

# ROTTLER

## H85A OPTIONAL EQUIPMENT PARTS MANUAL





## **ORDERING PROCEDURE**

Contact your regional Rottler sales rep for assistance in ordering optional equipment, replacement parts, or tooling.

If you are unable to contact your regional Rottler sales rep, call the factory at 253-872-7050 and ask to speak to the parts sales specialists.

Have the following information handy to expedite the ordering process:

1. Your name, business name, and contact number
2. Customer number
3. If you don't have a customer number, your billing address
4. Shipping address if different from billing address
5. Machine model and serial number
6. Part number and description of what you want to order
7. Preferred method of shipment

You may also contact us via e-mail with the above information. Send e-mail requests to: [parts@rottlermfg.com](mailto:parts@rottlermfg.com) or [intlparts@rottlermfg.com](mailto:intlparts@rottlermfg.com)

In some cases you may be requested to send a photo of the part you are ordering if it is a replacement part, or doesn't appear in the database.

If you are unsure which part you need to order, contact our service department and ask to speak to one of our service consultants. They will assist you in determining which part you require.

**THERE IS A MINIMUM ORDER OF \$25.00**



## Contents

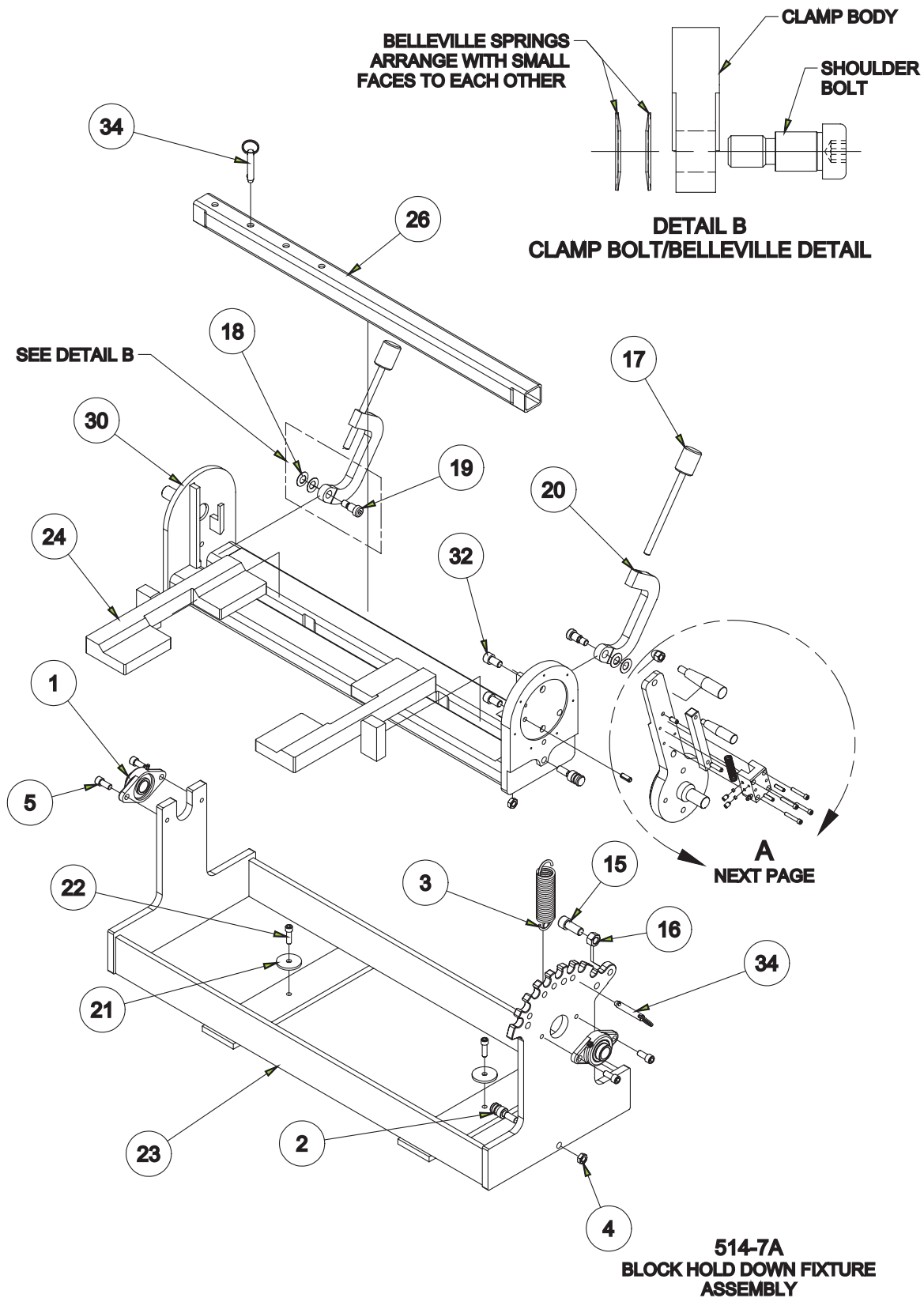
<b>Optional Fixturing.....</b>	<b>1</b>
514-7A Manual Indexable Roll Over Fixture Parts.....	1
502-1-30H Clamp Arm Assembly Parts.....	4
11115 2" (50mm) X 3" (75mm) Parallels.....	6
514-7-14E 2" (50.8mm) Small Diameter Main Line Bar.....	7
11112 Universal 8" (203mm) Heavy Duty T-Slot Parallels Parts.....	7
11114 Universal 16" (405mm) Heavy Duty T-Slot Parallels Parts.....	9
<b>Fixture for Honing Multiple Cylinder Liners (4 Liners) .....</b>	<b>11</b>
514-11-5 Cylinder Liner Honing Fixture Parts.....	11
514-11-6 Fixture Plate Parts.....	12
514-11-7 Fixture Plate Parts.....	13
514-11-4 Fixture Plate Parts.....	14
<b>Optional Coolant and Filter Equipment.....</b>	<b>15</b>
514-4-71C Synthetic Coolant.....	15
514-4-71D Coolant Refractor .....	15
514-2-42C Dual Gradient 50-5 Micron Replacement Filter Cartridge.....	16
514-2-42A Cannister Magnetic Filter System.....	16
<b>Optional Rottler Precision Hone Heads, Sleeves and Stone Holders .....</b>	<b>17</b>
514-9J Medium Rottler Precision 4 Stone Holder Hone Head Assembly Parts.....	17
514-10-13 Series Stone Holder Parts .....	18
<b>Medium Hone Head Stone Holder Size Charts .....</b>	<b>18</b>
514-9Q Large Rottler Precision Heavy Duty 6 Stone Holder Hone Head Assembly Parts .....	20
514-9S Large Rottler Precision Heavy Duty 6 Stone Holder Hone Head Assembly Parts.....	22
514-9-4E Sleeve Assembly Parts .....	24
514-9-4F Sleeve Assembly Parts.....	24
514-9-4G Sleeve Assembly Parts .....	25
514-9-31 Series Stone Holder Parts .....	26
<b>Six Stone Hone Head Stone Size Chart.....</b>	<b>26</b>
<b>Diamond Abrasives for Rottler Precision 6 Stone Holder Hone Heads .....</b>	<b>29</b>
514-9-32F Diamond Stones, 80 grit.....	29
514-9-32R Diamond Stones 80 grit .....	29
514-9-32W Diamond Stones, 140/170 grit.....	29
514-9-32K Diamond Stones, 170/200 grit .....	29
514-9-32J Diamond Stones, 270/325 grit.....	30

<b>514-9-32E Diamond Stones, 325/400 grit.....</b>	<b>30</b>
<b>514-9-32C Diamond Stones, 500 grit .....</b>	<b>30</b>
<b>514-9-32L Diamond Stones, 550 grit.....</b>	<b>30</b>
<b>514-9-32G Diamond Stones, 600 grit .....</b>	<b>31</b>
<b>514-9-33 Diamond Stones, 800 grit.....</b>	<b>31</b>
<b>514-9-33C Diamond Stones, 800 grit .....</b>	<b>31</b>
<b>514-9-33J Diamond Stones, 1200 grit.....</b>	<b>31</b>
<b>514-9-33B Diamond Stones, 270/325 grit .....</b>	<b>32</b>
<b>514-9-32D Diamond Stones, 325/400 grit .....</b>	<b>32</b>
<b>514-9-33A Diamond Stones, 800 grit .....</b>	<b>32</b>
<b>514-9-35C CBN Stones, 320 grit.....</b>	<b>33</b>
<b>514-9-35D CBN Stones, 400 grit.....</b>	<b>33</b>
<b>514-9-35B CBN Stones, 600 grit.....</b>	<b>33</b>
<b>514-9-14H Brushes, for Plateau Finishing.....</b>	<b>33</b>
<b>514-9-14Y Brushes, for Plateau Finishing.....</b>	<b>33</b>
<b>514-9P Large Rottler Precision Heavy Duty 4 Stone Holder Hone Head Assembly Parts.....</b>	<b>34</b>
<b>514-9R Large Rottler Precision Heavy Duty 4 Stone Holder Hone Head Assembly Parts .....</b>	<b>36</b>
<b>514-9-4A Sleeve Assembly Parts .....</b>	<b>38</b>
<b>514-9B Sleeve Assembly Parts .....</b>	<b>38</b>
<b>514-9-4G Sleeve Assembly Parts .....</b>	<b>39</b>
<b>514-9-6 Series Stone Holder Parts.....</b>	<b>39</b>
<b>514-9-14F Diamond Stones, 80 grit.....</b>	<b>42</b>
<b>514-9-14R Diamond Stones, 80 grit .....</b>	<b>42</b>
<b>514-9-21R Diamond Stones, 80 grit .....</b>	<b>42</b>
<b>514-9-14W Diamond Stones, 140/170 grit.....</b>	<b>42</b>
<b>514-9-21W Diamond Stones, 140/170 grit.....</b>	<b>42</b>
<b>514-9-14K Diamond stones, 170/200 grit.....</b>	<b>43</b>
<b>514-9-14M Diamond Stones, 170/200 grit.....</b>	<b>43</b>
<b>514-9-21M Diamond stones, 170/200 grit .....</b>	<b>43</b>
<b>514-9-14J Diamond Stones, 270/325 grit.....</b>	<b>43</b>
<b>514-9-14T Diamond Stones, 270/325 grit.....</b>	<b>43</b>
<b>514-9-14Z Diamond Stones, 270/325 grit.....</b>	<b>44</b>
<b>514-9-14E Diamond Stones, 325/400 grit.....</b>	<b>44</b>
<b>514-9-14Q Diamond Stones, 325/400 grit .....</b>	<b>44</b>
<b>514-9-14X Diamond Stones, 325/400 grit.....</b>	<b>44</b>

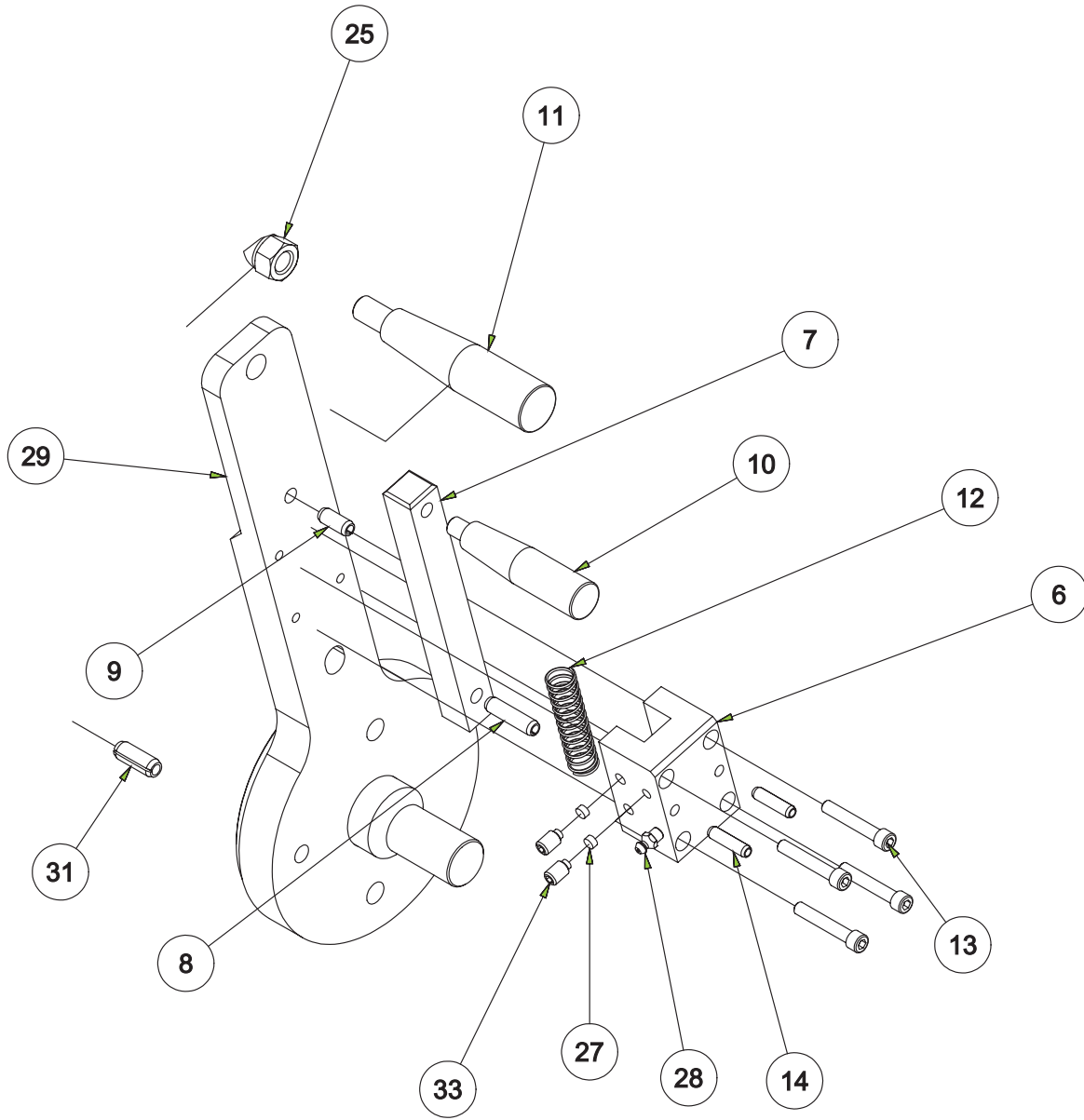
514-9-14V Diamond Stones, 500 grit.....	44
514-9-14C Diamond Stones, 325/400 grit .....	45
514-9-14P Diamond Stones, 500 grit.....	45
514-9-14D Diamond Stones, 325/400 grit .....	45
514-9-14U Diamond Stones, 500 grit .....	45
514-9-14L Diamond Stones, 550 grit.....	45
514-9-14N Diamond Stones, 550 grit .....	46
514-9-14G Diamond Stones, 600 grit .....	46
514-9-14S Diamond Stones, 600 grit.....	46
514-9-21G Diamond Stones, 800 grit .....	46
514-9-21H Diamond Stones, 1000 grit .....	46
514-9-21J Diamond Stones, 1200 grit.....	46
514-9-35C CBN Stones, 320 grit.....	47
514-9-35D CBN Stones, 400 grit.....	47
514-9-35B CBN Stones, 600 grit.....	47
514-9-35E CBN Stones, 500 grit.....	47
514-9-14H Brushes, for Plateau Finishing.....	48
514-9-14Y Brushes, for Plateau Finishing.....	48
514-9-18P Special Red Finish Diamonds .....	49
514-9-18N Silicone Abrasive Exposing Stones .....	49
514-9-21 Polishing Felt Pads .....	49
514-9-21F Silicone Paste.....	49
514-9N Hone Head, Single Stage (12 Stone).....	50
110-171-01 Single Stage Diamond Stones .....	51
110-171-02 Single Stage Diamond Stones .....	51
110-171-03 Single Stage Diamond Stones .....	51
<b>Optional Measuring Equipment .....</b>	<b>52</b>
201 Mitutoyo Surface Tester SurfTest 201 .....	52
514-8-27 Stone Depth Scale and Holder Assembly (inch) .....	52
514-8-27F Stone Depth Scale and Holder Assembly (metric) .....	52
514-14-29A Camera .....	53
514-14-29B Software Package.....	53
514-9V Pin Hone Adapter Parts.....	54

