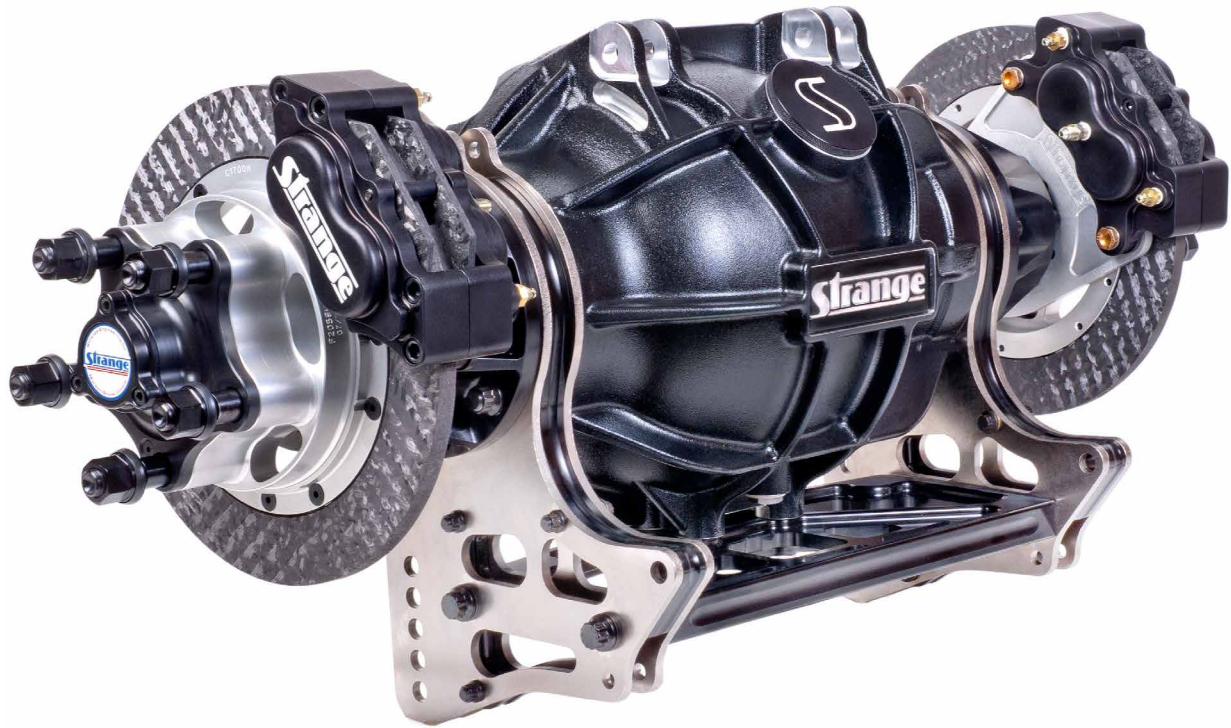


Strange

THE Ultra 4-Link Rear



RaceStrange

- Fully machined lightweight aluminum housing & components
- Narrow 16" or 17" center to center 4-link width
- 3/4" thick and internally ribbed faceplate
- Integral wheelie bar mounts
- Housing and 4-link plates are lugged for greater strength
- Pre-loaded spindle bearings with billet spindle nut and pre-load spacer
- Available for full floating or 2-piece axles
- Steel or carbon brake kits

Instruction packet:	
pg. 3 -	Kit overview
pg. 4 -	Housing dimensions
pg. 5 -	Face plate and end bell stud installation
pg. 6 -	Endbell and mounting brackets assembly
pg. 7 -	Full floating axle assembly
pg. 8 -	cont...
pg. 9 -	2-Piece axle assembly
pg. 10 -	Brake kit options

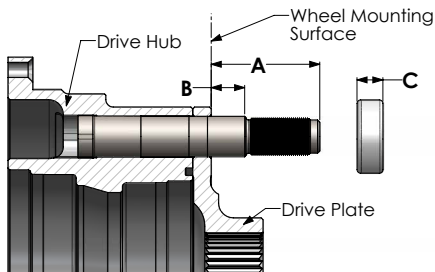
Note: consult B1850 B1855 Strange Four Piston Directional Caliper and Ultra Caliper (Black Calipers) B5044, B5045, B5046, B5040, B5042 instructions

☐ Full Floating Axle Assembly Options

Wheel to wheel widths	4-link plate	Brakes	Bolt circles	Lug nuts
31.75"	standard	11.50" Steel	4.75	Aluminium
33.25"	reinforced	11" Carbon	5.00	Steel
33.75"	no plates		5.50	
34.75"				

Note: All full floating axle assemblies have 16" 4-link center to center except 34.75" wide have 17" center to center (see pg. 4)

