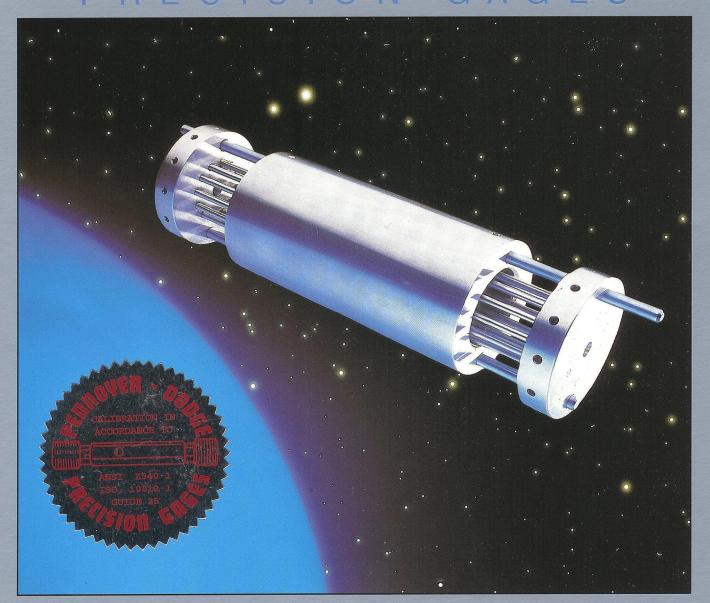
PENNERBODGE C O M P A N Y 1000 PRECISION GAGES



GAGING AND TOOLING SPECIALIST SINCE 1948

QUALITY

SALES

SERVICE



MESSAGE FROM THE PRESIDENT



Dear Customer,

Welcome to Pennoyer-Dodge Company! You are about to meet a family owned company that has been in the Precision Gage business since 1948. Pennoyer-Dodge Company is a leader in the manufacturing of all types of precision thread and cylindrical gages, as well as the design and manufacturing of special fixture gaging.

The basic philosophy of **Pennoyer-Dodge Company** has always been that our customers deserve our best effort. We know that quality and confidence is a prime concern in this competitive market.

The following pages will introduce you to consider the capabilities of our staff and our history of quality gaging as it relates to your individual problem areas.

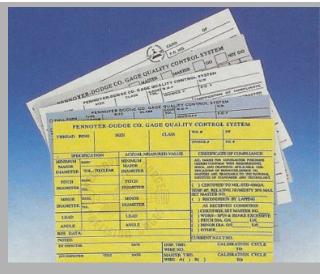
If you are already a customer, we would like to take this opportunity to thank you for your patronage. **Pennoyer-Dodge Company** values the opportunity to continue serving you for all your gaging needs.

Hazel L. Dodge

SALES AND SERVICE

When you buy from **Pennoyer-Dodge Company** you're buying proven quality and reliability. Our knowledgeable sales and engineering staff offer expert phone service in sales and technical information.

We invite you to phone us at (1-818-547-2100) and let our staff assist you with your gaging requirements.



CALIBRATION AND RECONDITIONING SERVICE

To aid customers in the calibration requirements of ISO 10012-1, ANSI/NCSL Z540-1, Mil-Std-45662A, Pennoyer-Dodge Company supplies complete certificates of calibration for all gages traceable to N.I.S.T. These certificates contain basic as well as actual measured values. Used gage certifications show not only the as-found values, but if reconditioned, we also include the new in-tolerance values. Sizeable cost and time saving can be achieved through this reconditioning process.





Robert Dodge

QUALITY CONTROL

Pennoyer-Dodge Company maintains a strict quality control program to insure the accuracy of its measurements. There is a in-process surveillance throughout the manufacturing process that insures the quality of our product. Final inspection is performed on all gauges by trained technicians in our environmentally controlled labs.

All Pennoyer-Dodge Company final inspection equipment is recalibrated on a designated recall schedule. The accuracy of all our final inspection equipment, measuring blocks and thread wires, are traceable to N.I.S.T. Pennoyer-Dodge Company maintains a quality control manual which adheres to the most stringent government requirements.





Pennoyer-Dodge Co.

Welcome to Pennoyer-Dodge Company!

SALES AND SERVICE

When you buy from **Pennoyer-Dodge Company** you're buying proven quality and reliability. Our knowledgeable sales and engineering staff offer expert phone service in sales and technical information. We invite you to call **1-818-547-2100 (Gage Quotes: pdbob@sbcglobal.net)** and let our staff assist you with your gaging requirements.

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QUALITY CONTROL

National Tooling & Machining Association

Member

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All **Pennoyer-Dodge Company** final inspection equipment is re-calibrated on a designated recall schedule. The accuracy of all our final inspection equipment, measuring blocks and thread wires, are traceable to N.I.S.T. Pennoyer-Dodge Company maintains a quality control manual which adheres to the most stringent government requirements.



When you need it right and right away!



Accepted Methods of Payment COD, Net 30 days from date of invoice (upon credit approval),



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Pennoyer-Dodge Co.

Expedite Service

Our

Need R Now

- Where time is of the essence and normal delivery schedules won't do...
- We will be glad to help you with your "just in time" gaging needs...
- Try our *INEED IT NOW* 24 & 48 hour Expediting Service.
- Call our technical sales staff and let us know your specific requirements.

COMPANY HOURS 6:00AM to 4:30 PM P.S.T. - MONDAY-FRIDAY SATURDAYS 6:00AM TO NOON

"WE ARE HERE TO HELP YOU WITH ANY GAGING NEEDS"

PRICES SUBJECT TO CHANGE WITHOUT NOTICE 01/03/2024 Rev A

- 4 -



Pennoyer-Dodge Co. Taperlock Thread Plug Gages

American Gage Design CLASS X RIGHT HAND

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and
- class of fit. Example: 1/4-28 UNF-2B
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end / special marking may be added for

CLASS X RIGHT HAND TAPERLOCK THREAD PLUG GAGES				
Nominal Size	Go or Not Go 2B or 3B Members	Complete Double End Gage W/Handle	Handle Only	Handle Size
#0-80 UNF	73.00	166.00	20.00	#000
#1-64 UNC	73.00	166.00	20.00	#000
# 1-72 UNF	73.00	166.00	20.00	# 000
# 2-56 UNC	69.00	158.00	20.00	# 000
# 2-64 UNF	69.00	158.00	20.00	# 000
# 3-48 UNC	61.00	142.00	20.00	# 000
# 3-56 UNF	61.00	142.00	20.00	# 000
# 4-40 UNC	55.00	130.00	20.00	# 00
# 4-48 UNF	58.00	136.00	20.00	# 00
# 5-40 UNC	49.00	118.00	20.00	# 00
# 5-44 UNF	49.00	118.00	20.00	# 00
# 6-32 UNC	46.00	112.00	20.00	# 00
# 6-40 UNF	46.00	112.00	20.00	# 00
# 8-32 UNC	46.00	112.00	20.00	# 0
# 8-36 UNF	46.00	112.00	20.00	# 0
# 10-24 UNC	46.00	112.00	20.00	# 0
# 10-32 UNF	46.00	112.00	20.00	# 0
# 12-24 UNC	46.00	112.00	20.00	# 0
# 12-28 UNF	46.00	112.00	20.00	# 0
# 12-32 UNEF	62.00	144.00	20.00	#0
1/4-20 UNC	43.00	106.00	20.00	#1
1/4-28 UNF	43.00	106.00	20.00	#1
1/4-32 UNEF	72.00	164.00	20.00	#1
5/16-18 UNC	43.00	106.00	20.00	#1
5/16-24 UNF	43.00	106.00	20.00	#1
5/16-32 UNEF	72.00	164.00	20.00	# 1
3/8-16 UNC	48.00	116.00	20.00	# 2
3/8-24 UNF	48.00	116.00	20.00	# 2
3/8-32 UNEF	82.00	184.00	20.00	# 2
7/16-14 UNC	48.00	116.00	20.00	# 2
7/16-20 UNF	48.00	116.00	20.00	# 2

an additional charge. (\$20.00 min). Handles ordered in colors other than Red or Green add \$20.00 per handle. 5. Long Form Calibration Reports are required, add \$20.00 per member.

- Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
 CHROME: Add 55% to each member.
- 8. "J" Series thread: Add \$10.00 per plug member.