# Optional Fixturing

## 514-7A Manual Indexable Roll Over Fixture Parts



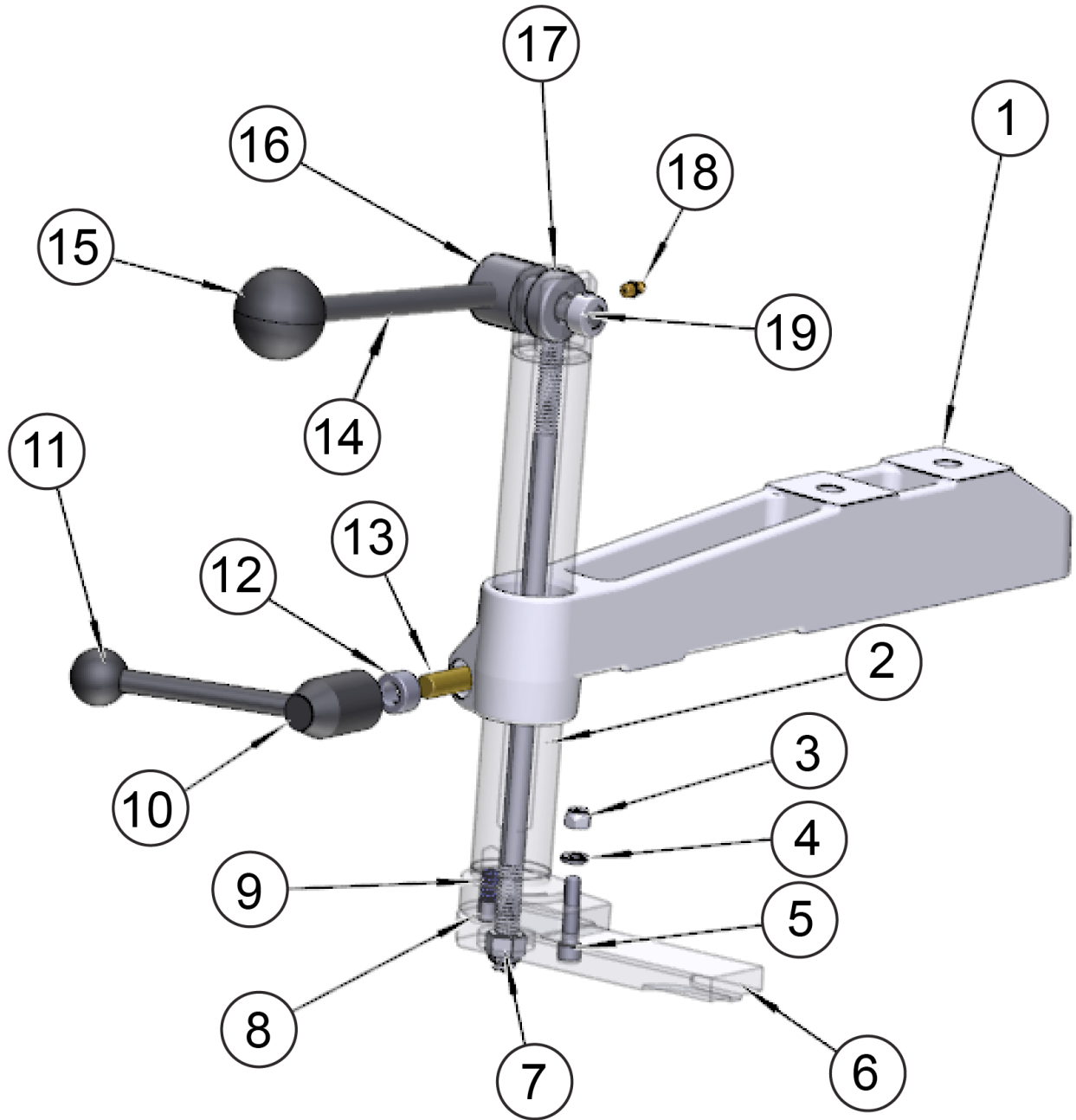




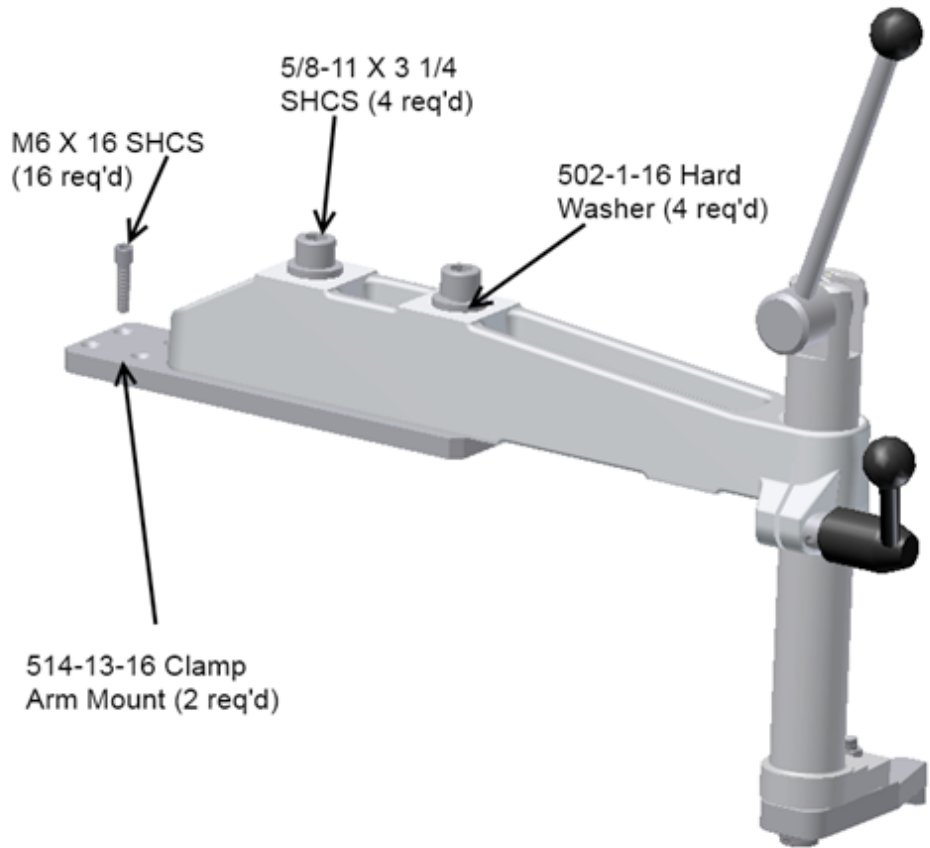
DETAIL A

514-7A BLOCK HOLD DOWN FIXTURE ASSEMBLY - HONE			
ITEM	QTY	PART NUMBER	DESCRIPTION
1	2	514-7-13	BLOCK, FLANGE, BLOCK HOLDDOWN FIXTURE
2	2	514-3-72A	PIN, SPRING RETAINER, BLOCK HOLD DOWN FIXTURE
3	1	514-3-34A	SPRING, EXTENSION - BLOCK HOLD DOWN FIXTURE
4	2	MF-165	1/2-13UNC HEX NUT
5	4	MF-39	7/16-14UNC x 1" LG. S.H.C.S.
6	1	514-3-56A	INDEX PIN SUPPORT - BLOCK HOLD DOWN FIXTURE HONE
7	1	514-7-9B	INDEX PIN - BLOCK HOLD DOWN FIXTURE - HONE
8	1	MF-227A	5/16" x 1-1/4" LG. ROLL PIN
9	1	MF-227B	5/16" x 3/4" LG. ROLL PIN
10	1	514-3-58A	HANDLE, INDEX - BLOCK HOLD DOWN FIXTURE - HONE
11	1	514-3-59B	HANDLE, PIVOT ARM - BLOCK HOLD DOWN FIXTURE & V6/V8 AIR FIXTURE
12	1	514-3-70	SPRING, HANDLE RETURN
13	4	MF-17	1/4-20UNC x 1-1/2" LG. S.H.C.S.
14	2	MF-226	1/4" x 1" LG. ROLL PIN
15	1	MF-46A	5/8-11UNC x 1-1/2" LG. S.H.C.S.
16	1	MF-166	5/8-11UNC HEX NUT
17	2	7223	CLAMP ASSEMBLY - MANUAL V6/V8 COMB. FIXTURE
18	4	514-7-21	Bellville Spring
19	2	514-7-22A	5/8 x 3/4" LG. SOCKET SHOULDER SCREW
20	2	514-7-10A	CLAMP ARM (MACHINING), BLOCK HOLD DOWN FIXTURE - HONE
21	2	514-7-1C	WASHER, HOLDDOWN - BLOCK HOLDDOWN FIXTURE - HONE
22	2	MF-32	S.H.C.S.3/8 - 16 UNC - 1 1/4
23	1	514-7-1E	MAIN FRAME REDESIGN (MACHINING)
24	2	514-7-15	SUPPORT, BLOCK - BLOCK HOLD DOWN FIXTURE
25	1	514-3-59C	1/2-13UNC ACORN NUT
26	1	514-7-14B	BAR, CLAMP - HOLD DOWN FIXTURE
27	2	514-3-56B	TERCITE PAD
28	1	MF-189	STRAIGHT GREASE FITTING
29	1	514-7-3D	MANUAL CRADLE HANDLE (MACHINING), HONE
30	1	514-13-14C	H70 - FIXTURE CRADLE MACHINING
31	1	MF-229B	3/8" x 1" LG. ROLL PIN
32	2	650-4-49	M14x2 x 25
33	2	7212C	5/16-18UNC x .50" LG. SOCKET HALF DOG SET SCREW
34	2	7210C	PIN, GUIDE ROTTLER LEVELING TABLE

## 502-1-30H Clamp Arm Assembly Parts



ITEM	PART #	DESCRIPTION
1	502-1-22G 502-1-22H	CLAMP ARM-LEFT CLAMP ARM-RIGHT
2	502-1-31C	LEG, CLAMP-14 1/2" LONG
3	MF-187	NYLOCK NUTS 5/16-18 NC
4	MF-184	LOCK WASHERS 5/16"
5	MF-25	SOCKET HEAD CAP SCREW 5/16-18 X 1 1/2"
6	502-1-24G	SHOE, CLAMP - HEAVY DUTY
7	502-1-25B	LOCKNUT, EYE BOLT 1/2-13NC
8	MF-211	DOWEL PIN 3/8 X 1/2"
9	500-33	SPRING, CLAMP LEG
10	514-2-39C	HANDLE,ADJUSTABLE-CLAMP STOP
11	514-2-39E	HANDLE, ADJUSTABLE CLAMP
12	7209J	COLLAR, 1/2" SHAFT
13	514-4-5B	STUD-CLAMP HANDLE
14	502-1-27	ARM, HANDLE - BLOCK CLAMP
15	502-1-28	KNOB, PLASTIC BALL - BLOCK CLAMP
16	502-1-26L 502-1-26R	CAM BODY LEFT HAND ONLY CAM BODY RIGHT HAND ONLY
17	502-1-25A	EYE BOLT ASSEMBLY
18	MF-189	1/4-28 STRAIGHT LUBE GREASE FITTING
19	502-1-29A	COLLAR (15/32 ID),CLAMP LEG



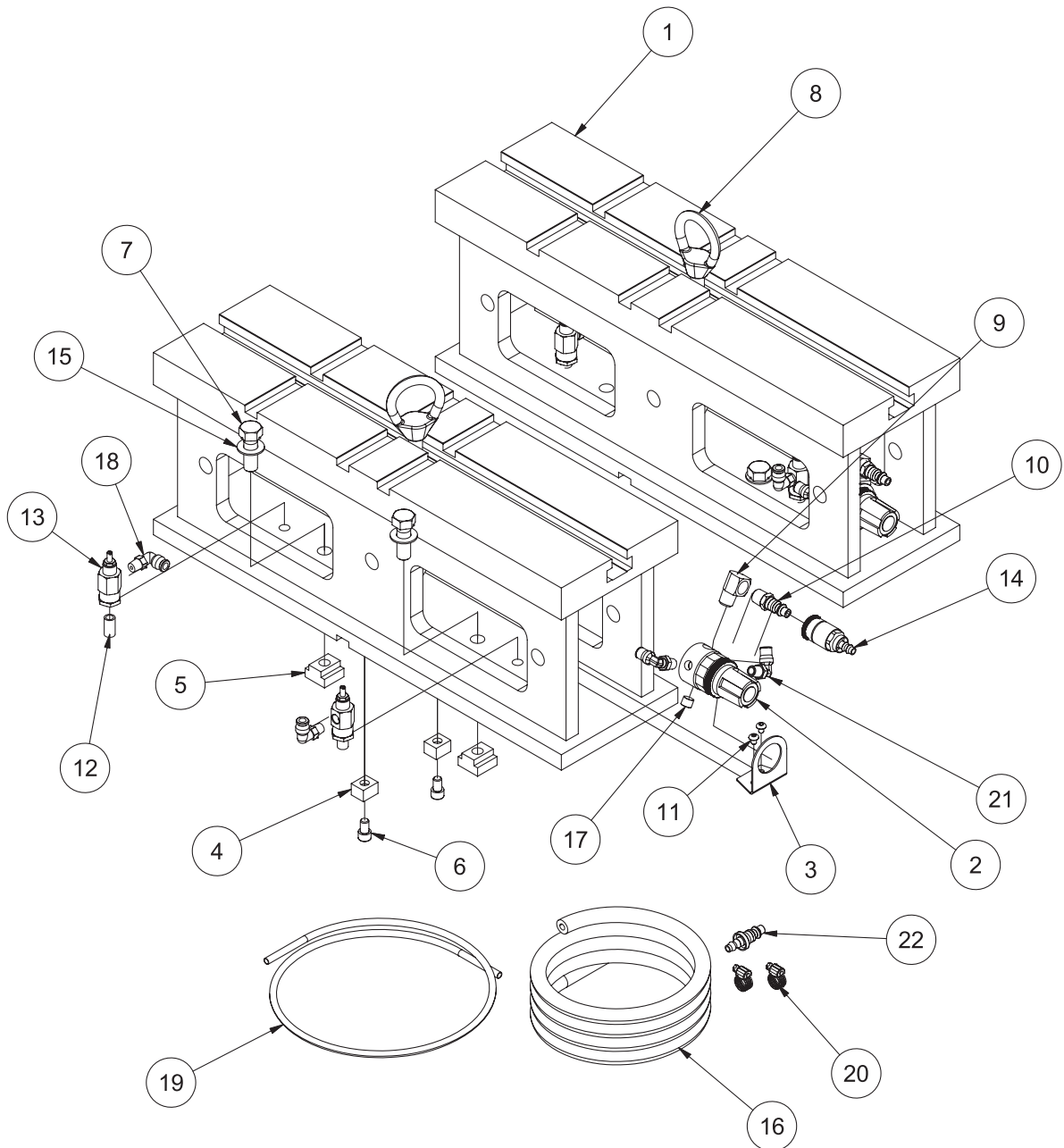
**11115 2" (50mm) X 3" (75mm) Parallels**  
Sold only as complete assembly.