Wheel Studs



Studs	A	B	C	Lug nuts
F2058BSP	1.90"	0.65"	0.250	steel
F2058BAP	1.90"	0.65"	n/a	aluminium
F2058BLP	2.65"	1.65"	0.4375	steel

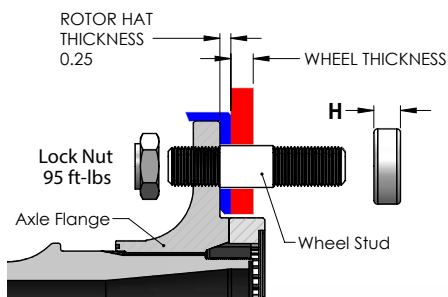
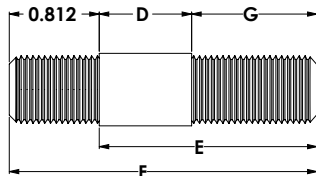
⚠ For wheel stud replacement please contact Strange Engineering

Steel & aluminum lug nut torque: 130 ft-lbs

☐ 2-Piece axle assembly options

Wheel to wheel widths	4-link plate	Brakes	Bolt circles	Lug nuts	Bearing
31.50"	standard	Steel (2 pc. rotor)	4.75	Aluminium	Dual row ball
32.50"	reinforced no plates	Carbon	5.00	Steel	Spherical misalignment

Wheel Studs



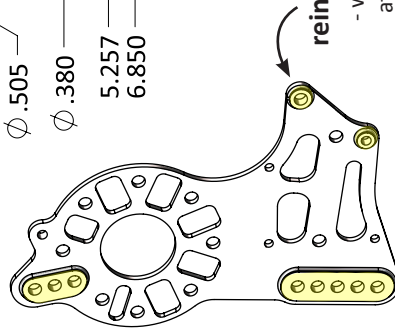
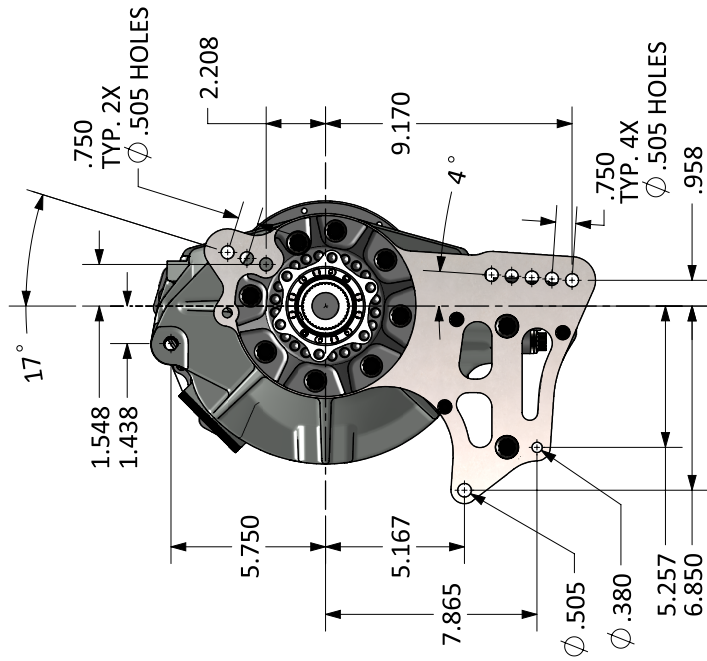
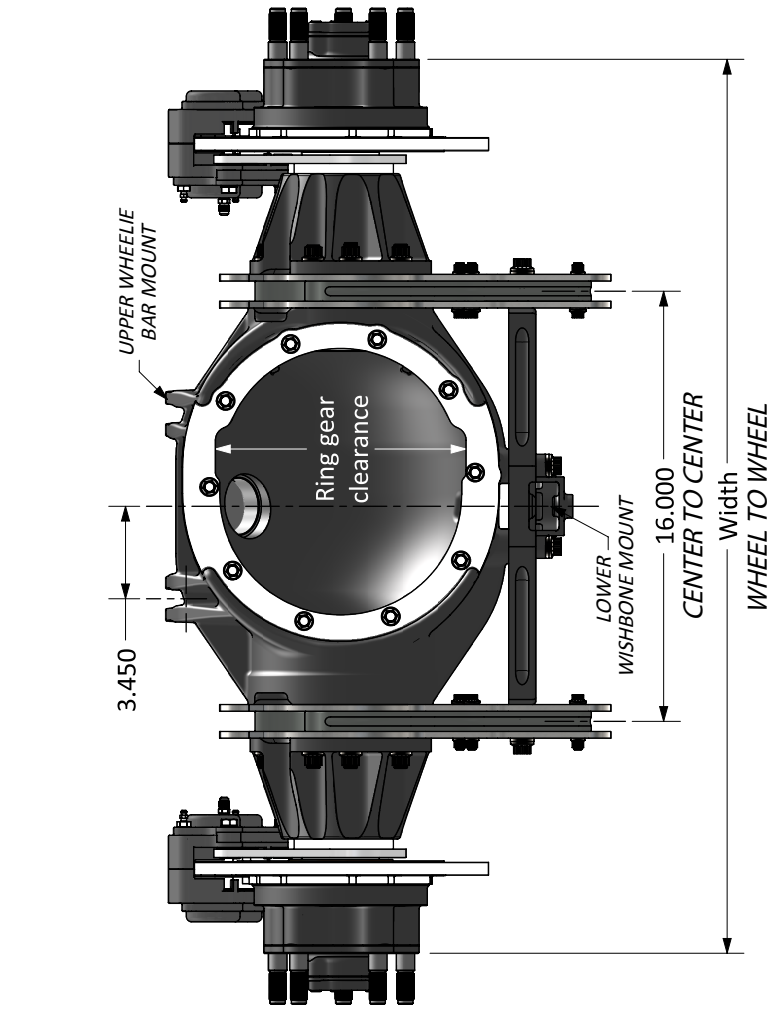
Studs	D	E	F	G	H
A1036	0.775	1.550	2.362	0.775	0.250
A1037	0.875	2.063	2.875	1.188	0.4375
A1037MD	0.875	1.760	2.572	0.885	0.250