Pennoyer-Dodge Co. Taperlock Thread Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2B
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end / special marking may be added for

CLASS X RIGHT HAND TAPERLOCK THREAD PLUG GAGES				
Nominal Size	Go or Not Go 2B or 3B Members	Complete Double End Gage W/Handle	Handle Only	Handle Size
7/16-28 UNEF	82.00	184.00	20.00	# 2
1/2-13 UNC	48.00	116.00	20.00	# 2
1/2-20 UNF	48.00	116.00	20.00	# 2
1/2-28 UNEF	82.00	184.00	20.00	# 2
9/16-12 UNC	61.00	142.00	20.00	# 3
9/16-18 UNF	60.00	140.00	20.00	# 3
9/16-24 UNEF	93.00	206.00	20.00	# 3
5/8-11 UNC	63.00	146.00	20.00	# 3
5/8-18 UNF	61.00	142.00	20.00	# 3
5/8-24 UNEF	93.00	206.00	20.00	# 3
11/16-24 UNEF	93.00	206.00	20.00	# 3
3/4-10 UNC	65.00	150.00	20.00	# 3
3/4-16 UNF	63.00	146.00	20.00	# 3
3/4-20 UNEF	93.00	206.00	20.00	# 3
13/16-20 UNEF	102.00	224.00	20.00	# 3
7/8-9 UNC	75.00	170.00	20.00	# 4
7/8-14 UNF	72.00	164.00	20.00	# 4
7/8-20 UNEF	102.00	224.00	20.00	# 4
15/16-20 UNEF	106.00	232.00	20.00	# 4
1-8 UNC	84.00	188.00	20.00	# 4
1-12 UNF	81.00	182.00	20.00	# 4
1-14 UNS	81.00	182.00	20.00	# 4
1-20 UNEF	119.00	258.00	20.00	# 4
1 1/16-18 UNEF	124.00	268.00	20.00	# 4
1 1/8-7 UNC	101.00	222.00	20.00	# 4
1 1/8-12 UNF	98.00	216.00	20.00	# 4
1 1/8-18 UNEF	124.00	268.00	20.00	# 4
1 3/16-18 UNEF	130.00	280.00	20.00	# 5
1 1/4-7 UNC	104.00	228.00	20.00	# 5
1 1/4-12 UNF	100.00	220.00	20.00	# 5
1 1/4-18 UNEF	130.00	280.00	20.00	# 5

an additional charge. (\$20.00 min). Handles ordered in colors other than Red or Green add \$20.00 per handle.

- 5. Long Form Calibration Reports are required, add \$20.00 per member.
- Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
 CHROME: Add 55% to each member.
- 8. "J" Series thread: Add \$10.00 per plug member.





Pennoyer-Dodge Co. Taperlock Thread Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2B
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end / special marking may be added for

CLASS X RIGHT HAND TAPERLOCK THREAD PLUG GAGES					
Nominal Size	Go or Not Go 2B or 3B Members	Complete Double End Gage W/Handle	Handle Only	Handle Size	
1 5/16-18 UNEF	140.00	300.00	20.00	# 5	
1 3/8-6 UNC	115.00	250.00	20.00	#5	
1 3/8-12 UNF	110.00	240.00	20.00	# 5	
1 3/8-18 UNEF	145.00	310.00	20.00	# 5	
17/16-18 UNEF	152.00	324.00	20.00	# 5	
1 1/2-6 UNC	126.00	272.00	20.00	# 5	
1 1/2-12 UNF	121.00	262.00	20.00	# 5	
1 1/2-18 UNEF	160.00	340.00	20.00	# 5	

CLASS X RIGHT HAND TAPERLOCK THREAD BLUG GAGES

an additional charge. (\$20.00 min). Handles ordered in colors other than Red or Green add \$20.00 per handle.

- 5. Long Form Calibration Reports are required, add \$20.00 per member.
- 6. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
 7. CHROME: Add 55% to each member.
- 8. "J" Series thread: Add \$10.00 per plug member.





Pennoyer-Dodge Co. Reversible Thread Plug Gages

American Gage Design

How To Order

1. State Quantity desired.

2. Nominal size and threads per inch and class of fit.

- Example: 1/4-28 UNF-2B
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end.

CLASS X RIGHT HAND REVERSIBLE THREAD PLUG GAGES				
	Go or	Complete		
Nominal	Not Go	Double End	Handle	Handle
Size	2B or 3B	Gage	Only	Size
	Members	W/Handle		
# 0-80 UNF	92.00	208.00	24.00	# 1W
# 1-64 UNC	92.00	208.00	24.00	# 1W
# 1-72 UNF	92.00	208.00	24.00	# 1W
# 2-56 UNC	79.00	182.00	24.00	# 2W
# 2-64 UNF	79.00	182.00	24.00	# 2W
# 3-48 UNC	79.00	182.00	24.00	# 2W
# 3-56 UNF	79.00	182.00	24.00	# 2W
# 4-40 UNC	70.00	164.00	24.00	# 2W
# 4-48 UNF	70.00	164.00	24.00	# 2W
# 5-40 UNC	70.00	164.00	24.00	# 2W
# 5-44 UNF	70.00	164.00	24.00	# 2W
# 6-32 UNC	64.00	152.00	24.00	# 2W
# 6-40 UNF	64.00	152.00	24.00	# 2W
# 8-32 UNC	64.00	152.00	24.00	# 2W
# 8-36 UNF	64.00	152.00	24.00	# 2W
# 10-24 UNC	64.00	156.00	28.00	# 3W
# 10-32 UNF	64.00	156.00	28.00	# 3W
# 12-24 UNC	64.00	156.00	28.00	# 3W
# 12-28 UNF	64.00	156.00	28.00	# 3W
1/4-20 UNC	63.00	154.00	28.00	# 3W
1/4-28 UNF	63.00	154.00	28.00	# 3W
5/16-18 UNC	63.00	154.00	28.00	# 4W
5/16-24 UNF	63.00	154.00	28.00	# 4W
3/8-16 UNC	65.00	158.00	28.00	# 4W
3/8-24 UNF	65.00	158.00	28.00	# 4W
7/16-14 UNC	65.00	158.00	28.00	# 5W
7/16-20 UNF	65.00	158.00	28.00	# 5W
1/2-13 UNC	65.00	158.00	28.00	# 5W
1/2-20 UNF	65.00	158.00	28.00	# 5W
9/16-12 UNC	93.00	219.00	33.00	# 6W
9/16-18 UNF	74.00	181.00	33.00	# 6W
5/8-11 UNC	74.00	181.00	33.00	# 6W
5/8-18 UNF	74.00	181.00	33.00	# 6W
3/4-10 UNC	81.00	195.00	33.00	# 7W
3/4-16 UNF	81.00	195.00	33.00	# 7W

Handles ordered in colors other than Red or Green collets and other than plain handles, call for current pricing.

- 5. Special marking may be added for an additional charge. (\$20.00 min).
- 6. Long Form certifications are required, add \$20.00 per member.
- 7. Calibration stickers available @ $10.00\ per$ sticker (advise calibration cycle) 8. CHROME: Add 55% to each member.
- CHROME: Add 55% to each member.
 If Trilock style desired, price upon application.





Pennoyer-Dodge Co. S.T.I. Thread Plug Gages X-Tolerance

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2B S.T.I.
- 3. Go or Not Go or a complete double end.

4. Handles: Either single end or double end. Handles ordered in colors other

than Red or Green add \$20.00 per handle.

CLASS X RIGHT HAND S.T.I. THREAD PLUG GAGES					
	Go and	Complete			
Nominal	2B, 3B	Double End	Handle	Handle	
Size	Not Go	2B, 3B Gage	Only	Size	
	Member	W/Handle			
# 2-56 UNC	76.00	172.00	20.00	# 00	
# 4-40 UNC	70.00	160.00	20.00	# 00	
# 4-48 UNF	70.00	160.00	20.00	# 00	
# 6-32 UNC	64.00	148.00	20.00	# 0	
# 6-40 UNF	64.00	148.00	20.00	# 0	-
# 8-32 UNC	63.00	146.00	20.00	# 0	
# 10-24 UNC	64.00	148.00	20.00	# 0	
# 10-32 UNF	63.00	146.00	20.00	# 0	
1/4-20 UNC	63.00	146.00	20.00	#1	
1/4-28 UNF	63.00	146.00	20.00	#1	
5/16-18 UNC	64.00	148.00	20.00	# 2	
5/16-24 UNF	63.00	146.00	20.00	#1	
3/8-16 UNC	64.00	148.00	20.00	# 2	
3/8-24 UNF	64.00	148.00	20.00	# 2	
7/16-14 UNC	69.00	158.00	20.00	# 3	
7/16-20 UNF	64.00	148.00	20.00	# 2	
1/2-13 UNC	70.00	160.00	20.00	# 3	
1/2-20 UNF	68.00	156.00	20.00	# 3	

5. Special marking may be added for an additional charge. (\$20.00 min).

- ⁶. Long Form Calibration Reports are required, add \$20.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle) 8. "W" tolerance (Inspection Grade) add 30%. Must purchase long form calibration reports.
- 9. CHROME: Add 55% to each member.
- 10. "J" series thread add \$10.00 per plug member.





Pennoyer-Dodge Co. Standard Thread Rings Gages

American Gage Design

How To Order

1. State Quantity desired. 2. Nominal size and threads per inch and class of fit. Example: 1/4-28 UNF-2A 3. Go or Not Go or a set of gages.

- 4. Special marking for an additional charge.(\$20.00 min.)
- 5. Long Form Calibration Reports are required, add \$20.00 per member
- 6. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle).
- 7. CHROME: Add 55% for sizes #10 and up, per ring.
- 8. For "J" series (MIL-S-8879 and SAE-AS-71051), ADD \$80.00 per Go ring.