### 514-7-14E 2" (50.8mm) Small Diameter Main Line Bar

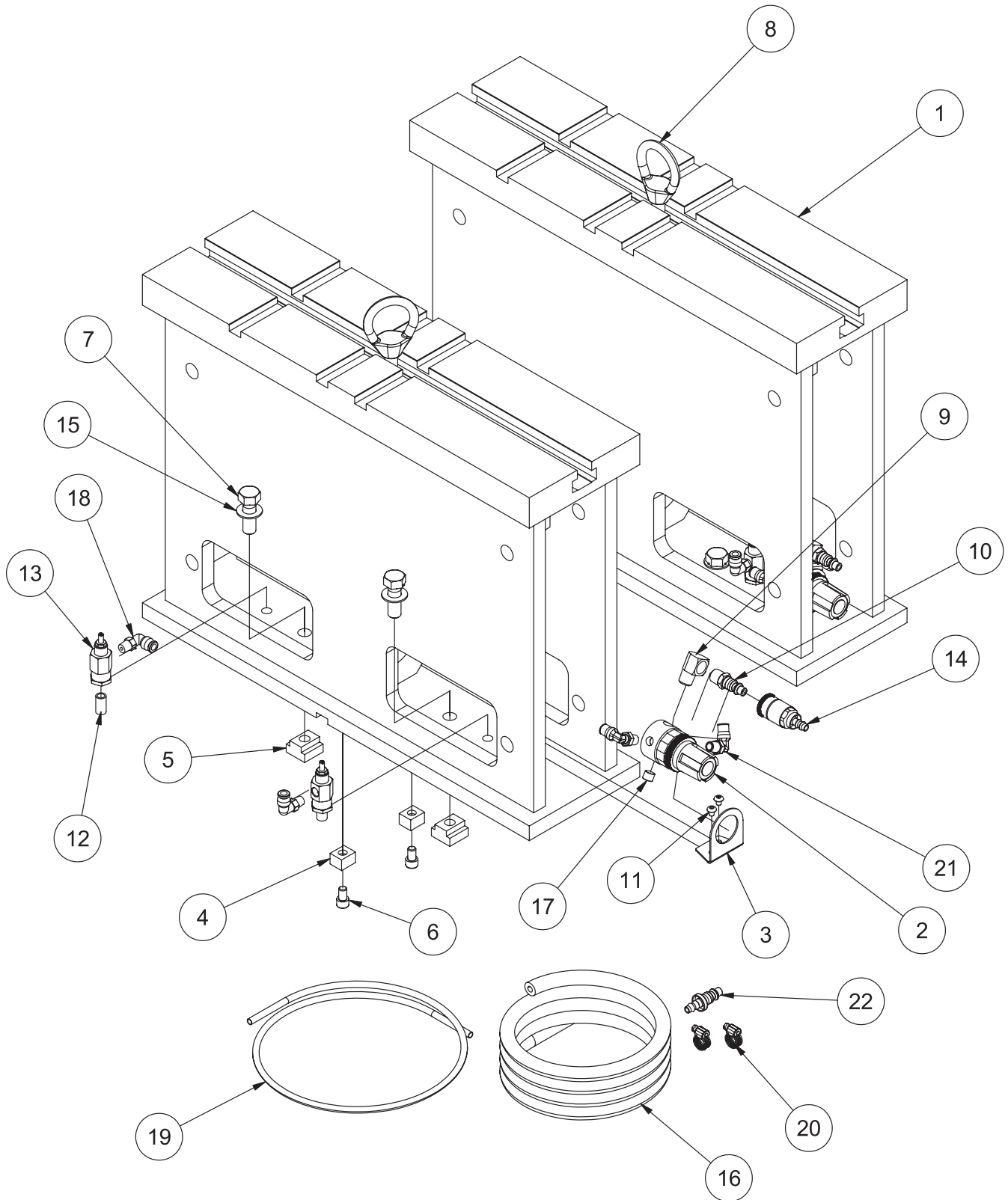


### 11112 Universal 8" (203mm) Heavy Duty T-Slot Parallels Parts



11112 SUPPORT PARALLEL ASSEMBLY 8" - F70			
ITEM	QTY	PART NUMBER	DESCRIPTION
1	2	11112A	SUPPORT PARALLEL 8" (MACHINING) - F70
2	2	502-27-17	Regulator 0 - 60 PSI
3	2	502-27-17A	Regulator Bracket
4	4	650-3-9	Key
5	4	650-3-10	TN-5 T-Nut
6	4	MF-21A	5/16-18UNC x 1/2" LG. S.H.C.S.
7	4	MF-137A	1/2-13UNC x 1-1/2" LG. HEX BOLT
8	2	502-3-13	Lift Eye
9	2	502-11-17S	1/4 STREET ELL
10	2	502-11-16X	CONNECTOR, MALE THREAD 1/4 NPTF V6/V8 FIXTURE
11	4	MF-87	10-24UNC x 1/4" LG. SOCKET BUTTONHEAD SCREW
12	4	502-11-17J	Nipple, Close 1/8" NPT
13	4	502-11-35A	Flo Control
14	1	502-11-16W	Quick connect air fitting female
15	4	MF-180	1/2" FLAT WASHER
16	15 FT.	502-1-98	1/4" AIR HOSE
17	2	MF-234	Countersunk Hex-Head Plug 1/8
18	4	514-4-17E	ELBOW, 90 DEGREE MALE - 1/4" POLY X 1/8" NPT
19	4 FT.	502-11-15	TUBING, BLACK POLYFLO 1/4" O.D.
20	2	502-1-97	CLAMP, 1/4" I.D. HOSE
21	4	514-4-17V	FITTING 1/8 NPT X 1/4 POLY-90 DEGREE
22	1	502-11-16Y	CONNECTOR, MALE AIR 1/4 NPTF

## 11114 Universal 16" (405mm) Heavy Duty T-Slot Parallels Parts



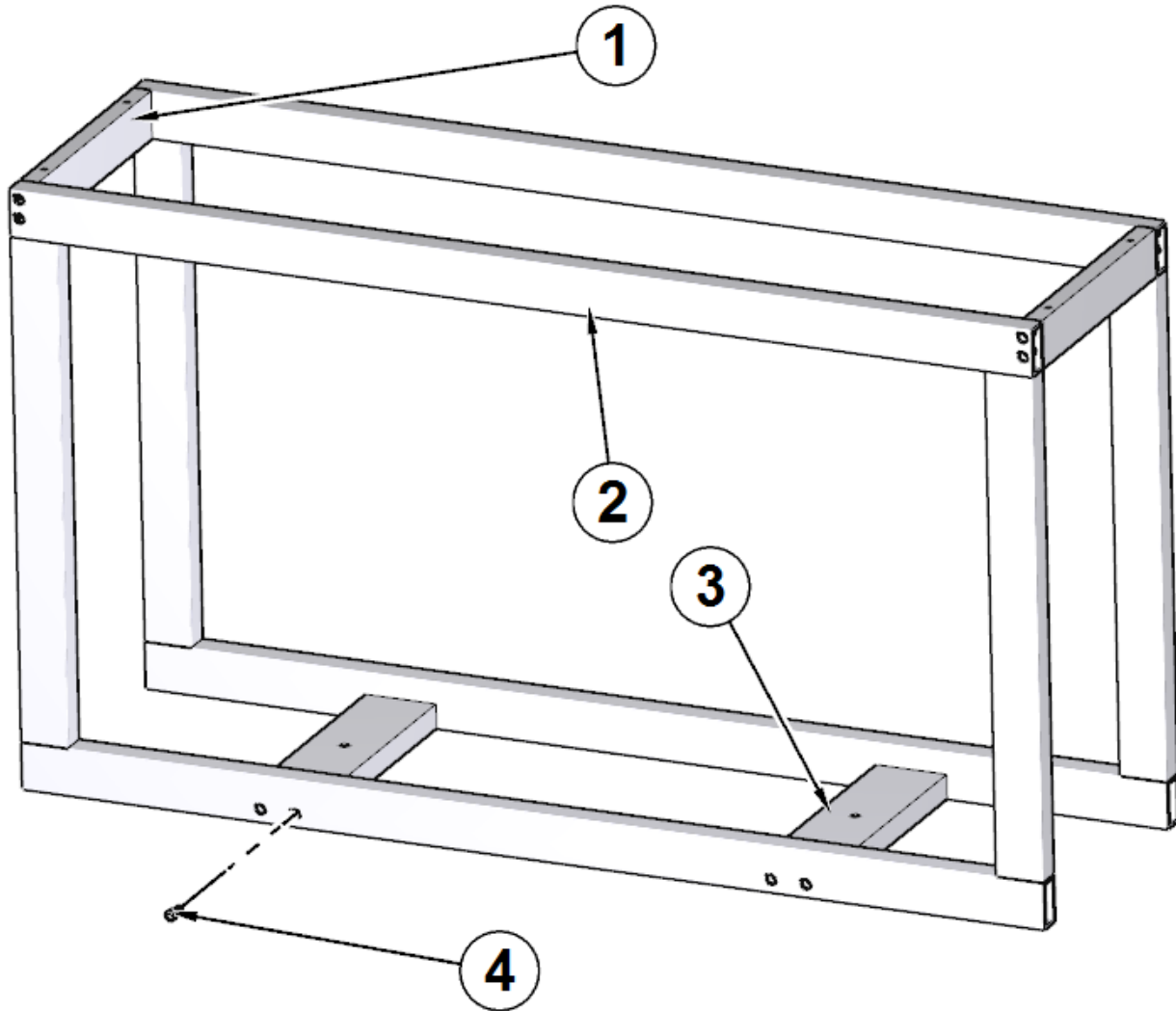
11114  
16" SUPPORT PARALLEL ASSEMBLY  
F70



11114 SUPPORT PARALLEL ASSEMBLY 16" - F70			
ITEM	QTY	PART NUMBER	DESCRIPTION
1	2	11114A	SUPPORT PARALLEL 16" (MACHINING) - F70
2	2	502-27-17	Regulator 0 - 60 PSI
3	2	502-27-17A	Regulator Bracket
4	4	650-3-9	Key
5	4	650-3-10	TN-5 T-Nut
6	4	MF-21A	5/16-18UNC x 1/2" LG. S.H.C.S.
7	4	MF-137A	1/2-13UNC x 1-1/2" LG. HEX BOLT
8	2	502-3-13	Lift Eye
9	2	502-11-17S	1/4 STREET ELL
10	2	502-11-16X	CONNECTOR, MALE THREAD 1/4 NPTF V6/V8 FIXTURE
11	4	MF-87	10-24UNC x 1/4" LG. SOCKET BUTTONHEAD SCREW
12	4	502-11-17J	Nipple, Close 1/8" NPT
13	4	502-11-35A	Flo Control
14	1	502-11-16W	Quick connect air fitting female
15	4	MF-180	1/2" FLAT WASHER
16	15 FT.	502-1-98	1/4" AIR HOSE
17	2	MF-234	Countersunk Hex-Head Plug 1/8
18	4	514-4-17E	ELBOW, 90 DEGREE MALE - 1/4" POLY X 1/8" NPT
19	4 FT.	502-11-15	TUBING, BLACK POLYFLO 1/4" O.D.
20	2	502-1-97	CLAMP, 1/4" I.D. HOSE
21	4	514-4-17V	FITTING 1/8 NPT X 1/4 POLY-90 DEGREE
22	1	502-11-16Y	CONNECTOR, MALE AIR 1/4 NPTF

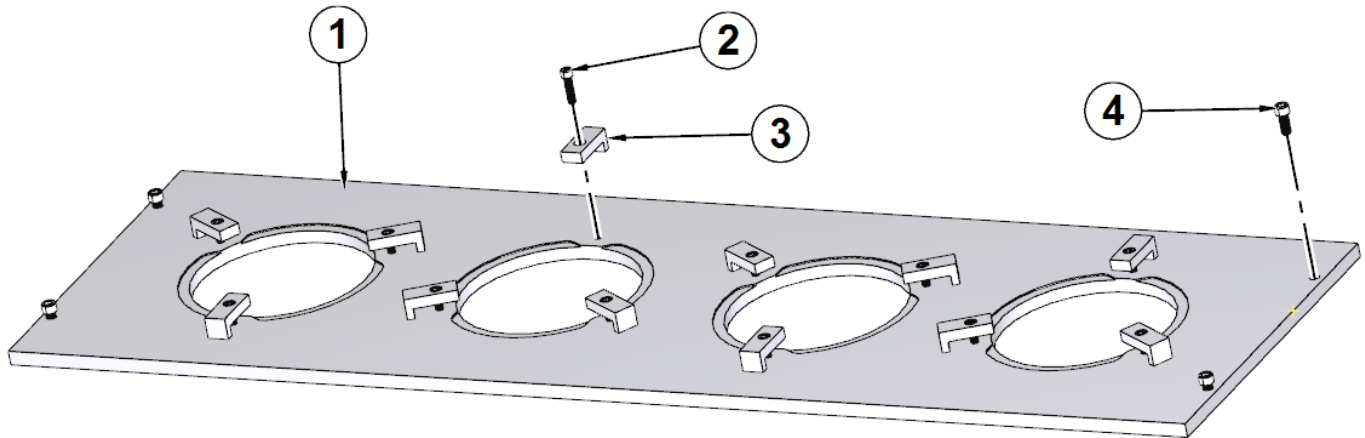
## Fixture for Honing Multiple Cylinder Liners (4 Liners)

### 514-11-5 Cylinder Liner Honing Fixture Parts



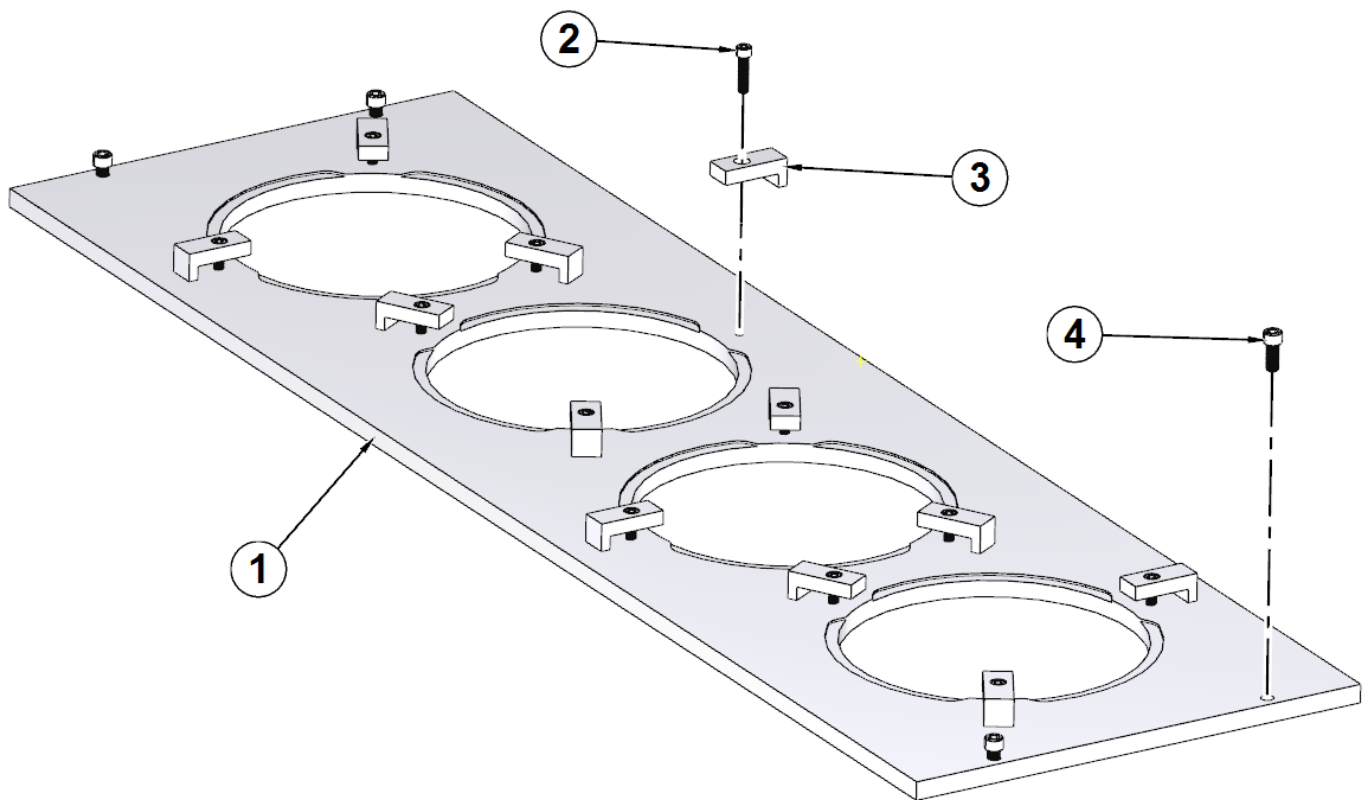
ITEM	PART #	DESCRIPTION
1	514-11-1D	UPPER CROSS BAR
2	514-11-5B	SIDE, SLEEVE FIXTURE
3	514-11-1E	LOWER CROSS BAR
4	MF-21	SOCKET HEAD CAP SCREW 5/16-18 X 5/8"

