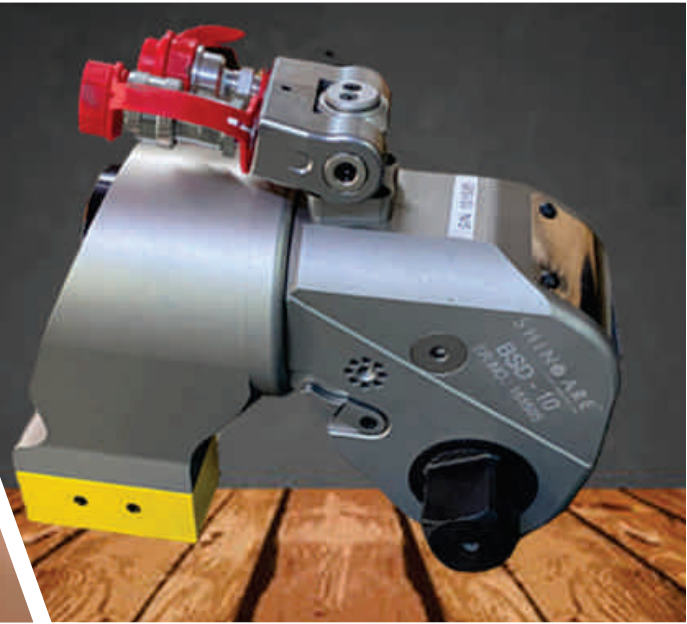


# HYDRAULIC TORQUE WRENCH



TUBE TOOLS



**SHINGARE**  
INDUSTRIES PVT LTD

**MANUFACTURER & EXPORTER OF**  
Tube Cleaners, Tube Tools,  
Tube Expanders, Bolting Tools, Impact Sockets,  
Pipe Beveling Machines, Pipe Cold Cutting Machines,  
High Pressure Water Jet Cleaning Machines & Tapping Machines

Education is necessary but not a pre-requisite for success in life. Bhartiya Industries is the best example of this theory. **Mr. Suryakant Shingare** (HARIBHAI), the founder of the company is a non-matriculate technocrat with more than 10 years experience in flexible shaft manufacturing. He founded this company in 1989.



### Basic Products:

Engineering products is our forte. We manufacture engineering products such as tube expander, tube cleaner, tube tools, hydraulic tube expansion, tube pulling, and pipe beveling machines. We also deal in manufacture of flexible shaft grinders, construction equipment, hydraulic torque wrench, impact socket, pneumatic tapping machines, and many more...

### Brief History of the Company:



We were a small industry until 2003 engaged in production and supply of different types of flexible shafts for tube cleaning, brushes, flexible shaft grinder, and concrete vibrators. The year 2003 was a watershed year for the company.

**Mr. Pradip Shingare**, son of **Mr. Hari Shingare**, graduated from Mumbai University with a degree in Mechanical Engineering. He had great plans to take the company forward on the route to expansion. He ventured into export of the engineering products. By 2008, the company acquired the reputation as the largest exporter of tube cleaning machines and flexible shafts in India.

The year 2009 saw the expansion of the company into manufacture of products such as Tube expander, tube tools, and tube pulling machines. The company witnessed a record double-digit growth in this product range. In 2011, the company started developing a product range of pipe beveling machines. These machines are extremely popular in India as well as in the overseas market. The year 2013 witnessed the company foray into imports of different types of tools such as tapping tools, grinding tools, etc making us the leading player in India in these categories.

The year 2015 saw us entering into the sugar industry component with the manufacture of the Heavy Duty Sugar Dust Collector machine, FlexRepair40 machine.

In 2016, we added **SHINGARE INDUSTRIES PVT. LTD.** a new company in our group. We were awarded ISO 9001:2015 certification for strictly followed quality norms and processes.

### Dedicated Staff:

We have a dedicated team of more than 40 people, many of whom are with us since the early days of the company. We have an excellent blend of youth, knowledge, and experience in our ranks.

### Export oriented:

We export over 60% of our products to more than 55 countries all over the globe.

### Expansion:

We feel the need to expand our business to enable us to serve the people of this country better. With this aim in mind, we established a new company in the name of SHINGARE INDUSTRIES PVT. LTD.

**Our main motto of business is “Growth with Trust.”**

Our mission is to innovate and create an import substitute products in India.

# CONTENTS

| Sr. No. | Product                                                        | Page  |
|---------|----------------------------------------------------------------|-------|
| 1.      | BSD Hydraulic Torque Wrenches-Square Drive                     | 4     |
| 2.      | BSD Series Accessories                                         | 5     |
| 3.      | Heavy Duty Impact Sockets                                      | 6     |
| 4.      | BXD Hydraulic Torque Wrenches-Low Profile Hexagon / Dimensions | 7     |
| 5.      | BXD Series Hex / Ratchet Links Reducers                        | 8-9   |
| 6.      | BHPE / Electric Driven Torque Wrench Pumps                     | 10    |
| 7.      | BHPA / Air Driven Torque Wrench Pumps                          | 11    |
| 8.      | Torque Wrench Pump Accessories                                 | 12    |
| 9.      | Top Side Bolt Tensioner                                        | 13-14 |
| 10.     | Ts series Multi-Stage Bolt Tensioner                           | 15    |
| 11.     | Electric Powerpack For Bolt Tensioner (BETP)                   | 16    |
| 12.     | Air Operated Powerpack For Bolt Tensioner (BATP)               | 17    |
| 13.     | Hand Pump For Bolt Tensioner (SHP)                             | 18    |

## Our Successful Participation in Trade Fairs and Conventions in INDIA and Overseas.



SISSTA BENGALURU 2015



SISSTA, CHENNAI 2016



SISSTA, TIRUPATI 2017



MAHATECH, PUNE 2015



STAI, NEW DELHI 2016

## BSD HYDRAULIC TORQUE WRENCHES – SQUARE DRIVE

### TECHNICAL SPECIFICATION:

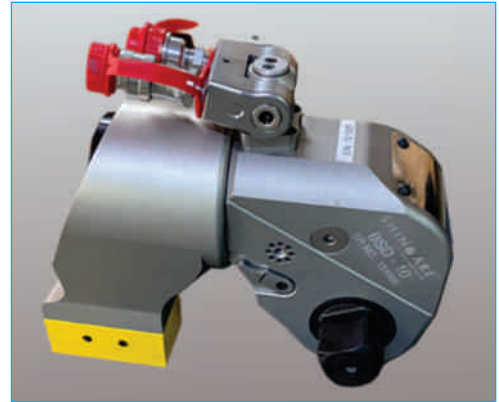
Torque Capacity up to 36872 Nm

Torque Accuracy of +/- 3 %

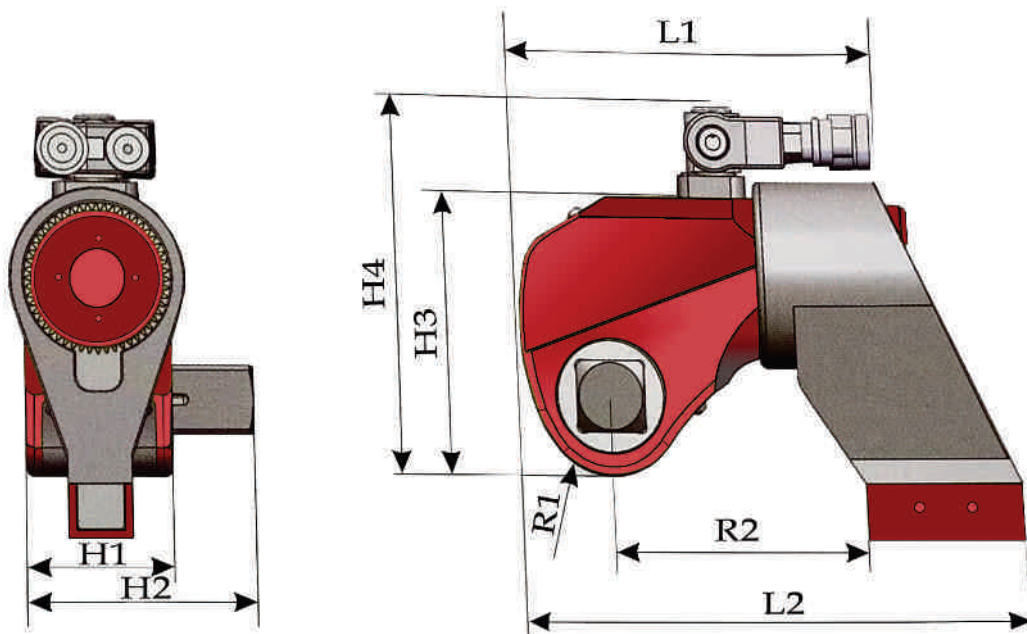
Working Pressure 700 bar

### FEATURES:

- Compact, lightweight aluminium body construction
- Output torque capacities from 183 to 34725 Nm
- Choice of square drive sizes from ¾" to 2 ½"
- Reversible square drive for tightening or loosening applications
- Multi-position reaction arm with safety lock feature
- Fitted with 360° uni-swivel quick release couplings for easy positioning of hydraulic hoses during operation
- The 360°×180° degree swivel is free to operation with no space limitation.
- Optional Allen hex drives available from ½" to 2 ¼" and 14 to 60 mm
- The new locking coupler ensures the oil keep free access.



