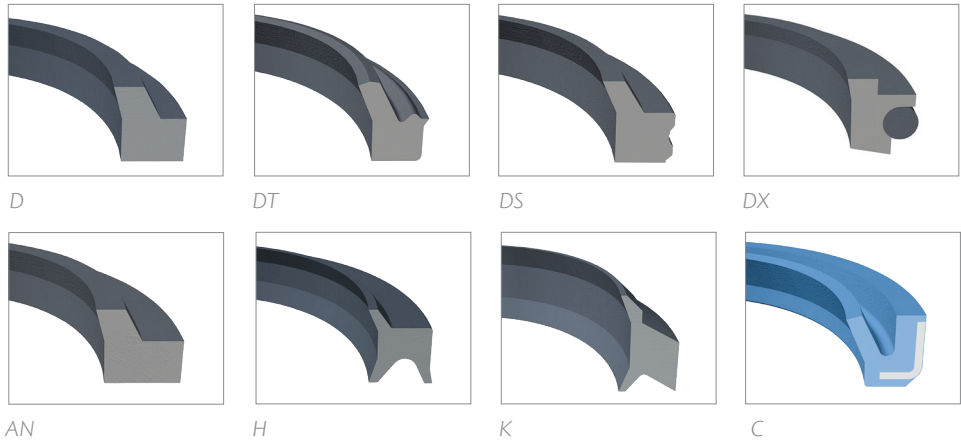
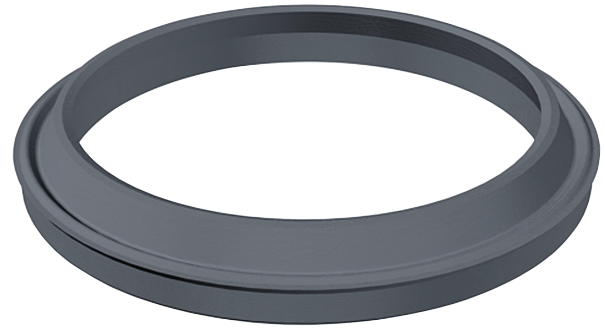


Standard Materials	Temp. Range		
Urethane (PU)	-54°C	to	105°C
Hydrogenated Nitrile (HNBR)	-40°C	to	160°C
Viton™/Fluorocarbon (FKM)	-26°C	to	204°C
Hytrel® /Fluorotrel™ (TPC-ET)	-54°C	to	149°C
Nitrile (NBR)	-40°C	to	120°C



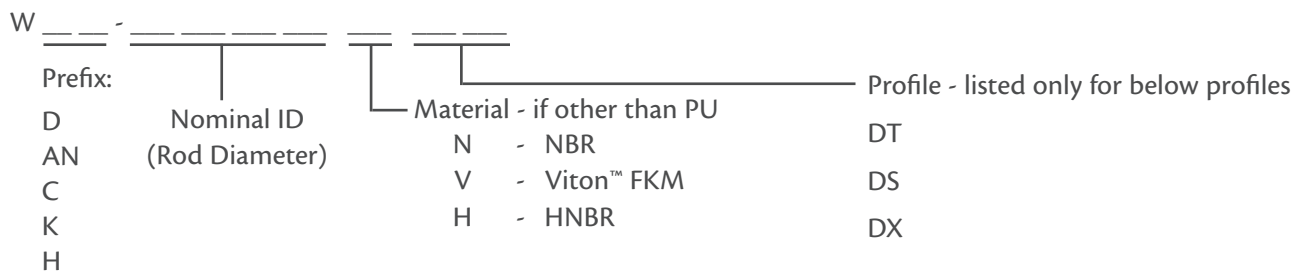
Additional styles such as Seal Guard, Trailmobile and Hyster are available upon request.

Product Description

Wipers are primarily designed to stop contaminants from entering a cylinder on the rod, however, they can also act as a secondary rod seal. If contaminants were to enter a cylinder it could lead to damage of the rod and/or other sealing components. A properly selected wiper could help reduce the need for unscheduled maintenance and even increase the time between maintenance cycles.

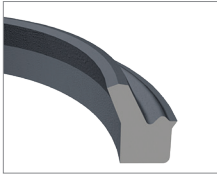
Our standard wiper material is 95A PU. It is important to select the appropriate wiper style and material for an application. When selecting the material for a wiper, remember to consider the required abrasion resistance, elasticity, resilience, and fluid compatibility.