## 514-11-6 Fixture Plate Parts



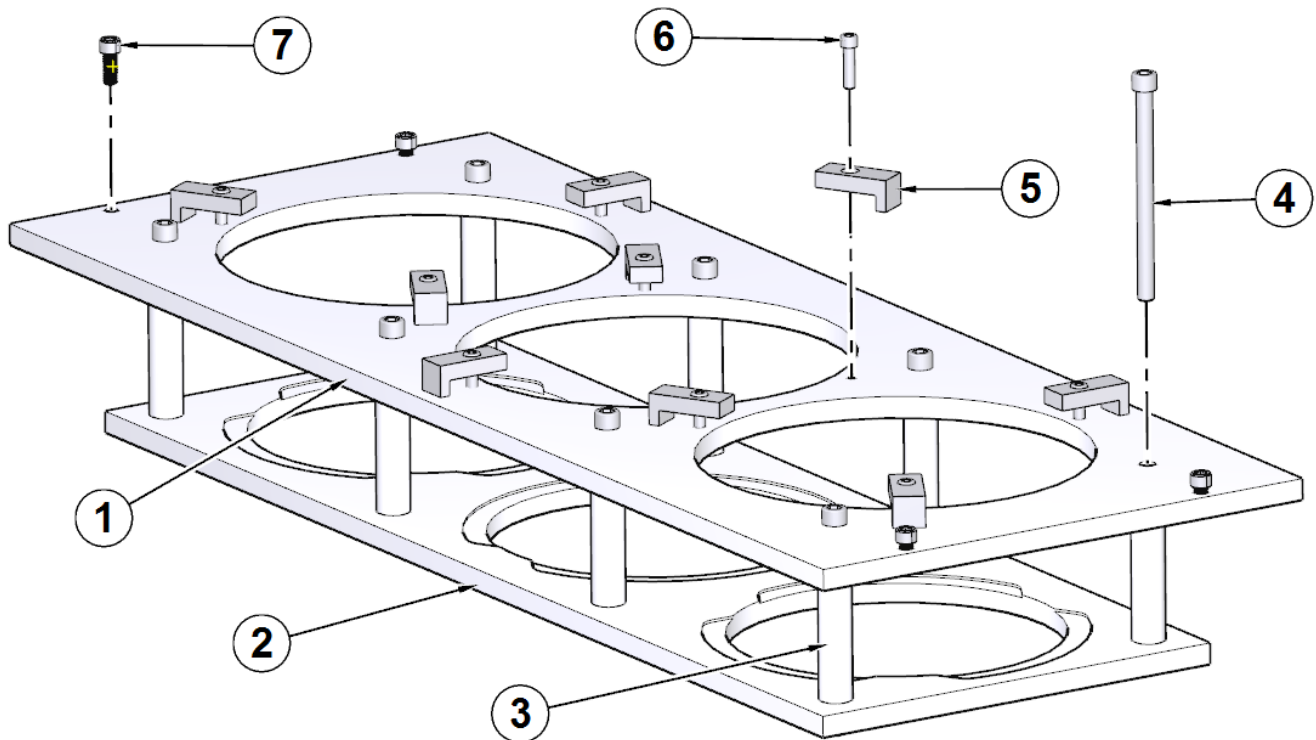
ITEM	PART #	DESCRIPTION
1	514-11-6B	PLATE, CAT 3400 SLEEVE FIXTURE
2	MF-15	SOCKET HEAD CAP SCREW 1/4-20 X 1"
3	514-11-2C	CLAMP, FIXTURE PLATE
4	MF-22	SOCKET HEAD CAP SCREW 5/16-18 X 3/4"

## 514-11-7 Fixture Plate Parts



ITEM	PART #	DESCRIPTION
1	514-11-7B	PLATE, CAT 3500 SLEEVE FIXTURE
2	MF-15	SOCKET HEAD CAP SCREW 1/4-20 X 1"
3	514-11-2C	CLAMP, FIXTURE PLATE
4	MF-22	SOCKET HEAD CAP SCREW 5/16-18 X 3/4"

## 514-11-4 Fixture Plate Parts



ITEM	PART #	DESCRIPTION
1	514-11-4A	UPPER FIXTURE PLATE
2	514-11-4C	LOWER FIXTURE PLATE
3	514-11-4E	SPACER,CAT C175 FIXTURE PLATE ASSEMBLY
4	MF-38	SOCKET HEAD CAP SCREW 3/8-16 X 5"
5	514-11-2C	CLAMP, FIXTURE PLATE
6	MF-15	SOCKET HEAD CAP SCREW 1/4-20 X 1"
7	MF-22	SOCKET HEAD CAP SCREW 5/16-18 X 3/4"

## Optional Coolant and Filter Equipment

### 514-4-71C Synthetic Coolant

(for use with diamond stones) 5 gal (20 liter) (mix with water 20:1)



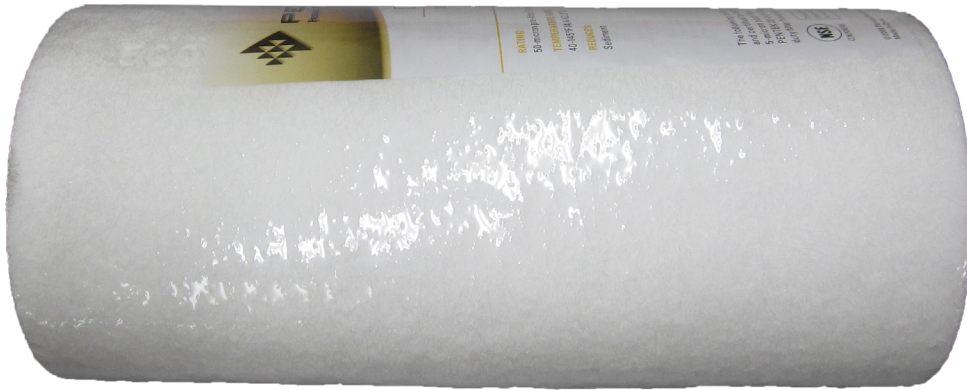
### 514-4-71D Coolant Refractor

Sold as complete kit only.



**514-2-42C Dual Gradient 50-5 Micron Replacement Filter Cartridge**

For standard filter system

**514-2-42A Cannister Magnetic Filter System**

Replacement parts available:

514-2-42M O-Ring

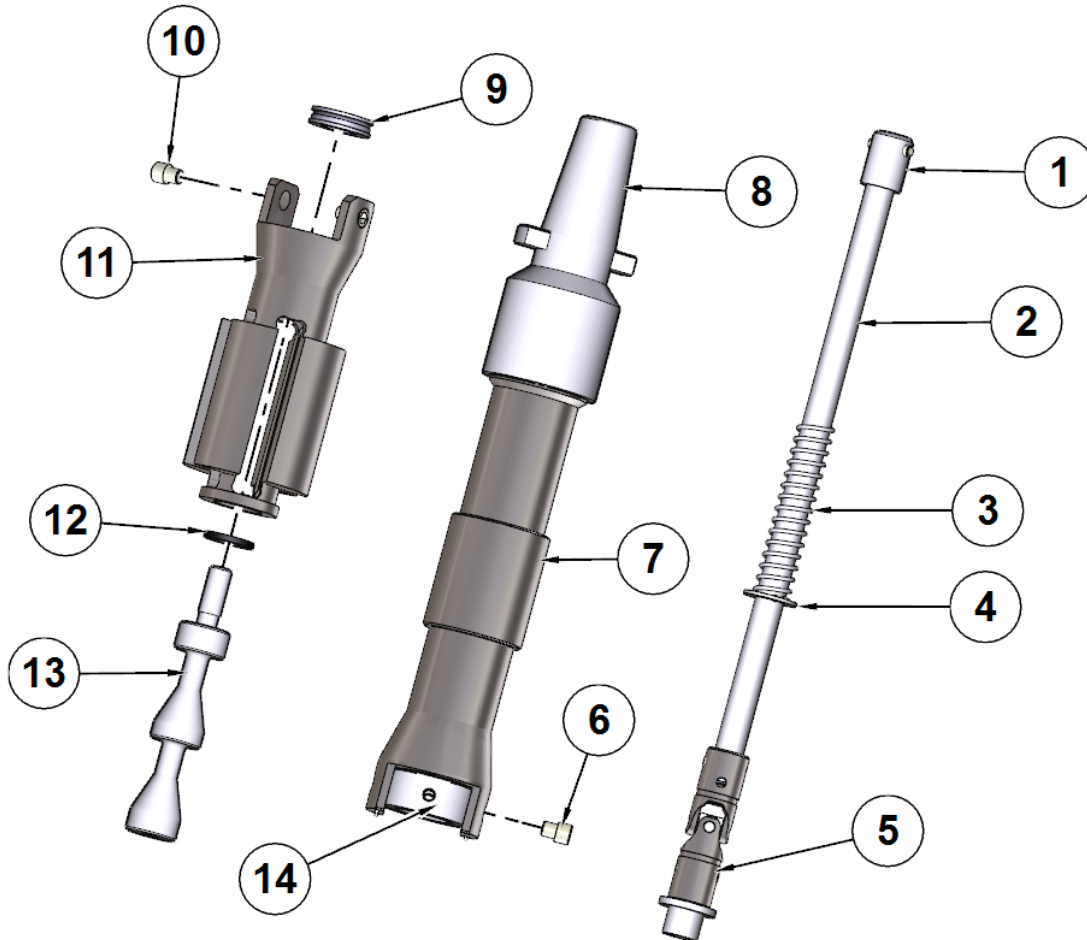
514-2-42P Bowl Spanner

514-2-42Q Bowl



## Optional Rottler Precision Hone Heads, Sleeves and Stone Holders

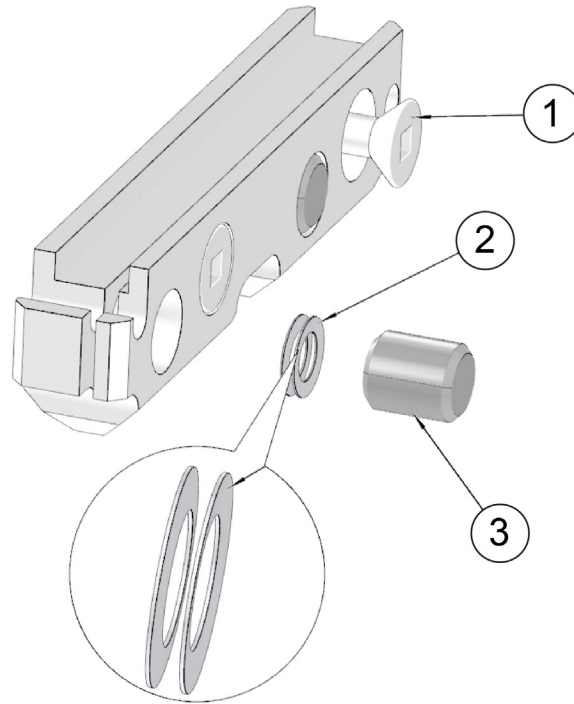
### 514-9J Medium Rottler Precision 4 Stone Holder Hone Head Assembly Parts



ITEM	PART #	DESCRIPTION
1	514-6-44	COUPLING, DRIVEN
2	514-10-20B	SHAFT, ADJUSTING
3	514-5-72A	SPRING, COMPRESSION
4	100-19	WASHER, THRUST
5	514-10-5A	JOINT, UNIVERSAL ASSY
6	514-10-10	SCREW, PIVOT
7	514-10-20A	YOKE
8	514-13-49	ADAPTER, KWIK SWITCH
9	514-7-82F	BEARING, THRUST
10	514-10-10	SCREW, PIVOT
11	514-10-1A	BODY
12	7209H	BUMPER
13	514-10-2A	CONE ROD
14	514-10-6	BLOCK, PIVOT



**514-10-13 Series Stone Holder Parts**



ITEM	PART #	DESCRIPTION
1	514-7-81J	SCREW, FLAT HEAD SQUARE DRIVE
2	514-10-11D	SPRING, BELLEVILLE
3	514-10-11C	PIN, DAMPENING

**Medium Hone Head Stone Holder Size Charts**

Diameter (New Stones)

	0.312 Stones		0.200 Stones	
	Min	Max	Min	Max
514-10-13A	2.34	2.45	2.20	2.23
514-10-13F	2.44	2.55	2.22	2.33
514-10-13B	2.54	2.65	2.32	2.43
514-10-13G	2.64	2.75	2.42	2.53
514-10-13C	2.74	2.85	2.52	2.63
514-10-13H	2.84	2.95	2.62	2.73
514-10-13D	2.94	3.05	2.72	2.83

## Diameter (New Stones) (Metric)

	7.925 Stones		5.08 Stones	
	Min	Max	Min	Max
514-10-13A	59.44	62.23	53.75	56.54
514-10-13F	61.98	64.77	56.29	59.08
514-10-13B	64.52	67.31	58.83	61.62
514-10-13G	67.06	69.85	61.37	64.16
514-10-13C	69.60	72.39	63.91	66.70
514-10-13H	72.14	74.93	66.45	69.24
514-10-13D	74.68	77.47	68.99	71.78

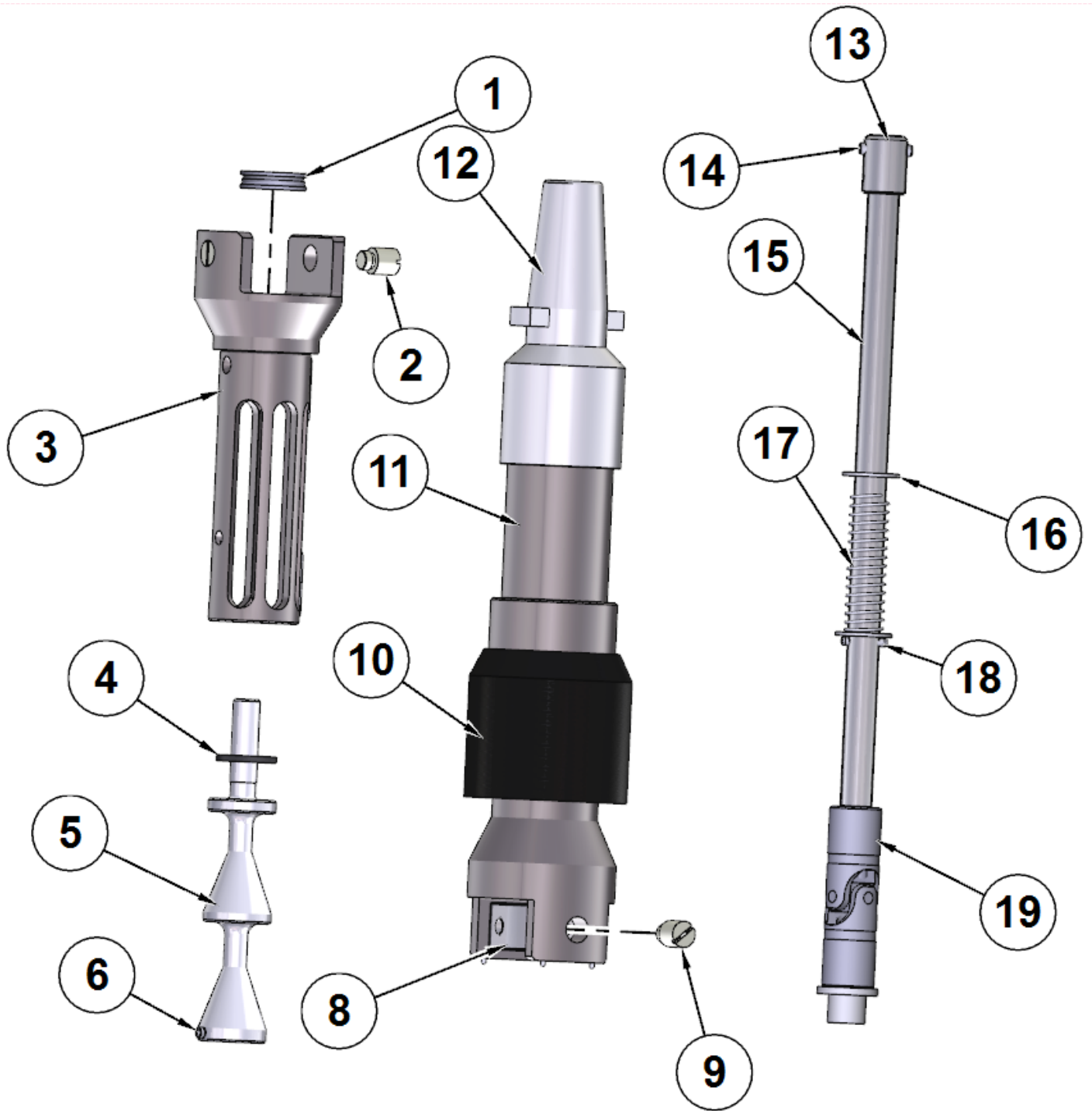
## Diameter (New Brushes )

	0.550 Brushes		0.395 Brushes	
	Min	Max	Min	Max
514-10-13A	2.82	2.93	2.51	2.62
514-10-13F	2.92	3.03	2.61	2.72
514-10-13B	3.02	3.13	2.71	2.82
514-10-13G	3.12	3.23	2.81	2.92
514-10-13C	3.22	3.33	2.91	3.02
514-10-13H	3.32	3.43	3.01	3.12
514-10-13D	3.42	3.53	3.11	3.22

