



Dial Bore Gages

No. 82 Series .107-1.565"

No. 82M Series 2.7-39.75mm

Dial bore gages are available in convenient sets or with individual probes and dial indicators. Each set consists of a dial indicator, a body and actuating rod, two adjusting wrenches and the probes as specified below.

The head may be ordered separately (includes dial indicator, body, and two adjusting wrenches). Individual probes can also be ordered as listed. All probes are furnished with an actuating rod. These gages are also available with electronic indicators by special order.

Measurements are taken by comparison so some type of set master should be used as a reference standard. We recommend setting as close to the hole being measured as possible, and this can be easily done with gage blocks or with a micrometer. We can also furnish master setting rings – by request.

- ◆ The split-ball contact is self-centering and the two-point contact makes the gage useful for detecting hole geometry problems like taper, bell-mouth and out-of-roundness
- ◆ Reads to .0001" and 0.002mm
- ◆ Useful for controlling approach to tolerance without removing the workpiece from a machine
- ◆ Interchangeable probes are hard chrome plated and polished



Left, No. 82AZ; right, No. 82BZ.

Inch Reading

Total Range	No. of Probes	Range Each Probe	Max. Bore Depth	Graduation	Complete Sets		Heads Only	
					Cat. No.	EDP No.	Cat. No.	EDP No.
.107 - .266"	5	.107 - .140"; .139 - .172"; .171 - .203"; .202 - .234"; .233 - .266"	13/16"	.0001"	82AZ	55791	82AB1	66013
		.217 - .281"; .279 - .344"; .342 - .405"	1-1/2"					
		.403 - .469"; .467 - .532"; .530 - .594"	1-3/4"					
.560 - 1.565"	8	.560 - .690"; .685 - .815"; .810 - .940"	2-1/2"	.0001"	82CZ	55793	82C1	66026
		.935 - 1.065"; 1.060 - 1.190"; 1.185 - 1.315"; 1.310 - 1.440"; 1.435 - 1.565"	5"*					

Sets are furnished in attractive, protective case.

NOTES: *Includes insertion of gage body into bore.

Packed one in a box.

(Continued on next page.)



Dial Bore Gages No. 82 Series (continued)

Millimeter Reading

Total Range	No. of Probes	Range Each Probe	Max. Bore Depth	Graduation	Complete Sets		Heads Only**	
					Cat. No.	EDP No.	Cat. No.	EDP No.
2.7 - 6.76mm	5	2.7 - 3.55mm; 3.55 - 4.35mm; 4.35 - 5.15mm; 5.15 - 5.95mm; 5.95 - 6.76mm	20.6mm	0.002 mm	82MAZ	66010	82MAB1	66014
5.5 - 15.1mm	6	5.5 - 7.15mm; 7.1 - 8.75mm; 8.7 - 10.3mm	38mm		82MBZ	66011	82MAB1	66014
		10.25 - 11.9mm; 11.9 - 13.5mm; 13.5 - 15.1mm	44mm					
14.2 - 39.75mm	8	14.2 - 17.5mm; 17.4 - 20.7mm; 20.6 - 23.9mm	63mm		82MCZ	66012	82MC1	66027
		23.75 - 27.05mm; 26.9 - 30.2mm; 30.1 - 33.4mm; 33.3 - 36.6mm; 36.5 - 39.75mm	125mm*					

NOTES: *Includes insertion of gage body into bore. ** Includes dial indicator

Individual Probes Only

A Series

Range		Catalog No.	EDP No.
Inch	mm		
.107 - .140"	2.7 - 3.55mm	82A2	66015
.139 - .172"	3.55 - 4.35mm	82A3	66016
.171 - .203"	4.35 - 5.15mm	82A4	66017
.202 - .234"	5.15 - 5.95mm	82A5	66018
.233 - .266"	5.9 - 6.76mm	82A6	66019

B Series

Range	Catalog No.	EDP No.
.217 - .281"	82B2	66020
.279 - .344"	82B3	66021
.342 - .405"	82B4	66022
.403 - .469"	82B5	66023
.467 - .532"	82B6	66024
.530 - .594"	82B7	66025

C Series

Range		Catalog No.	EDP No.
Inch	mm		
.560 - .690"	14.2 - 17.5mm	82C2	66028
.685 - .815"	17.4 - 20.7mm	82C3	66029
.810 - .940"	20.6 - 23.9mm	82C4	66030
.935 - 1.065"	23.75 - 27.05mm	82C5	66031
1.060 - 1.190"	26.9 - 30.2mm	82C6	66032
1.185 - 1.315"	30.1 - 33.4mm	82C7	66033
1.310 - 1.440"	33.3 - 36.6mm	82C8	66034
1.435 - 1.565"	36.5 - 39.75mm	82C9	66035

NOTE: All probes come complete with actuating rod.