Part Numbers:

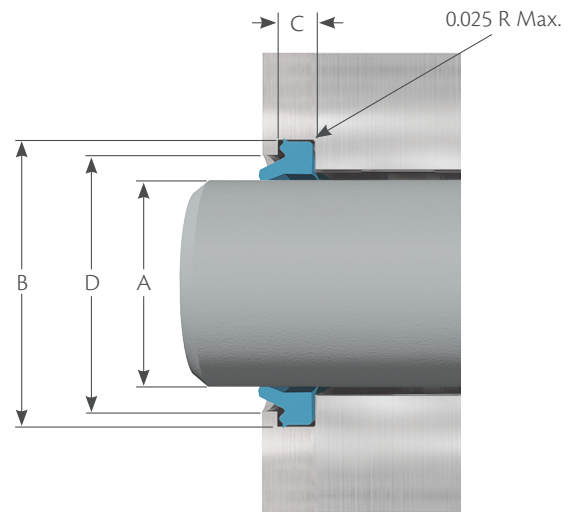


Example: WD 1250 - 1 - 1/4" Nominal ID, Wiper, PU, D Style
 WD 5750DT - 5 - 3/4" Nominal ID, Wiper, PU, DT Style

D, DT, DS and DX styles



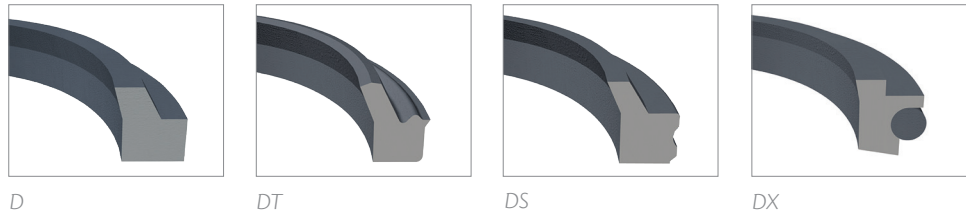
DT Wipers are a one piece snap-in type rod wiper designed for medium duty applications. The outside lip provides improved OD ingress resistance. The DT style wiper lip reduces apparent rod seal leakage with equivalent ingress resistance to a sharp lip wiper.



Part Number	A Shaft Diameter	B Groove Diameter +0.006 -0.000	C Groove Width +0.004 -0.000	D Shoulder Diameter +0.010 -0.000
WD 0250	0.250	0.497	0.124	0.410
WD 0312	0.313	0.560	0.124	0.475
WD 0375	0.375	0.622	0.124	0.535
WD 0437	0.438	0.685	0.124	0.600
WD 0500	0.500	0.747	0.124	0.660
WD 0562	0.563	0.810	0.124	0.725
WD 0625	0.625	0.872	0.124	0.785
WD 0687	0.688	0.935	0.124	0.850
WD 0750	0.750	1.122	0.187	0.995
WD 0812	0.813	1.185	0.187	1.060
WD 0875	0.875	1.247	0.187	1.120
WD 0937	0.938	1.310	0.187	1.185
WD 1000	1.000	1.372	0.187	1.245
WD 1062	1.063	1.435	0.187	1.310
WD 1125	1.125	1.497	0.187	1.370
WD 1187	1.188	1.560	0.187	1.435
WD 1250	1.250	1.622	0.187	1.495
WD 1312	1.313	1.685	0.187	1.560
WD 1375	1.375	1.747	0.187	1.620
WD 1437	1.438	1.810	0.187	1.685
WD 1500	1.500	1.872	0.187	1.745
WD 1562	1.563	1.935	0.187	1.810
WD 1625	1.625	1.997	0.187	1.870
WD 1687	1.688	2.060	0.187	1.935
WD 1750	1.750	2.122	0.187	1.995

