



16574451  
Edition 3  
October 2009

# DC Electric Tools, Angle, In-Line & Push-to-Start

## QE4 Series

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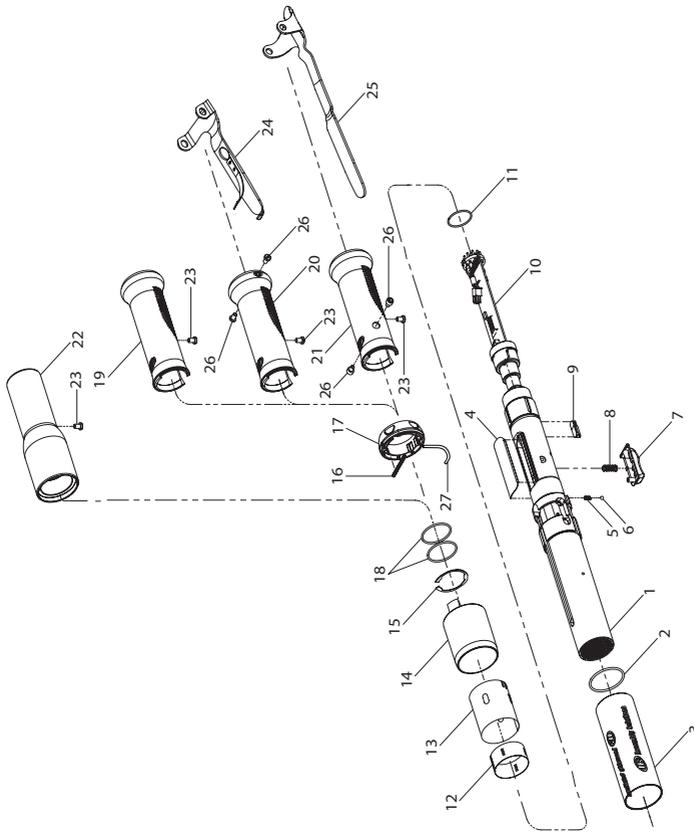
# Parts Information



Save These Instructions

 **Ingersoll Rand**

**QE4 Motor Housing Assembly, Grips and Levers Exploded Diagram**  
**For In-Line and Angle Tools**



(Dwg. TP2166)

**QE4 Motor Housing Assembly, Grips and Levers Parts List**

**For In-Line and Angle Tools**

Item	Part Description	Part Number	Item	Part Description	Part Number
1	Motor Housing Assembly	GEA15-D53	15	Retaining Ring	GEA40-208
2	O-Ring	GEA40-136-211	** 16	Spring	GEA40-329-52-1
3	Housing Cover	GEA15-136	** 17	Reverse Ring	GEA40-329-1
4	Cover	GEA15-144	18	O-Ring	GEA40-801
5	Spring	GEA40-329-51	19	Handle Grip	GEA40-135
6	Ball	AV1-255	20	Handle Grip	GEA40-135SL
7	Trigger	GEA40-273	21	Handle Grip	GEA40-135EL
8	Spring	GEA40-273-51	22	Fixtured Tool Sleeve	GEF40-137
† 9	Memory Chip	TRP-A528	23	Socket Cap Screw (Low Head)	GEA40-135-68
* 10	Communication Board	GEA15-B499	24	Lever, Short	GEA40-273SL
11	Retainer	GEA40-2309-104	25	Lever, Extended	GEA40-273EL
12	LED Flex Board	GEA15-98	26	Socket Head Cap Screw	GEA40-273EL-68
13	Warning Label	GEA15-99	27	Guide Pin	GEA40-329-53
14	Label-Cover Lens	GEA15-600			