⚠ Ensure measurement "D" is able to fully engage into the wheel. The "D" dimension needs to be slightly greater than combined thickness of the brake rotor hat and thickness of the wheel

Lug nut torque: 130 ft-lbs
Wheel Stud Torque: 50 ft-lbs
Lock Nut Torque: 95 ft-lbs



Housing dimensions



reinforced 4-link plate option

- weld-on bosses double plate thickness at mounting points to increase strength

Note: 34.75" wide wheel to wheel floater axle kits have 17" 4-link center to center

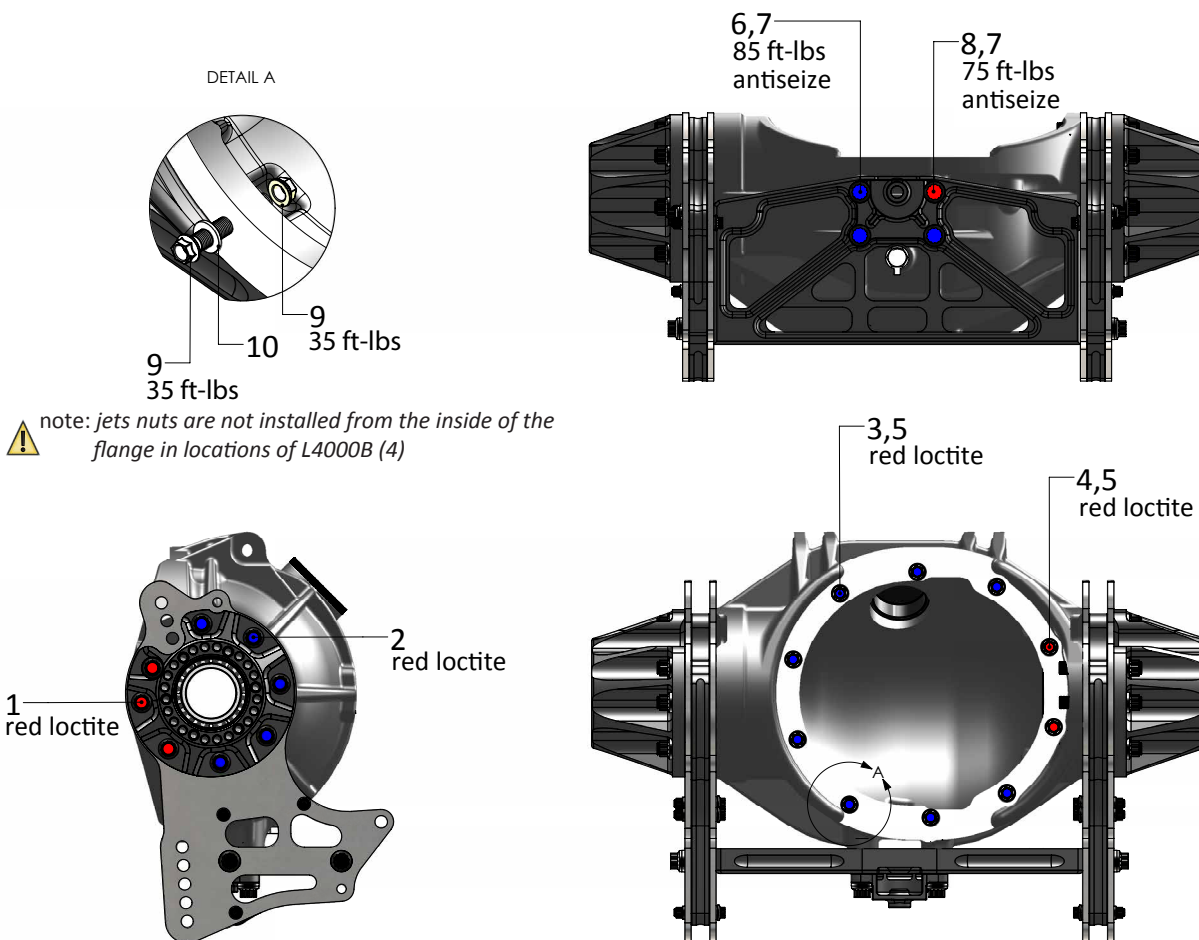
Ring gear clearance revisions	
Date manufactured	Ring gear clearance
2/11 - 10/11	9.195
11/11 - present	9.446