## Diameter (New Brushes) (Metric)

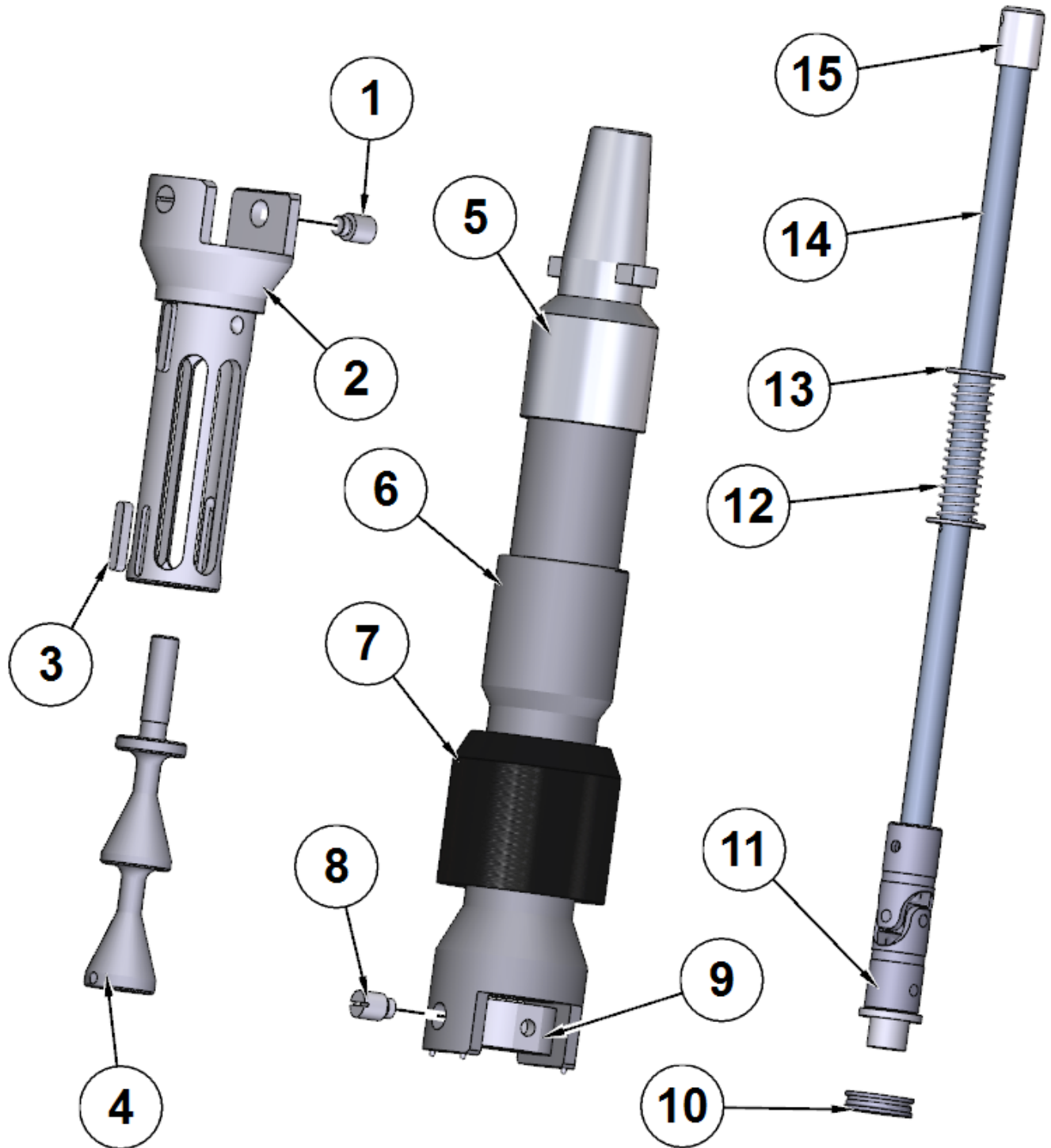
	13.970 Brushes		10.033 Brushes	
	Min	Max	Min	Max
514-10-13A	71.53	74.32	63.65	66.45
514-10-13F	74.07	76.86	66.19	68.99
514-10-13B	76.61	79.40	68.73	71.53
514-10-13G	79.15	81.94	71.27	74.07
514-10-13C	81.69	84.48	73.81	76.61
514-10-13H	84.23	87.02	76.35	79.15
514-10-13D	86.77	89.56	78.89	81.69

## 514-9Q Large Rottler Precision Heavy Duty 6 Stone Holder Hone Head Assembly Parts

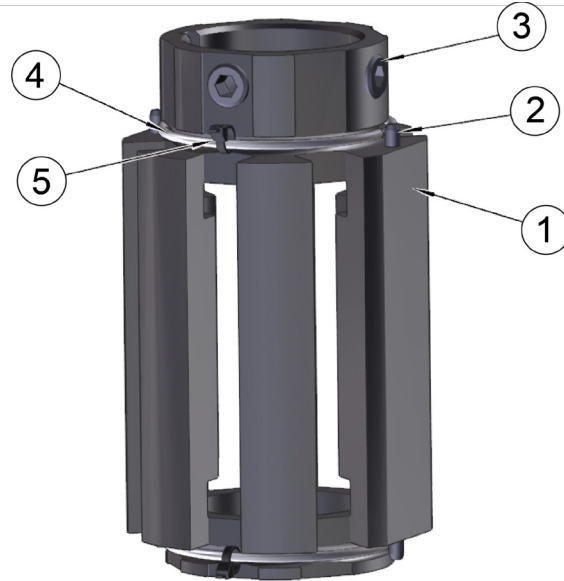


ITEM	PART #	DESCRIPTION
1	514-7-82F	BEARING, THRUST
2	514-5-66G	PIN, THREADED
3	514-9-10D	BODY, LARGE HEAVY DUTY HONE HEAD
4	514-7-82G	RING, SQUARE CROSS SECTION
5	514-9-7A	CONE ROD
6	MF-223C	ROLL PIN 3/16 X 5/8"
8	514-7-81S	PIVOT BLOCK
9	514-5-66G	PIN, THREADED
10	514-9-10G	COVER, HONE HEAD U-JOINT
11	514-7-81T	YOKE, DRIVE SHAFT
12	514-13-49	ADAPTER, KWIK SWITCH
13	514-6-44	COUPLING, DRIVEN
14	MF-198A	DOWEL PINS 3/16 X 7/8"
15	514-7-81U	SHAFT, ADJUSTING HONE HEAD
16	100-19	WASHER, THRUST
17	514-5-72A	SPRING, COMPRESSION
18	MF-219	ROLL PIN 1/8 X 3/4"
19	514-9-8A	JOINT, UNIVERSAL ASSY

## 514-9S Large Rottler Precision Heavy Duty 6 Stone Holder Hone Head Assembly Parts

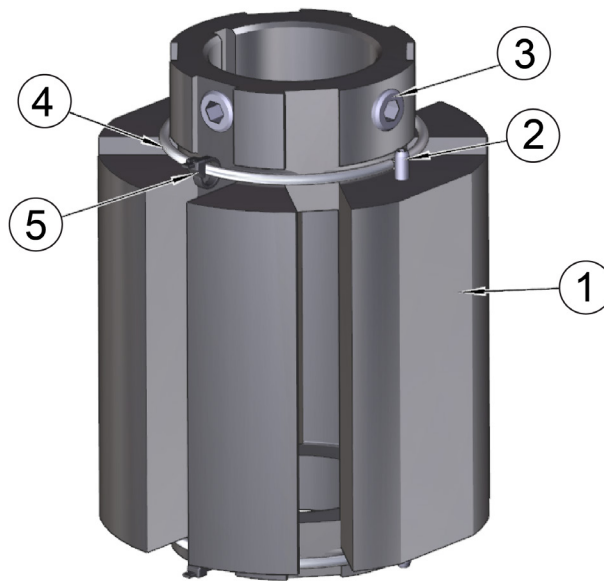


ITEM	PART #	DESCRIPTION
1	514-5-66G	PIN, THREADED
2	514-9-10D	BODY, LARGE HEAVY DUTY HONE HEAD
3	514-7-83C	KEY,SLEEVE
4	514-9-7A	CONE ROD
5	514-13-49	ADAPTER, KWIK SWITCH
6	514-7-81R	YOKE, DRIVE SHAFT
7	514-9-10G	COVER, HONE HEAD U-JOINT
8	514-5-66G	PIN, THREADED
9	514-7-81S	PIVOT BLOCK
10	514-7-82F	BEARING, THRUST
11	514-9-8A	JOINT, UNIVERSAL ASSY
12	514-5-72A	SPRING, COMPRESSION
13	100-19	WASHER, THRUST
14	514-7-81B	SHAFT, ADJUSTING HONE HEAD
15	514-6-44	COUPLING, DRIVEN



**514-9-4E Sleeve Assembly Parts**

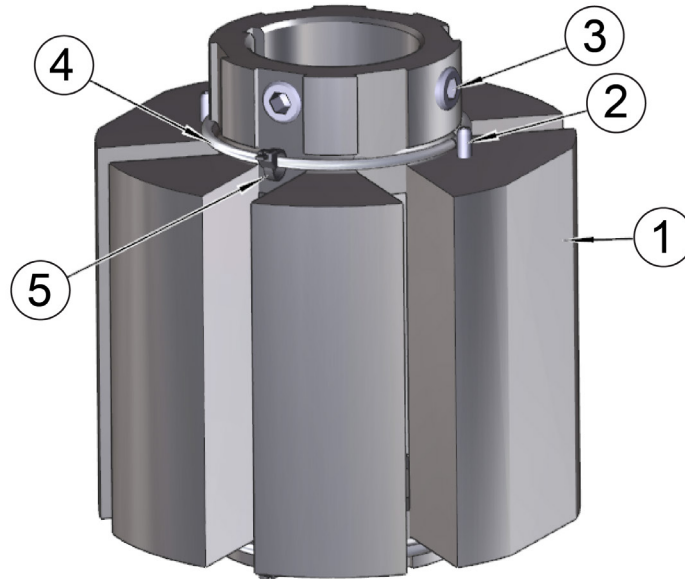
ITEM	PART #	DESCRIPTION
1	514-9-3E	SLEEVE ONLY (6 STONE) 2.77 TO 3.88" DIAMETER
2	MF-217	ROLL PIN 1/8 X 1/2"
3	514-7-83D	SCREW, SOCKET SET CONE POINT
4	514-7-83K	SPRING,GARTER
5	6147D	TYRAP



**514-9-4F Sleeve Assembly Parts**

ITEM	PART #	DESCRIPTION
1	514-9-3F	SLEEVE ONLY (6 STONE) 3.67 TO 4.63" DIAMETER
2	MF-217	ROLL PIN 1/8 X 1/2"
3	514-7-83D	SCREW, SOCKET SET CONE POINT
4	514-7-83K	SPRING,GARTER
5	6147D	TYRAP

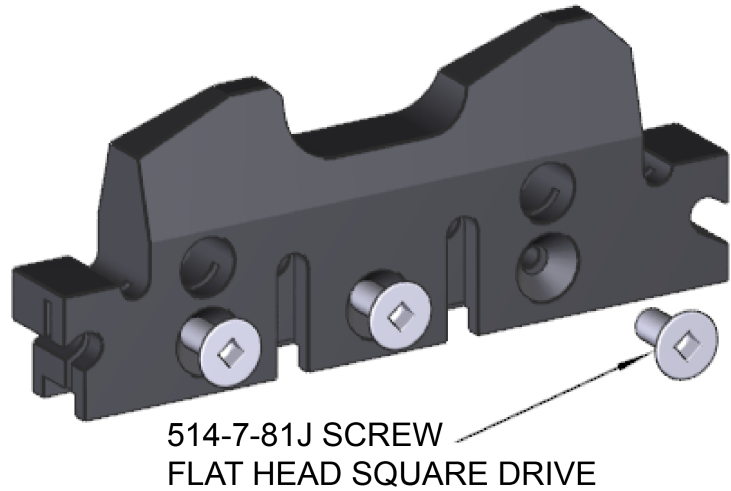
### 514-9-4G Sleeve Assembly Parts



ITEM	PART #	DESCRIPTION
1	514-9-3G	SLEEVE ONLY (6 STONE) 4.42 TO 7.38" DIAMETER
2	MF-217	ROLL PIN 1/8 X 1/2"
3	514-7-83D	SCREW, SOCKET SET CONE POINT
4	514-7-83K	SPRING, GARTER
5	6147D	TYRAP



### 514-9-31 Series Stone Holder Parts



### Six Stone Hone Head Stone Size Chart

	Diameter (New Stones)			
	0.312 Stones		0.200 Stones	
	Min	Max	Min	Max
514-9-31J	2.99	3.45	2.77	3.23
514-9-31A	3.17	3.63	2.94	3.41
514-9-31B	3.42	3.88	3.19	3.66
514-9-31C	3.67	4.13	3.44	3.91
514-9-31D	3.92	4.38	3.69	4.16
514-9-31E	4.17	4.63	3.94	4.41
514-9-31F	4.42	4.88	4.19	4.66
514-9-31G	4.67	5.13	4.44	4.91
514-9-31H	4.92	5.38	4.69	5.16
514-9-31K	5.17	5.63	4.94	5.41
514-9-31L	5.42	5.88	5.19	5.66
514-9-31M	5.67	6.13	5.44	5.91
514-9-31N	5.92	6.38	5.69	6.16
514-9-31P	6.17	6.63	5.94	6.41
514-9-31Q	6.42	6.88	6.19	6.66
514-9-31R	6.67	7.13	6.44	6.91
514-9-31S	6.92	7.38	6.69	7.16



<b>Diameter (New Stones) (Metric)</b>				
	7.9248 Stones		5.08 Stones	
	Min	Max	Min	Max
514-9-31J	75.92	87.73	70.23	82.04
514-9-31A	80.39	92.20	74.70	86.51
514-9-31B	86.74	98.55	81.05	92.86
514-9-31C	93.09	104.90	87.40	99.21
514-9-31D	99.44	111.25	93.75	105.56
514-9-31E	105.79	117.60	100.10	111.91
514-9-31F	112.14	123.95	106.45	118.26
514-9-31G	118.49	130.30	112.80	124.61
514-9-31H	124.84	136.65	119.15	130.96
514-9-31K	131.19	143.00	125.50	137.31
514-9-31L	137.54	149.35	131.85	143.66
514-9-31M	143.89	155.70	138.20	150.01
514-9-31N	150.24	162.05	144.55	156.36
514-9-31P	156.59	168.40	150.90	162.71
514-9-31Q	162.94	174.75	157.25	169.06
514-9-31R	169.29	181.10	163.60	175.41
514-9-31S	175.64	187.45	169.95	181.76

<b>Diameter (New Brushes )</b>				
	0.550 Brushes		0.395 Brushes	
	Min	Max	Min	Max
514-9-31J	3.47	3.93	3.16	3.62
514-9-31A	3.64	4.11	3.33	3.80
514-9-31B	3.89	4.36	3.58	4.05
514-9-31C	4.14	4.61	3.83	4.30
514-9-31D	4.39	4.86	4.08	4.55
514-9-31E	4.64	5.11	4.33	4.80
514-9-31F	4.89	5.36	4.58	5.05
514-9-31G	5.14	5.61	4.83	5.30
514-9-31H	5.39	5.86	5.08	5.55
514-9-31K	5.64	6.11	5.33	5.80
514-9-31L	5.89	6.36	5.58	6.05
514-9-31M	6.14	6.61	5.83	6.30
514-9-31N	6.39	6.86	6.08	6.55
514-9-31P	6.64	7.11	6.33	6.80
514-9-31Q	6.89	7.36	6.58	7.05
514-9-31R	7.14	7.61	6.83	7.30
514-9-31S	7.39	7.86	7.08	7.55



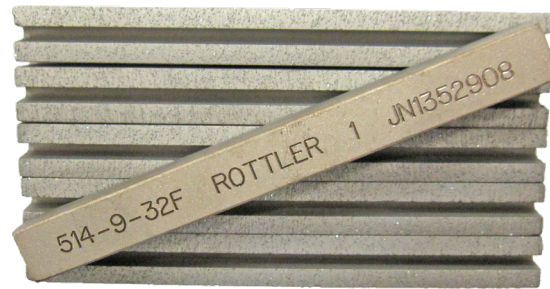
<b>Diameter (New Brushes) (Metric)</b>				
	13.97 Brushes		10.033 Brushes	
	Min	Max	Min	Max
514-9-31J	88.01	99.82	80.14	91.95
514-9-31A	92.48	104.29	84.61	96.42
514-9-31B	98.83	110.64	90.96	102.77
514-9-31C	105.18	116.99	97.31	109.12
514-9-31D	111.53	123.34	103.66	115.47
514-9-31E	117.88	129.69	110.01	121.82
514-9-31F	124.23	136.04	116.36	128.17
514-9-31G	130.58	142.39	122.71	134.52
514-9-31H	136.93	148.74	129.06	140.87
514-9-31K	143.28	155.09	135.41	147.22
514-9-31L	149.63	161.44	141.76	153.57
514-9-31M	155.98	167.79	148.11	159.92
514-9-31N	162.33	174.14	154.46	166.27
514-9-31P	168.68	180.49	160.81	172.62
514-9-31Q	175.03	186.84	167.16	178.97
514-9-31R	181.38	193.19	173.51	185.32
514-9-31S	187.73	199.54	179.86	191.67

## Diamond Abrasives for Rottler Precision 6 Stone Holder Hone Heads

NOTE: Ra - Roughness Average. Value before Ra is in micro inches. Value in brackets um is micro meters. Long designates length of stone. Height designated thickness of stone.