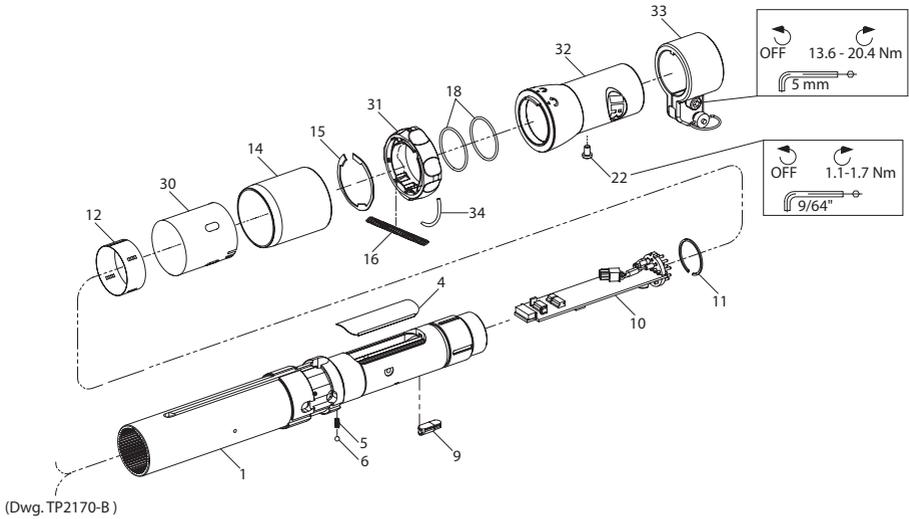
\* If tool serial number is before A07K, also order new GEA40-273.

\*\* If tool serial number is before A07F, order kit GEA40-K329 instead.

† Optional Part. Order O-Rings GEA40-801 with memory chip.

## QE4 Motor Housing Assembly and Components Exploded Diagram

### For Push-to-Start Tools



## QE4 Motor Housing Assembly and Components Parts List

### For Push-to-Start Tools

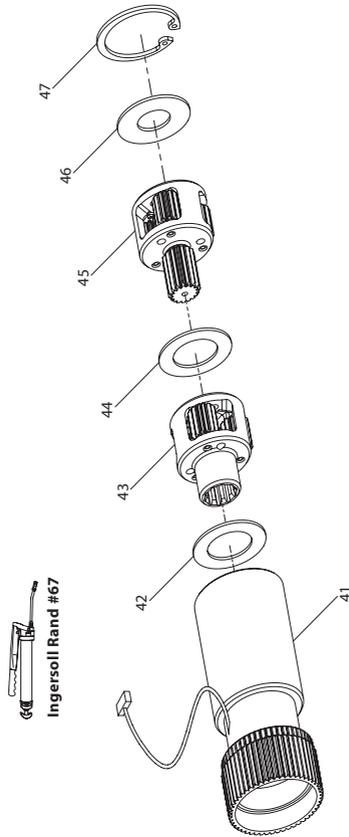
Item	Part Description	Part Number	Item	Part Description	Part Number
1	Motor Housing Assembly	GEA15-D53	15	Retaining Ring	GEA40-208
4	Cover	GEA15-144	*16	Spring	GEA40-329-52-1
5	Spring	GEA40-329-51	18	O-Ring	GEA40-801
6	Ball	AV1-255	22	Socket Cap Screw (Low Head)	GEA40-135-68
† 9	Memory Chip	TRP-A528	30	Warning Label	GEPTS15-99
10	Communication Board	GEA15-B499	*31	Reverse Ring	GEPTS15-329-1
11	Retainer	GEA40-2309-104	32	Sleeve, Push to Start	GEPTS15-137
12	LED Flex Board	GEA15-98	33	Bracket (uses M6 screw after 04/2008, 1/4"-20 before.)	GEPTS15-A25
14	Label-Cover Lens	GEA15-600	34	Guide Pin	GEA40-329-53

\* If tool serial number is before A08A, order kit GEPTS15-K329 instead.

† Optional Part. Order O-Rings GEA40-801 with memory chip.

## QE4 Transducer Gear Pack Assembly and Components Exploded Diagram

### For In-Line, Angle and Push-to-Start Tools



(Dwg. TP2167)