CLASS X RIGHT HAND AGD THREAD RING GAGES				
Nominal Size	Go or Not Go 2A or 3A	Go & Not Go Sets 2A or 3A	Ring Holder	Ring Holder Size
# 0-80 UNF	180.00	360.00	30.00	1T
# 1-64 UNC	168.00	336.00	30.00	1T
# 1-72 UNF	168.00	336.00	30.00	1T
# 2-56 UNC	156.00	312.00	30.00	1T
# 2-64 UNF	156.00	312.00	30.00	1T
# 3-48 UNC	156.00	312.00	30.00	1T
# 3-56 UNF	156.00	312.00	30.00	1T
# 4-40 UNC	143.00	286.00	30.00	1T
# 4-48 UNF	143.00	286.00	30.00	1T
# 5-40 UNC	130.00	260.00	30.00	1T
# 5-44 UNF	130.00	260.00	30.00	1T
# 6-32 UNC	126.00	252.00	30.00	1T
# 6-40 UNF	126.00	252.00	30.00	1T
# 8-32 UNC	122.00	244.00	30.00	1T
# 8-36 UNF	122.00	244.00	30.00	1T
# 10-24 UNC	122.00	244.00	30.00	1T
# 10-32 UNF	122.00	244.00	30.00	1T
# 12-24 UNC	122.00	244.00	30.00	1T
# 12-28 UNF	122.00	244.00	30.00	1T
# 12-32 UNEF	148.00	296.00	30.00	1T
1/4-20 UNC	118.00	236.00	30.00	2T
1/4-28 UNF	118.00	236.00	30.00	2T
1/4-32 UNEF	148.00	296.00	30.00	2T
5/16-18 UNC	119.00	238.00	30.00	2T
5/16-24 UNF	119.00	238.00	30.00	2T
5/16-32 UNEF	148.00	296.00	30.00	2T
3/8-16 UNC	124.00	248.00	30.00	3T
3/8-24 UNF	124.00	248.00	30.00	3T
3/8-32 UNEF	149.00	298.00	30.00	3T
7/16-14 UNC	123.00	246.00	30.00	3T
7/16-20 UNF	123.00	246.00	30.00	3T
7/16-28 UNEF	149.00	298.00	30.00	3T
1/2-13 UNC	124.00	248.00	30.00	3T
1/2-20 UNF	124.00	248.00	30.00	3T
1/2-28 UNEF	151.00	302.00	30.00	3T
9/16-12 UNC	144.00	288.00	35.00	4T
9/16-18 UNF	144.00	288.00	35.00	4T





Pennoyer-Dodge Co. Standard Thread Rings Gages

American Gage Design

How To Order

1. State Quantity desired. 2. Nominal size and threads per inch and class of fit. Example: 1/4-28 UNF-2A 3. Go or Not Go or a set of gages.

- CLASS X RIGHT HAND AGD THREAD RING GAGES Go or Go & Not Nominal Ring Not Go Go Sets Ring Holder Size Holder Size 2A or 3A 2A or 3A 9/16-24 UNEF 167.00 334.00 4T 35.00 5/8-11 UNC 144.00 288.00 35.00 4T 5/8-18 UNF 144.00 288.00 35.00 4T 380.00 35.00 4T 5/8-24 UNEF 190.00 11/16-24 UNEF 190.00 380.00 35.00 4T 35.00 3/4-10 UNC 177.00 354.00 4T 4T 3/4-16 UNF 174.00 348.00 35.00 35.00 4T 3/4-20 UNEF 216.00 432.00 13/16-20 UNEF 432.00 35.00 4T 216.00 7/8-9 UNC 390.00 40.00 195.00 5T 7/8-14 UNF 191.00 382.00 40.00 5T 7/8-20 UNEF 228.00 456.00 40.00 5T 15/16-20 UNEF 228.00 456.00 40.00 5T 1-8 UNC 234.00 468.00 40.00 5T 1-12 UNF 231.00 462.00 40.00 5T 1-14 UNS 231.00 462.00 40.00 5T 1-20 UNEF 262.00 524.00 40.00 5T 1 1/16-18 UNEF 298.00 596.00 40.00 5T 1 1/8-7 UNC 298.00 596.00 40.00 5T 1 1/8-12 UNF 296.00 592.00 40.00 5T 40.00 5T 1 1/8-18 UNEF 307.00 614.00 1 3/16-18 UNEF 307.00 614.00 45.00 6T 1 1/4-7 UNC 308.00 616.00 45.00 6T 45.00 6T 1 1/4-12 UNF 305.00 610.00 1 1/4-18 UNEF 319.00 638.00 45.00 6T 45.00 6T 1 5/16-18 UNEF 319.00 638.00 1 3/8-6 UNC 319.00 638.00 45.00 6T 1 3/8-12 UNF 313.00 626.00 45.00 6T 1 3/8-18 UNEF 335.00 670.00 45.00 6T 1 7/16-18 UNEF 335.00 670.00 45.00 6T 45.00 6T 1 1/2-6 UNC 350.00 700.00 1 1/2-12 UNF 338.00 676.00 45.00 6T 6T 1 1/2-18 UNEF 358.00 716.00 45.00
- 4. Special marking for an additional charge.(\$20.00 min.)
- ^{5.} Long Form Calibration Reports are required, add \$20.00 per member.
- 6. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 7. CHROME: Add 55% for sizes #10 and up, per ring.
- 8. For "J" series (MIL-S-8879 and SAE-AS-71051), ADD \$80.00 per Go ring.





Pennoyer-Dodge Co. **Truncated Setting Plug Gages**

American Gage Design

How To Order

class of fit.

1. State Quantity desired. 2. Nominal size and threads per inch and

Call Toll Free 1-800-736-4243

than Red or Green add \$20.00 per handle.

- 5. Special marking may be added for an additional charge. (\$20.00 min). 6. Long Form Calibration Reports are required, add \$20.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)

- Example: 1/4-28 UNF-2A
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other

CLASS X P.D. RIGHT HAND TRUNCATED SETTING PLUG GAGES W-TOL ON LEAD & ANGLE Go or Complete

	Go or	Complete		
Nominal	Not Go	Double End	Handle Only	Handla Siza
Size	2A or 3A	Gage	natiule Only	natiule size
	Members	W/Handle		
# 0-80 UNF	124.00	268.00	20.00	# 000
# 1-64 UNC	124.00	268.00	20.00	# 000
# 1-72 UNF	124.00	268.00	20.00	# 000
# 2-56 UNC	124.00	268.00	20.00	# 000
# 2-64 UNF	124.00	268.00	20.00	# 000
# 3-48 UNC	111.00	242.00	20.00	# 000
# 3-56 UNF	111.00	242.00	20.00	# 000
# 4-40 UNC	105.00	230.00	20.00	# 00
# 4-48 UNF	105.00	230.00	20.00	# 00
# 5-40 UNC	105.00	230.00	20.00	# 00
# 5-44 UNF	105.00	230.00	20.00	# 00
# 6-32 UNC	101.00	222.00	20.00	# 00
# 6-40 UNF	101.00	222.00	20.00	# 00
# 8-32 UNC	101.00	222.00	20.00	# 0
# 8-36 UNF	101.00	222.00	20.00	# 0
# 10-24 UNC	101.00	222.00	20.00	# 0
# 10-32 UNF	101.00	222.00	20.00	# 0
# 12-24 UNC	105.00	230.00	20.00	# 0
# 12-28 UNF	105.00	230.00	20.00	# 0
# 12-32 UNEF	126.00	272.00	20.00	# 0
1/4-20 UNC	94.00	208.00	20.00	# 1
1/4-28 UNF	94.00	208.00	20.00	# 1
1/4-32 UNEF	128.00	276.00	20.00	# 1
5/16-18 UNC	94.00	208.00	20.00	# 1
5/16-24 UNF	94.00	208.00	20.00	# 1
5/16-32 UNEF	128.00	276.00	20.00	# 1
3/8-16 UNC	95.00	210.00	20.00	# 2
3/8-24 UNF	95.00	210.00	20.00	# 2
3/8-32 UNEF	149.00	318.00	20.00	# 2

- 8. "W" Tolerance P.D.: add 30%.
 9. "J" Series thread: Add \$10.00 per plug member.
- 10.Full Form set plugs available upon request.





Pennoyer-Dodge Co. **Truncated Setting Plug Gages**

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2A
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other

CLASS X P.D. RIGHT HAND TRUNCATED SETTING PLUG GAGES				
	W-TOL (ON LEAD & AI	NGLE	
	Go or	Complete		
Nominal	Not Go	Double End	Handle Only	Handle Size
Size	2A or 3A	Gage	nunuic only	Hanaic Size
	Members	W/Handle		
7/16-14 UNC	<mark>98.00</mark>	216.00	20.00	# 2
7/16-20 UNF	<mark>98.00</mark>	216.00	20.00	# 2
7/16-28 UNEF	149.00	318.00	20.00	# 2
1/2-13 UNC	102.00	224.00	20.00	# 2
1/2-20 UNF	102.00	224.00	20.00	# 2
1/2-28 UNEF	155.00	330.00	20.00	# 2
9/16-12 UNC	116.00	252.00	20.00	# 3
9/16-18 UNF	116.00	252.00	20.00	#3
9/16-24 UNEF	165.00	350.00	20.00	#3
5/8-11 UNC	123.00	266.00	20.00	# 3
5/8-18 UNF	123.00	266.00	20.00	#3
5/8-24 UNEF	170.00	360.00	20.00	# 3
11/16-24 UNEF	175.00	370.00	20.00	# 3
3/4-10 UNC	142.00	304.00	20.00	#3
3/4-16 UNF	140.00	300.00	20.00	#3
3/4-20 UNEF	177.00	374.00	20.00	# 3
13/16-20 UNEF	184.00	388.00	20.00	# 3
7/8-9 UNC	169.00	358.00	20.00	# 4
7/8-14 UNF	166.00	352.00	20.00	# 4
7/8-20 UNEF	195.00	410.00	20.00	# 4
15/16-20 UNEF	195.00	410.00	20.00	# 4
1-8 UNC	186.00	392.00	20.00	# 4
1-12 UNF	183.00	386.00	20.00	# 4
1-14 UNS	183.00	386.00	20.00	# 4
1-20 UNEF	211.00	442.00	20.00	# 4
1 1/16-18 UNEF	215.00	450.00	20.00	# 4
1 1/8-7 UNC	215.00	450.00	20.00	# 4
1 1/8-12 UNF	207.00	434.00	20.00	# 4
1 1/8-18 UNEF	227.00	474.00	20.00	# 4
1 3/16-18 UNEF	231.00	482.00	20.00	# 5

than Red or Green add \$20.00 per handle.