### Diamond Stones, .312 (7.90MM), Set of 6

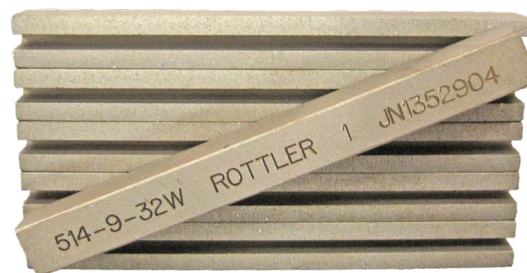
#### 514-9-32F Diamond Stones, 80 grit 3" (76mm) long set of 6, 90 Ra, (2.25um)



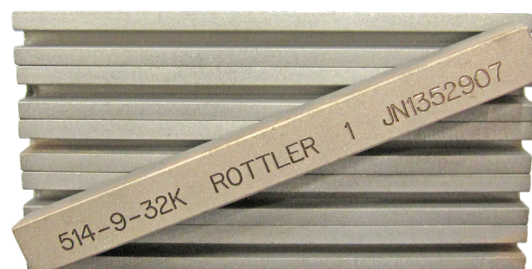
#### 514-9-32R Diamond Stones 80 grit 3.5" (89mm) long set of 6, 90 Ra, (2.25um)



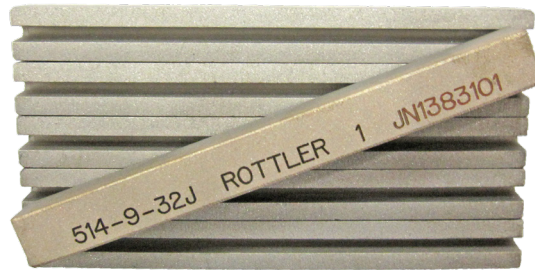
#### 514-9-32W Diamond Stones, 140/170 grit 3" (76mm) long set of 6, 50-75 Ra, (1.25 - 1.875um)



#### 514-9-32K Diamond Stones, 170/200 grit 3" (76mm) long set of 6, 45-60 Ra, (1.125 - 1.5um)



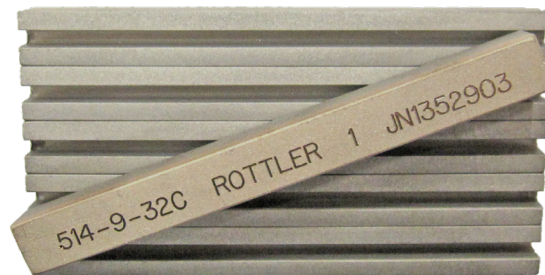
**514-9-32J Diamond Stones, 270/325 grit**  
3" (76mm) long set of 6, 35-45 Ra, (.875 - 1.125um)



**514-9-32E Diamond Stones, 325/400 grit**  
3" (76mm) long set of 6, 24-30 Ra, (.6 - .75um)



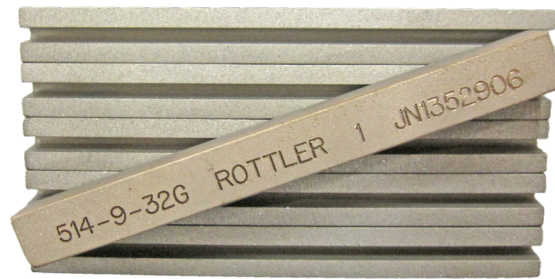
**514-9-32C Diamond Stones, 500 grit**  
3" (76mm) long set of 6, 18-22 Ra, (.45 - .55um)



**514-9-32L Diamond Stones, 550 grit**  
3" (76mm) long set of 6, 15-19 Ra, (.375 - .475)



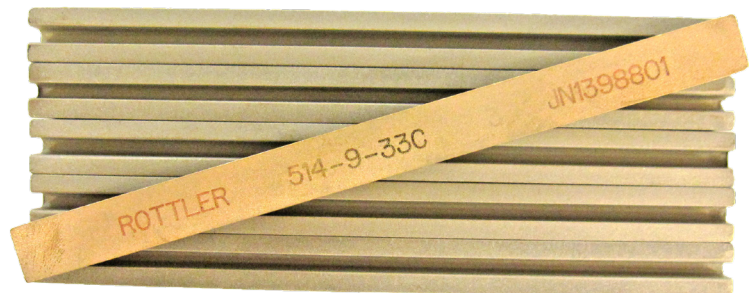
**514-9-32G Diamond Stones, 600 grit**  
3" (76mm) long set of 6, 8-12 Ra, (.2 - .3um)



**514-9-33 Diamond Stones, 800 grit**  
3" (76mm) long set of 6



**514-9-33C Diamond Stones, 800 grit**  
4" (102mm) long set of 6



**514-9-33J Diamond Stones, 1200 grit**  
3" (76mm) long set of 6



**Diamond Stones, .200 (5.08MM), Set of 6**

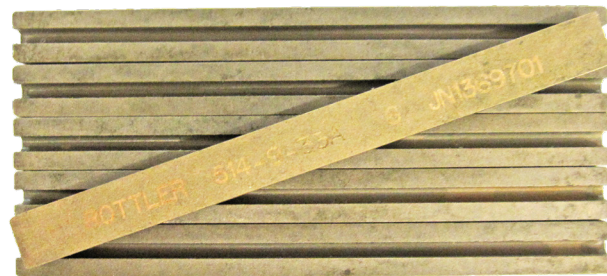
**514-9-33B Diamond Stones, 270/325 grit**  
3.5" (89mm) long set of 6, 35-45 Ra,



**514-9-32D Diamond Stones, 325/400 grit**  
3" (76mm) long set of 6, 18-22 Ra, 2.795 bore



**514-9-33A Diamond Stones, 800 grit**  
3.5" (89mm) long set of 6



## CBN Stones for Super Finishing with Rottler Precision 4 and 6 Stone Holder Hone Heads

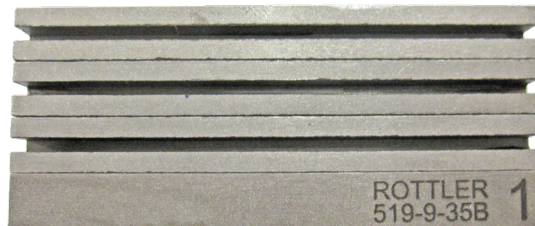
**514-9-35C CBN Stones, 320 grit**  
3" (76mm) long set of 4, for super finishing



**514-9-35D CBN Stones, 400 grit**  
3" (76mm) long set of 4, for super finishing



**514-9-35B CBN Stones, 600 grit**  
3" (76mm) long set of 4, for super finishing



## Brushes for Plateau Finishing with Rottler Precision 4 and 6 Stone Holder Hone Heads

**514-9-14H Brushes, for Plateau Finishing**  
.550" (14mm) height, 3 1/2" (89mm) long, requires one or two size smaller stone holder compared to .312" (7.90mm) height diamond stone. Set of 4

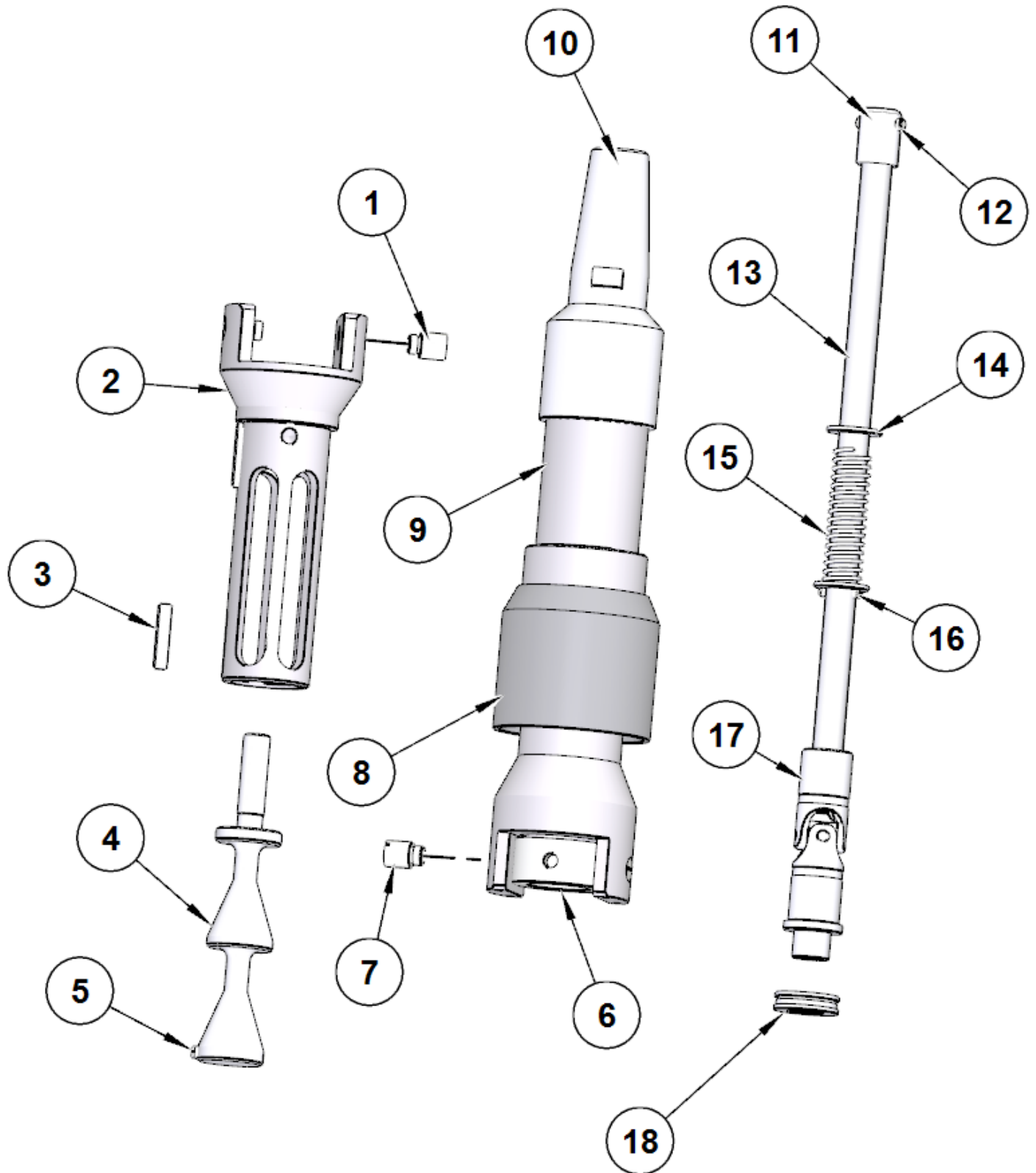


**514-9-14Y Brushes, for Plateau Finishing**  
.395" (10mm) height, 3 1/2" (89mm) long, requires same or one size smaller stone holder compared to .312" (7.90mm) height diamond stone. Set of 4



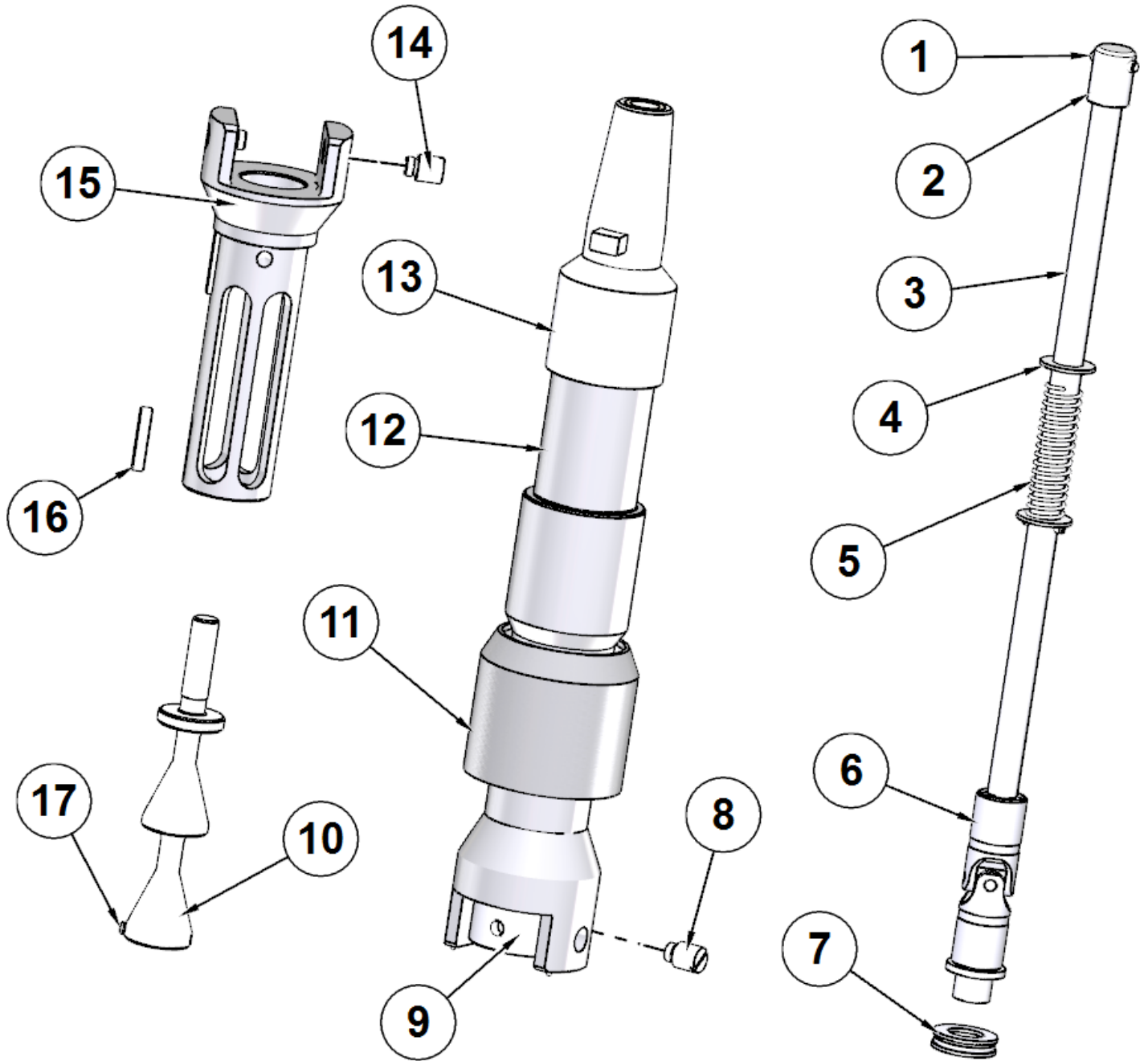


## 514-9P Large Rottler Precision Heavy Duty 4 Stone Holder Hone Head Assembly Parts



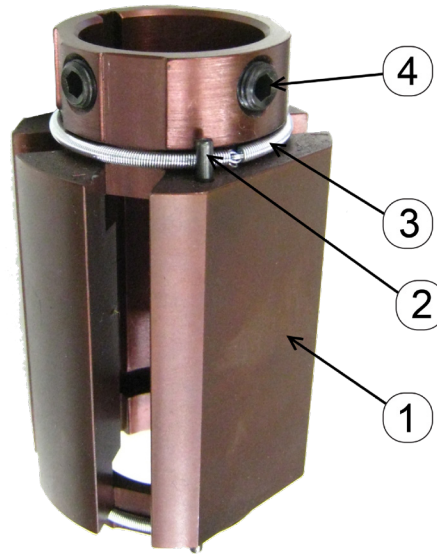
ITEM	PART #	DESCRIPTION
1	514-5-66G	PIN, THREADED
2	514-9-10E	BODY, LARGE HEAVY DUTY HONE HEAD
3	514-7-83C	KEY,SLEEVE
4	514-9-7A	CONE ROD
5	MF-223C	ROLL PIN 3/16 X 5/8"
6	514-7-81S	PIVOT BLOCK
7	514-5-66G	PIN, THREADED
8	514-9-10G	COVER, HONE HEAD U-JOINT
9	514-7-81T	YOKE, DRIVE SHAFT
10	514-13-49	ADAPTER, KWIK SWITCH
11	514-6-44	COUPLING, DRIVEN
12	MF-198A	DOWEL PIN 3/16 X 7/8"
13	514-7-81U	SHAFT, ADJUSTING HONE HEAD
14	100-19	WASHER, THRUST
15	514-5-72A	SPRING, COMPRESSION
16	MF-219	ROLL PIN 1/8 X 3/4"
17	514-9-8A	JOINT,UNIVERSAL ASSY
18	514-7-82F	BEARING,THRUST