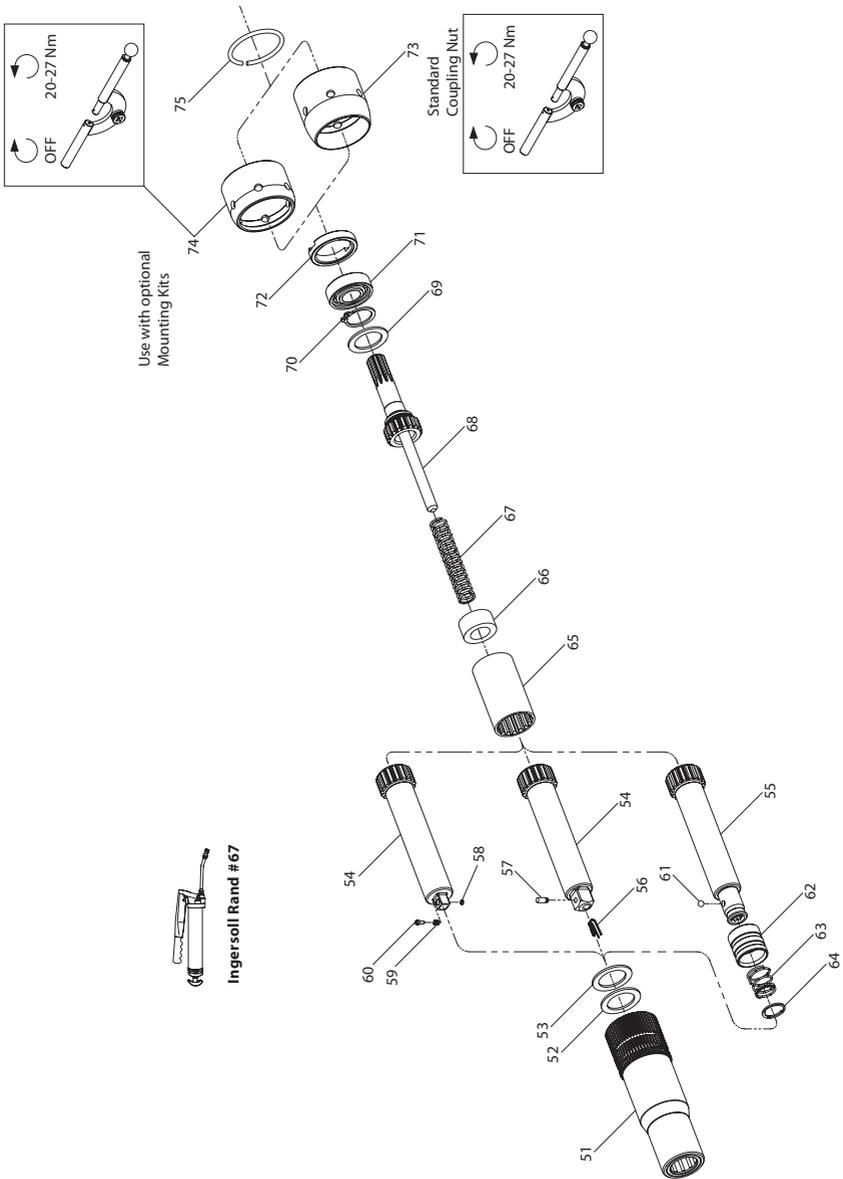
## QE4 Transducer Gear Pack Assembly and Components Parts List

### For In-Line, Angle and Push-to-Start Tools

Item	Part Description	QE4A{ }013{ }	QE4A{ }020{ }	QE4A{ }027{ }	QE4A{ }034{ }
		QE4S{ }010{ }	QE4S{ }015{ }	QE4S{ }020{ }	QE4S{ }025{ }
		QE4T{ }010{ }	QE4T{ }015{ }	QE4T{ }020{ }	QE4T{ }025{ }
Part Number					
*	Transducer Gear Pack Assembly	GEA15-13-M37	GEA15-19-M37	GEA15-25-M37	GEA15-32-M37
41	Transducer Assembly	GEA15-A756-15	GEA15-A756-15	GEA15-A756-15	GEA15-A756-15
42	Spacer	DEP30-80	DEP30-80	DEP30-80	DEP30-80
43	Spindle Assembly (2nd Stage)	DEP20-A8	DEP5-A8	DEP15-A8	DEP5-A8
44	Spacer	DEP30-80	DEP30-80	DEP30-80	DEP30-80
45	Spindle Assembly (1st Stage)	GEA15-A216	DEP9-A216	DEP25-A216	DEP30-A216
46	Spacer	DEP30-81	DEP30-81	DEP30-81	DEP30-81
47	Retaining Ring	W22-118	W22-118	W22-118	W22-118

# QE4 Attachment Components Exploded Diagram

## For In-Line Tools



(Dwg. TP2168)