Part Number	A Shaft Diameter	B Groove Diameter +0.006 -0.000	C Groove Width +0.004 -0.000	D Shoulder Diameter +0.010 -0.000
WD 1812	1.813	2.185	0.187	2.060
WD 1875	1.875	2.247	0.187	2.120
WD 1937	1.938	2.310	0.187	2.185
WD 2000	2.000	2.497	0.249	2.327
WD 2062	2.063	2.560	0.249	2.390
WD 2125	2.125	2.622	0.249	2.452
WD 2187	2.188	2.685	0.249	2.515
WD 2250	2.250	2.747	0.249	2.577
WD 2312	2.313	2.810	0.249	2.640
WD 2375	2.375	2.872	0.249	2.702
WD 2437	2.438	2.935	0.249	2.765
WD 2500	2.500	2.997	0.249	2.827
WD 2562	2.563	3.060	0.249	2.890
WD 2625	2.625	3.122	0.249	2.952
WD 2687	2.688	3.185	0.249	3.015
WD 2750	2.750	3.247	0.249	3.077
WD 2812	2.823	3.310	0.249	3.140
WD 2875	2.875	3.372	0.249	3.202
WD 2937	2.938	3.435	0.249	3.265
WD 3000	3.000	3.497	0.249	3.327
WD 3125	3.125	3.622	0.249	3.452
WD 3250	3.250	3.747	0.249	3.577
WD 3375	3.375	3.872	0.249	3.702
WD 3500	3.500	3.997	0.249	3.827
WD 3625	3.625	4.122	0.249	3.952

D, DT, DS and DX styles



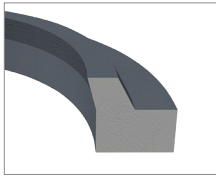
Part Number	A	B	C	D
	Shaft Diameter	Groove Diameter +0.006 -0.000	Groove Width +0.004 -0.000	Shoulder Diameter +0.010 -0.000
WD 3750	3.750	4.247	0.249	4.077
WD 3875	3.875	4.372	0.249	4.202
WD 4000	4.000	4.497	0.249	4.327
WD 4125	4.125	4.622	0.249	4.452
WD 4250	4.250	4.747	0.249	4.577
WD 4375	4.375	4.872	0.249	4.702
WD 4500	4.500	5.247	0.374	4.993
WD 4625	4.625	5.372	0.374	5.118
WD 4750	4.750	5.497	0.374	5.243
WD 4875	4.875	5.622	0.374	5.368
WD 5000	5.000	5.747	0.374	5.493
WD 5125	5.125	5.872	0.374	5.618
WD 5250	5.250	5.997	0.374	5.743
WD 5375	5.375	6.122	0.374	5.868
WD 5500	5.500	6.247	0.374	5.993
WD 5625	5.625	6.372	0.374	6.118
WD 5750	5.750	6.497	0.374	6.243
WD 5875	5.875	6.622	0.374	6.368
WD 6000	6.000	6.747	0.374	6.493
WD 6250	6.250	6.997	0.374	6.743
WD 6500	6.500	7.247	0.374	6.993
WD 6750	6.250	7.497	0.374	7.243
WD 7000	7.000	7.747	0.374	7.493

Part Number	A	B	C	D
	Shaft Diameter	Groove Diameter +0.006 -0.000	Groove Width +0.004 -0.000	Shoulder Diameter +0.010 -0.000
WD 7250	7.250	7.997	0.374	7.743
WD 7500	7.500	8.247	0.374	7.993
WD 7750	7.750	8.497	0.374	8.243
WD 8000	8.000	8.747	0.374	8.493
WD 8250	8.125	8.997	0.374	8.743
WD 8500	8.500	9.247	0.374	8.993
WD 8750	8.750	9.497	0.374	9.243
WD 9000	9.000	9.747	0.374	9.493
WD 9250	9.250	9.997	0.374	9.743
WD 9500	9.500	10.247	0.374	9.993
WD 9750	9.750	10.497	0.374	10.243
WD 10000	10.000	10.997	0.499	10.659
WD 10250	10.250	11.247	0.499	10.909
WD 10500	10.500	11.497	0.499	11.159
WD 10750	10.750	11.747	0.499	11.409
WD 11000	11.000	11.997	0.499	11.659
WD 11250	11.250	12.247	0.499	11.909
WD 11500	11.500	12.497	0.499	12.159
WD 11750	11.750	12.747	0.499	12.409
WD 12000	12.000	12.997	0.499	12.659
WD 12500	12.500	13.497	0.499	13.159
WD 13000	13.000	13.997	0.499	13.659