| PART                       | BSD-1    | BSD-3    | BSD-5    | BSD-8      | BSD-10     | BSD-20     | BSD-25     |
|----------------------------|----------|----------|----------|------------|------------|------------|------------|
| Torque (NM)                | 183-1837 | 451-4512 | 752-7528 | 1078-10780 | 1551-15516 | 2666-26664 | 3472-34725 |
| Bolt Size A/F of Nut in mm | 16-36    | 22-48    | 27-56    | 30-64      | 36-72      | 42-90      | 48-100     |
| Weight (Kg)                | 2.5      | 5        | 10       | 11         | 15         | 26.5       | 35         |
| Square Drive               | ¾"       | 1"       | 1-1/2"   | 1-1/2"     | 1-1/2"     | 2-1/2"     | 2-1/2"     |



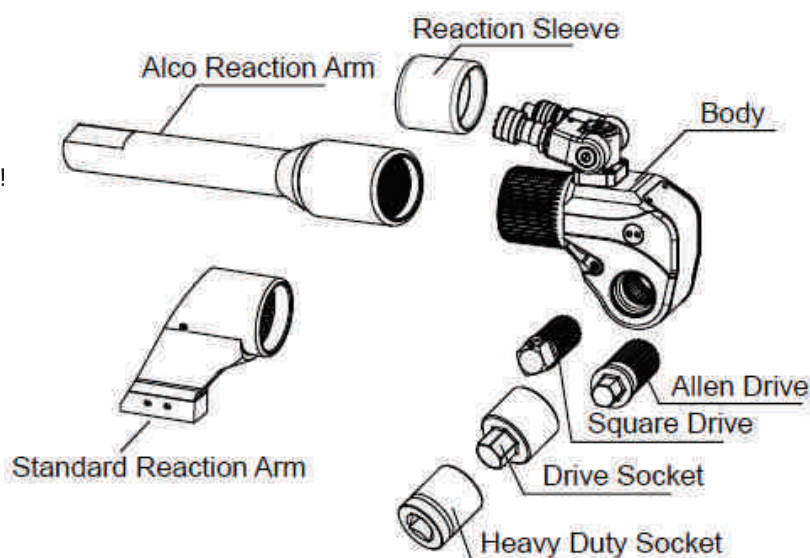
# HYDRAULIC TORQUE WRENCH

## DIMENSIONS

| Model No.<br>Dimension | BSD-1 | BSD-3 | BSD-5 | BSD-8 | BSD-10 | BSD-20 | BSD-25 |
|------------------------|-------|-------|-------|-------|--------|--------|--------|
| L1                     | 144.5 | 178   | 210.5 | 222   | 245.5  | 307.5  | 323    |
| L2                     | 173   | 229   | 270.5 | 293   | 317.5  | 383.5  | 401    |
| H1                     | 50    | 68    | 80    | 90    | 100    | 120    | 137    |
| H2                     | 72    | 95    | 123   | 134   | 142    | 183    | 200    |
| H3                     | 96    | 127   | 149   | 167   | 182    | 220    | 247    |
| H4                     | 131   | 176.5 | 199   | 217   | 232    | 270    | 297    |
| R                      | 91.5  | 123.5 | 140   | 165   | 178    | 213    | 228    |
| R1                     | 26    | 34    | 39    | 47    | 51     | 59     | 66     |
| R2                     | 85    | 114   | 137   | 153   | 154    | 186    | 199    |
| R3                     | 29    | 40    | 46.5  | 47    | 58.5   | 71     | 72.5   |

## ACCESSORIES

For Special Reaction Arm, consult to SIPL!

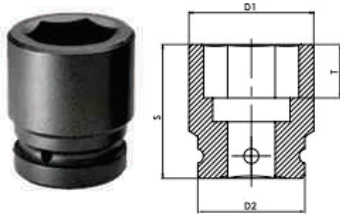


### IMPACT SOCKETS (Standard and Deep)

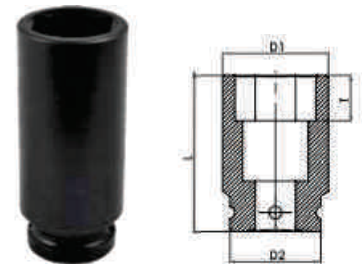
Suitable for 3/4", 1", 1.1/2" and 2.1/2" Square Drive  
from A/F 14 mm to 165 mm