- 5. Special marking may be added for an additional charge. (\$20.00 min).
- 6. Long Form Calibration Reports are required, add \$20.00 per member.
- Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
 "W"Tolerance P.D.: add 30%.
 "J" Series thread: Add \$10.00 per plug member.
 Full Form set plugs available upon request.





Pennoyer-Dodge Co. Truncated Setting Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2A
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other

CLASS X P.D. RIGHT HAND TRUNCATED SETTING PLUG GAGES					
	W-TOL ON LEAD & ANGLE				
	Go or	Complete			
Nominal	Not Go	Double End	Handle Only	Handle Size	
Size	2A or 3A	Gage	nanule Only	Hanule Size	
	Members	W/Handle			
1 1/4-7 UNC	221.00	462.00	20.00	# 5	
1 1/4-12 UNF	216.00	452.00	20.00	# 5	
1 1/4-18 UNEF	252.00	524.00	20.00	# 5	
1 5/16-18 UNEF	252.00	524.00	20.00	# 5	
1 3/8-6 UNC	252.00	524.00	20.00	# 5	
1 3/8-12 UNF	250.00	520.00	20.00	# 5	
1 3/8-18 UNEF	273.00	566.00	20.00	# 5	
1 7/16-18 UNEF	273.00	566.00	20.00	# 5	
1 1/2-6 UNC	273.00	566.00	20.00	# 5	
1 1/2-12 UNF	271.00	562.00	20.00	# 5	
1 1/2-18 UNEF	294.00	608.00	20.00	# 5	

- than Red or Green add \$20.00 per handle.
- 5. Special marking may be added for an additional charge. (\$20.00 min).
- 6. Long Form Calibration Reports add \$20.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle) 8. "W" tolerance P.D.: add 30%.
- 9. "J" Series thread: Add \$10.00 per plug member.
- 10.Full Form set plugs available upon request.





Pennoyer-Dodge Co. *Progressive Setting Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2A Progressive
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other than Red or Green add \$20.00 per handle.

CLASS X P.D. RIGHT HAND PROGRESSIVE SETTING PLUG GAGES

W-TOL ON LEAD & ANGLE					
	Go or	Complete			
Nominal	Not Go	Double End			
Size	2A or 3A	Gage	Handle Only	Handle Size	
	Members	W/Handle			
# 0-80 UNF	304.00	628.00	20.00	# 000	
# 1-64 UNC	304.00	628.00	20.00	# 000	
# 1-72 UNF	304.00	628.00	20.00	# 000	
# 2-56 UNC	304.00	628.00	20.00	# 000	
# 2-64 UNF	304.00	628.00	20.00	# 000	
# 3-48 UNC	279.00	578.00	20.00	# 000	
# 3-56 UNF	279.00	578.00	20.00	# 000	
# 4-40 UNC	279.00	578.00	20.00	# 00	
# 4-48 UNF	279.00	578.00	20.00	# 00	
# 5-40 UNC	253.00	526.00	20.00	# 00	
# 5-44 UNF	253.00	526.00	20.00	# 00	
# 6-32 UNC	253.00	526.00	20.00	# 00	
# 6-40 UNF	253.00	526.00	20.00	# 00	
# 8-32 UNC	253.00	526.00	20.00	# 0	
# 8-36 UNF	253.00	526.00	20.00	# 0	
# 10-24 UNC	253.00	526.00	20.00	# 0	
# 10-32 UNF	253.00	526.00	20.00	# 0	
# 12-24 UNC	253.00	526.00	20.00	# 0	
# 12-28 UNF	253.00	526.00	20.00	# 0	
# 12-32 UNEF	317.00	654.00	20.00	# 0	
1/4-20 UNC	213.00	446.00	20.00	# 1	
1/4-28 UNF	213.00	446.00	20.00	# 1	
1/4-32 UNEF	287.00	594.00	20.00	# 1	
5/16-18 UNC	213.00	446.00	20.00	# 1	
5/16-24 UNF	213.00	446.00	20.00	# 1	
5/16-32 UNEF	315.00	650.00	20.00	# 1	
3/8-16 UNC	227.00	474.00	20.00	# 2	
3/8-24 UNF	227.00	474.00	20.00	# 2	
3/8-32 UNEF	344.00	708.00	20.00	# 2	
7/16-14 UNC	227.00	474.00	20.00	# 2	
7/16-20 UNF	227.00	474.00	20.00	# 2	
7/16-28 UNEF	344.00	708.00	20.00	# 2	
1/2-13 UNC	247.00	514.00	20.00	# 2	
1/2-20 UNF	247.00	514.00	20.00	# 2	
1/2-28 UNEF	358.00	736.00	20.00	# 2	

5. Special marking may be added for an additional charge. (\$20.00 min)

- 6. Long Form certifications are required, add \$40.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 8. J series thread add \$10.00 per plug member.



* Progressive master setting plugs differ from conventional truncated setting plugs in that the plug member contains two distinct P.D. limit areas. The limits are based on the Min. and Max. P.D. limits for the ring gage it will be used to inspect. The front portion contains the minimum P.D. limit with a full form major diameter, while the back portion contains the maximum P.D. limit with a truncated major diameter.



Pennoyer-Dodge Co. *Progressive Setting Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and class of fit.
- Example: 1/4-28 UNF-2A Progressive
- 3. Go or Not Go or a complete double end.
- Handles: Either single end or double end. Handles ordered in colors other than Red or Green add \$20.00 per handle.

CLASS X P.D. RIGHT HAND PROGRESSIVE SETTING PLUG GAGES				
		ON LEAD & AI	VGLE	
	Go or	Complete		
Nominal	Not Go	Double End	Handle Only	Handle Size
Size	2A or 3A	Gage	Hanule Only	Fiditule Size
	Members	W/Handle		
9/16-12 UNC	274.00	568.00	20.00	# 3
9/16-18 UNF	270.00	560.00	20.00	# 3
9/16-24 UNEF	363.00	746.00	20.00	# 3
5/8-11 UNC	285.00	590.00	20.00	# 3
5/8-18 UNF	270.00	560.00	20.00	# 3
5/8-24 UNEF	370.00	760.00	20.00	# 3
11/16-24 UNEF	374.00	768.00	20.00	# 3
3/4-10 UNC	319.00	658.00	20.00	# 3
3/4-16 UNF	310.00	640.00	20.00	# 3
3/4-20 UNEF	378.00	776.00	20.00	# 3
13/16-20 UNEF	423.00	866.00	20.00	# 3
7/8-9 UNC	342.00	704.00	20.00	# 4
7/8-14 UNF	324.00	668.00	20.00	# 4
7/8-20 UNEF	438.00	896.00	20.00	# 4
15/16-20 UNEF	453.00	926.00	20.00	# 4
1-8 UNC	423.00	866.00	20.00	# 4
1-12 UNF	404.00	828.00	20.00	# 4
1-14 UNS	404.00	828.00	20.00	# 4
1-20 UNEF	478.00	976.00	20.00	# 4
1 1/16-18 UNEF	501.00	1022.00	20.00	# 4
1 1/8-7 UNC	483.00	986.00	20.00	# 4
1 1/8-12 UNF	455.00	930.00	20.00	# 4
1 1/8-18 UNEF	501.00	1022.00	20.00	# 4
1 3/16-18 UNEF	530.00	1080.00	20.00	# 5
1 1/4-7 UNC	530.00	1080.00	20.00	# 5
1 1/4-12 UNF	510.00	1040.00	20.00	# 5
1 1/4-18 UNEF	530.00	1080.00	20.00	# 5
1 5/16-18 UNEF	576.00	1172.00	20.00	# 5
1 3/8-6 UNC	610.00	1240.00	20.00	# 5
1 3/8-12 UNF	569.00	1158.00	20.00	# 5
1 3/8-18 UNEF	585.00	1190.00	20.00	# 5
1 7/16-18 UNEF	632.00	1284.00	20.00	# 5
1 1/2-6 UNC	580.00	1180.00	20.00	# 5
1 1/2-12 UNF	580.00	1180.00	20.00	# 5
1 1/2-18 UNEF	634.00	1288.00	20.00	# 5

5. Special marking may be added for an additional charge. (\$20.00 min)

- 6. Long Form certifications are required, add \$40.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 8. "J" series thread add \$10.00 per plug member.



* Progressive master setting plugs differ from conventional truncated setting plugs in that the plug member contains two distinct P.D. limit areas. The limits are based on the Min. and Max. P.D. limits for the ring gage it will be used to inspect. The front portion contains the minimum P.D. limit with a full form major diameter, while the back portion contains the maximum P.D. limit with a truncated major diameter.