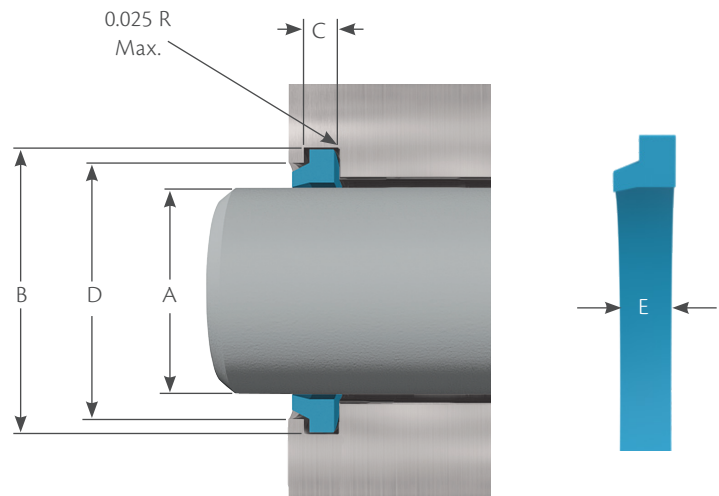
Wipers

Wipers

AN - Style



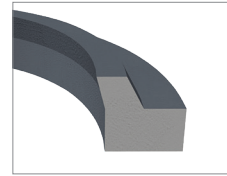
AN Wipers are designed for light to medium duty hydraulic and pneumatic applications. Fits in MS-33675 dash size grooves.



Wipers

Dash #	A Shaft Diameter	B Groove Diameter	C Groove Width	D Shoulder Diameter	E Max. Wiper Axial Width
	+0.000/-0.002	+0.004/-0.000	+0.003/-0.003	+0.005/-0.000	
1	0.500	0.760	0.107	0.647	0.187
2	0.562	0.823	0.107	0.710	0.187
3	0.625	0.885	0.107	0.772	0.187
4	0.687	0.948	0.107	0.834	0.187
5	0.750	1.010	0.107	0.897	0.187
6	0.812	1.084	0.107	0.960	0.187
7	0.875	1.147	0.107	1.023	0.187
8	0.937	1.209	0.107	1.085	0.187
9	1.000	1.272	0.107	1.148	0.187
10	1.062	1.334	0.107	1.210	0.187
11	1.125	1.397	0.107	1.273	0.187
12	1.187	1.459	0.107	1.335	0.187
13	1.250	1.522	0.107	1.398	0.187
14	1.312	1.614	0.107	1.480	0.187
15	1.375	1.677	0.107	1.542	0.187
16	1.437	1.739	0.107	1.605	0.187
17	1.500	1.802	0.107	1.668	0.187
17.5	1.562	1.865	0.107	1.731	0.187
18	1.625	1.927	0.107	1.793	0.187
18.5	1.687	1.990	0.107	1.856	0.187
19	1.750	2.052	0.107	1.918	0.187
19.5	1.812	2.115	0.107	1.981	0.187
20	1.875	2.177	0.107	2.043	0.187
20.5	1.937	2.240	0.107	2.106	0.187

Dash #	A Shaft Diameter	B Groove Diameter	C Groove Width	D Shoulder Diameter	E Max. Wiper Axial Width
21	2.000	2.302	0.107	2.178	0.187
21.5	2.062	2.365	0.107	2.241	0.187
	+0.000/-0.003	+0.004/-0.000	+0.003/-0.003	+0.005/-0.000	
22	2.125	2.427	0.107	2.303	0.187
22.5	2.187	2.490	0.107	2.366	0.187
23	2.250	2.552	0.107	2.428	0.187
23.5	2.312	2.615	0.107	2.491	0.187
24	2.375	2.677	0.107	2.553	0.187
24.5	2.437	2.740	0.107	2.616	0.187
25	2.500	2.802	0.107	2.678	0.187
25.5	2.562	2.865	0.107	2.741	0.187
26	2.625	2.989	0.122	2.834	0.211
26.5	2.687	3.052	0.122	2.897	0.211
27	2.750	3.114	0.122	2.959	0.211
27.5	2.812	3.177	0.122	3.022	0.211
28	2.875	3.239	0.122	3.084	0.211
29	3.000	3.364	0.122	3.209	0.211
30	3.125	3.489	0.122	3.334	0.211
31	3.250	3.614	0.122	3.459	0.211
32	3.375	3.739	0.122	3.584	0.211
33	3.500	3.864	0.122	3.709	0.211
34	3.625	3.989	0.122	3.834	0.211
35	3.750	4.114	0.122	3.959	0.211
36	3.875	4.239	0.122	4.084	0.211
37	4.000	4.427	0.138	4.240	0.238