## HEAVY DUTY IMPACT SOCKETS



### 6 POINTS IMPACT SOCKETS



| Model No. | Square Drive | Nut A/F |     | D1  | D2 | S   | T  | L   |
|-----------|--------------|---------|-----|-----|----|-----|----|-----|
|           |              | inch    | mm  |     |    |     |    |     |
| S-12M24   | 3/4"         | -       | 24  | 40  | 44 | 46  | 21 | 90  |
| S-12M27   | 3/4"         | -       | 27  | 41  | 44 | 48  | 23 | 90  |
| S-1217    | 3/4"         | 1.1/16  | -   | 41  | 44 | 48  | 23 | 90  |
| S-1230    | 3/4"         | -       | 30  | 44  | 44 | 52  | 24 | 90  |
| S-1220    | 3/4"         | 1.1/4   | -   | 49  | 44 | 52  | 24 | 90  |
| S-12M32   | 3/4"         | -       | 32  | 49  | 44 | 52  | 26 | 90  |
| S-12M36   | 3/4"         | -       | 36  | 52  | 44 | 55  | 28 | 90  |
| S-1223    | 3/4"         | 1.7/16  | -   | 52  | 44 | 56  | 28 | 90  |
| S-12M41   | 3/4"         | -       | 41  | 57  | 44 | 59  | 36 | 90  |
| S-1226    | 3/4"         | 1.5/8   | -   | 57  | 44 | 59  | 36 | 90  |
| S-12M46   | 3/4"         | -       | 46  | 67  | 44 | 64  | 37 | 90  |
| S-1229    | 3/4"         | 1.13/16 | -   | 67  | 44 | 64  | 36 | 90  |
| S-12M50   | 3/4"         | -       | 50  | 70  | 54 | 67  | 39 | 90  |
| S-1232    | 3/4"         | 2       | -   | 73  | 54 | 67  | 39 | 90  |
| 12M55DH   | 3/4"         | -       | 55  | 78  | 54 | 71  | 41 | 94  |
| S-1635    | 3/4"         | 2.3/16  | -   | 78  | 54 | 71  | 41 | 94  |
| 12M60DH   | 3/4"         | -       | 60  | 82  | 52 | 75  | 45 | 98  |
| S-1638    | 3/4"         | 2.3/8   | -   | 82  | 54 | 75  | 45 | 98  |
| S-12M24   | 1"           | -       | 24  | 42  | 54 | 55  | 21 | 100 |
| S-12M27   | 1"           | -       | 27  | 46  | 54 | 55  | 23 | 100 |
| S-1217    | 1"           | 1.1/16  | -   | 46  | 54 | 55  | 23 | 100 |
| S-12M30   | 1"           | -       | 30  | 50  | 54 | 57  | 24 | 100 |
| S-1220    | 1"           | 1.1/4   | -   | 51  | 54 | 57  | 24 | 100 |
| S-12M32   | 1"           | -       | 32  | 51  | 54 | 57  | 26 | 100 |
| S-12M36   | 1"           | -       | 36  | 54  | 54 | 60  | 28 | 100 |
| S-1223    | 1"           | 1.7/16  | -   | 54  | 54 | 60  | 28 | 100 |
| S-12M41   | 1"           | -       | 41  | 63  | 54 | 64  | 36 | 100 |
| S-1226    | 1"           | 1.5/8   | -   | 63  | 54 | 64  | 36 | 100 |
| S-12M46   | 1"           | -       | 46  | 70  | 54 | 69  | 36 | 100 |
| S-1229    | 1"           | 1.13/16 | -   | 70  | 54 | 69  | 36 | 100 |
| S-1250    | 1"           | -       | 50  | 73  | 54 | 72  | 36 | 100 |
| S-1232    | 1"           | 2       | -   | 73  | 54 | 72  | 39 | 100 |
| 12M55DH   | 1"           | -       | 55  | 82  | 54 | 76  | 41 | 105 |
| S-1635    | 1"           | 2.3/16  | -   | 82  | 54 | 80  | 41 | 105 |
| 12M60DH   | 1"           | -       | 60  | 86  | 54 | 82  | 45 | 112 |
| S-1638    | 1"           | 2.3/8   | -   | 88  | 54 | 85  | 45 | 112 |
| S-16M65   | 1"           | -       | 65  | 92  | 54 | 85  | 46 | 118 |
| S-1641    | 1"           | 2.9/16  | -   | 92  | 54 | 85  | 46 | 118 |
| S-16M70   | 1"           | -       | 70  | 96  | 54 | 88  | 50 | 124 |
| S-1644    | 1"           | 2.3/4   | -   | 96  | 54 | 88  | 50 | 124 |
| S-16M75   | 1"           | -       | 75  | 100 | 86 | 92  | 57 | 124 |
| S-1647    | 1"           | 2.15/16 | -   | 100 | 86 | 92  | 57 | 124 |
| S-16M100  | 1"           | -       | 100 | 135 | 86 | 112 | 62 | 143 |
| S-1650    | 1"           | 3.1/8"  | -   | 105 | 86 | 97  | 57 | 132 |
| S-16M80   | 1"           | -       | 80  | 105 | 86 | 97  | 62 | 132 |
| S-16M85   | 1"           | -       | 85  | 115 | 86 | 100 | 62 | 132 |
| S-1656    | 1"           | 3.1/2"  | -   | 121 | 86 | 104 | 62 | 140 |
| S-16M90   | 1"           | -       | 90  | 127 | 86 | 104 | 62 | 140 |
| S-16M95   | 1"           | -       | 95  | 135 | 86 | 106 | 62 | 140 |

| Model No. | Square Drive | Nut A/F |     | D1  | D2  | S   | T   | L   |
|-----------|--------------|---------|-----|-----|-----|-----|-----|-----|
|           |              | inch    | mm  |     |     |     |     |     |
| S-1662    | 1"           | 3.7/8"  | -   | 135 | 86  | 112 | 62  | 143 |
| S-16M36   | 1.1/2"       | -       | 36  | 64  | 86  | 80  | 28  | 130 |
| S-16M41   | 1.1/2"       | -       | 41  | 69  | 86  | 83  | 32  | 130 |
| S-16M46   | 1.1/2"       | -       | 46  | 76  | 86  | 86  | 36  | 130 |
| S-1629    | 1.1/2"       | 1.13/16 | -   | 76  | 86  | 86  | 36  | 130 |
| S-12M50   | 1.1/2"       | -       | 50  | 81  | 86  | 90  | 39  | 130 |
| S-1232    | 1.1/2"       | 2       | -   | 81  | 86  | 90  | 39  | 130 |
| 12M55DH   | 1.1/2"       | -       | 55  | 88  | 86  | 95  | 41  | 140 |
| S-1635    | 1.1/2"       | 2.3/16  | -   | 88  | 86  | 95  | 41  | 140 |
| S-16M60   | 1.1/2"       | -       | 60  | 96  | 86  | 98  | 45  | 140 |
| S-1638    | 1.1/2"       | 2.3/8   | -   | 96  | 86  | 98  | 45  | 140 |
| S-16M65   | 1.1/2"       | -       | 65  | 102 | 86  | 102 | 46  | 140 |
| S-1641    | 1.1/2"       | 2.9/16  | -   | 102 | 86  | 102 | 46  | 140 |
| S-16M70   | 1.1/2"       | -       | 70  | 108 | 86  | 102 | 50  | 150 |
| S-1644    | 1.1/2"       | 2.3/4   | -   | 108 | 86  | 102 | 50  | 150 |
| S-16M75   | 1.1/2"       | -       | 75  | 116 | 86  | 108 | 57  | 150 |
| S-1647    | 1.1/2"       | 2.15/16 | -   | 116 | 86  | 108 | 57  | 150 |
| S-16M80   | 1.1/2"       | -       | 80  | 120 | 86  | 110 | 62  | 150 |
| S-1650    | 1.1/2"       | 3.1/8   | -   | 120 | 86  | 110 | 62  | 150 |
| S-16M85   | 1.1/2"       | -       | 85  | 130 | 86  | 115 | 62  | 170 |
| S-16M90   | 1.1/2"       | -       | 90  | 135 | 125 | 118 | 65  | 170 |
| S-1656    | 1.1/2"       | 3.1/2   | -   | 135 | 125 | 118 | 65  | 170 |
| S-16M95   | 1.1/2"       | -       | 95  | 140 | 125 | 123 | 70  | 170 |
| S-16M100  | 1.1/2"       | -       | 100 | 148 | 125 | 128 | 75  | 190 |
| S-1662    | 1.1/2"       | 3.7/8   | -   | 148 | 125 | 128 | 75  | 190 |
| S-16M105  | 1.1/2"       | -       | 105 | 155 | 125 | 133 | 80  | 190 |
| S-1668    | 1.1/2"       | 4.1/4   | -   | 155 | 125 | 133 | 80  | 190 |
| S-16M110  | 1.1/2"       | -       | 110 | 161 | 150 | 138 | 85  | 200 |
| S-16M115  | 1.1/2"       | -       | 115 | 161 | 150 | 143 | 94  | 200 |
| S-1670    | 1.1/2"       | 4.5/8   | -   | 175 | 150 | 149 | 94  | 200 |
| S-16M80   | 2.1/2"       | -       | 80  | 135 | 125 | 140 | 62  | 190 |
| S-1650    | 2.1/2"       | 3.1/8   | -   | 135 | 125 | 140 | 62  | 190 |
| 16M85DH   | 2.1/2"       | -       | 85  | 140 | 125 | 140 | 62  | 190 |
| 16M90DH   | 2.1/2"       | -       | 90  | 145 | 125 | 140 | 65  | 190 |
| 16M95DH   | 2.1/2"       | -       | 95  | 155 | 125 | 150 | 70  | 190 |
| 1662DH    | 2.1/2"       | 3.7/8   | -   | 155 | 125 | 150 | 70  | 190 |
| S-24M100  | 2.1/2"       | -       | 100 | 160 | 125 | 150 | 75  | 200 |
| S-24M105  | 2.1/2"       | -       | 105 | 165 | 125 | 160 | 80  | 200 |
| S-24M110  | 2.1/2"       | -       | 110 | 174 | 150 | 160 | 85  | 210 |
| S-24M115  | 2.1/2"       | -       | 115 | 180 | 150 | 170 | 90  | 210 |
| S-2472    | 2.1/2"       | 4.1/2   | -   | 180 | 150 | 170 | 90  | 210 |
| S-2480    | 2.1/2"       | 5       | -   | 195 | 150 | 175 | 98  | 220 |
| S-24M130  | 2.1/2"       | -       | 130 | 195 | 150 | 175 | 98  | 220 |
| S-2482    | 2.1/2"       | 5.3/8   | -   | 205 | 150 | 180 | 102 | 220 |
| S-40M145  | 2.1/2"       | -       | 145 | 220 | 150 | 180 | 105 | 230 |
| S-4092    | 2.1/2"       | 5.3/4   | -   | 220 | 150 | 180 | 105 | 230 |
| S-4098    | 2.1/2"       | 6.1/8   | -   | 230 | 180 | 190 | 110 | 250 |
| S-40104   | 2.1/2"       | 6.1/2   | -   | 240 | 180 | 200 | 120 | -   |
| S-40110   | 2.1/2"       | 6.7/8   | -   | 255 | 180 | 200 | 120 | -   |