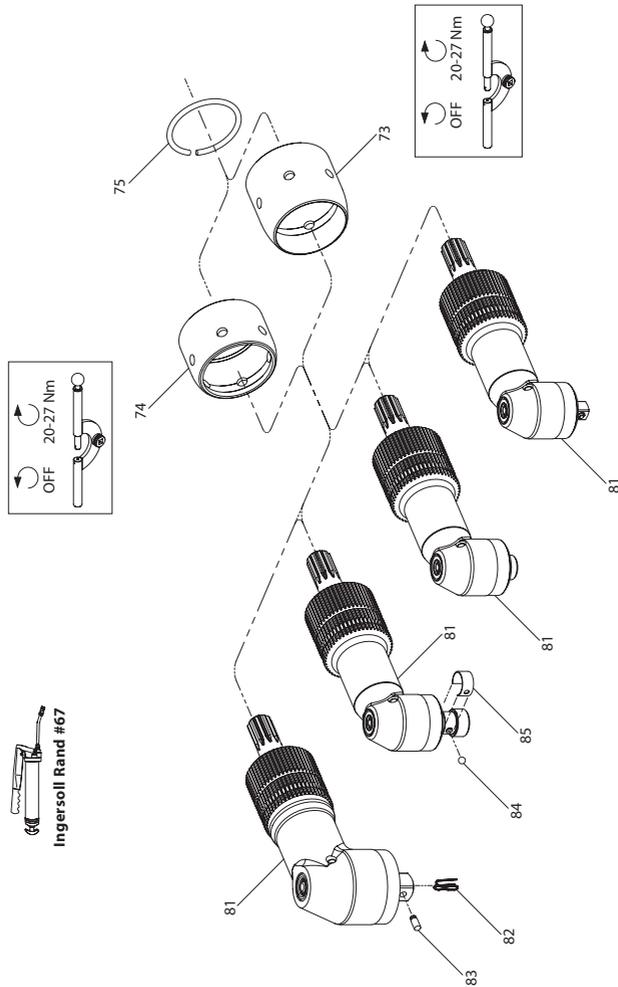
## QE4 Attachment Components Parts List

### For In-Line Tools

Item	Part Description	Part Number	Item	Part Description	Part Number
	QE4...21S04 (1/4" Sq. Drive & 2" Long Shank)	15E254	58	Washer	
	QE4...21S06 (3/8" Sq. Drive & 2" Long Shank)	15E256		for 21S04 and 41S04	2U-817
	QE4...21S08 (1/2" Sq. Drive & 2" Long Shank)	15E258	59	Spring	
	QE4...21Q04 (1/4" Hex, Quick Change & 2" Long Shank)	15E2Q4		for 21S04 and 41S04	500B-818
	QE4...41S04 (1/4" Hex, Drive & 4" Long Shank)	15E454	60	Socket Retaining Pin	
	QE4...41S06 (3/8" Sq. Drive & 4" Long Shank)	15E456		for 21S04 and 41S04	500B-816AX
	QE4...41S08 (1/2" Sq. Drive & 4" Long Shank)	15E458	61	Ball	
	QE4...41Q04 (1/4" Hex, Quick Change & 4" Long Shank)	15E4Q4		for 21Q04 and 41Q04	RX1-629
	QE4...20Q04 (2" Long, no float, 1/4" Quick Change)	15E1Q4	62	Sleeve	
	QE4...20S04 (2" Long, no float, 1/4" Square)	15E1S4		for 21Q04 and 41Q04	5C1-930-4
	QE4...20S06 (2" Long, no float, 3/8" Square)	15E1S6	63	Spring	
51	Housing Assembly			for 21Q04 and 41Q04	5C1-931-4
	for 21S04, 21S06, 21S08 and 21Q04	15E2-A580	64	Retaining Ring	
	for 41S04, 41S06, 41S08 and 41Q04	15E4-A580		for 21Q04 and 41Q04	5C1-853
52	Washer	120E4-105	65	Coupler	
53	Washer	120E4-106		for 21S04, 21S06, 21S08 and 21Q04	15E2-581
				for 41S04, 41S06, 41S08 and 41Q04	120E4-581
54	Square Drive Spindle		66	Spacer	
	for 21S04	15E254-586		for 20Q04, 20S04 and 20S06	GEA15-591
	for 21S06	15E256-586	67	Disengaging Spring	
	for 21S08	15E258-586		for 21S04, 21S06, 21S08 and 21Q04	15E2-626
	for 41S04	120E454-86		for 41S04, 41S06, 41S08 and 41Q04	120E4-626
	for 41S06	120E456-586	68	Drive Spindle Assembly	15E2-A584
	for 41S08	120E458-586	69	Washer	120E4-105
55	1/4" Hex, Quick Change Spindle		70	Retaining Ring	FEA100-20
	for 21Q04	15E2Q4-586	71	Rear Spindle Bearing	8SA32-593
	for 41Q04	120E4Q4-586	72	Bearing Cap	8SA32-531
56	Socket Retainer Spring		73	Coupling Nut, Long	GEA2-27
	for 21S06 and 41S06	401-718	74	Coupling Nut, Short	15E2-27
	for 21S08 and 41S08	5UHD-718	75	Retainer	GEA2-29
57	Socket Retaining Pin				
	for 21S06 and 41S06	5020-716			
	for 21S08 and 41S08	804-716			