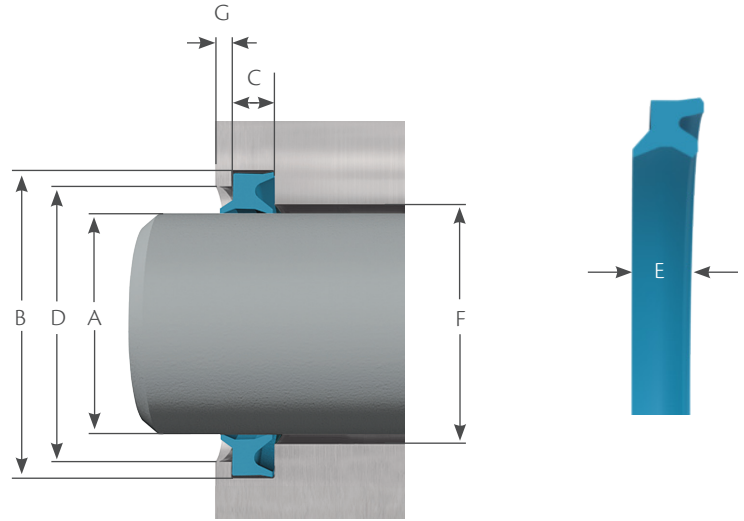
Dash #	A Shaft Diameter	B Groove Diameter	C Groove Width	D Shoulder Diameter	E Max. Wiper Axial Width
38	4.125	4.552	0.138	4.365	0.238
39	4.250	4.677	0.138	4.490	0.238
40	4.375	4.802	0.138	4.615	0.238
41	4.500	4.927	0.138	4.740	0.238
42	4.625	5.052	0.138	4.865	0.238
43	4.750	5.177	0.138	4.990	0.238
44	4.875	5.302	0.138	5.115	0.238
45	5.000	5.427	0.138	5.240	0.238
46	5.125	5.552	0.138	5.365	0.238
47	5.250	5.677	0.138	5.490	0.238
48	5.375	5.802	0.138	5.615	0.238
49	5.500	5.927	0.138	5.740	0.238
50	5.625	6.114	0.154	5.896	0.264
51	5.750	6.239	0.154	6.022	0.264
52	5.875	6.364	0.154	6.146	0.264
53	6.000	6.489	0.154	6.272	0.264
54	6.250	6.739	0.154	6.522	0.264
	+0.000/-0.004	+0.005/-0.000	+0.003/-0.003	+0.005/-0.000	
55	6.500	6.989	0.154	6.772	0.264
56	6.750	7.239	0.154	7.022	0.264
57	7.000	7.489	0.154	7.272	0.264
58	7.250	7.739	0.154	7.522	0.264
59	7.500	7.989	0.154	7.772	0.264
60	7.750	8.239	0.154	8.022	0.264

Dash #	A Shaft Diameter	B Groove Diameter	C Groove Width	D Shoulder Diameter	E Max. Wiper Axial Width
61	8.000	8.489	0.154	8.272	0.264
61.5	8.250	8.739	0.154	8.522	0.264
62	8.500	8.989	0.154	8.772	0.264
62.5	8.750	9.239	0.154	9.022	0.264
	+0.000/-0.005	+0.005/-0.000	+0.003/-0.003	+0.010/-0.000	
63	9.000	9.489	0.154	9.272	0.264
63.5	9.250	9.739	0.154	9.522	0.264
64	9.500	9.989	0.154	9.772	0.264
64.5	9.750	10.239	0.154	10.022	0.264
65	10.000	10.489	0.154	10.272	0.264
65.5	10.250	10.739	0.154	10.522	0.264
66	10.500	10.989	0.154	10.772	0.264
66.5	10.750	11.239	0.154	11.022	0.264
67	11.000	11.489	0.154	11.272	0.264
67.5	11.250	11.739	0.169	11.522	0.289
68	11.500	11.989	0.169	11.772	0.289
68.5	11.750	12.239	0.169	12.022	0.289
69	12.000	12.489	0.169	12.272	0.289
69.5	12.250	12.739	0.169	12.522	0.289
70	12.500	12.989	0.169	12.772	0.289
70.5	12.750	13.239	0.169	13.022	0.289
71	13.000	13.489	0.169	13.272	0.289
77	14.000	14.489	0.169	14.272	0.289