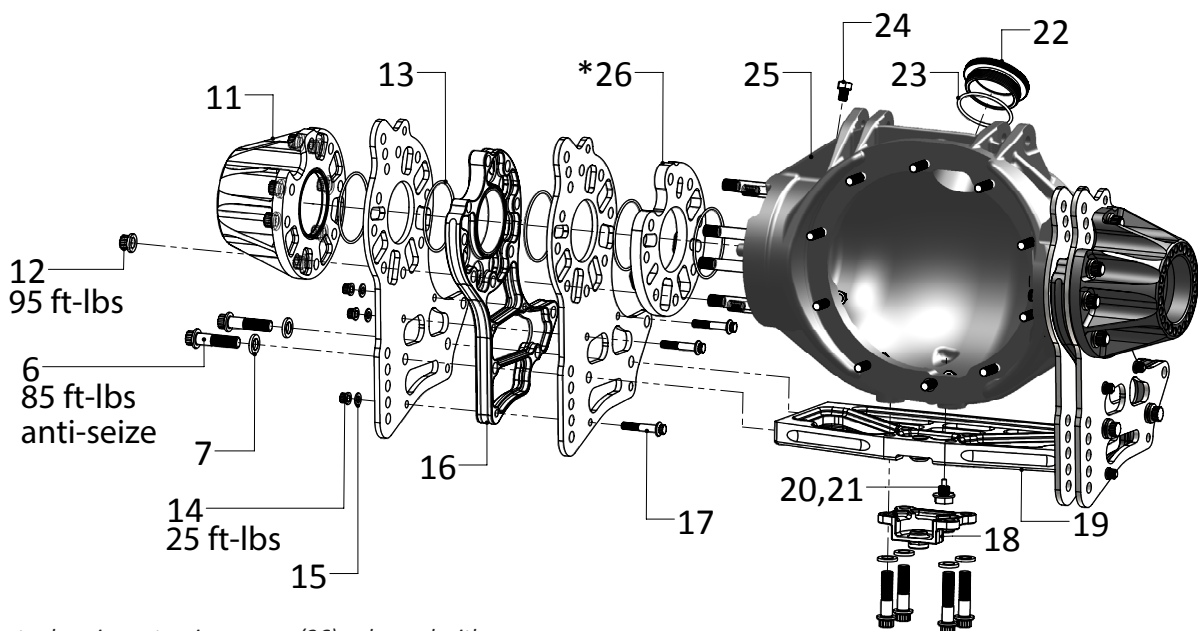
Face plate and endbell stud installation


If the housing end bell studs (1,2) or face plate studs (3,4) have not been pre-installed by Strange Engineering refer to the diagrams below to ensure the proper length studs are installed in corresponding locations. The blue and red colors indicate the variations of stud and bolt lengths.

- red Loctite must be used on the studs (not nuts)