Sets are furnished in attractive, protective case; packed one in a box.



Dial Bore Gages

No. 84 Series 1-1/2 – 12-1/8"

No. 84M Series 38 - 308mm

These bore gages allow for bore measurements beyond the size range of our No. 82 Series.

They are comparison gages and should be set with a master ring gage, gage blocks with parallel jaws, outside micrometers or vernier calipers. Ring gages are available by request, quoted by application. Good practice is to set the gage to zero, as near to the desired dimension as possible.

Gages are well balanced, easy to use and have the following features:

- ◆ Can be easily held to inspect bores and hole sizes without removing the workpiece
- ◆ An adjustable range screw and two centralizing plungers provide accurate, three-point contact for tool alignment in larger bores
- ◆ All contacts and centralized plungers are of hardened tool steel for wear and spring-loaded for sensitivity
- ◆ The housing and knurled handle are aluminum for light weight and good balance
- ◆ Dial indicators have jewel bearings for sensitivity
- ◆ Bore depths are also available up to 12" (300mm) in 1" (25mm) increments on special order
- ◆ Also available with carbide contacts or electronic indicators with output capability on special order
- ◆ Furnished in finished wood case



Left, No. 84Z-111-4J;
right, No. 84Z-111-7J.



Above: Inspecting bore size with No. 84Z-111-4J.

1-1/2 – 12-1/8" Range

Total Range with Extension	No. Ext.	Range Each Extension	Max. Bore Depth	Plunger Travel	Indicator Grad.	Catalog No.	EDP
1-1/2 – 3"	5	1.500 - 1.800"; 1.800 - 2.100"; 2.100 - 2.400"; 2.400 - 2.700"; 2.700 - 3.000"	4"	.030"	.0001"	84Z-111-4J	56264
					.0005"	84Z-134-4J	56270
3 – 5-3/16"	3	3.000 - 3.750"; 3.750 - 4.468"; 4.468 - 5.187"	6"	.035"	.0001"	84Z-111-5J	50386
					.0005"	84Z-134-5J	50392
5 – 8-1/8"	3	5.000 - 6.187"; 6.187 - 7.125"; 7.125 - 8.125"	6"	.035"	.0001"	84Z-111-6J	50388
					.0005"	84Z-134-6J	50394
8 – 12-1/8"	2	8.000 - 10.000"; 10.000 - 12.125"	7"	.035"	.0001"	84Z-111-7J	50390
					.0005"	84Z-134-7J	50396

38 - 308mm Range

38 - 76.2mm	5	38 - 45.7mm; 45.7 - 53.35mm; 53.35 - 61mm; 61 - 68.6mm; 68.6 - 76.2mm	100mm	0.76mm	0.002mm	84MZ-161-4J	64922
					0.01mm	84MZ-181-4J	64923
76.2 - 131.75mm	3	76.2 - 95.25mm; 95.25 - 113.5 mm; 113.5 - 131.75mm	150mm	0.9mm	0.002mm	84MZ-161-5J	64924
					0.01mm	84MZ-181-5J	64925
127 - 206.37mm	3	127 - 157.15mm; 157.15 - 181mm; 181 - 206.37mm	150mm	0.9 mm	0.002mm	84MZ-161-6J	64926
					0.01mm	84MZ-181-6J	64927
203.2 - 308mm	2	203.2 - 254mm; 254 - 308mm	175mm	0.9mm	0.002mm	84MZ-161-7J	64928
					0.01mm	84MZ-181-7J	64929



Using the No. 84Z-111-4J with No. F2710-1 Electronic Indicator to check hole size.

Packed one in a box.