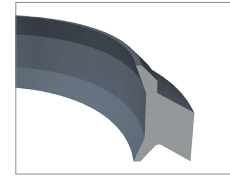
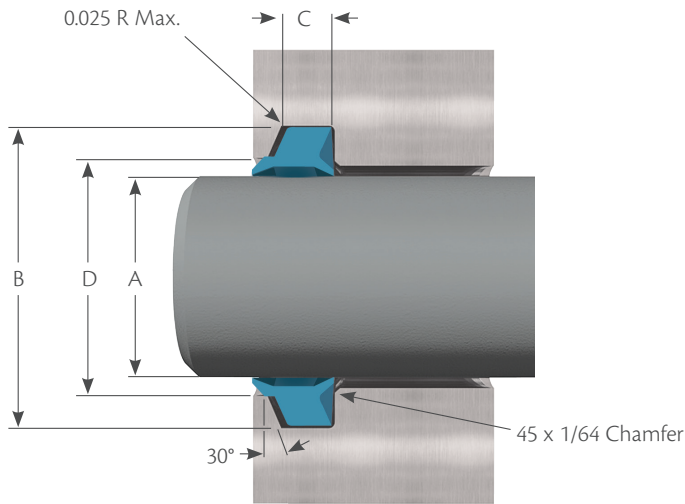
H - Style



H Style Wipers are a one piece snap-in type rod wiper designed for light duty applications. This style acts as a secondary rod seal.



A Rod Diameter		B Groove Diameter	C Groove Width	D Shoulder Diameter	E Max Wiper Axial Width	F Throat Diameter	G Flange Thickness
Range	Tolerance	+0.003/-0.000	+0.005/-0.000	+0.003/-0.000		+0.003/-0.000	
0.250 - 0.750	+0.000/-0.002	Dia. A + 0.302	0.203	Dia. A + 0.120	0.245	Dia. A + 0.001	0.042
0.812 - 2.125	+0.000/-0.003	Dia. A + 0.365	0.218	Dia. A + 0.135	0.275	Dia. A + 0.001	0.057
2.187 - 6.000	+0.000/-0.003	Dia. A + 0.495	0.281	Dia. A + 0.135	0.351	Dia. A + 0.001	0.070
6.250 - 8.500	+0.000/-0.004	Dia. A + 0.495	0.281	Dia. A + 0.135	0.351	Dia. A + 0.001	0.070
8.750 - 10.000	+0.000/-0.005	Dia. A + 0.495	0.281	Dia. A + 0.135	0.351	Dia. A + 0.001	0.070

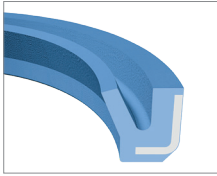


K Style Wipers are a one-piece, snap-in type rod wiper, designed for light duty applications. This style acts as a secondary rod seal.

Part Number	A Shaft Diameter	B Groove Diameter +0.005 -0.000	C Groove Width +0.015 -0.000	D Shoulder Diameter +0.015 -0.000
WK 0500	0.500	0.760	0.155	0.625
WK 0562	0.562	0.822	0.155	0.687
WK 0625	0.625	0.885	0.155	0.750
WK 0687	0.688	0.947	0.155	0.812
WK 0750	0.750	1.135	0.195	0.832
WK 0812	0.812	1.197	0.195	0.894
WK 0875	0.875	1.260	0.195	0.957
WK 0937	0.938	1.322	0.195	1.019
WK 1000	1.000	1.385	0.195	1.082
WK 1062	1.063	1.447	0.195	1.144
WK 1125	1.125	1.510	0.195	1.207
WK 1187	1.188	1.572	0.195	1.269
WK 1250	1.250	1.635	0.195	1.332
WK 1312	1.313	1.697	0.195	1.394
WK 1375	1.375	1.760	0.195	1.457
WK 1437	1.437	1.822	0.195	1.519
WK 1500	1.500	1.885	0.195	1.582
WK 1562	1.563	1.947	0.195	1.644
WK 1625	1.625	2.010	0.195	1.707
WK 1687	1.688	2.072	0.195	1.769
WK 1750	1.750	2.135	0.195	1.832
WK 1812	1.813	2.197	0.195	1.894
WK 1875	1.875	2.260	0.195	1.957
WK 1937	1.938	2.322	0.195	2.019
WK 2000	2.000	2.385	0.195	2.082
WK 2125	2.125	2.510	0.195	2.207
WK 2250	2.250	2.760	0.255	2.407
WK 2375	2.375	2.885	0.255	2.532
WK 2500	2.500	3.010	0.255	2.657
WK 2625	2.625	3.135	0.255	2.782
WK 2750	2.750	3.260	0.255	2.907
WK 2875	2.875	3.385	0.255	3.032