Component	Part #	Quantity	Description
1a	H1180D	3	Housing Tube Stud 2.906" Long
1b	H1180D1	3	Housing Tube Stud 3.781" Long (34.75" WTW)
2a	H1180C	13	Housing Tube Stud 3.312" Long
2b	H1180C1	13	Housing Tube Stud 4.187" Long (34.75" WTW)
3	L4000B1	8	Face Plate Stud 3/8-24 x 2.125"
4	L4000B	2	Face Plate Stud 3/8-24 x 1.50"
5	H1150E	10	3/8-24 x 0.520 Thread Inserts
6	H1180J	7	1/2-13 x 2.25" 12 Point Screw
7	A1026B	8	1/2" Flat Washer
8	H1180K	1	1/2-13 x 2" 12 Point Screw
9	F1282	18	3/8-24 Jet Nut
10	S3402N	10	3/8" Washer



 note: housing extension spacer (26) only used with 34.75 wide floater rear ends

Component	Part #	Quantity	Description
11a	F2094CR3175	1	31.75 WTW End Bell (RH)
11b	F2094CR	1	33.25 WTW End Bell (RH)
11c	F2094CR3375	1	33.75 & 34.75 WTW End Bell (RH)
12	H1180Q	16	1/2-20 12 Point Nut
13	H1180O	8	-151 O-Ring End Bell
14	H1180M	6	5/16-24 12 Point Nut
15	S3800W	6	5/16" Washer 1/16" Thick
16	H1180B	2	Four Link Spacer Plate
17	H1180L	6	5/16-24 x 1.75 12 Point Screw
18	H1180G	1	Wishbone Retainer
19a	H1180E	1	Bottom Brace for 16" center to center
19b	H1180E1	1	Bottom Brace for 17" center to center
20	H1180I	1	Drain Plug
21	H1108IW	1	Drain Plug Gasket
22	H1180F	1	Fill Plug
23	H1180H	1	Fill Plug O-Ring
24	H1180P	1	1/8 Breather
25	H1180A	1	Modular Housing
26	H1180RR	1	34.75" WTW Housing Extension Spacer (RH)
27	H1180RL	1	34.75" WTW Housing Extension Spacer (LH)
28a	F2094CL3175	1	31.75 WTW End Bell (LH)
28b	F2094CL	1	33.25 WTW End Bell (LH)
28c	F2094CL3375	1	33.75 & 34.75 WTW End Bell (LH)

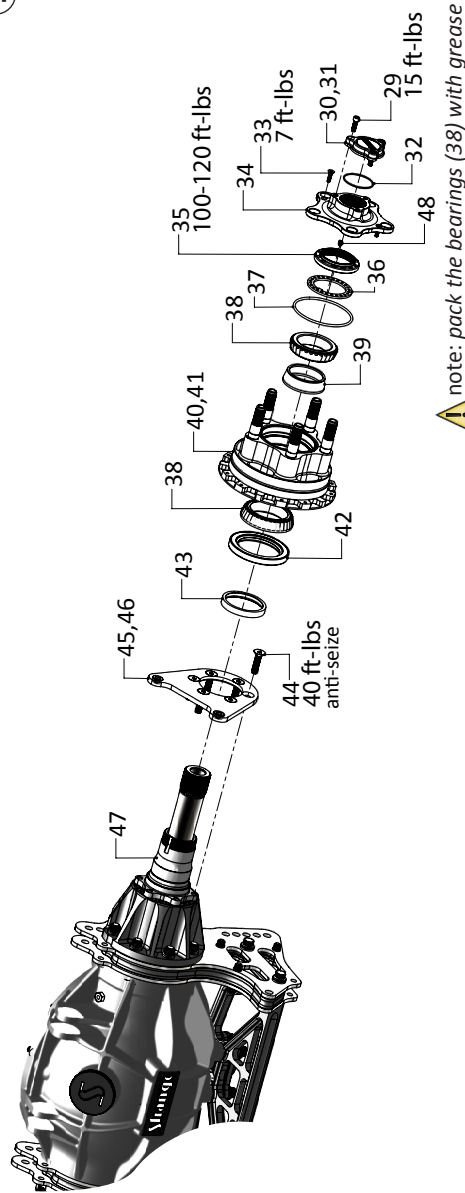
Full floating axle assembly

1 Spindle Retainer Nut Installation

Tools (included with all kits)

- F2058W- Spindle Nut Wrench for 4-3/4" & 5" B.C.
- F2056M- Spindle Nut Wrench for 5-1/2" B.C.

1. Press the spindle (47) into the endbell and align the threaded holes. Then slide the caliper bracket (45) on.
2. Align the threaded holes in the endbell with the holes in the caliper bracket and spindle flange.
3. Install the six flat head screws (44) and torque to 40 ft.-lbs. Apply anti-seize on the threads of the spindle retainer nut.
4. The spindle retainer nut (49) is installed using the provided wrench. Torque spindle retainer nut to 200-250 ft.-lbs and align two opposing holes in the retainer nut to mate with the threaded holes in the housing.
5. Apply loctite to a set screw (48) and hand tighten to secure assembly.