Pennoyer-Dodge Co. Metric Thread Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and threads per inch and
- class of fit. Example: 10.00 x 1.25-6H
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other

CLASS X R	IGHT HAND	METRIC THRE	AD PLUG GA	GES	CLASS X RIGHT HAND METRIC THREAD PLUG GAGES									
Nominal Size	Go or Not Go 6h	Complete Double End Gage W/Handle	Handle Only	Handle Size										
M1.6 x 0.35	80.00	180.00	20.00	# 000										
M2.0 x 0.40	71.00	162.00	20.00	# 000										
M2.5 x 0.45	68.00	156.00	20.00	# 000										
M3.0 x 0.50	68.00	156.00	20.00	# 00										
M3.5 x 0.60	63.00	146.00	20.00	# 00										
M4.0 x 0.70	63.00	146.00	20.00	# 0										
M5.0 x 0.80	63.00	146.00	20.00	# 0										
M6.0 x 1.00	54.00	128.00	20.00	# 0										
M8.0 x 1.25	54.00	128.00	20.00	# 1										
M10 x 1.00	61.00	142.00	20.00	# 2										
M10 x 1.25	57.00	134.00	20.00	# 2										
M10 x 1.50	57.00	134.00	20.00	# 2										
M12 x 1.25	57.00	134.00	20.00	# 2										
M12 x 1.50	57.00	134.00	20.00	# 2										
M12 x 1.75	57.00	134.00	20.00	# 2										
M14 x 1.50	62.00	144.00	20.00	# 3										
M14 x 2.00	62.00	144.00	20.00	# 3										
M16 x 1.50	65.00	150.00	20.00	# 3										
M16 x 2.00	65.00	150.00	20.00	# 3										
M18 x 1.50	68.00	156.00	20.00	# 3										
M18 x 2.50	68.00	156.00	20.00	# 3										

- than Red or Green add \$20.00 per handle. 5. Special marking may be added for an additional charge. (\$20.00 min).
 - Long Form Calibration Reports are required add \$20.00 per member.
 - 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
 - 8. CHROME: Add 55% to each member.
 - 9. For "MJ Series", Add \$10.00 per plug member.





Pennoyer-Dodge Co. Metric Reversible Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal metric size and metric threads
- per inch and class of fit. Example: 10.00 x 1.25-6H
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other

than Red or Green collets and other than plain handles, call for current pricing.

CLASS X RIGHT HAND METRIC REVERSIBLE THREAD PLUG GAGES

Nominal Size	Go or Not Go 6h	Complete Double End Gage W/Handle	Handle Only	Handle Size
M1.6 x 0.35	101.00	226.00	24.00	# 1W
M2.0 x 0.40	93.00	210.00	24.00	# 2W
M2.5 x 0.45	93.00	210.00	24.00	# 2W
M3.0 x 0.50	81.00	186.00	24.00	# 2W
M3.5 x 0.60	81.00	186.00	24.00	# 2W
M4.0 x 0.70	76.00	176.00	24.00	# 2W
M5.0 x 0.80	76.00	180.00	28.00	# 3W
M6.0 x 1.00	74.00	176.00	28.00	# 3W
M8.0 x 1.25	70.00	168.00	28.00	# 4W
M10 x 1.25	76.00	180.00	28.00	# 5W
M10 x 1.50	76.00	180.00	28.00	# 5W
M12 x 1.25	76.00	180.00	28.00	# 5W
M12 x 1.50	76.00	180.00	28.00	# 5W
M12 x 1.75	76.00	180.00	28.00	# 5W

- 5. Special marking may be added for an additional charge. (\$20.00 min).
- ⁶ Long Form Calibration Reports are required, add \$20.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 8. CHROME: add 55% to each member.





Pennoyer-Dodge Co. Metric Thread Ring Gages

EXAMPLE: Add 55% for size 5.0mm and up, per ring.

American Gage Design

How To Order 1. State Quantity desired.

- Special marking may be added for an additional charge(\$20.00 min).
 Long Form Calibration Reports add \$20.00 per member.
 Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
 - 7. CHROME: Add 55% for size 5.0mm and up, per ring
 - 8. For "MJ Series", add \$80.00 per GO ring.

per inch and class of fit. Example: 10.00 x 1.25-6g 3. Go or Not Go or a complete set of rings.

2. Nominal metric size and metric threads

CLASS X R	IGHT HAND	METRIC THRE	AD RING GA	GES
Nominal Size	Go or Not Go 6g Rings	Go and Not Go 6g Pair of Rings	Ring Holder	Ring Holder Size
M1.6 x 0.35	207.00	414.00	30.00	# 1T
M2.0 x 0.40	178.00	356.00	30.00	# 1T
M2.5 x 0.45	178.00	356.00	30.00	# 1T
M3.0 x 0.50	158.00	316.00	30.00	# 1T
M3.5 x 0.60	158.00	316.00	30.00	# 1T
M4.0 x 0.70	148.00	296.00	30.00	# 1T
M5.0 x 0.80	148.00	296.00	30.00	# 1T
M6.0 x 1.00	132.00	264.00	30.00	# 1T
M8.0 x 1.25	132.00	264.00	30.00	# 2T
M10 x 1.25	139.00	278.00	30.00	# 3T
M10 x 1.50	139.00	278.00	30.00	# 3T
M12 x 1.25	143.00	286.00	30.00	# 3T
M12 x 1.50	148.00	296.00	30.00	# 3T
M12 x 1.75	148.00	296.00	30.00	# 3T
M14 x 1.50	163.00	326.00	35.00	# 4T
M14 x 2.00	163.00	326.00	35.00	# 4T
M16 x 1.50	163.00	326.00	35.00	# 4T
M16 x 2.00	163.00	326.00	35.00	# 4T
M18 x 1.50	218.00	436.00	35.00	# 4T
M18 x 2.50	255.00	510.00	35.00	# 4T
M20 x 1.50	265.00	530.00	35.00	# 4T
M20 x 2.50	265.00	530.00	35.00	# 4T
M22 x 1.50	270.00	540.00	40.00	# 5T





Pennoyer-Dodge Co. Metric Truncated Setting Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- Nominal metric size and metric threads per inch and class of fit.
- Example: 10.00 x 1.25-6g
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other

CLASS X RIGHT HAND METRIC SETTING PLUG GAGES W-TOL ON LEAD & ANGLE Nominal Size Go or Not Go 6g W/Handle Complete Double End Gage W/Handle

	6g	W/Handle		
M1.6 x 0.35	144.00	308.00	20.00	# 000
M2.0 x 0.40	134.00	288.00	20.00	# 000
M2.5 x 0.45	134.00	288.00	20.00	# 000
M3.0 x 0.50	130.00	280.00	20.00	# 00
M3.5 x 0.60	130.00	280.00	20.00	# 00
M4.0 x 0.70	126.00	272.00	20.00	# 0
M5.0 x 0.80	126.00	272.00	20.00	# 0
M6.0 x 1.00	113.00	246.00	20.00	# 0
M8.0 x 1.25	113.00	246.00	20.00	# 1
M10 x 1.25	122.00	264.00	20.00	# 2
M10 x 1.50	122.00	264.00	20.00	# 2
M12 x 1.25	124.00	268.00	20.00	# 2
M12 x 1.50	124.00	268.00	20.00	# 2
M12 x 1.75	124.00	268.00	20.00	# 2
M14 x 1.50	144.00	308.00	20.00	# 3
M14 x 2.00	144.00	308.00	20.00	# 3
M16 x 1.50	144.00	308.00	20.00	# 3
M16 x 2.00	144.00	308.00	20.00	# 3
M18 x 1.50	156.00	332.00	20.00	# 3
M18 x 2.50	160.00	340.00	20.00	# 3
M20 x 1.50	160.00	340.00	20.00	# 3
M20 x 2.50	160.00	340.00	20.00	# 3
M22 x 1.50	218.00	456.00	20.00	# 4

- than Red or Green add \$20.00 per handle.
- 5. Special marking may be added for an additional charge. (\$20.00 min).
- 6. Long Form Calibration Reports are required, add \$20.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 8. "W" tolerance P.D.: add 30%.
- 9. Full Form set plugs available upon request.
- 10. For "MJ Series", add \$10.00





Pennoyer-Dodge Co. NPTF Taper Pipe Ring & Plug Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal size and L-1, L-2, or plain taper for ring gages and L-1, L-3, or
- plain taper for plug gages.
- Example: 1/16-27 NPTF L-2 RING
- 3. Handles: Either single end or double end. Handles ordered in colors other
- than Red or Green add \$20.00 each per handle.
- 4. Special marking for an additional charge, (\$20.00 min.)
- 5. NPTF plugs come with one basic step. If MN and /or MX steps desired, add \$35.00 per each additional step 1/16-27 to 1 1/2, Above 1 1/2, \$50.00.
- Long Form Calibration Reports are required, add \$20.00 per member.
- 7.Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)

NPTF TAPER PIPE THREAD GAGES										
Nominal Size	L-1 Ring Gage	L-2 ring Gage	Plain Taper Ring Gage	L-1 Plug Gage	L-3 Plug Gage	Plain Taper Plug Gage	Handle Only	Handle Size		
1/16 - 27	283.00	331.00	361.00	129.00	149.00	232.00	20.00	#1		
1/8 - 27	252.00	331.00	361.00	116.00	118.00	232.00	20.00	#2		
1/4 - 18	247.00	340.00	361.00	121.00	124.00	232.00	20.00	#3		
3/8 - 18	258.00	340.00	361.00	142.00	149.00	232.00	20.00	#3		
1/2 - 14	273.00	355.00	361.00	158.00	165.00	232.00	20.00	#4		
3/4 - 14	299.00	378.00	408.00	170.00	185.00	255.00	20.00	#4		
1 - 11.5	324.00	421.00	433.00	190.00	208.00	269.00	20.00	#5		
1 1/4 - 11.5	384.00	474.00	464.00	210.00	221.00	283.00	20.00	#5		
1 1/2 - 11.5	403.00	505.00	525.00	239.00	247.00	311.00	20.00	#5		
2 - 11.5	494.00	590.00	577.00	288.00	294.00	424.00	20.00	#5		
2 1/2 - 8	561.00	703.00	675.00	453.00	464.00	634.00	35.00	#6		
3 - 8	689.00	830.00	819.00	505.00	510.00	695.00	35.00	#6		



NOTE:

Master gages for NPT working gages are L-1 design.