## BXD HYDRAULIC TORQUE WRENCHES – LOW PROFILE HEXAGON

### TECHNICAL SPECIFICATION:

Torque Capacity up to 48327 Nm

Torque Accuracy of +/- 3 %

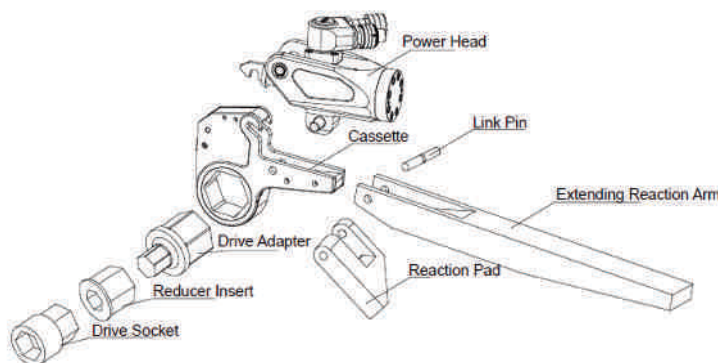
Working Pressure 700 bar



### FEATURES:

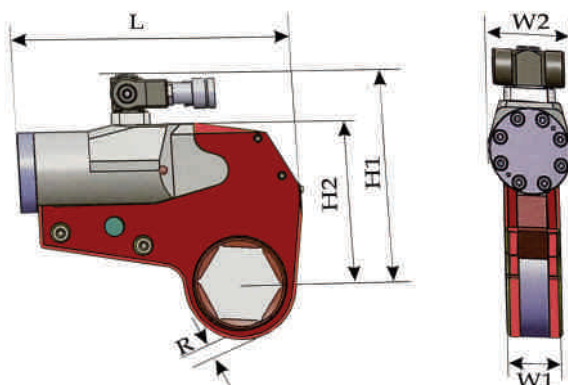
- Lightweight
- Output torque capacities from 232 to 44593 Nm
- Low profile design for direct in-line reaction
- Narrow cassette head design makes it ideal for limited access applications
- Ratchet head can be easily changed by simply withdrawing/inserting a single pin
- Imperial ratchet heads available with across flat (AF sizes) sizes from 1 1/16" to 6 7/8"
- Metric ratchet heads available with across flat (AF sizes) sizes from 24 to 175 mm
- Fitted with 360° x 180° swivel with quick release couplings for easy positioning of hydraulic hoses

## ACCESSORIES



| MODEL NO. | TORQUE NM  | NUT SIZES IN MM | POWER HEAD WEIGHT IN KGS | LINK / CASSATTE WEIGHT IN KGS |
|-----------|------------|-----------------|--------------------------|-------------------------------|
| BXD-2     | 232-2328   | 19-55           | 1                        | 1.6                           |
|           | 241-2414   | 60              | 1                        | 1.7                           |
| BXD-4     | 585-2510   | 34-36           | -                        | -                             |
|           | 585-5021   | 41              | 2                        | 4.4                           |
|           | 585-5858   | 46-65           | 2                        | 4.6                           |
|           | 647-6474   | 70-80           | -                        | -                             |
| BXD-8     | 1000-11000 | 41-95           | 3.0                      | 8.2                           |
|           | 1120-12100 | 100-105         | 3.5                      | 9                             |
| BXD-14    | 1852-18521 | 50-117          | 5.5                      | 11.6                          |
| BXD-32    | 4188-41882 | 110-155         | 11.4                     | 29                            |
|           | 4459-44593 | 160-175         | 11.4                     | 30                            |

## BXD HYDRAULIC TORQUE WRENCHES – LOW PROFILE HEXAGON



| Dimension<br>Model No. | L              | H1             | H2             | W1       | W2         |
|------------------------|----------------|----------------|----------------|----------|------------|
| BXD-2                  | 196.4<br>196.4 | 125.9<br>128.5 | 102.3<br>105   | 32<br>32 | 51<br>51   |
| BXD-4                  | 245<br>246     | 177<br>187     | 135.7<br>145.7 | 42<br>42 | 66<br>66   |
| BXD-8                  | 300<br>301     | 207<br>216     | 169<br>178     | 53<br>53 | 83<br>83   |
| BXD-14                 | 361            | 239            | 204            | 64       | 99         |
| BXD-32                 | 430<br>441     | 303<br>315     | 272<br>285     | 85<br>85 | 131<br>131 |

## BXD SERIES HEX / RATCHET LINKS

| BXD-2    |    |    |            | BXD-4    |    |    |            | BXD-8     |    |    |            | BXD-14     |    |    |            | BXD-32     |     |    |            |
|----------|----|----|------------|----------|----|----|------------|-----------|----|----|------------|------------|----|----|------------|------------|-----|----|------------|
| Type     | R  | A  | Max Torque | Type     | R  | A  | Max Torque | Type      | R  | A  | Max Torque | Type       | R  | A  | Max Torque | Type       | R   | A  | Max Torque |
| BXD-2-19 | 27 | 16 | 2328       | BXD-4-34 | 36 | 16 | 2510       | BXD-8-41  | 46 | 22 | 10941      | BXD-14-50  | 60 | 31 | 18521      | BXD-32-85  | 78  | 28 | 41882      |
| BXD-2-22 | 27 | 14 | 2328       | BXD-4-36 | 36 | 15 | 2510       | BXD-8-46  | 46 | 19 | 10941      | BXD-14-55  | 60 | 28 | 18521      | BXD-32-90  | 78  | 28 | 41882      |
| BXD-2-27 | 27 | 11 | 2328       | BXD-4-41 | 39 | 15 | 5021       | BXD-8-50  | 46 | 17 | 10941      | BXD-14-60  | 60 | 25 | 18521      | BXD-32-95  | 83  | 28 | 41882      |
| BXD-2-30 | 29 | 12 | 2328       | BXD-4-46 | 42 | 15 | 5858       | BXD-8-55  | 50 | 18 | 10941      | BXD-14-65  | 60 | 22 | 18521      | BXD-32-100 | 83  | 25 | 41882      |
| BXD-2-32 | 29 | 11 | 2328       | BXD-4-50 | 44 | 15 | 5858       | BXD-8-60  | 52 | 17 | 10941      | BXD-14-70  | 60 | 19 | 18521      | BXD-32-105 | 89  | 28 | 41882      |
| BXD-2-34 | 31 | 11 | 2328       | BXD-4-55 | 46 | 14 | 5858       | BXD-8-65  | 55 | 17 | 10941      | BXD-14-75  | 63 | 19 | 18521      | BXD-32-110 | 89  | 25 | 41882      |
| BXD-2-36 | 31 | 10 | 2328       | BXD-4-60 | 50 | 15 | 5858       | BXD-8-70  | 58 | 17 | 10941      | BXD-14-80  | 66 | 19 | 18521      | BXD-32-115 | 95  | 28 | 41882      |
| BXD-2-41 | 34 | 10 | 2328       | BXD-4-65 | 53 | 15 | 5858       | BXD-8-75  | 60 | 17 | 10941      | BXD-14-85  | 69 | 19 | 18521      | BXD-32-117 | 95  | 27 | 41882      |
| BXD-2-46 | 37 | 10 | 2328       | BXD-4-70 | 56 | 15 | 6474       | BXD-8-80  | 63 | 16 | 10941      | BXD-14-90  | 72 | 20 | 18521      | BXD-32-120 | 95  | 25 | 41882      |
| BXD-2-50 | 40 | 11 | 2328       | BXD-4-75 | 59 | 15 | 6474       | BXD-8-85  | 66 | 16 | 10941      | BXD-14-95  | 74 | 19 | 18521      | BXD-32-125 | 101 | 29 | 41882      |
| BXD-2-55 | 43 | 11 | 2328       | BXD-4-80 | 61 | 15 | 6474       | BXD-8-90  | 69 | 17 | 10941      | BXD-14-100 | 77 | 19 | 18521      | BXD-32-130 | 101 | 26 | 41882      |
| BXD-2-60 | 46 | 11 | 2414       | -        | -  | -  | -          | BXD-8-95  | 71 | 16 | 10941      | BXD-14-105 | 80 | 19 | 18521      | BXD-32-135 | 104 | 26 | 41882      |
| -        | -  | -  | -          | -        | -  | -  | -          | BXD-8-100 | 75 | 17 | 11774      | BXD-14-110 | 83 | 19 | 18521      | BXD-32-140 | 110 | 29 | 41882      |
| -        | -  | -  | -          | -        | -  | -  | -          | BXD-8-105 | 78 | 17 | 11774      | BXD-14-115 | 87 | 20 | 18521      | BXD-32-145 | 110 | 26 | 41882      |
| -        | -  | -  | -          | -        | -  | -  | -          | -         | -  | -  | -          | BXD-14-117 | 87 | 19 | 18521      | BXD-32-150 | 116 | 29 | 41882      |
| -        | -  | -  | -          | -        | -  | -  | -          | -         | -  | -  | -          | -          | -  | -  | -          | BXD-32-155 | 116 | 26 | 41882      |
| -        | -  | -  | -          | -        | -  | -  | -          | -         | -  | -  | -          | -          | -  | -  | -          | BXD-32-160 | 128 | 36 | 44593      |
| -        | -  | -  | -          | -        | -  | -  | -          | -         | -  | -  | -          | -          | -  | -  | -          | BXD-32-165 | 128 | 33 | 44593      |
| -        | -  | -  | -          | -        | -  | -  | -          | -         | -  | -  | -          | -          | -  | -  | -          | BXD-32-170 | 128 | 30 | 44593      |
| -        | -  | -  | -          | -        | -  | -  | -          | -         | -  | -  | -          | -          | -  | -  | -          | BXD-32-175 | 128 | 27 | 44593      |