## QE4 Attachment Components Exploded Diagram

### For Angle Assembly Attachment



(Dwg. TP2169)

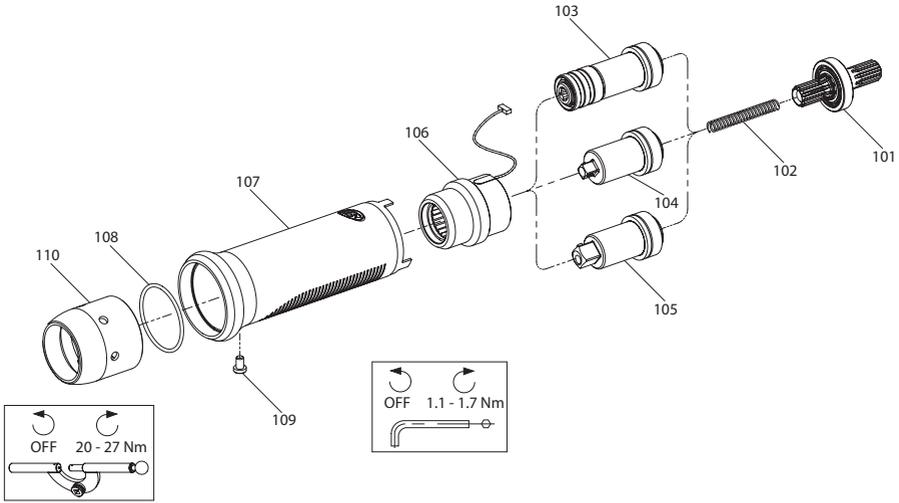
## QE4 Attachment Components Parts List

### For Angle Assembly Attachment

Item	Part Description	QE4..A2H04	QE4..A2Q04	QE4..A2S04	QE4..A2S06	QE4..A4S06	QE4..A4S08
		Part Number					
73	Coupling Nut, Long	GEA2-27	GEA2-27	GEA2-27	GEA2-27	GEA2-27	GEA2-27
74	Coupling Nut, Short	15E2-27	15E2-27	15E2-27	15E2-27	15E2-27	15E2-27
75	Retainer	GEA2-29	GEA2-29	GEA2-29	GEA2-29	GEA2-29	GEA2-29
81	Angle Assembly Attachment	GEA2H4	GEA2Q4	GEA2S4	GEA2S6	GEA4S6	GEA4S8
82	Socket Retaining Spring	---	---	---	401-718	401-718	4UHD-718
83	Socket Retaining Pin	---	---	---	5020-716	5020-716	804-716
84	Bit Retaining Ball	---	AV1-255	---	---	---	---
85	Bit Retaining Spring	---	102A60-241	---	---	---	---