## 514-9R Large Rottler Precision Heavy Duty 4 Stone Holder Hone Head Assembly Parts



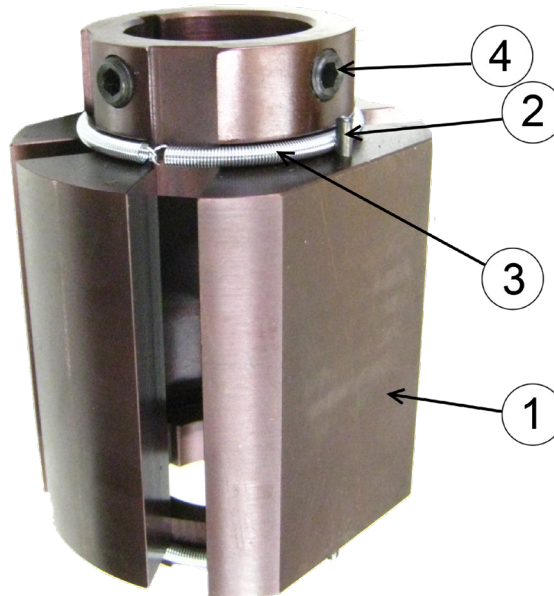
ITEM	PART #	DESCRIPTION
1	MF-198A	DOWEL PIN 3/16 X 7/8"
2	514-6-44	COUPLING, DRIVEN
3	514-7-81B	SHAFT, ADJUSTING HONE HEAD
4	100-19	WASHER, THRUST
5	514-5-72A	SPRING, COMPRESSION
6	514-9-8A	JOINT, UNIVERSAL ASSY
7	514-7-82F	BEARING, THRUST
8	514-5-66G	PIN, THREADED
9	514-7-81S	PIVOT BLOCK
10	514-9-7A	CONE ROD
11	514-9-10G	COVER, HONE HEAD U-JOINT
12	514-7-81R	YOKE, DRIVE SHAFT
13	514-13-49	ADAPTER, KWIK SWITCH
14	514-5-66G	PIN, THREADED
15	514-9-10E	BODY, LARGE HEAVY DUTY HONE HEAD
16	514-7-83C	KEY, SLEEVE
17	MF-223C	ROLL PIN 3/16 X 5/8"

**514-9-4A Sleeve Assembly Parts**



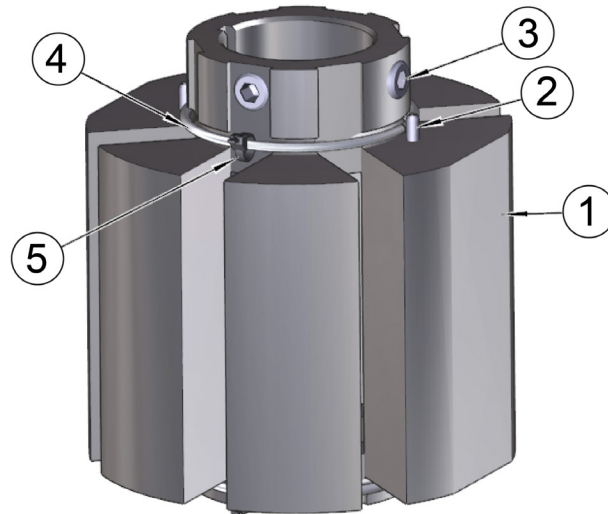
ITEM	PART #	DESCRIPTION
1	514-9-3A	SLEEVE 2.75 TO 3.56" DIA.
2	MF-217	ROLL PIN 1/8 X 1/2"
3	514-7-83K	SPRING,GARTER
4	514-7-83D	SCREW, SOCKET SET CONE POINT

**514-9B Sleeve Assembly Parts**



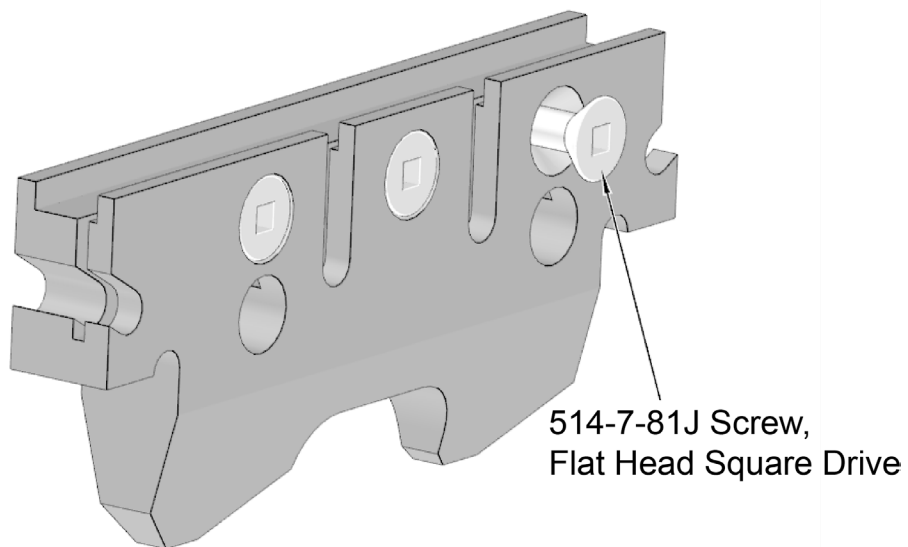
ITEM	PART #	DESCRIPTION
1	514-9-3B	SLEEVE ONLY 3.50-4.32" DIAMETER
2	MF-217	ROLL PIN 1/8 X 1/2"
3	514-7-83K	SPRING,GARTER
4	514-7-83D	SCREW, SOCKET SET CONE POINT

**514-9-4G Sleeve Assembly Parts**



ITEM	PART #	DESCRIPTION
1	514-9-3G	SLEEVE ONLY (6 STONE) 4.42 TO 7.38" DIAMETER
2	MF-217	ROLL PIN 1/8 X 1/2"
3	514-7-83D	SCREW, SOCKET SET CONE POINT
4	514-7-83K	SPRING, GARTER
5	6147D	TYRAP

**514-9-6 Series Stone Holder Parts**





### Large Hone Head Stone Size Chart

Diameter (New Stones)

	0.312 Stones		0.200 Stones	
	Min	Max	Min	Max
514-9-6J	2.99	3.45	2.77	3.23
514-9-6A	3.17	3.63	2.94	3.41
514-9-6B	3.42	3.88	3.19	3.66
514-9-6C	3.67	4.13	3.44	3.91
514-9-6D	3.92	4.38	3.69	4.16
514-9-6E	4.17	4.63	3.94	4.41
514-9-6F	4.42	4.88	4.19	4.66
514-9-6G	4.67	5.13	4.44	4.91
514-9-6H	4.92	5.38	4.69	5.16
514-9-6K	5.17	5.63	4.94	5.41
514-9-6L	5.42	5.88	5.19	5.66
514-9-6M	5.67	6.13	5.44	5.91
514-9-6N	5.92	6.38	5.69	6.16
514-9-6P	6.17	6.63	5.94	6.41
514-9-6Q	6.42	6.88	6.19	6.66
514-9-6R	6.67	7.13	6.44	6.91
514-9-6S	6.92	7.38	6.69	7.16

Diameter (New Stones) (Metric)

	7.925 Stones		5.08 Stones	
	Min	Max	Min	Max
514-9-6J	75.92	87.73	70.23	82.04
514-9-6A	80.39	92.20	74.70	86.51
514-9-6B	86.74	98.55	81.05	92.86
514-9-6C	93.09	104.90	87.40	99.21
514-9-6D	99.44	111.25	93.75	105.56
514-9-6E	105.79	117.60	100.10	111.91
514-9-6F	112.14	123.95	106.45	118.26
514-9-6G	118.49	130.30	112.80	124.61
514-9-6H	124.84	136.65	119.15	130.96
514-9-6K	131.19	143.00	125.50	137.31
514-9-6L	137.54	149.35	131.85	143.66
514-9-6M	143.89	155.70	138.20	150.01
514-9-6N	150.24	162.05	144.55	156.36
514-9-6P	156.59	168.40	150.90	162.71
514-9-6Q	162.94	174.75	157.25	169.06
514-9-6R	169.29	181.10	163.60	175.41
514-9-6S	175.64	187.45	169.95	181.76



## Diameter (New Brushes )

	0.550 Brushes		0.395 Brushes	
	Min	Max	Min	Max
514-9-6J	3.47	3.93	3.16	3.62
514-9-6A	3.64	4.11	3.33	3.80
514-9-6B	3.89	4.36	3.58	4.05
514-9-6C	4.14	4.61	3.83	4.30
514-9-6D	4.39	4.86	4.08	4.55
514-9-6E	4.64	5.11	4.33	4.80
514-9-6F	4.89	5.36	4.58	5.05
514-9-6G	5.14	5.61	4.83	5.30
514-9-6H	5.39	5.86	5.08	5.55
514-9-6K	5.64	6.11	5.33	5.80
514-9-6L	5.89	6.36	5.58	6.05
514-9-6M	6.14	6.61	5.83	6.30
514-9-6N	6.39	6.86	6.08	6.55
514-9-6P	6.64	7.11	6.33	6.80
514-9-6Q	6.89	7.36	6.58	7.05
514-9-6R	7.14	7.61	6.83	7.30
514-9-6S	7.39	7.86	7.08	7.55

## Diameter (New Brushes) (Metric)

	13.970 Brushes		10.033 Brushes	
	Min	Max	Min	Max
514-9-6J	88.01	99.82	80.14	91.95
514-9-6A	92.48	104.29	84.61	96.42
514-9-6B	98.83	110.64	90.96	102.77
514-9-6C	105.18	116.99	97.31	109.12
514-9-6D	111.53	123.34	103.66	115.47
514-9-6E	117.88	129.69	110.01	121.82
514-9-6F	124.23	136.04	116.36	128.17
514-9-6G	130.58	142.39	122.71	134.52
514-9-6H	136.93	148.74	129.06	140.87
514-9-6K	143.28	155.09	135.41	147.22
514-9-6L	149.63	161.44	141.76	153.57
514-9-6M	155.98	167.79	148.11	159.92
514-9-6N	162.33	174.14	154.46	166.27
514-9-6P	168.68	180.49	160.81	172.62
514-9-6Q	175.03	186.84	167.16	178.97
514-9-6R	181.38	193.19	173.51	185.32
514-9-6S	187.73	199.54	179.86	191.67



## Diamond Stones, .312" (7.90mm) Height, Set of 4

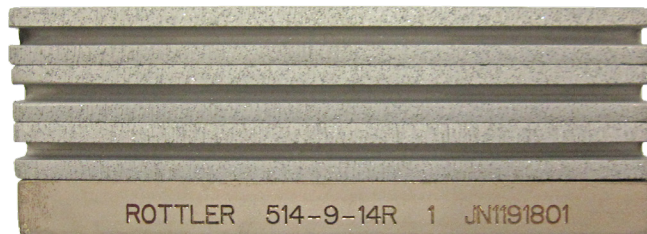
### 514-9-14F Diamond Stones, 80 grit

3" (76mm) long set of 4, 90Ra (2.25um), stock removal .004-.007/min.



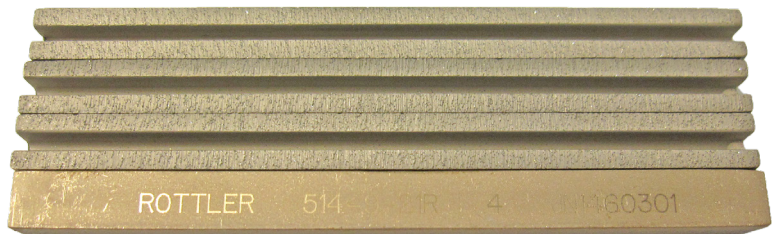
### 514-9-14R Diamond Stones, 80 grit

3 1/2" (89mm) long set of 4, 90Ra (2.25um), stock removal .004-.007/min. (.102 - .178mm)



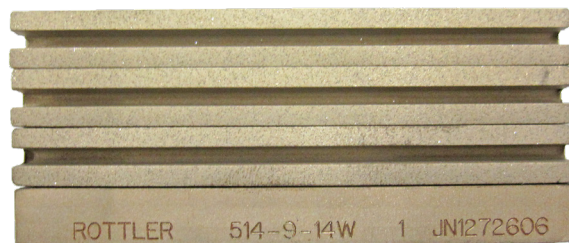
### 514-9-21R Diamond Stones, 80 grit

4" (102mm) long set of 4, 90 Ra, (2.25um)



### 514-9-14W Diamond Stones, 140/170 grit

3" (76mm) long set of 4, 50-75Ra (1.25 - 1.875um)



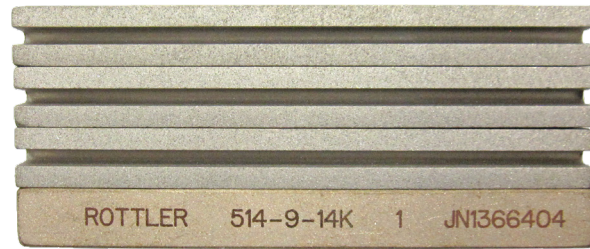
### 514-9-21W Diamond Stones, 140/170 grit

4" (102mm) long set of 4, 50-75 Ra, (1.25 - 1.875um)



**514-9-14K Diamond stones, 170/200 grit**

3 (76mm) long set of 4, 45-60Ra (1.125 - 1.5um)

**514-9-14M Diamond Stones, 170/200 grit**

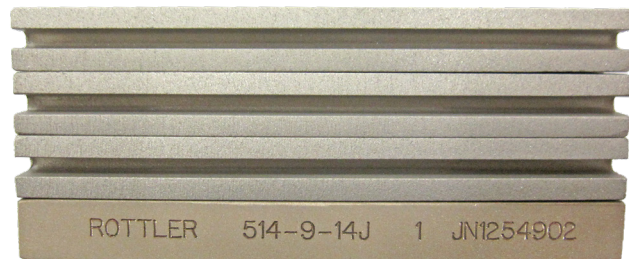
3 1/2" (89mm) long set of 4, 45-60Ra (1.125 - 1.5um)

**514-9-21M Diamond stones, 170/200 grit**

4" (102mm) long set of 4, 45-60 Ra, (1.125 - 1.5um)

**514-9-14J Diamond Stones, 270/325 grit**

3" (76mm) long set of 4, 35-45Ra (.875 - 1.125um)

**514-9-14T Diamond Stones, 270/325 grit**

3 1/2" (89mm) long set of 4, 35-45Ra (.875 - 1.125um)



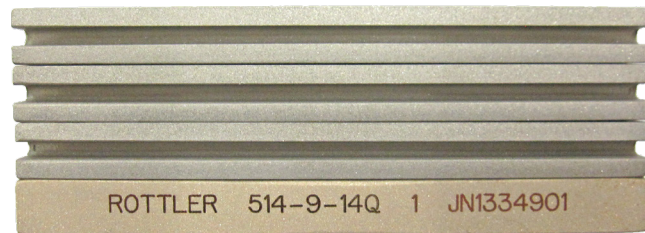
**514-9-14Z Diamond Stones, 270/325 grit**  
4" (102mm) long set of 4, 35-45Ra (.875 - 1.125um)