Master gages for NPTF working gages are special design to encompass the L-1 and L-3 length for the master ring and the L-2 and L-3 length on the master plug. A set consists of (1) master plug and (1) master ring.

MIL-P-7105B and SAE-AS-71051 does not specify design on ANPT master. Pennoyer-Dodge Co. designs these masters the same as the NPTF.



Pennoyer-Dodge Co. ANPT Taper Pipe Ring & Plug Gages

than Red or Green add \$20.00 each per handle

4. Special marking for an additional charge, (\$20.00 min.)

5. ANPT plugs come with one basic step. If MN and /or MX steps desired, add \$35.00 per each additional step 1/16-27 to 1 1/2, Above 1 1/2, \$50.00.
6.Long Form Calibration Reports are required, add \$20.00 per member.

7 Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)

American Gage Design

How To Order

1. State Quantity desired.

2. Nominal size and L-1, L-2, or

plain taper for ring gages and L-1,

L-3, or plain taper for plug gages.

Example: 1/16-27 ANPT L-1 RING

3. Handles: Either single end or double end. Handles ordered in colors other

	ANPT TAPER PIPE THREAD GAGES										
Nominal Size	L-1 Ring Gage	L-2 ring Gage	Plain Taper Ring Gage	L-1 Plug Gage	L-3 Plug Gage	Plain Taper Plug Gage	Handle Only	Handle Size			
1/16 - 27	283.00	336.00	366.00	185.00	227.00	232.00	20.00	#1			
1/8 - 27	252.00	336.00	366.00	185.00	185.00	232.00	20.00	#2			
1/4 - 18	247.00	340.00	366.00	185.00	185.00	232.00	20.00	#3			
3/8 - 18	258.00	340.00	366.00	175.00	185.00	232.00	20.00	#3			
1/2 - 14	273.00	355.00	366.00	165.00	185.00	232.00	20.00	#4			
3/4 - 14	299.00	399.00	409.00	190.00	191.00	255.00	20.00	#4			
1 - 11.5	324.00	432.00	433.00	193.00	227.00	269.00	20.00	#5			
1 1/4 - 11.5	384.00	482.00	464.00	210.00	227.00	283.00	20.00	#5			
1 1/2 - 11.5	403.00	507.00	525.00	239.00	232.00	311.00	20.00	#5			
2 - 11.5	494.00	604.00	577.00	288.00	273.00	424.00	20.00	#5			
2 1/2 - 8	561.00	718.00	677.00	453.00	438.00	654.00	35.00	#6			
3 - 8	689.00	848.00	827.00	505.00	494.00	710.00	35.00	#6			



NOTE:

Master gages for NPT working gages are L-1 design.

Master gages for NPTF working gages are special design to encompass the L-1 and L-3 length for the master ring and the L-2 and L-3 length on the master plug. A set consists of (1) master plug and (1) master ring.

MIL-P-7105B and SAE-AS-71051 does not specify design on ANPT master. Pennoyer-Dodge Co. designs these masters the same as the NPTF.



Pennoyer-Dodge Co. NPT Taper Pipe Ring & Plug Gages

American Gage Design

How To Order

1. State Quantity desired.

- 2. Nominal size and L-1 for ring gages or for plug gages.
- Example: 1/16-27 NPT L-1 RING or 1/16-27 NPT L-1 PLUG

3. Handles: Either single end or double end. Handles ordered in colors other than Red or Green add \$20.00 each per handle.

NPT TAPER PIPE THREAD GAGES									
Nominal Size	L-1 Ring Gage	L-1 Plug Gage	Handle Only	Handle Size					
1/16-27	283.00	113.00	20.00	# 1					
1/8-27	232.00	87.00	20.00	# 2					
1/4-18	242.00	89.00	20.00	# 3					
3/8-18	252.00	98.00	20.00	# 3					
1/2-14	273.00	111.00	20.00	# 4					
3/4-14	294.00	126.00	20.00	# 4					
1"- 11.5	319.00	139.00	20.00	# 5					
1 1/4 - 11.5	384.00	155.00	20.00	# 5					
1 1/2 - 11.5	403.00	175.00	20.00	# 5					
2" - 11.5	494.00	211.00	20.00	# 5					
2 1/2 - 8	561.00	263.00	35.00	# 6					
3"- 8	615.00	304.00	35.00	# 6					
3 1/2 - 8	846.00	453.00	40.00	# 7					
4" - 8	1037.00	500.00	40.00	# 7					
5" - 8	1211.00	711.00	40.00	# 7					
<mark>6" - 8</mark>	1421.00	834.00	40.00	#7					

- Special marking for an additional charge, (\$20.00 min.)
 NPT plugs come with one basic step. If MN and /or MX steps desired, add \$35.00 per each additional step 1/16-27 to 1 1/2, Above 1 1/2, \$50.00.
- 6. Long Form Calibration Reports are required, add \$20.00 per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)



NOTE:

Master gages for NPT working gages are L-1 design.

Master gages for NPTF working gages are special design to encompass the L-1 and L-3 length for the master ring and the L-2 and L-3 length on the master plug. A set consists of (1) master plug and (1) master ring.

MIL-P-7105B and SAE-AS-71051 does not specify design on ANPT master. Pennoyer-Dodge Co. designs these masters the same as the NPTF.



Pennoyer-Dodge Co. Cylindrical Taperlock Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal decimal size and tolerance class. Examples: .1500 class XX Go member, .1500 XX Go S.E., .1500 - .1509 XX D.E. Gage.
- 3. Go or Not Go or a complete double end.
- Handles, either single end or double end. Handles ordered in colors other than Red or Green add \$20.00 per handle.
- Special marking may be added for an additional charge. (\$20.00 min).
 Long Form calibration reports must be purchased on all classes: add \$20.00
- per member.
- 7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 8. CHROME: Add 55% to each member.

	CYLINDRICAL TAPERLOCK GAGES										
Nominal Size		Go Class XX Members	Not Go Class XX Members	Go & Not Go D.E. Class XX W/Handle	Go Class X Members	Not Go Class X Members	Go & Not Go D.E. Class X	Go Class Y & Z Members	Not Go Class Y & Z Mombors	Go & Not Go D.E. Class Y & Z	Handle Only
Above	To & Incl			w/nativie	WEITDEIS		w/natiule	W/Handle		Members W/Handle	
0.059 (1.499mm)	0.105 (2.667mm)	96.00	<mark>88.00</mark>	204.00	84.00	70.00	174.00	72.00	70.00	<mark>1</mark> 62.00	20.00
0.105 (2.667mm)	0.230 (5.842mm)	83.00	82.00	185.00	72.00	66.00	158.00	69.00	66.00	<mark>1</mark> 55.00	20.00
0.230 (5.842mm)	0.510 (12.954mm)	83.00	82.00	185.00	72.00	68.00	160.00	70.00	68.00	<mark>1</mark> 58.00	20.00
0.510 (12.954mm)	0.825 (20.955mm)	92.00	90.00	202.00	78.00	73.00	171.00	75.00	72.00	1 67.00	20.00
0.825 (20.955mm)	1.135 (28.829mm)	95.00	<mark>93.00</mark>	208.00	82.00	76.00	178.00	78.00	75.00	173.00	20.00
1.135 (28.829mm)	1.510 (38.354mm)	97.00	96.00	213.00	90.00	83.00	193.00	81.00	76.00	177.00	20.00







American Gage Design

How To Order

- 1. State Quantity desired.
- 2. Nominal decimal size and tolerance class and Go, Not Go or Master. Examples: 1500 class XX Go member, 1500 XX Go S.E.,
 - .1500 .1509 XX D.E. Gage.
- 3. Types: Go, Not Go or Master, single end or a complete double end.

4. Handles: Either single end or double end. Handles ordered in colors other than Red or Green collets and other than plain handles, call for current pricing.

Special marking may be added for an additional charge. (\$20.00 min).

6. Long Form calibration reports must be purchased on all classes: add \$20.00 per member.

7. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)

- 8. All pin style above 1.010, price upon application.
- 9 CHROME: Add 55% to each member.
- Sizes < .080, price upon application.
- 10. XXX gages price upon application, on sizes .125 and larger.
- 11. Use Z prices shown below for inch sizes in thousands and half thousands, and two decimal places metric sizes. For Z pin sizes other than this, use X & Y column pricing.
- 12. Extra length gages available, price on application.