## QE4 Grip and Spindles Exploded Diagram

### For Push-to-Start Tools



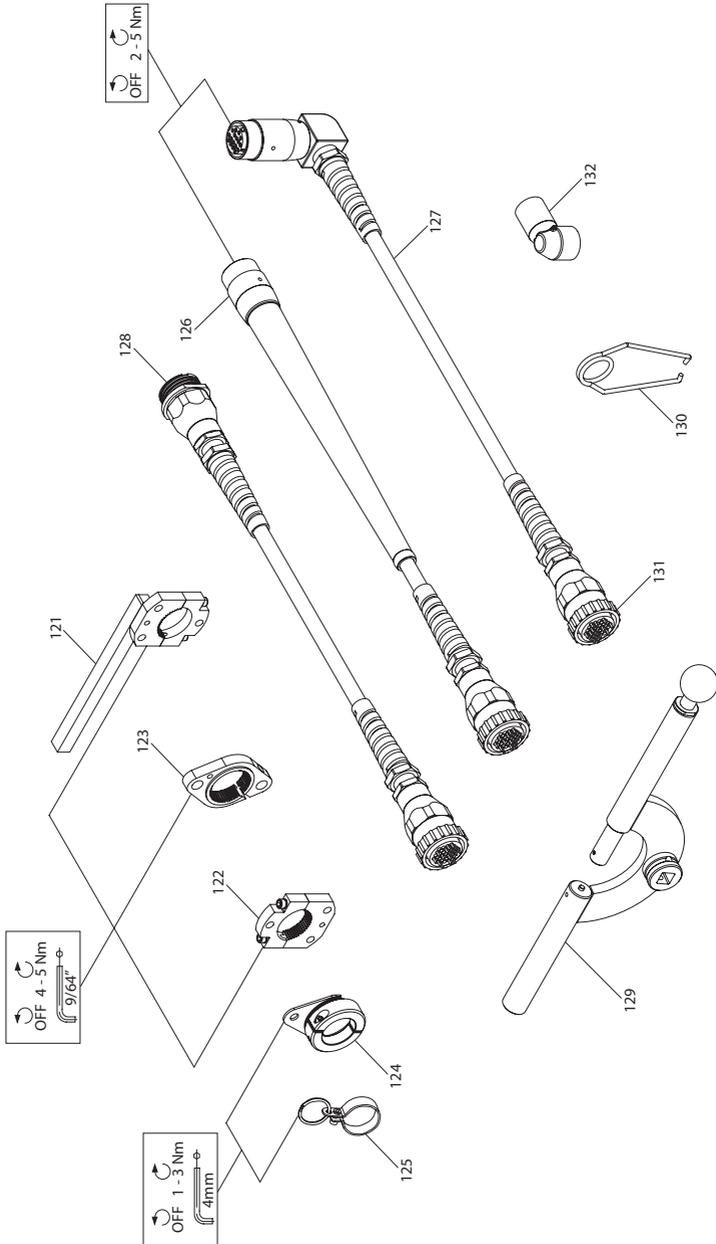
(Dwg. TP2171-B)

## QE4 Grip and Spindles Parts List

### For Push-to-Start Tools

Item	Part Description	Part Number	Item	Part Description	Part Number
101	Drive Spindle Assembly	GEPTS15-A586	106	Spindle Housing Assembly	GEPTS15-A531
102	Spring	DEPTS30-626	107	Grip Handle	GEPTS15-145
103	1/4" Hex, Quick Change Spindle Assembly	GEPTS15-A586-Q4	108	O-Ring	GEA15-136-211
104	1/4" Sq. Drive Spindle Assembly	GEPTS15-A586-S4	109	Cap Screw	GEA40-135-68
105	3/8" Sq. Drive Spindle Assembly	GEPTS15-A586-S6	110	Coupling Nut	GEPTS15-27

# QE4 Accessories Exploded Diagram (Optional)



(Dwg. TP2172-B)

## QE4 Accessories Parts List (Optional)

Item	Part Description	Part Number	Item	Part Description	Part Number
** 121	Reaction Bar Assembly	GEA15-K48	131	Coupling Ring	GEA40-26F-12
** 122	Mounting Plate Assembly	GEA4-K48	132	Angle Head Sleeve	
** 123	Mounting Plate Assembly	15E4-K48		For Models {A2H04, A2Q04, A2S04, A2S06}	GEA40-170
** 124	Swivel Hanger Kit	GEA15-K364		For Models {A4S06, A4S08}	GEA40-171
** 125	Tool Hanger Assembly	GEA15-A365		For Models {A2H04, A2Q04, A2S04, A2S06 (Extended Boot)}	GAA2-170
126	Power Cord Assembly (3 Meter)	GEA40-CORD-3M		For Models {A4S06, A4S08 (Extended Boot)}	GAA4-170
	Power Cord Assembly (6 Meter)	GEA40-CORD-6M		* Socket Tray Retaining Pin & Spring (for 3/8" and 1/2" square drives)	KIT-PFS
	Power Cord Assembly (10 Meter)	GEA40-CORD-10M		* Socket Tray Retaining Pin & Spring (for 3/8" square drive only, Qty: 5 of each)	GEA15-38KIT-5
127	Power Cord Assembly, 90 Deg (3 Meter)	GEA40-CORD-3M-90		* Socket Tray Retaining Pin & Spring (for 1/2" square drive only, Qty: 5 of each)	GEA40-38KIT-5
	Power Cord Assembly, 90 Deg (6 Meter)	GEA40-CORD-6M-90			
	Power Cord Assembly, 90 Deg (10 Meter)	GEA40-CORD-10M-90			
128	Power Cord Extension Assembly (10 Meter)	GEA40-EXT-10M			
	Power Cord Extension Assembly (20 Meter)	GEA40-EXT-20M			
	Power Cord Extension Assembly (40 Meter)	GEA40-EXT-40M			
129	Spanner Wrench	GEA40-478			
130	Suspension Bail	7L-365			

\*\* Must be used with QE4 "In-Line" tools; Optional for 'Angle Wrench' tools.

