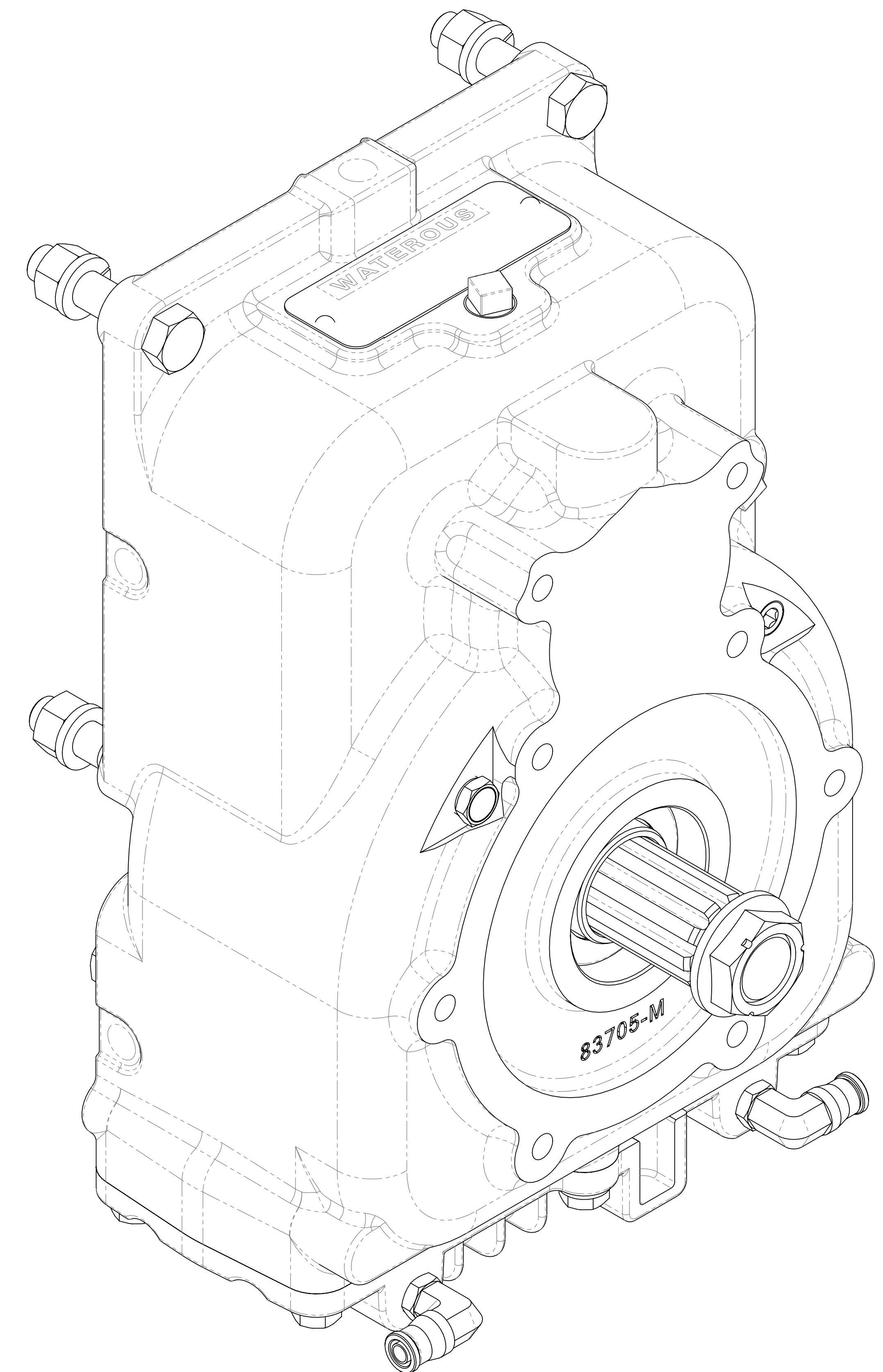
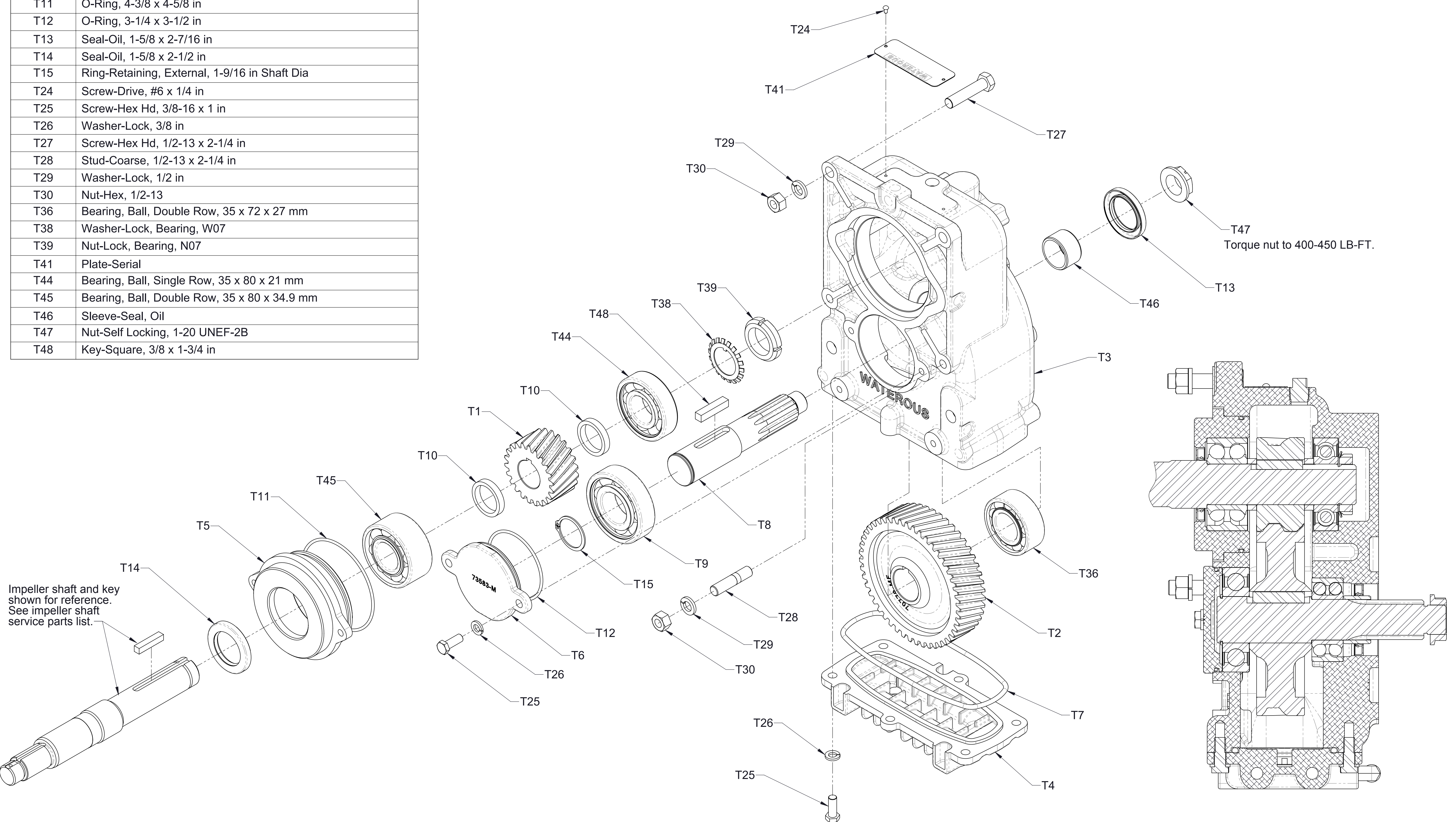


Heavy Duty K Transmission Assy 83741

| Pump Model | Impeller Shaft type | Extended Shaft for CAFS Drive | Input Type | See Sheet |
|--|---------------------|-------------------------------|------------------------------|-----------|
| CXN, CXS, CXV | One-Piece | No | Standard 1-3/8in. SAE Spline | 2 |
| | | | Hydraulic Flange Adapter | 3 |
| | | Yes | Standard 1-3/8in. SAE Spline | 4 |
| CGV, CGVR, CGVG | One-Piece | N/A | Standard 1-3/8in. SAE Spline | 5 |