## BXD SERIES HEX / RATCHET LINKS

### REDUCERS



| Wrench Model | Cassette  | Nut Size (S) | Locking ring / Reducer |         |         |
|--------------|-----------|--------------|------------------------|---------|---------|
| BXD2         | BXD2-50   | 50           | 50/41                  | 50/36   | 50/32   |
|              | BXD2-46   | 46           | 46/36                  | 46/32   | 46/30   |
|              | BXD2-41   | 41           | 41/32                  | 41/30   | 41/27   |
|              | BXD2-36   | 36           | 36/30                  | 36/27   |         |
|              | BXD2-32   | 32           | 32/27                  |         |         |
|              | BXD2-30   | 30           |                        |         |         |
| BXD4         | BXD2-27   | 27           |                        |         |         |
|              | BXD4-65   | 65           | 65/55                  | 65/50   | 65/46   |
|              | BXD4-60   | 60           | 60/50                  | 60/46   | 60/41   |
|              | BXD4-55   | 55           | 55/46                  | 55/41   | 55/36   |
|              | BXD4-50   | 50           | 50/41                  | 50/36   | 50/32   |
|              | BXD4-46   | 46           | 46/36                  | 46/32   | 46/30   |
|              | BXD4-41   | 41           | 41/32                  | 41/30   | 41/27   |
|              | BXD4-36   | 36           | 36/30                  | 3/27    |         |
|              | BXD4-32   | 32           | 32/27                  |         |         |
| BXD8         | BXD4-30   | 30           |                        |         |         |
|              | BXD4-27   | 27           |                        |         |         |
|              | BXD8-90   | 90           | 90/80                  | 90/75   | 90/70   |
|              | BXD8-85   | 85           | 85/75                  | 85/70   | 85/65   |
|              | BXD8-80   | 80           | 80/70                  | 80/65   | 80/60   |
|              | BXD8-75   | 75           | 75/65                  | 75/60   | 75/55   |
|              | BXD8-70   | 70           | 70/60                  | 70/55   | 70/50   |
|              | BXD8-65   | 65           | 65/55                  | 65/50   | 65/45   |
| BXD14        | BXD8-60   | 60           | 60/50                  | 60/46   |         |
|              | BXD8-55   | 55           | 55/46                  | 55/41   |         |
|              | BXD8-50   | 50           |                        |         |         |
|              | BXD14-115 | 115          | 115/105                | 115/100 | 115/95  |
|              | BXD14-110 | 110          | 110/100                | 110/95  | 110/90  |
|              | BXD14-105 | 105          | 105/95                 | 105/90  | 105/85  |
|              | BXD14-100 | 100          | 100/90                 | 100/85  | 100/80  |
|              | BXD14-95  | 95           | 95/85                  | 95/80   | 95/75   |
|              | BXD14-90  | 90           | 90/80                  | 90/75   | 90/70   |
| BXD32        | BXD14-85  | 85           | 85/75                  | 85/70   | 85/65   |
|              | BXD14-80  | 80           | 80/70                  | 80/65   |         |
|              | BXD14-75  | 75           | 75/65                  |         |         |
|              | BXD14-70  | 70           |                        |         |         |
|              | BXD14-65  | 65           |                        |         |         |
|              | BXD32-155 | 155          | 155/145                | 155/130 | 155/120 |
|              | BXD32-145 | 145          | 145/130                | 145/120 | 145/115 |
|              | BXD32-130 | 130          | 130/120                | 130/115 | 130/110 |
|              | BXD32-120 | 120          | 120/110                | 120/105 | 120/100 |
|              | BXD32-115 | 115          | 115/105                | 115/100 | 115/95  |
|              | BXD32-110 | 110          | 110/100                | 110/95  | 110/90  |
|              | BXD32-105 | 105          | 105/95                 | 105/90  | 100/80  |
|              | BXD32-100 | 100          | 100/90                 | 100/85  | 100/80  |
|              | BXD32-95  | 95           | 95/85                  | 95/80   |         |
|              | BXD32-90  | 90           | 90/80                  |         |         |
|              | BXD32-85  | 85           |                        |         |         |
|              | BXD32-80  | 80           |                        |         |         |

## BHPA | AIR DRIVEN TORQUE WRENCH PUMPS

### TECHNICAL SPECIFICATION:

Working Pressure 700 bar

High Flow 3 – stage pump unit

Compact and Lightweight

### FEATURES

- The Single valve block can be replaced by component FP-4, thereby allowing 2 or 4 tools to be driven simultaneously
- Three stage with air drive
- Supporting continuous operation with steel frame
- 100mm diameter gauge ,aluminium oil tank with oil level indicator
- Variable pressure adjustment between 1000~10000 psi
- Designed for continuous operation
- Supplied with 5 mtr twin hoses and quick connect couplings suitable for BXD and BSD torque wrenches



| TYPE             | BHPA-2          | BHPA-4          |
|------------------|-----------------|-----------------|
| Working Pressure | 70 MPa          | 70 MPa          |
| Drive            | Air             | Air             |
| Air Pressure     | ≥3.4 m³/min     | ≥3.4 m³/min     |
| Power            | 4.0HP           | 4.0HP           |
| Tank Capacity    | 5.5L            | 5.5L            |
| Flow Rate        | 10-2-21.1 L/min | 10-2-21.1 L/min |
| Oil Cooler       | Yes             | Yes             |
| Weight           | 19kg            | 21kg            |
| Pill Outputs     | 4x1/4"NPT       | 8x1/4"NPT       |
| Air in           | 4~8 bar         | 4~8 bar         |
| LxWxH(mm)        | 442x282x377     | 460x282x377     |