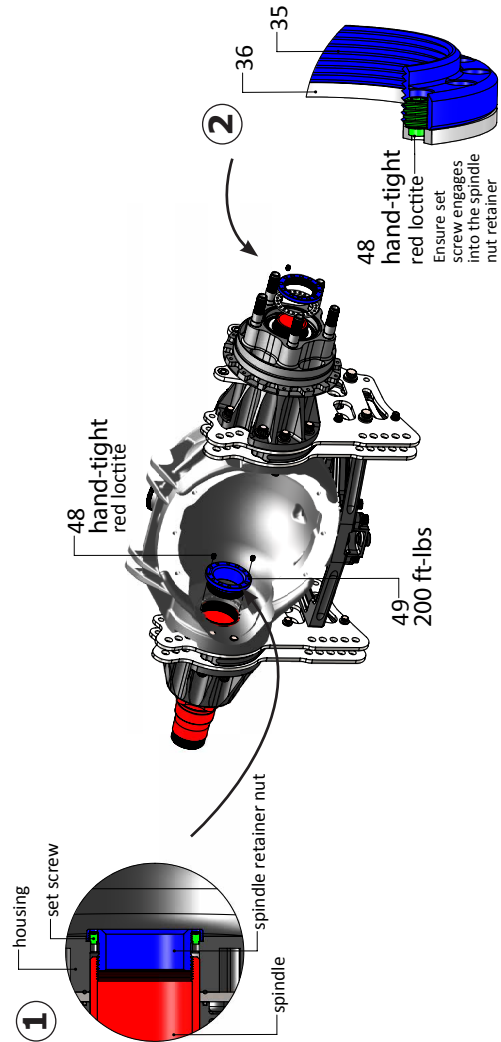


2 Spindle Nut Installation

Tools (included with all kits)

- F2058W- Spindle Nut Wrench for 4-3/4" & 5" B.C.
- F2056M- Spindle Nut Wrench for 5-1/2" B.C.

1. Slide the spindle nut retainer (36) onto the spindle ensuring the notches on the retainer and slots on the spindle are oriented properly.
2. Install the spindle nut (35) using the provided wrench. Spindle nuts are torqued to 100-120 ft.-lbs.
3. Ensure to align two opposite holes on the spindle nut and retainer for installation of set screws.
4. Thread the set screws opposite one another into the spindle nut. Ensure screws engage into spindle nut retainer.
5. Rotate hub several times to ensure everything is seated.