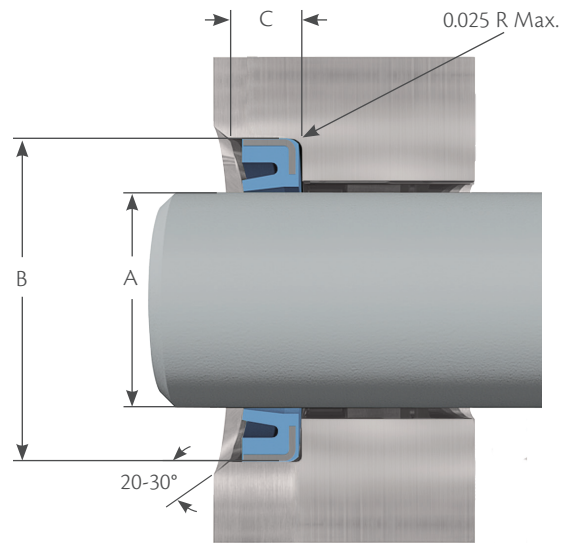
Part Number	A Shaft Diameter	B Groove Diameter +0.005 -0.000	C Groove Width +0.015 -0.000	D Shoulder Diameter +0.015 -0.000
WK 3000	3.000	3.510	0.255	3.157
WK 3125	3.125	3.635	0.255	3.282
WK 3250	3.250	3.760	0.255	3.407
WK 3375	3.375	3.885	0.255	3.532
WK 3500	3.500	4.010	0.255	3.657
WK 3625	3.625	4.135	0.255	3.782
WK 3750	3.750	4.260	0.255	3.907
WK 3875	3.875	4.385	0.255	4.032
WK 4000	4.000	4.510	0.255	4.157
WK 4125	4.125	4.635	0.255	4.282
WK 4250	4.250	4.760	0.255	4.407
WK 4375	4.375	4.885	0.255	4.532
WK 4500	4.500	5.010	0.255	4.657
WK 4625	4.625	5.135	0.255	4.782
WK 4750	4.750	5.260	0.255	4.907
WK 4875	4.875	5.385	0.255	5.032
WK 5000	5.000	5.510	0.255	5.157
WK 5250	5.250	5.760	0.255	5.407
WK 5500	5.500	6.010	0.255	5.657
WK 5750	5.750	6.260	0.255	5.907
WK 6000	6.000	6.510	0.255	6.157
WK 6250	6.250	6.760	0.255	6.407
WK 6500	6.500	7.010	0.255	6.657
WK 6750	6.750	7.260	0.255	6.907
WK 7000	7.000	7.510	0.255	7.157
WK 7500	7.500	8.010	0.255	7.657
WK 8000	8.000	8.510	0.255	8.157
WK 8500	8.500	9.010	0.255	8.657
WK 9000	9.000	9.510	0.255	9.157
WK 9500	9.500	10.010	0.255	9.657
WK 10000	10.000	10.510	0.255	10.157

Metal Encased Style



Metal encased wipers are composed of nitrile (NBR) or urethane (PU) materials encased in a high quality steel metal retainer.

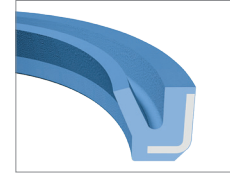
The lip is rigid enough to handle tough scraping environments such as dry or wet mud, and ice, yet sensitive enough to exclude fine dust and moisture.



Part Number	A Shaft Diameter	B Groove Diameter +0.003 -0.000	C Groove Width +0.015 -0.000
WC 0500 N	0.500	0.750	0.125
WC 05001000250	0.500	1.000	0.250
WC 06250875 N	0.625	0.875	0.125
WC 06250937 N	0.625	0.937	0.187
WC 0625	0.625	1.125	0.312
WC 0687 N	0.687	1.000	0.187
WC 07501000125 N	0.750	1.000	0.125
WC 0750 N	0.750	1.250	0.250
WC 0750	0.750	1.250	0.250
WC 07501250312	0.750	1.250	0.312
WC 08751125 N	0.875	1.125	0.125
WC 08751250 N	0.875	1.250	0.187
WC 0875	0.875	1.375	0.312
WC 0937 N	0.937	1.187	0.125
WC 10001250125 N	1.000	1.250	0.125
WC 10001375 N	1.000	1.375	0.187
WC 1000187 N	1.000	1.500	0.187
WC 1000	1.000	1.500	0.312
WC 1063 N	1.063	1.500	0.187
WC 11251500187 N	1.125	1.500	0.187
WC 1125250 N	1.125	1.625	0.250
WC 1125	1.125	1.625	0.312
WC 1187 N	1.187	1.625	0.250
WC 12501500125 N	1.250	1.500	0.125