## BHPE | ELECTRIC DRIVEN TORQUE WRENCH PUMPS

### TECHNICAL SPECIFICATION:

Working Pressure 700 bar

High Flow 3 – stage pump unit

Compact and Lightweight

### FEATURES

- Low noise operation (<88 dB)
- Supplied fitted with one set of quick connect couplers
- Automatically activated oil cooling heat exchanger fitted as standard
- Adjustable torque setting pressure relief valve with locking nut
- Analogue or digital gauge options
- Remote hand pendant controller with 5 metres cable for easy operation
- Choice of manual operation with auto retract or fully automatic operation
- Multi-outlet 4-way split block for simultaneous operation of up to 4 torque wrenches
- Factory fitted roll bar protection and carrying frame
- Supplied with 5 mtr twin hoses and quick connect couplings suitable for BXD and BSD torque wrenches



| TYPE             | BHPE-1000       | BHPE-4000       |
|------------------|-----------------|-----------------|
| Working Pressure | 70 MPa          | 70 MPa          |
| Drive            | Electric        | Electric        |
| Voltage          | 220 V/50Hz      | 220 V/50Hz      |
| Power            | 1.1 kW          | 1.1 kW          |
| Tank Capacity    | 5.5L            | 5.5L            |
| Flow Rate        | 7-1.6-0.8 L/min | 7-1.6-0.8 L/min |
| Oil Cooler       | Yes             | Yes             |
| Weight           | 25kg            | 27kg            |
| Oil Outputs      | 4x1/4"NPT       | 8x1/4"NPT       |
| LxWxH(mm)        | 445x304x304x426 | 461x304x426     |

## TORQUE WRENCH PUMP ACCESSORIES

- High quality hydraulic torque wrench bonded twin hose sets
- Maximum working pressure of 700 bar with 4:1 safety factor
- Ergonomically designed protective, strain reliever hand grips on both ends

Hose length up to 100 meters

Supplied with quick connect couplings

Working pressure 700 bar



| Model                           | Photograph                                                                          | Max operating Pressure (Mpa) | Hose end |         | Hose Length (M) |
|---------------------------------|-------------------------------------------------------------------------------------|------------------------------|----------|---------|-----------------|
|                                 |                                                                                     |                              | End one  | End two |                 |
| BH64 series twin hydraulic hose |  | 72                           | 1/4"NPT  | 1/4"NPT | 6<br>9          |
| BH74 series hydraulic hose      |  | 72                           | 1/4"NPT  | 1/4"NPT | 6<br>9          |
| Bh78 series hydraulic hose      |  | 100                          | 3/8"NPT  | 3/8"NPT | 1.8<br>4.5<br>6 |

## TOP SIDE BOLT TENSIONER (SBT)

### Features :

- Shingare hydraulic bolt tensioners have eight load cells from M16 to M150 or from  $\frac{5}{8}$ " to  $5\frac{3}{4}$ "
- Twin ports for quick connection of multiple tools.
- Only one size of bridge per size of load cell.
- Detachable and rotational bridge simplifies bolt tensioner positioning.
- Full bridge window.
- Black surface treatment protects against corrosion
- Anti-slip grip for more secure handling
- Universal and multi-use tool.
- Double Straight Reaction Arm
- Blank Reaction Arm

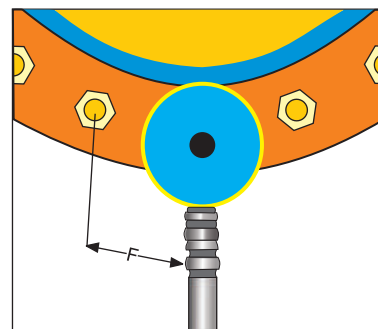
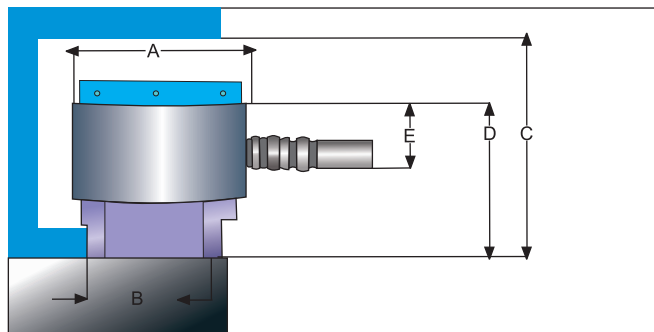


### Why Tensioning ?

Safe, reliable and repeatable, the use of hydraulic tensioners has many advantages over other less accurate tightening methods.

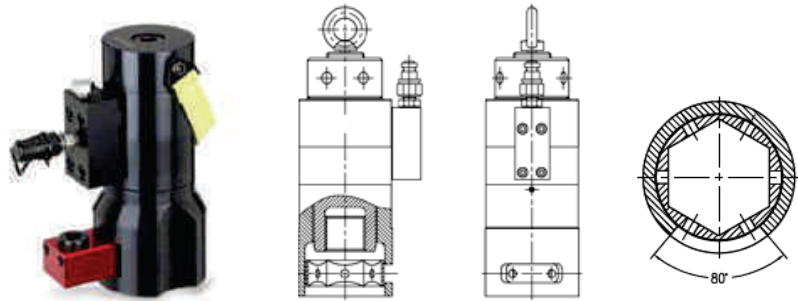
- Tension is applied directly to stretch the bolt, so we don't need to fight against friction or losses.
- The applied load is controlled very accurately, because it is directly proportional to the pressure applied to the tensioner.
- The load transfer factor is calculable, helping to give the correct residual load.
- Operation of tooling and improved accuracy reduces time required to retighten the load.
- Tensioning allows for loading multiple fasteners in a joint at the same time.
- Uniform bolt loading ensures a high level of accuracy by applying a constant force.
- Purely axial, tensile loading ensures no torsional stresses are introduced.

## SHINGARE BOLT TENSIONER (SBT)



| Model  | Bolt Size |        | Cylinder | Area | Dimension |         |         |         |       |         | Weight |
|--------|-----------|--------|----------|------|-----------|---------|---------|---------|-------|---------|--------|
|        | Metric    | Inch   |          |      | A         | B       | C       | D       | E     | F       |        |
| SBT-3  | M16       | -      | 23.5     | 15.7 | 75        | 32.5    | 168     | 90      | 62    | 47-51   | 2      |
|        | M18       | 3/4"   |          |      |           |         |         |         |       |         |        |
|        | M20       | -      |          |      |           |         |         |         |       |         |        |
|        | M22       | 7/8"   |          |      |           |         |         |         |       |         |        |
|        | M24       | 1      |          |      |           |         |         |         |       |         |        |
| SBT-5  | M27       | 1-1/8" | 50       | 33   | 102       | 47      | 187     | 106     | 60    | 65-71   | 4      |
|        | M30       | -      |          |      |           |         |         |         |       |         |        |
|        | M33       | 1-1/4" |          |      |           |         |         |         |       |         |        |
|        | M36       | 1-3/8" |          |      |           |         |         |         |       |         |        |
|        | M39       | 1-1/2" |          |      |           |         |         |         |       |         |        |
| SBT-9  | M39       | 1-1/2" | 90       | 59.7 | 133       | 61      | 208     | 120     | 60    | 86-93   | 6      |
|        | M42       | 1-5/8" |          |      |           |         |         |         |       |         |        |
|        | M45       | 1-3/4" |          |      |           |         |         |         |       |         |        |
|        | M48       | 1-7/8" |          |      |           |         |         |         |       |         |        |
| SBT-13 | M52       | 2"     | 130      | 83   | 163       | 73      | 231     | 135     | 62    | 106-114 | 10     |
|        | M56       | 2-1/4" |          |      |           |         |         |         |       |         |        |
|        | M60       | -      |          |      |           |         |         |         |       |         |        |
|        | M64       | 2-1/2" |          |      |           |         |         |         |       |         |        |
| SBT-19 | M64       | 2-1/2" | 190      | 123  | 193       | 86.5    | 254     | 150     | 62    | 129-135 | 15     |
|        | M68       | -      |          |      |           |         |         |         |       |         |        |
|        | M72       | 2-3/4" |          |      |           |         |         |         |       |         |        |
|        | M76       | 3"     |          |      |           |         |         |         |       |         |        |
| SBT-27 | M76       | 3"     | 270      | 176  | 233       | 110     | 286     | 180     | 73    | 155-167 | 24     |
|        | M80       | -      |          |      |           |         |         |         |       |         |        |
|        | M85       | 3-1/4" |          |      |           |         |         |         |       |         |        |
|        | M90       | 3-1/2" |          |      |           |         |         |         |       |         |        |
|        | M95       | 3-3/4" |          |      |           |         |         |         |       |         |        |
| SBT-44 | M100      | 4"     | 440      | 251  | 280       | 111-121 | 304-338 | 181-197 | 37-40 | 210-233 | 45     |
|        | M110      | 4-1/2" |          |      |           |         |         |         |       |         |        |
|        | M120      | 4-3/4" |          |      |           |         |         |         |       |         |        |
|        | M125      | 5"     |          |      |           |         |         |         |       |         |        |
| SBT-54 | M130      | 5-1/4" | 540      | 317  | 325       | 126-141 | 354-388 | 202-216 | 42-47 | 243-275 | 73     |
|        | M140      | 5-1/2" |          |      |           |         |         |         |       |         |        |
|        | M150      | 5-3/4" |          |      |           |         |         |         |       |         |        |