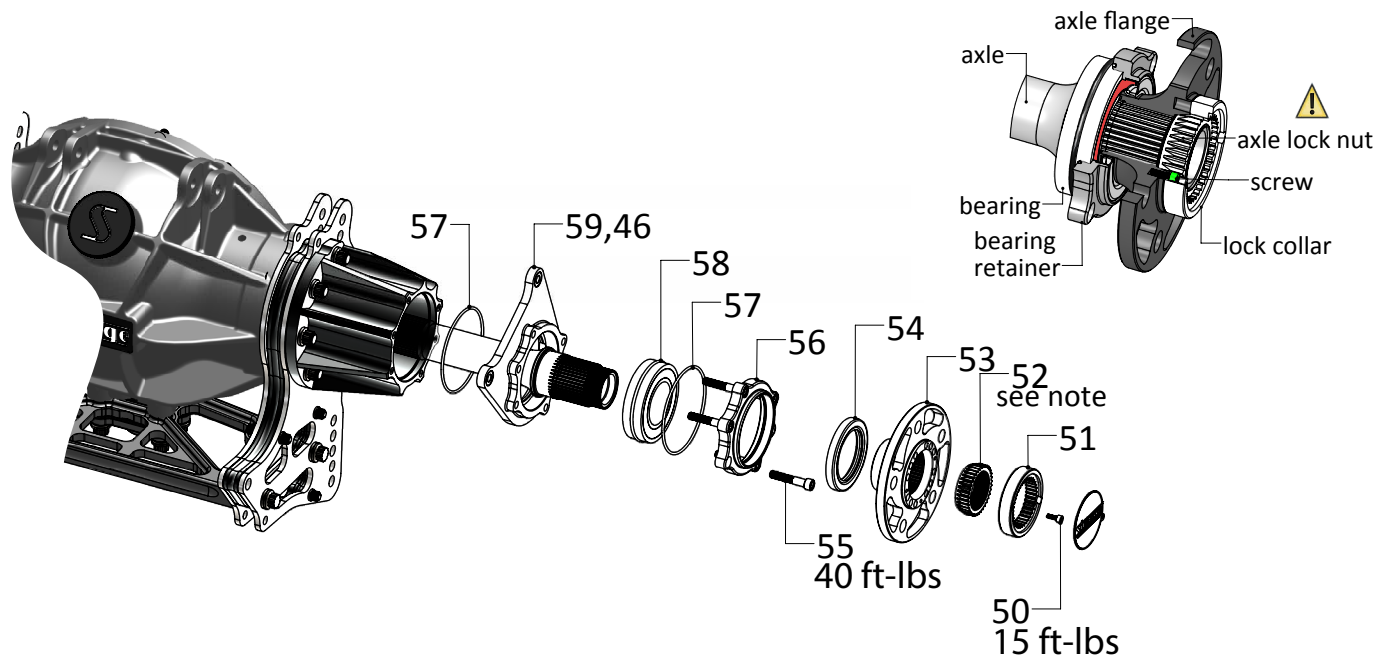


Full floating axle assembly

Component	Part #	Quantity	Description
29	A1050D	6	1/4-28 x 3/4 SHCS
30	A1RS	2	Race Decal
31	F2054B	2	40 Spline Floater Cap
32	F2200B	2	Drive Cap O-Ring #032
33	F2200C	4	10-24 x 3/4" FHSCS
34a	F2060A	2	4.75" B.C. Scalloped Driveplate
34b	F2058A	2	5.00" B.C. Scalloped Driveplate
34c	F2056A	2	5.50" B.C. Scalloped Driveplate
35a	F2058C	2	4.75" & 5.00" B.C. Spindle Nut
35b	F2056C	2	5.50" B.C. Spindle Nut
36a	F2058D	2	4.75" & 5.00" B.C. Spindle Nut Retainer
36b	F2056D	2	5.50" B.C. Spindle Nut Retainer
37a	F1209C	2	4.75" & 5.00" B.C. Hub O-Ring
37b	F1277	2	5.50" B.C. Hub O-Ring
38a	F1270	see note	4.75" & 5.00" B.C. Outer Bearing Cone L507949
38b	F2056I	see note	5.50" B.C. Inner & Outer Bearing Cone L610549
39a	F2058E	2	4.75" & 5.00" B.C. Preload Spacer
39b	F2056E	2	5.50" B.C. Preload Spacer
40a	F2060H	2	4.75" B.C. Floater Drive Hub
40b	F2058H	2	5.00" B.C. Floater Drive Hub
40c	F2056P	2	5.50" B.C. Floater Drive Hub
41a	F1271	see note	4.75" & 5.00" B.C. Outer Bearing Cup L507910
41b	F2056J	see note	5.50" B.C. Inner & Outer Bearing Cup L610510
42	F2056K	2	Hub Seal SKF 28745
43	F2056B	2	Spindle Ring
44	F2058G	12	3/8-16 x 1-1/2 FHSCS
45a	F2056O	2	Caliper Mounting Bracket (<i>Steel Brakes</i>)
45b	F2056F	2	Caliper Mounting Bracket (<i>Carbon Brakes</i>)
46	B1301E	4	3/8-24 Press Nut
47a	F2092A3175	2	31.75 WTW Spindle
47b	F2094A3325	2	33.25 WTW Spindle
47c	F2092A3375	2	33.75 WTW Spindle
47d	F2094A3475	2	34.75 WTW Spindle
48	F2056L	8	1/4-20 x 5/16" Dog Pt. Set Screw
49	F2094B	2	Spindle Retainer
5.50" B.C. Kits include a quantity of 4 F2056I & F2056J			
4.75" & 5.00" B.C. Kits include a quantity of 2 F2056I, F2056J, F1270 & F1271			



2-Piece axle assembly



! Axle lock nut (52) should be torqued to **250 ft-lbs**. Then add additional torque until holes in the lock collar match either pair of threaded holes in the flange. Check and retorqued axle lock nut periodically!

Tools:

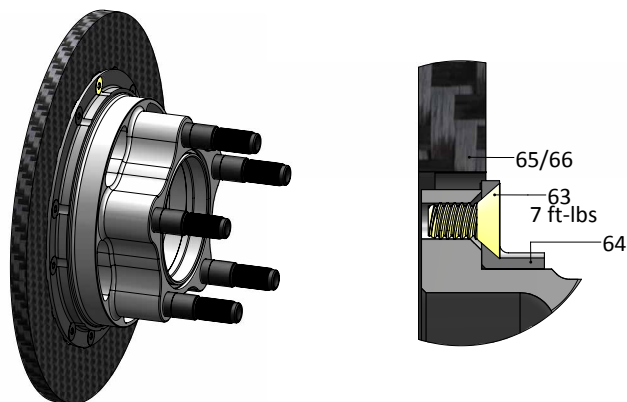
WJ11 - Axle lock nut tool (included with kit)

WJ13 - Axle holder (optional)

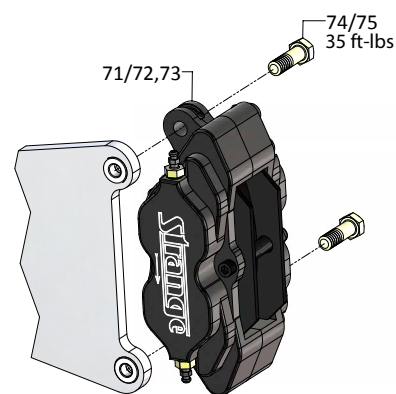
If the optional WJ13 tool is not being used install the axle in the spool and then torque the axle nut.