Part Number	A Shaft Diameter	B Groove Diameter +0.003 -0.000	C Groove Width +0.015 -0.000
WC 12501690187 N	1.250	1.690	0.187
WC 1250250 N	1.250	1.750	0.250
WC 1250250	1.250	1.750	0.250
WC 1250	1.250	1.750	0.312
WC 12501750312 N	1.250	1.750	0.312
WC 13751625 N	1.375	1.625	0.125
WC 13751750 N	1.375	1.750	0.187
WC 1375250 N	1.375	1.875	0.250
WC 1375	1.375	1.875	0.312
WC 13752000312 N	1.375	2.000	0.312
WC 15001875187 N	1.500	1.875	0.187
WC 15001875250 N	1.500	1.875	0.250
WC 1500250 N	1.500	2.000	0.250
WC 1500250	1.500	2.000	0.250
WC 1500	1.500	2.000	0.312
WC 15002125	1.500	2.125	0.312
WC 1500375	1.500	2.250	0.375
WC 16252125250	1.625	2.125	0.250
WC 1625	1.625	2.125	0.312
WC 17502125187 N	1.750	2.125	0.187
WC 1750250 N	1.750	2.250	0.250
WC 1750250	1.750	2.250	0.250
WC 1750	1.750	2.250	0.312
WC 1750375	1.750	2.437	0.375

Metal Encased Style



Part Number	A Shaft Diameter	B Groove Diameter +0.003 -0.000	C Groove Width +0.015 -0.000
WC 1875	1.875	2.375	0.312
WC 20002375187 N	2.000	2.375	0.187
WC 2000250	2.000	2.500	0.250
WC 2000	2.000	2.500	0.312
WC 20002625 N	2.000	2.625	0.250
WC 2000375 N	2.000	2.687	0.375
WC 20002750	2.000	2.750	0.375
WC 2125	2.125	2.625	0.312
WC 2250250	2.250	2.750	0.250
WC 22502625 N	2.250	2.625	0.250
WC 2250	2.250	2.750	0.312
WC 22502875 N	2.250	2.875	0.250
WC 2250375	2.250	3.000	0.375
WC 2375	2.375	2.875	0.312
WC 2375375	2.375	3.125	0.375
WC 25003000250 N	2.500	3.000	0.250
WC 2500	2.500	3.000	0.312
WC 25003125 N	2.500	3.125	0.250
WC 25003125	2.500	3.125	0.250
WC 25003250250	2.500	3.250	0.250
WC 2625	2.625	3.125	0.250
WC 2750187 N	2.750	3.250	0.187
WC 2750	2.750	3.250	0.312
WC 27503500375	2.750	3.500	0.375
WC 2750500	2.750	3.750	0.500
WC 3000	3.000	3.500	0.312
WC 3000375	3.000	3.750	0.375
WC 3000500	3.000	4.000	0.500
WC 30003625250 N	3.000	3.625	0.250
WC 30003750250	3.000	3.750	0.250

Part Number	A Shaft Diameter	B Groove Diameter +0.003 -0.000	C Groove Width +0.015 -0.000
WC 32503750	3.250	3.750	0.312
WC 3250	3.250	3.875	0.312
WC 3250500	3.250	4.250	0.500
WC 35004000	3.500	4.000	0.312
WC 3500	3.500	4.125	0.312
WC 35004250	3.500	4.250	0.250
WC 3500500	3.500	4.500	0.500
WC 35004750250 N	3.500	4.750	0.250
WC 3625	3.625	4.250	0.312
WC 3750	3.750	4.375	0.312
WC 4000	4.000	4.625	0.312
WC 40004750	4.000	4.750	0.312
WC 4000500	4.000	5.000	0.500
WC 4250	4.250	4.875	0.312
WC 4375312	4.375	5.000	0.312
WC 4500	4.500	5.125	0.312
WC 45005250	4.500	5.250	0.312
WC 4500500	4.500	5.500	0.500
WC 4750500	4.750	5.750	0.500
WC 5000	5.000	5.750	0.312
WC 52505750	5.250	5.750	0.312
WC 5250	5.250	5.875	0.312
WC 55006125375	5.500	6.125	0.375
WC 55006250	5.500	6.250	0.312
WC 57506375375	5.750	6.375	0.375
WC 6000	6.000	6.625	0.375
WC 6000500	6.000	7.000	0.500
WC 6500625	6.500	7.500	0.625
WC 6750	6.750	7.375	0.375