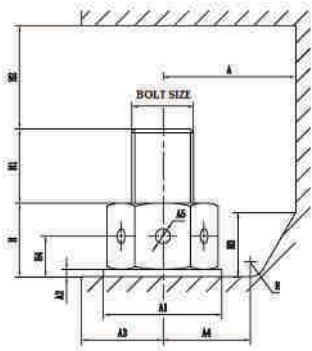
## TS SERIES MULTI-STAGE BOLT TENSIONERS



### Features and benefits

- Relatively smaller dimension with higher.
- Multi-stage design, maximize the tensioning Length
- Suitable for single type bolt tensioning, high
- Max. Pressure: 1500 Bar
- Can be operated with ultra high pressure hand pump, air pump and electric pump

Customers can fill the form below for us to chose the right desgin of multi-stage bolt tensioners for your solutions.



THREAD \_\_\_\_\_.

ADJACENT BOLT CENTER DISTANCE \_\_\_\_\_ mm.

BOLT TYPE(ROUND/HEX) \_\_\_\_\_.

BOLT SIZE \_\_\_\_\_.

BOLT TENSION FORCE \_\_\_\_\_ KN.

BOLT QTY. \_\_\_\_\_.

WORKING TEM. \_\_\_\_\_ 0C .

|              |              |
|--------------|--------------|
| A: _____ MM  | H: _____ MM  |
| A1: _____ MM | H1: _____ MM |
| A2: _____ MM | H2: _____ MM |
| A3: _____ MM | H3: _____ MM |
| A4: _____ MM | H4: _____ MM |
| A5: _____ MM | R: _____ MM  |

## ELECTRIC POWERPACK FOR BOLT TENSIONER (BETP)



### Features of Power Pack:

- Brand new technology: Combine unit of Low pressure and high pressure equipments.
- Less High pressure component used, hence maintenance cost is less.
- All components are Highly precise and reputed make.
- Substantial savings in energy and oil consumption.
- Analog or Digital pressure gauges assure the highest possible read out and adjustment precision.
- High speed/flow.
- Remotely operation forward and reverse.
- Light weight & compact design.

### Optional Accessories:

- High pressure hose
- High pressure QRC (Quick Release Coupling)
- Digital Pressure Gauge

| Tensioning Pump - Model BETP-1500 (Tensioning Pump) |       |                |
|-----------------------------------------------------|-------|----------------|
| Pump                                                |       |                |
| Main Voltage                                        | AC    | 230 V, 50Hz    |
| Solenoid Voltage                                    | AC    | 230 V          |
| Main Consumption                                    | A     | 10             |
| Motor Capacity                                      | kW    | 1.5            |
| Protected According to                              | IP    | IP 55          |
| Nominal Pressure                                    | bar   | 0-1500         |
| Flow                                                |       |                |
| Flow @ 1500 Bar                                     | lpm   | 0.1 @ 1500 bar |
| Tank Volume                                         | litre | 14             |
| Oil Type                                            |       | Servo 68       |
| Ambient Temperature                                 | C     | 45             |
| Max Oil Temperature                                 | C     | 60             |
| Weight                                              |       |                |
| Weight without oil                                  | Kg    | 35 Approx      |

## BHARTIYA AIR OPERATED TENSIONER PUMP (BATP)



The air operated powerpack for bolt tensioner BATP-1500 are designed to meet the highest technical and safety requirements of high pressure equipment.

### Technical Features

- **Stainless Steel Frame:** The hydraulic unit is installed in a weather proof stainless steel protection frame.
- **Logical Control Panel:** Logical layout design engraved for easy operation.
- **Calibrated Pressure Gauge:** Calibrated 150mm (6"), liquid filled, SS Frame, 2500 bar rating pressure gauge with dual reading of bar & psi.
- **Complete Air System:** System includes FRL Unit, air pressure gauge and control knob for safe air control and supply.
- **Higher Operating Pressure:** Pump has max working pressure of 1500 bar to cover all bolt tensioning applications.
- **Light Weight:** Unit weighs only 18 Kg and measures 450mm x 340mm x 480mm.
- **Lower Input air Pressure:** Higher pressure ratio of 1 : 350 ensures less input air pressure for operation.
- **Quick Connect Outlet:** Pump comes fitted with quick connect outlet for easy connection of hydraulic hose.

### Optional Accessories:

- High pressure hose
- High pressure QRC (Quick Release Coupling)
- Digital Pressure Gauge

| Technical Details - Model BATP-1500 (Bhartiya Air Operated Tensioner Pump) |                 |       |
|----------------------------------------------------------------------------|-----------------|-------|
| <b>Pump</b>                                                                |                 |       |
| Pressure Ratio                                                             |                 | 1:350 |
| Displacement Volume                                                        | cm <sup>3</sup> | 1.3   |
| Operating Pressure, Max. ( at 5.1 bar Pre Limited (PL) Air Pressure )      | bar             | 1800  |
| <b>Compressed air supply (air drive)</b>                                   |                 |       |
| System Operating Air Pressure, Max.                                        | bar             | 5.1   |
| Safety Valve Set Pressure                                                  | bar             | 5.5   |
| <b>Stainless Steel Tank Capacity</b>                                       |                 |       |
| Oil Tank capacity                                                          | litre           | 5     |

## HAND PUMP FOR BOLT TENSIONER (SHP)



The SHINGARE double stage hand pumps comes with pressure gauge as standard, this gives the user precise and safe control over the work carried out. The gauge is directly mounted onto the pump and is well protected by the specially designed pump lever.

### Features

- Return connections on all pumps.
- Robust design
- Aluminium tank.
- Easy and simple maintenance

**Model No. : SHP**

**Maximum Working Pressure :- 1600 Bar**

| Pump Type    | Usable Oil Capacity | Model Number | Pressure Rating |           | Output Oil Volume Each Stroke |           | Handle Force | Dimensions (mm) |     |     | Output Adapter     | Weight |
|--------------|---------------------|--------------|-----------------|-----------|-------------------------------|-----------|--------------|-----------------|-----|-----|--------------------|--------|
|              |                     |              | (Bar)           |           | (cm^3)                        |           |              |                 |     |     |                    |        |
|              | (cm^3)              | Nm           | 1st Stage       | 2nd Stage | 1st Stage                     | 2nd Stage | (N)          | A               | B   | C   |                    | (Kg)   |
| Double Speed | 655                 | SHP 7 - 0.7  | 25              | 700       | 15                            | 2.6       | 300          | 520             | 133 | 119 | NPT 3/8”<br>G 1/4” | 5.3    |
|              | 1440                | SHP 7-1      | 25              | 700       | 32                            | 2.5       |              | 577             | 120 | 170 |                    | 6.3    |
|              | 2200                | SHP 7-2      | 25              | 700       | 16                            | 2.5       |              | 539             | 146 | 170 |                    | 8      |
|              | 3240                | SHP 7-3      | 25              | 700       | 32                            | 2.5       |              | 582             | 200 | 170 |                    | 10     |
|              | 5860                | SHP 7-4      | 25              | 700       | 32                            | 2.5       |              | 667             | 250 | 172 |                    | 14.5   |
|              | 7500                | SHP 7-8      | 14              | 700       | 126                           | 4.8       |              | 742             | 308 | 270 |                    | 27     |
|              | 1440                | SHP 16-1     | 15              | 1600      | 32                            | 2.5       | 375          | 577             | 577 | 170 |                    | 6.3    |
|              | 3240                | SHP 16-3     | 15              | 1600      | 32                            | 2.5       |              | 577             | 140 | 190 |                    | 10     |