	CYLINDRICAL REVERSABLE GAGES										
Nominal Size		Class XX Member	Class XX Double End	Class X & Y MemberS	Class X & Y Double End	Class Z Members	Class Z Double End	Handle Only			
Above	To & Incl										
.035 (0.889mm)	.075 (1.905mm)	119.00	262.00	79.00	182.00	71.00	166.00	24.00			
.075 (1.905mm)	.180 (4.572mm)	108.00	240.00	72.00	168.00	65.00	154.00	24.00			
.180 (4.572mm)	.281 (7.137mm)	93.00	210.00	62.00	148.00	56.00	136.00	24.00			
.281 (7.137mm)	.406 (10.312mm)	93.00	214.00	62.00	152.00	56.00	140.00	28.00			
.406 (10.312mm)	.510 (12.954mm)	95.00	218.00	63.00	154.00	57.00	142.00	28.00			
.510 (12.954mm)	.635 (16.129mm)	104.00	241.00	69.00	171.00	62.00	157.00	33.00			
.635 (16.129mm)	.760 (19.304mm)	110.00	253.00	73.00	179.00	66.00	165.00	33.00			
.760 (19.304mm)	1.010 (25.654mm)	128.00	299.00	85.00	213.00	77.00	197.00	43.00			



Handle Size	Above	To & Including
1W	.030	.075
2W	.075	.180
3W	.180	.281
4W	.281	.406
5W	.406	.510
6W	.510	.635
7W	.635	.760
8W	.760	1.010



Pennoyer-Dodge Co. Cylindrical Trilock Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- Nominal decimal size and tolerance class class and Go, Not Go or Master. Examples: .1500 class XX Go member, .1500 XX Go S.E., .1500 - .1509 XX D.E. Gage.
- 3. Go or Not Go or a complete double end.
- 4. Handles: Either single end or double end. Handles ordered in colors other than Red or Green add \$20.00 per handle.
- Special marking may be added for an additional charge. (\$20.00 min).
 Long Form calibration reports must be purchased on all classes: add \$20.00 per member.
- per member. 7 Calibration stickers available @ \$10.00 per sticker (advise calibration cycle) 8 All pin style above .760 up to and including 1.500 price upon application.
- All prinsiple above .760 up to and including 1.500 price upon application.
 All trilock style from .760 up to and including 1.500 price upon application.
- 10. CHROME: Add 55% to each member
- 11.XXX gages quoted upon request.

	CYLINDRICAL TRILOCK GAGES										
Nomir	nal Size	Go Class XX Members	Not Go Class XX Members	Go & Not Go Double End Class XX	Go Class X Members	Not Go Class X Members	Go & Not Go Double End Class X	Go Class Y & Z Mambara	Not Go Class Y & Z	Go & Not Go Double End Class Y & Z	Handle Only
Above	To & Incl.			W/Handle			W/Handle	Members	Members	W/Handle	
1.510 (38.354mm)	2.010 (51.054mm)	138.00	133.00	306.00	130.00	117.00	282.00	126.00	112.00	273.00	35.00
2.010 (51.054mm)	2.510 (63.754mm)	167.00	147.00	349.00	143.00	129.00	307.00	130.00	120.00	285.00	35.00
2.510 (63.754mm)	3.010 (76.454mm)	194.00	167.00	431.00	168.00	134.00	372.00	143.00	132.00	345.00	35.00
3.010 (76.454mm)	3.510 (89.154mm)	283.00	223.00	586.00	239.00	210.00	529.00	210.00	194.00	484.00	40.00





Pennoyer-Dodge Co. Cylindrical Progressive Gages

American Gage Design

How To Order

- 1. State Quantity desired.
- Nominal decimal size and tolerance class and Go, Not Go or Master. Examples: .1500 class XX Go member, .1500 XX Go S.E., .1500 - .1509 XX D.E. Gage.
- 5. Long Form calibration reports must be purchased on all classes: add 4.00 per member.
- 6. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle)
- 7. CHROME: Add 55% to each member.
- Handles: Either single end or double end. Handles ordered in colors other than Red or Green add \$20.00 per handle.
- 4. Special marking may be added for an additional charge. (\$20.00 min).

CYLINDRICAL PROGRESSIVE GAGES										
Nomi	Class XX Members	Class X Members	Class Y & Z Members	Handle Only						
.059 (1.499mm)	.105 <mark>(2.667</mark> mm)	C.I.Q.	C.I.Q.	C.I.Q.	20.00					
.105 (2.667mm)	.150 (3.810mm)	135.00	123.00	114.00	20.00					
.150 (3.810mm)	.185 (4.699mm)	133.00	121.00	109.00	20.00					
.185 (4.699mm)	.230 (5.842mm)	135.00	121.00	110.00	20.00					
.230 (5.842mm)	.365 (9.271mm)	135.00	121.00	111.00	20.00					
.365 (9.271mm)	.510 (12.954mm)	138.00	121.00	113.00	20.00					
.510 (12.954mm)	.635 (16.129mm)	147.00	131.00	121.00	20.00					
.635 (16.129mm)	.760 (19.304mm)	147.00	131.00	121.00	20.00					
.760 (19.304mm)	.825 (20.955mm)	149.00	131.00	121.00	20.00					
.825 (20.955mm)	1.135 (28.829mm)	164.00	140.00	135.00	20.00					
1.135 (28.829mm)	1.510 (38.354mm)	187.00	146.00	137.00	20.00					





Pennoyer-Dodge Co. Cylindrical Ring Gages

American Gage Design

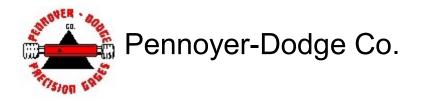
How To Order

State Quantity desired.
 Nominal decimal size and tolerance class.

- 6. Calibration stickers available @ \$10.00 per sticker (advise calibration cycle) 7. CHROME: Add 55% per ring for .125 and up.
- 8. XXX Master rings quoted upon request.

- Example: .150 class XX
- 3. Go or Not Go or a Master ring.
- Special marking may be added for an additional charge. (\$20.00 min).
 Long Form calibration reports must be purchased on all classes: add \$20.00
- per member. CYLINDRICAL RING GAGES Nominal Class Class Class Size XX х Y & Z Members Members Members To & Incl. Above .062 (1.575mm) .070 (1.778mm) 255.00 235.00 224.00 .070 (1.778mm) .090 (2.286mm) 243.00 197.00 189.00 .090 (2.286mm) .150 (3.810mm) 197.00 243.00 187.00 .150 (3.810mm) .230 (5.842mm) 197.00 177.00 169.00 .230 (5.842mm) .365 (9.271mm) 164.00 152.00 144.00 .365 (9.271mm) .510 (12.954mm) 173.00 152.00 144.00 197.00 .510 (12.954mm) .825 (20.955mm) 177.00 169.00 .825 (20.955mm) 1.135 (28.829mm) 204.00 181.00 177.00 193.00 1.135 (28.829mm) 1.510 (38.354mm) 216.00 202.00 1.510 (38.354mm) 2.010 (51.054mm) 255.00 228.00 219.00 2.010 (51.054mm) 2.510 (63.754mm) 328.00 278.00 268.00 2.510 (63.754mm) 3.010 (76.454mm) 361.00 304.00 293.00 3.010 (76.454mm) 3.510 (89.154mm) 374.00 439.00 361.00 3.510 (89.154mm) 4.010 (101.854mm) 492.00 430.00 417.00 4.010 (101.854mm) 4.760 (120.904mm) 570.00 475.00 461.00 4.760 (120.904mm) 5.510 (139.954mm) 748.00 601.00 585.00





Gage Re-Calibration Charges

The following **"Standard Published"** prices are for calibration of customer submitted thread plugs; thread rings; pipe plugs and rings; and cylindrical plug and rings *regardless of calibration results*. Expedited, safety related and Special Calibration charges are priced on application and will not be waived, regardless of the calibration results.

> **Pennoyer-Dodge Co.** also manufacture's and/or calibrates many other types of gages. Please call/fax your inquiries.

Calibration of gages in accordance to ISO 10012-1, ANSI/NCSL Z540-1, Mil-Std-45662A. Minimum order is \$50.00

THREAD PLUGS (PER MEMBER)	STANDARDS	SET PLUGS	PIPE	SIX STEP
ANY SIZE 60 DEGREE & METRIC'S FROM # 0 THRU 3"	40.00	50.00	75.00	80.00
OVER 3" TO 6"	55.00	65.00	CALL	CALL
OVER 6" and High/Low	CALL FOR CURRENT PRICING	CALL FOR CURRENT PRICING	CALL FOR CURRENT PRICING	CALL FOR CURRENT PRICING

THREAD RINGS (PER RING)	STANDARDS	PIPE	SIX STEP
STANDARD UNC, UNF AND UNEF FROM # 0 TO 1 1/2"	50.00	90.00	90.00
SPECIALS 0-80 TO 3" (60 DEGREE)	80.00	100.00	100.00
OVER 3" (60 DEGREE)	CALL FOR CURRENT PRICING	CALL FOR CURRENT PRICING	CALL FOR CURRENT PRICING

CYLINDRICAL PLUGS	PER MEMBER	
UP TO .020	CALL FOR CURRENT PRICING	
Above .020 THRU 5.00	45.00	
OVER 5.00	CALL FOR CURRENT PRICING	
FOR XXX TOL. CALIBRATION	CALL FOR CURRENT PRICING	
CYLINDRICAL RINGS	PER MEMBER	
.059 THRU .125	90.00	
Above .125 THRU 4.010	80.00	
	90.00	
Above 4.010 THRU 6.010	90.00	
Above 4.010 THRU 6.010 OVER 6.010	90.00 CALL FOR CURRENT PRICING	



Pennoyer-Dodge Co.