\* Not Illustrated.

## Packaging (Corrugated Box)

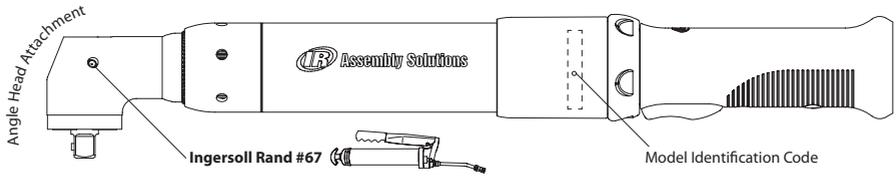
Packaging P/N	Description
BOX-28	Corrugated Box
BOX-20X	Foam

## Greases

Grease P/N	Description
67-4T	#67 Grease, 4 oz
67-1 LB	#67 Grease, 1 lb
67 8 LB	#67 Grease, 8 lb
GTH-1	Grease Tube Head (For QE Angle Tools. Use with 4 oz Grease Tube).

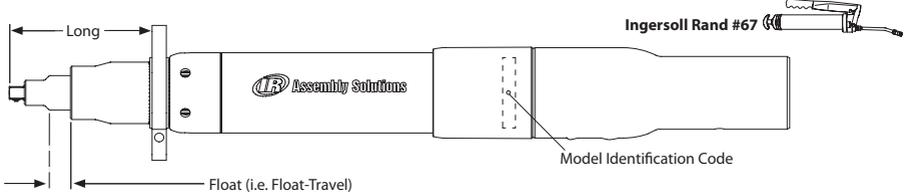
## QE4 Tool Assemblies Exploded Diagram

### Angles



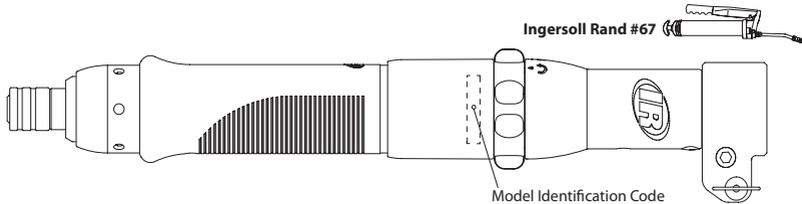
(Dwg. TP2174a)

### In-line



(Dwg. TP2174b)

### Push-to Start



(Dwg. TP2104)

## QE4 Suggested Tools Parts List

Item	Tool Used	Part Description	Where Used ?
1	Spanner Wrench	Ingersoll Rand Part #GEA40-478	Coupling Nut
2	Pin Spanner Wrench	3 mm or 1/8" pin	Cable
3	Hook Spanner Wrench	---	Motor Housing Assembly
4	Torque Wrench	1/2" Sq. Drive, 50 ft-lb capacity	General use
5	Adjustable Pin Wrench	---	In-Line Spindle Bearing Caps
6	5/64" Hex Key	---	Cap Screws (Low Socket Head)
7	9/64" Hex Key	---	Cap Screws
8	Internal Snap Ring Pliers	---	General use
9	Pick	---	O-Rings, Smalley Ring, etc.
10	Needle Nose Pliers	---	Accessing Connectors

## Parts and Maintenance

When the life of the tool has expired, it is recommended that the tool be disassembled, degreased and parts be separated by material so that they can be recycled.

Tool repair and maintenance should only be carried out by an authorized Service Center.

Refer all communications to the nearest **Ingersoll Rand** Office or Distributor.

## Related Documentation

For additional information refer to:

Product Safety Information Manual 16573685.

Product Information Manual 16576951.

Maintenance Information Manual 16575151.

Manuals can be downloaded from [www.ingersollrandproducts.com](http://www.ingersollrandproducts.com).

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