**514-9-14E Diamond Stones, 325/400 grit**  
3" (76mm) long set of 4, 24-30Ra (.6 - .75um)



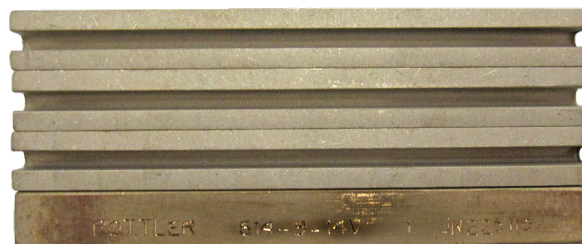
**514-9-14Q Diamond Stones, 325/400 grit**  
3 1/2" (89mm) long set of 4, 24-30Ra (.6 - .75um)



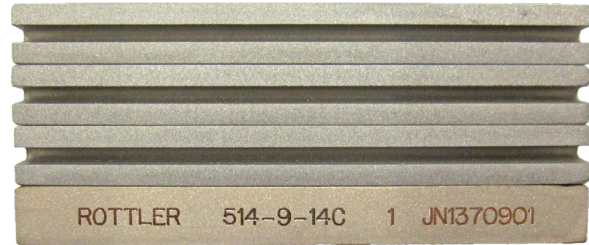
**514-9-14X Diamond Stones, 325/400 grit**  
4" (102mm) long set of 4, 24-30Ra (.6 - .75um)



**514-9-14V Diamond Stones, 500 grit**  
3" (76mm) long set of 4, 15-19Ra (.375 - .475um)



**514-9-14C Diamond Stones, 325/400 grit**  
3" (76mm) long set of 4, 18-22Ra (.45 - .55um)



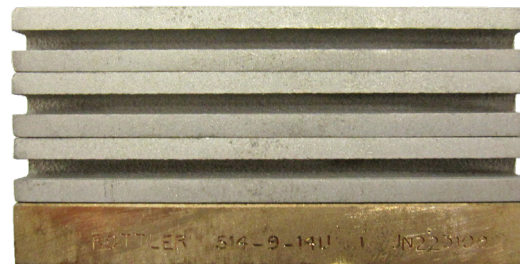
**514-9-14P Diamond Stones, 500 grit**  
3-1/2" (89mm) long set of 4, 18-22Ra (.45 - .55um)



**514-9-14D Diamond Stones, 325/400 grit**  
3" (76mm) long set of 4, 18-22Ra (.45 - .55um)  
Special required for bores under 2.990" diameter  
(75.94mm) .200" (5.1mm) Height



**514-9-14U Diamond Stones, 500 grit**  
2 1/2" (64mm) long set of 4, 18-22Ra (.45 - .55um)



**514-9-14L Diamond Stones, 550 grit**  
3" (76mm) long set of 4, 15-19Ra (.375 - .475um)



**514-9-14N Diamond Stones, 550 grit**  
3 1/2" (89mm) long set of 4, 15-19Ra (.375 - .475um)



**514-9-14G Diamond Stones, 600 grit**  
3" (76mm) long set of 4, 8-12Ra (.2 - .3um)



**514-9-14S Diamond Stones, 600 grit**  
3 1/2" (89mm) long set of 4, 8-12Ra (.2 - .3um)



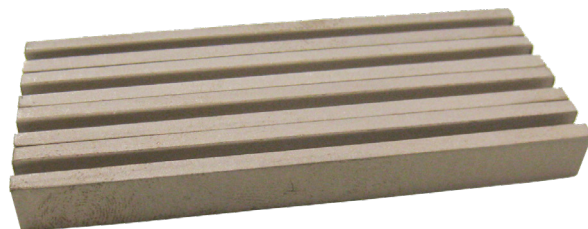
**514-9-21G Diamond Stones, 800 grit**  
3" (76mm) long set of 4



**514-9-21H Diamond Stones, 1000 grit**  
3" (76mm) long set of 4



**514-9-21J Diamond Stones, 1200 grit**  
3" (76mm) long set of 4



## CBN Stones for Super Finishing with Rottler Precision 4 and 6 Stone Holder Hone Heads

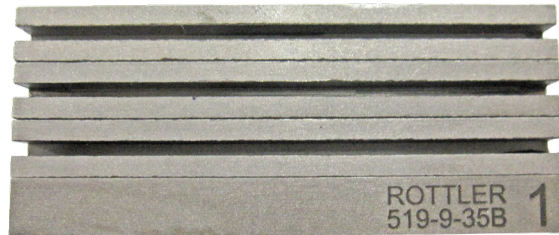
**514-9-35C CBN Stones, 320 grit**  
3" (76mm) long set of 4, for super finishing



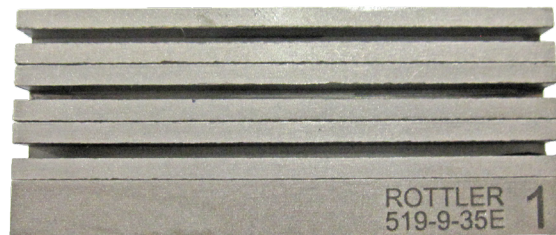
**514-9-35D CBN Stones, 400 grit**  
3" (76mm) long set of 4, for super finishing



**514-9-35B CBN Stones, 600 grit**  
3" (76mm) long set of 4, for super finishing



**514-9-35E CBN Stones, 500 grit**  
3" (76mm) long set of 4, for super finishing.



**Brushes for Plateau Finishing with Rottler Precision 4 and 6 Stone Holder Hone Heads****514-9-14H Brushes, for Plateau Finishing**

.550" (14mm) height, 3 1/2" (89mm) long. Set of 4

Requires one or two size smaller stone holder compared to .312" (7.90mm) height diamond stone.

**514-9-14Y Brushes, for Plateau Finishing**

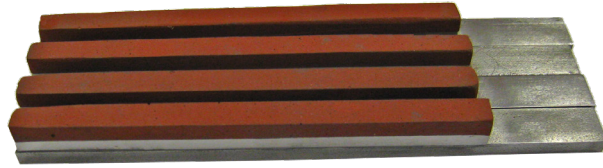
.395" (10mm) height, 3 1/2" (89mm) long. Set of 4

Requires same or one size smaller stone holder compared to .312" (7.90mm) height diamond stone.



**Special Stones for Finishing Aluminum Silicone Cylinders**  
(Refer to bulletin No. 284) Requires Rottler Precision 4 or 6 Stone Holder Hone Heads

**514-9-18P Special Red Finish Diamonds**  
For Final Sizing (set of 4)



**514-9-18N Silicone Abrasive Exposing Stones**  
For Removing Aluminum (set of 4)



**514-9-21 Polishing Felt Pads**  
For use with 514-9-21F silicon paste. (set of 4)



**514-9-21F Silicone Paste**  
For use with 514-9-21 Polishing felt pads





**Special Hone Head Single Stage, 12 Stone****514-9N Hone Head, Single Stage (12 Stone)**

3.9" - 4.375" (99.06MM - 111.125MM ), H-70



**Assembly Image and Parts List are unavailable at this time.**

**Please visit the service tab of our web page at [Send a Service Request www.rottlermfg.com](http://www.rottlermfg.com) or contact the Rottler Factory Service at [service@rottlermfg.com](mailto:service@rottlermfg.com) for assistance and your service request.**

**You may also call Rottler at 1-800-452-0534 or 1-253-872-7050**

**Please ensure you have the Machine Model and Serial Number available when contacting Rottler for Service**

**110-171-01 Single Stage Diamond Stones**

.0781" Tall (19.83MM), 600 Grit Set of 12

**110-171-02 Single Stage Diamond Stones**

.0781" Tall (19.83MM), 1200 Grit, Set of 12

**110-171-03 Single Stage Diamond Stones**

.0781" Tall (19.83MM), (325/400 Grit) - Set of 12



## Optional Measuring Equipment

### 201 Mitutoyo Surface Tester Surftest 201

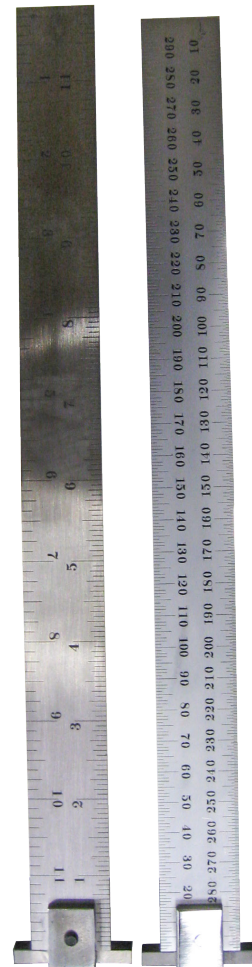
Sold as complete unit only.



### 514-8-27 Stone Depth Scale and Holder Assembly (inch)

### 514-8-27F Stone Depth Scale and Holder Assembly (metric)

Both items sold as complete assemblies only.

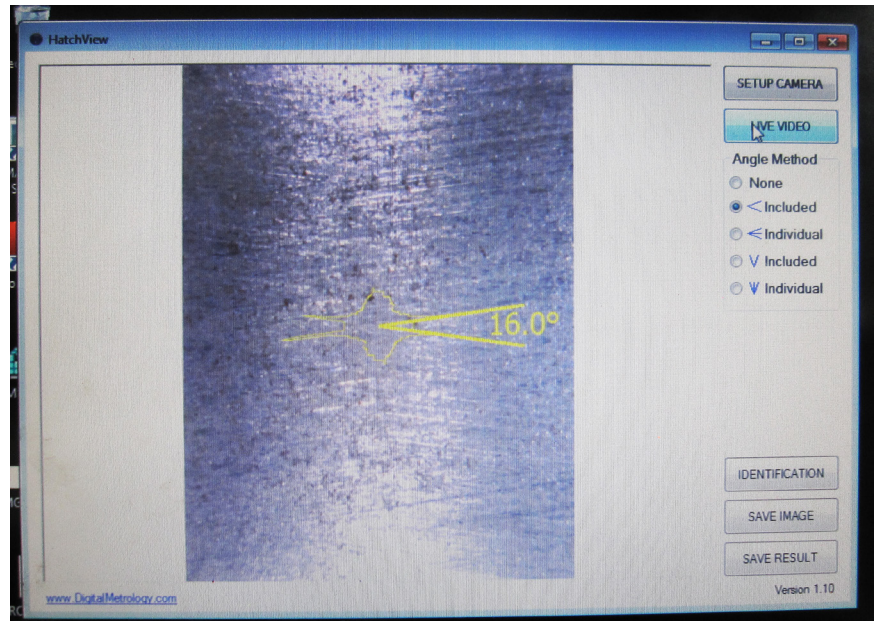


### Camera & Software To View Cross Hatch Angle

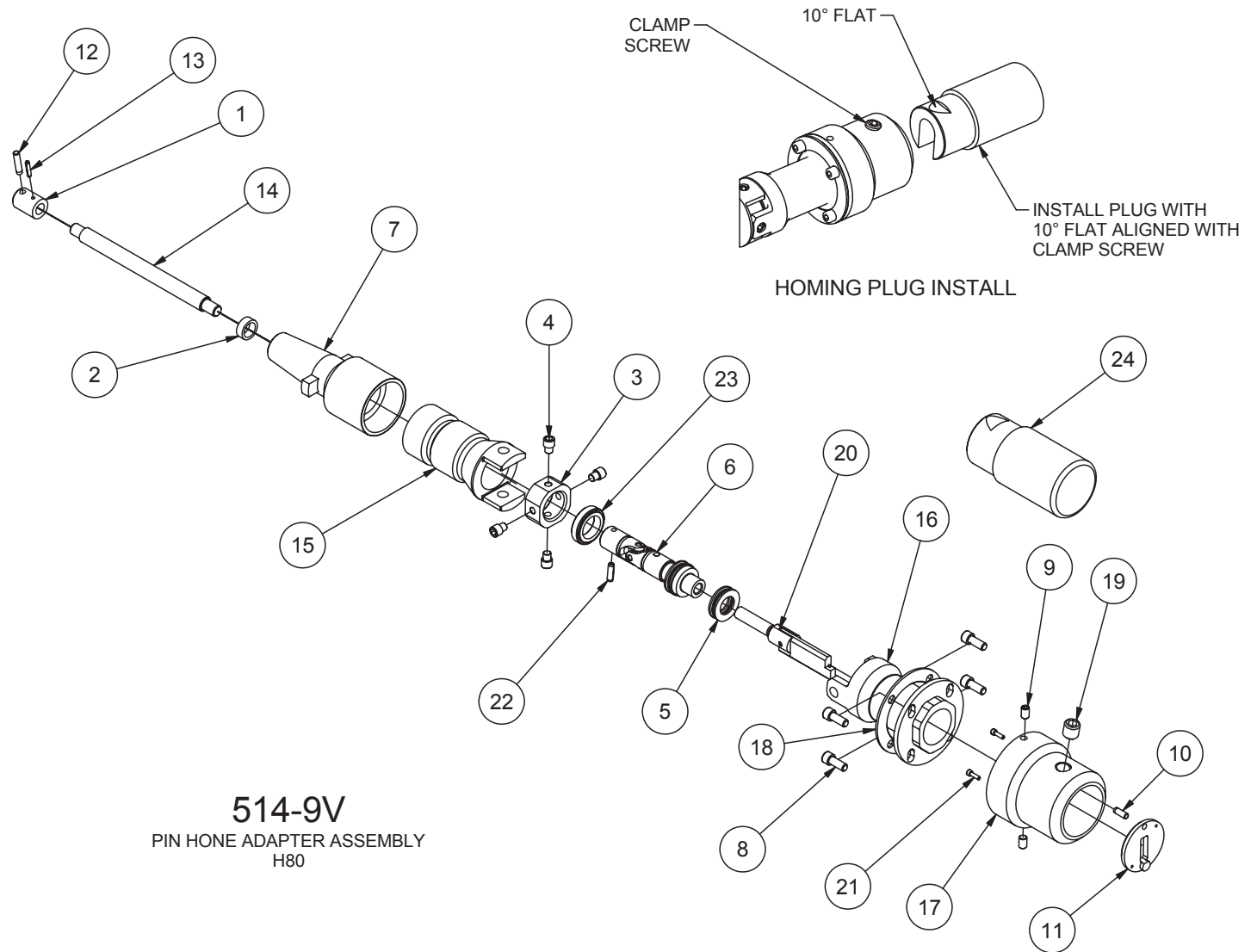
514-14-29A Camera



514-14-29B Software Package



### 514-9V Pin Hone Adapter Parts



514-9V PIN HONE ADAPTER ASSEMBLY - H80			
ITEM	QTY	PART NUMBER	DESCRIPTION
1	1	514-6-44	DRIVEN COUPLING - HONE #2
2	1	514-7-80T	OIL LITE BUSHING
3	1	514-10-6	PIVOT BLOCK UNIVERSAL JUNIOR PERCISION HONE HEAD
4	4	514-10-10	PIVOT SCREW
5	1	514-7-82F	THRUST WASHER
6	1	514-10-5B	U-JOINT ASSEMBLY - PIN HONE ADAPTER - H80
7	1	514-13-49	KWIK SWITCH TAPER
8	4	MF-13	S.H.C.S. 1/4 - 20 UNC - 5/8
9	2	514-10-1E	1/4-28UNF x 3/8" LONG SOCKET FLAT POINT SET SCREW
10	1	MF-196	3/16" x 1/2" LG. DOWEL PIN
11	1	514-10-3D	BACKING PLATE, PIN HONE ADAPTER ASSEMBLY
12	1	MF-198A	3/16 x 7/8 Dowel Pin
13	1	MF-218	1/8 x 5/8 Roll Pin
14	1	514-10-20C	ADJUSTING SHAFT - PIN HONE ADAPTER ASSEMBLY
15	1	514-10-20D	YOKE DRIVE TUBE, PIN HONE ADAPTER - H75
16	1	514-10-1B	UPPER BODY, PIN HONE ADAPTER ASSEMBLY - H80
17	1	514-10-1C	LOWER BODY, PIN HONE ADAPTER ASSEMBLY - H80
18	1	514-10-1D	CLAMP PLATE, PIN HONE ADAPTER ASSEMBLY - H80
19	1	6855P	1/2-13UNC x 1/2" LONG SOCKET FLAT POINT SET SCREW
20	1	514-10-3E	ACTUATOR ASSEMBLY, PIN HONE ADAPTER ASSEMBLY - H80
21	2	MF-84D	4-40UNC x 3/8" LG. S.H.C.S.
22	1	MF-223C	3/16" X 5/8" LG. ROLL PIN
23	1	514-10-1F	NUT, THRUST BEARING - PIN HONE ADAPTER - H80
24	1	514-10-1G	HOMING PLUG, PIN HONE ADAPTER - H85