# HYDRAULIC TORQUE WRENCH



| Bolt Size | A/F | Bolt Grade: 8.8    |        |       |              | Bolt Grade: 10.9   |        |       |              | Bolt Grade: 12.9   |        |       |              | Bolt Size | A/F      | Bolt Grade: B7/B16 |        |       |              |
|-----------|-----|--------------------|--------|-------|--------------|--------------------|--------|-------|--------------|--------------------|--------|-------|--------------|-----------|----------|--------------------|--------|-------|--------------|
|           |     | Torque Values (Nm) |        |       | Tension (kN) | Torque Values (Nm) |        |       | Tension (kN) | Torque Values (Nm) |        |       | Tension (kN) |           |          | Torque Values (Nm) |        |       | Tension (kN) |
|           |     | μ=0.10             | μ=0.15 | μ=0.2 |              | μ=0.10             | μ=0.15 | μ=0.2 |              | μ=0.10             | μ=0.15 | μ=0.2 |              |           |          | μ=0.10             | μ=0.15 | μ=0.2 |              |
| M16       | 24  | 121                | 165    | 208   | 54           | 171                | 232    | 292   | 76           | 205                | 278    | 351   | 91           | 5/8"      | 1.1/16"  | 126                | 171    | 215   | 57           |
| M18       | 27  | 165                | 224    | 283   | 66           | 233                | 316    | 399   | 92           | 279                | 379    | 478   | 111          |           |          |                    |        |       |              |
| M20       | 30  | 237                | 322    | 406   | 85           | 333                | 452    | 571   | 119          | 400                | 543    | 685   | 143          | 3/4"      | 1.1/4"   | 226                | 306    | 387   | 85           |
| M22       | 32  | 327                | 443    | 560   | 106          | 459                | 623    | 787   | 149          | 551                | 748    | 945   | 179          | 7/8"      | 1.7/16"  | 366                | 496    | 627   | 117          |
| M24       | 36  | 409                | 556    | 702   | 122          | 576                | 781    | 987   | 171          | 691                | 938    | 1184  | 206          | 1"        | 1.5/8"   | 549                | 745    | 941   | 154          |
| M27       | 41  | 608                | 828    | 1043  | 161          | 855                | 1161   | 1467  | 226          | 1027               | 1393   | 1760  | 272          |           |          |                    |        |       |              |
| M30       | 46  | 820                | 1113   | 1406  | 195          | 1154               | 1566   | 1978  | 275          | 1384               | 1879   | 2373  | 330          | 1.1/8"    | 1.13/6"  | 816                | 1107   | 1398  | 204          |
| M33       | 50  | 1128               | 1531   | 1933  | 244          | 1586               | 2152   | 2719  | 343          | 1903               | 2583   | 3263  | 412          | 1.1/4"    | 2"       | 1157               | 1570   | 1983  | 260          |
| M36       | 55  | 1442               | 1957   | 2472  | 286          | 2028               | 2752   | 3476  | 402          | 2433               | 3302   | 4171  | 483          | 1.3/8"    | 2.3/16"  | 1582               | 2147   | 2712  | 324          |
| M39       | 60  | 1881               | 2553   | 3225  | 345          | 2646               | 3590   | 4535  | 485          | 3175               | 4308   | 5442  | 581          | 1.1/2"    | 2.3/8"   | 2100               | 2850   | 3600  | 394          |
| M42       | 65  | 2317               | 3145   | 2973  | 394          | 3259               | 4423   | 5587  | 554          | 3911               | 5307   | 6704  | 665          | 1.5/8"    | 2.9/16"  | 2720               | 3692   | 4663  | 471          |
| M45       | 70  | 2912               | 3952   | 4992  | 462          | 4095               | 5558   | 7021  | 650          | 4914               | 6670   | 8425  | 780          | 1.3/4"    | 2.3/4"   | 3452               | 4685   | 5917  | 555          |
| M48       | 75  | 3490               | 4737   | 5984  | 519          | 4909               | 6662   | 8415  | 730          | 5890               | 7994   | 10097 | 877          | 1.7/8"    | 2.15/16" | 4304               | 5841   | 7378  | 645          |
| M52       | 80  | 4545               | 6169   | 7792  | 624          | 6392               | 8675   | 10958 | 878          | 7670               | 10410  | 13149 | 1054         | 2"        | 3.1/8"   | 5285               | 7173   | 9060  | 743          |
| M56       | 85  | 5642               | 7658   | 9673  | 720          | 7935               | 10768  | 13602 | 1012         | 9522               | 12922  | 16323 | 1214         | 2.1/4"    | 3.1/2"   | 7674               | 10414  | 13155 | 959          |
| M60       | 90  | 7076               | 9603   | 12130 | 842          | 9951               | 13504  | 17058 | 1185         | 11941              | 16205  | 20470 | 1422         |           |          |                    |        |       |              |
| M64       | 95  | 8535               | 11583  | 14631 | 953          | 12002              | 16289  | 20575 | 1340         | 14403              | 19547  | 24690 | 1607         | 2.1/2"    | 3.7/8"   | 10691              | 14509  | 18327 | 1203         |
| M68       | 100 | 10405              | 14121  | 17838 | 1093         | 14632              | 19858  | 25084 | 1537         | 17559              | 23830  | 30101 | 1844         | 2.3/4"    | 4.1/4"   | 13038              | 17694  | 22350 | 1333         |
| M72       | 105 | 12530              | 17005  | 21480 | 1243         | 17620              | 23913  | 30206 | 1748         |                    |        |       |              |           |          |                    |        |       |              |
| M76       | 110 | 14926              | 20256  | 25587 | 1403         | 20989              | 28485  | 35981 | 1973         |                    |        |       |              |           |          |                    |        |       |              |
| M80       | 115 | 17608              | 30185  | 1572  | 1572         |                    |        |       |              |                    |        |       |              | 3"        | 4.5/8"   | 17104              | 23213  | 29321 | 1603         |
| M85       | 120 | 21390              | 29029  | 36668 | 1797         |                    |        |       |              |                    |        |       |              |           |          |                    |        |       |              |
| M90       | 130 | 25676              | 34847  | 44017 | 2038         |                    |        |       |              |                    |        |       |              | 3.1/4"    | 5"       | 21938              | 29774  | 37609 | 1898         |
| M95       | 135 | 30500              | 41393  | 52286 | 2293         |                    |        |       |              |                    |        |       |              | 3.1/2"    | 5.3/8"   | 27607              | 37467  | 47326 | 2218         |
| M100      | 145 | 35893              | 48712  | 61531 | 2564         |                    |        |       |              |                    |        |       |              | 3.3/4"    | 5.3/4"   | 34176              | 46382  | 58588 | 2563         |
| M105      | 150 | 41886              | 56846  | 71805 | 2849         |                    |        |       |              |                    |        |       |              | 4"        | 6.1/8"   | 41712              | 56610  | 71507 | 2933         |
| M110      | 155 | 48511              | 65837  | 83162 | 3150         |                    |        |       |              |                    |        |       |              |           |          |                    |        |       |              |

$\mu=0.10$  - Lubricated Bolts  
 $\mu=0.15$  - Semi Lubricated Bolts  
 $\mu=0.2$  - Dry Bolts

Newton - Meter Nm to Foot-Pounds lbf. ft. (1Nm = 0.738 lbf. ft.)  
 Kilogram - Force Meter to Newton - Meter (1 Kgm = 9.80 Nm)

## Our Major Clients

Please see below our robust and valued client list that uses BHARTIYA products repeatedly. We take pride in our partnerships and the ability to grow with such amazing group of companies.



**SHINGARE**  
INDUSTRIES PVT LTD

SHINGARE INDUSTRIES PVT. LTD.  
Formerly known as Bharatiya Industries  
Manufacturer & Exporter of Tube Cleaners, Flexible Shafts, Tube Tools, Pipe Beveling Machines, Torque Tools, Grinding Tools, Tapping Tools.  
A-48 B Osiya Mataji Compound, Village Kalher, Retibunder Road, Tal. Bhiwandi, Dist. Thane - 421302, Maharashtra,  
+91 22 25854509 | +91 90290 05461 | +91 22 25883527 | bharatflex@yahoo.com | spradip@tubecleaner.co.in  
www.shingare.com | www.tubecleaner.co.in

*Authorised Dealer*