Special Gage Listing Special Precision Gages Now Manufactured by Pennoyer-Dodge Company

PLUG GAGES - THREAD

Standard 60° N.F., N.C., UNC, UNF, UNJ, UNJF, NEF, UNEF Setting "X" and "W" tolerance S.T.I. "X" and "W" tolerance Acme 29° Stub & Trapezoidal Threads **Buttress Threads** Metric Threads Whitworth 55° Straight Pipe, NPSC,NPSF,NPSI, NPSM, NPSL Taper Pipe, NPT, NPTF, ANPT. BSP Taper Pipe, Setting **British Pipe Threads Taper Threads** Square Threads A N Port Hose Fittings **Position Gages**

RING GAGES- THREAD Metric 60°N.F., N.C., UNC, UNJ,

UNJF, NEF & UNEF Acme & Trapezoidal Buttress Whitworth 55° Straight Pipe, NPSC, NPSF, NPSI, NPSM, NPSL Taper Pipe, NPT, NPTF, ANPT British Pipe Taper Square

VARIABLE GAGING - INTER-NAL & EXTERNAL Tri rolls

Internal Thread Comparator

SNAP GAGES

Plain Adjustable Built-up Fixed Solid Special Indicating Roll Thread to Mil-Std-8879A and Mil-Std-7742A, Amendment No. 1 Methods A and B.

AIR GAGE TOOLING

Air Ring Air Probe Related Masters

OIL FIELD GAGES

Sucker Rod Casing Tubing Line Pipe Rotary

PLUG GAGES -PLAIN CYLINDRICAL

Flat, hex, & Square Progressive Type Plain Taper (Master) Brown & Sharpe, Medical Type Gages. Morse or any Special Taper to Print. Plain Cylindrical, Taperlock, Reversible, Trilock Master Disks Style 1,2 & 3 Paddle Type Depth M S Flush Flush Pin Functional A N Port **Thread Measuring Wires**

RING GAGES -PLAIN CYLINDRICAL

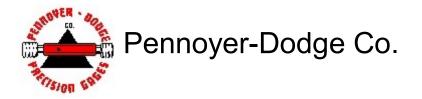
Plain, Go, Not Go, Master Setting Taper Progressive

SPECIAL TOOLING

Hole Location Gages Drill Fixtures Mandrills Template Gages Spanner Gages Receiver Gages Fixture Gages Functional Gages Concentricity & Runout Gages Profile Gages Crimping Tool Gages Flush Pin Gages Paddle Gages Chamber Gages

SPECIAL SERVICES

Certification on all types of Gages listed, traceable to N.I.S.T. Lead Screws Thread Grinding to close tolerances. Jig Grinding Lap I.D. and O.D. Lapping of Plugs and Rings -Both Plain and Threads.



Accurate Formula To Compute The Pitch And Major/Minor Diameters For Before Plate Thread Plugs And Thread Rings*

If no plating tolerance is given, then it is assumed that the maximum plating thickness will be nominal or minimum thickness given plus 50%. (see ASME B1.1-2003, pg. 64, 7.4.2; pg. 65, 7.5.2) The diameters of the gaging for external threads will be smaller while the diameters of the gaging for internal threads will be larger, than standard.

THREAD PLUGS

For the Go plug pitch diameter, add the MAX. amount of plate. For the Not Go pitch diameter, add the MIN. amount of plate. For the majors of work plugs, increase the major diameter on Go work plug by using half the MAX. amount of plate. On Not Go work plugs, increase the major diameter by using half the MIN. amount of plate.

Example

Based on .0002 to .0003 allowance per side (multiply by 4) .0002 X 4 = .0008 **MIN**. .0003 X 4 = .0012 **MAX**. 1/4-28 UNF 2B B/P <u>Basic GO P.D.</u> .2268 + .0012 **MAX**. = .2280 Go P.D. <u>Basic NOT GO P.D.</u> .2311 + .0008 **MIN**. = .2319 Not Go P.D. <u>Basic GO major</u> .2500 + (.0012 / 2) = .2506 B/P Go major. Basic NOT GO major .2466 + (.0008 / 2) = .2470 B/P Not Go major.

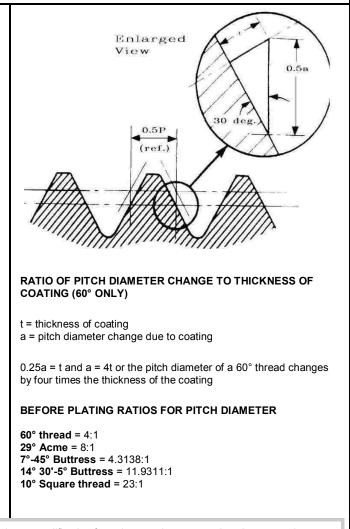
THREAD RINGS

For the Go ring, **subtract** the MAX. amount of plate. For the Not Go ring, **subtract** the MIN. amount of plate. For the minors of thread rings, **decrease** the minor diameter on the Go thread ring by using half the MAX. amount of plate. On Not Go thread rings, **decrease** the minor diameter by using half the MIN. amount of plate.

Example

Based on .0002 to .0003 allowance per side (multiply by 4) .0002 X 4 = .0008 MIN. .0003 X 4 = .0012 MAX. 1/4-28 UNF 2A B/P Basic GO P.D. .2258 - .0012 MAX. = .2246 Go P.D. Basic NOT GO P.D. .2225 - .0008 MIN. = .2217 Not Go P.D.

Basic GO minor .2103 - (.0012 / 2) = .2097 B/P Go minor. Basic NOT GO minor .2148 - (.0008 / 2) = .2144 B/P Not Go minor.



Anodic Coatings—When calculating dimensions for pre-anodize gaging, a modification from the two above examples given, must be made.

For example, when calculating the increase in dimensions for the pre-anodize work plug gages, the value of thickness amount of the anodize applied, must be, for gage calculations purposes, reduced by one half, i.e., if the minimum and maximum applied anodize thickness dimensions were, .0004 to .0006 per surface, the values used in the calculations, would be only one half of the application, or .0002 to .0003 per surface. The results, in this example, would then be the same values, as the example shown above for the thread plugs. For thread rings, the same procedure would be utilized, in reverse. Reference Data: MIL-A-8625F, page 16.

In accordance with ANSI/ASME B1.1 Latest Rev.

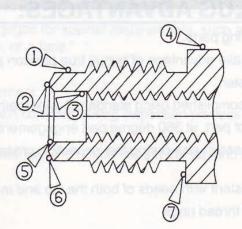
PENNOYER-DODGE CO. introduces "TWIST'ER GAGES"



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Functional Location - P.D. Limit & Size "When you want it Right ... and Right away"

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SPC



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"<u>TWISTER OUT</u>"

YOUR CHOICE FOR FUNCTIONAL THREADED AXIS LOCATION, REGARDLESS OF FEATURE SIZE

"TWISTER OUT" RING PRINCIPLE:

The "TWISTER OUT" ring with it's P.D. (Functional Diameter) related ground O.D. and faces, works by two independent thread gage sections that, when twisted, grips the flanks of the product thread. This locks and locates the functional thread axis of the product thread. At this point a variety of inspection techniques are possible, such as true position, runout, and concentricity to the part functional P.D. (Functional Diameter) datum.

"TWISTER OUT" RING FEATURES:

- Reliable functional pitch diameter datum source for location of functional thread axis position.
- · Accuracy to .0001
- No complicated moving parts.
- · Easily adapted for SPC.
- · Use of high quality tool steel (Chrome also available).
- Engineered and manufactured in the U.S.A.

"TWISTER OUT" RING ADVANTAGES:

Allows part manufacturer to accurately determine runout, perpendicularity, true position, and

 concentricity of part parameters to the P.D. (Functional Diameter) RFS EXAMPLE:

Ø.005 P.D. (Functional Diameter)

- Inspects functional thread plug gages for special requirements, such as: "Pitch diameter of gages must run within .0002 to centers, or a face."
- · Assures assemblability .
- Checks 360 degree part engagement.
- Major and minor diameters remain constant during inspection process as compared to alternate types of gaging.
- Portability and accuracy consistent with the needs of both the lab and manufacturing environment

Prices available upon application



Pennoyer-Dodge Co.

"<u>TWISTER IN</u>"

YOUR CHOICE FOR PRECISION THREAD LOCATION AND FUNCTIONAL SIZE

"TWISTER IN" PLUG PRINCIPLE:

The "TWISTER " plug works by movable thread gage segments that engage one flank angle, while the thread body engages the opposite thread flank angle of the product thread. The resultant "flank grip" establishes the functional size and/or functional thread axis of the part, depending on how the twister plug is fabricated.

"TWISTER IN" PLUG FEATURES:

- Reliable functional pitch diameter datum source for functional size determination and/or functional thread axis location.
- Accuracy to .0001
- · No complicated moving parts.
- Easily adapted for SPC.
- · Consistent readings.
- · Locks readings in place.
- · Use of high quality tool steel (Chrome also available).
- · Engineered and manufactured in the U.S.A.

"TWISTER IN" PLUG ADVANTAGES:

- Allows part manufacturer to take advantage of bonus
- true position part tolerancing 🛛 🕂 Ø.005 🕅 P.D. (Functional Diameter)
- <u>No need</u> for solid ring set master.
- · Assures assemblability.
- Can measure functional size of part, at 360 degree part engagement.
- Major diameter does not increase in size during the inspection process, as compared to alternate types of gages.
- · Portability and accuracy consistent with the needs of both the lab and manufacturing environment
- Calibrate adjustable and solid thread rings.

Prices available upon application

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All gages are certified in accordance to MIL-STD-45662A and are traceable to the N.I.S.T.



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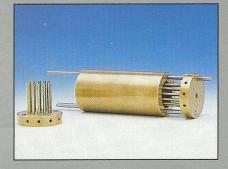
- Fabrication of custom gages to existing gage drawings.
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- Parts analysis and "troubleshooting".
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