Component	Part #	Quantity	Description
50	WJ10	4	10-32 x 1/2" SHCS
51	WJ08	2	Lock Collar
52	WJ04	2	Axle Lock Nut
53a	WJ024	1	4.75" B.C. Axle Flange Passenger Side
53b	WJ030	1	5.00" B.C. Axle Flange Passenger Side
54	WJ01	2	Seal National #411394
55	WJ100D	12	5/16-18 x 1-3/4 SHCS
56	WJ100AR	1	Passenger Side Bearing Retainer
57	WJ036	4	O-Ring #153
58a	WJ00	2	Spherical Misalignment Bearing
58b	WJBB	2	Ball Bearing
59a	WJ02BR	1	Passenger Side Caliper Mounting Bracket (Steel Brakes)
59b	WJ100BR	1	Passenger Side Caliper Mounting Bracket (Carbon Brakes)
60a	WJ02BL	1	Driver Side Caliper Mounting Bracket (Steel Brakes)
60b	WJ100BR	1	Driver Side Caliper Mounting Bracket (Carbon Brakes)
61	WJ100AL	1	Driver Side Bearing Retainer
62a	WJ023	1	4.75" B.C. Axle Flange Driver Side
62b	WJ029	1	5.00" B.C. Axle Flange Driver Side

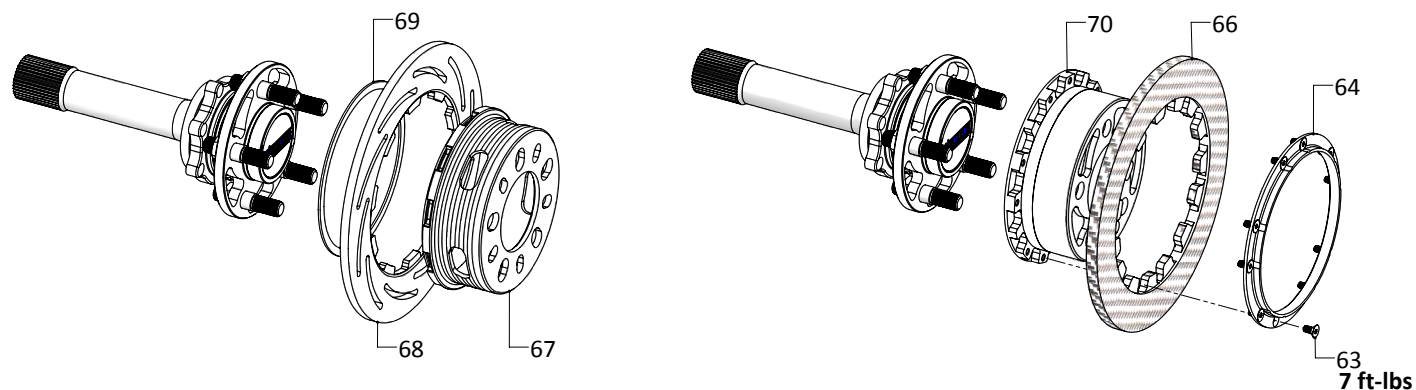
Full Floating Axle Steel & Carbon Brake Assembly



Brake Caliper



2-Piece Axle Steel & Carbon Brake Assembly



Component	Part #	Quantity	Description
63	C1700D	20	1/4-20 x 1/2" FHSCS
64	C1700H	2	Retainer Ring
65a	F2056NR	1	11.5" Rear Rotor RH
65b	F2056NL	1	11.5" Rear Rotor LH
66	C1790	2	11" Carbon Rotor
67	B2794B	2	Rotor Adapter
68	B2794A	2	Brake Rotor
69	B2794D	2	Spirolock
70a	C1700B	1	4.75 B.C. Carbon Adapter RH
70b	C1700C	1	4.75 B.C. Carbon Adapter LH
70c	C1700F	1	5.00 B.C. Carbon Adapter RH
70d	C1700G	1	5.00 B.C. Carbon Adapter LH
71	B1855	1	Four Piston Caliper w/ Metallic Pads
72	B5040	2	Four Piston Carbon Caliper
73	L4050HS	4	Carbon Soft Pad
74	B5000Y	4	3/8-24 x 1.125" HHSC (included in B1855 kit)
75	B5000X	4	3/8-24 x 1.27" Bolt