| | | | Hydraulic Flange Adapter | 6 |
| CM, CS | Separable | N/A | Standard 1-3/8in. SAE Spline | 7 |
| HL200, HL300, HL400 | Separable | No | Standard 1-3/8in. SAE Spline | 8 |
| | | Yes | Standard 1-3/8in. SAE Spline | 9 |
| Oil Cooler Fittings -- CX, CG | | | | 10 |
| Oil Cooler Fittings -- HL200, HL300, HL400, HLU | | | | 11 |
| Oil Cooler Fittings -- HL400 with Short Intake Fitting | | | | 12 |
| Oil Cooler Fittings -- CM, CS | | | | 13 |
| Pump Mounting Positions - Oil Level, Breather, Drain, and Vent locations | | | | 14-15 |

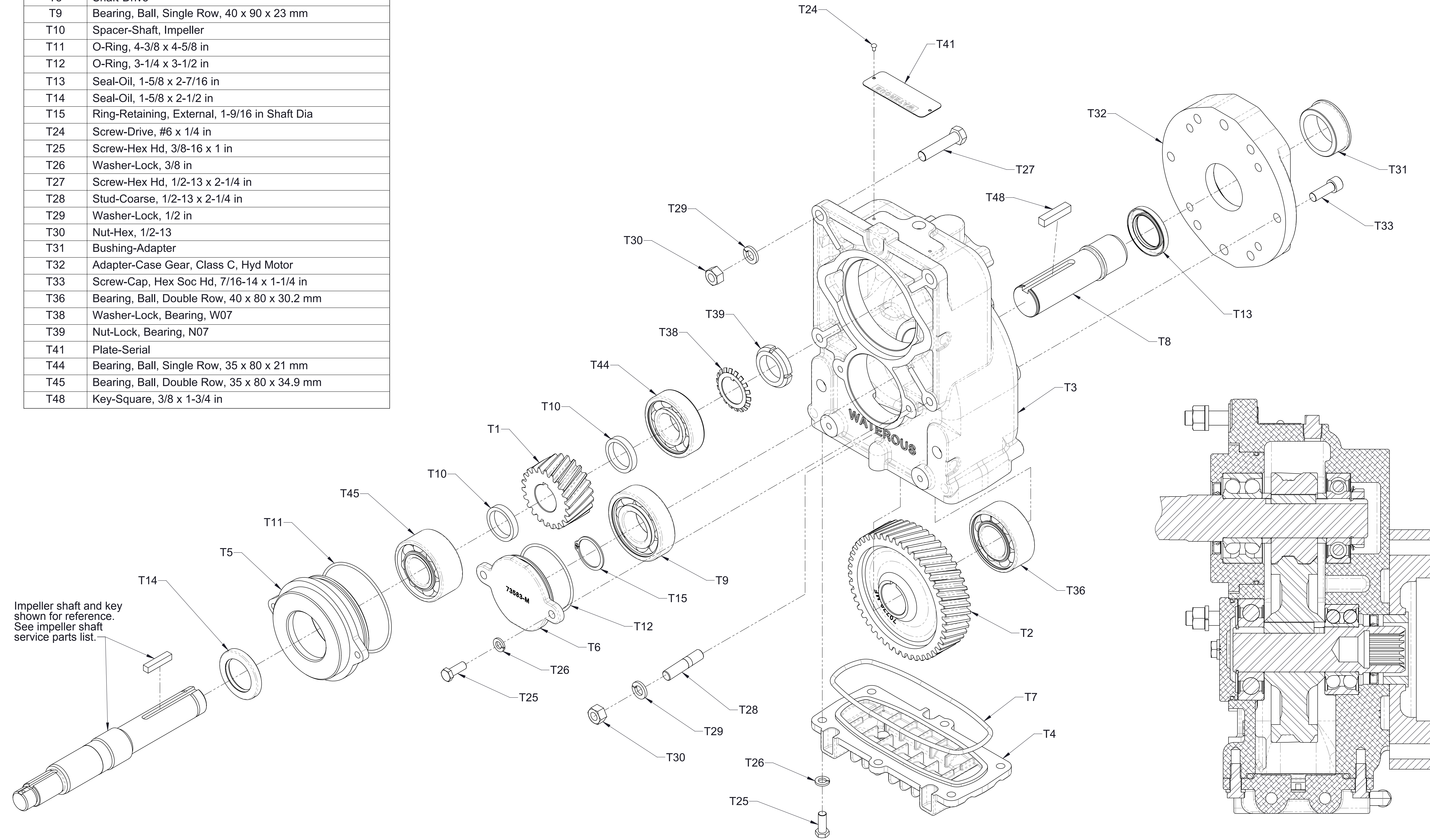


| Ref No. | Description | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
|---------|--|----|--|-----|------------------------|-----|--------------------------|-----|--------------------------|-----|-----------------------------|-----|----------------------------|-----|---|-----|--------------------------|-----|-----------------------------|-----|---------------------|-----|---------------------------------|-----|--------------------------------|-----|---------------------|-----|-----------------|-----|--|-----|---------------------------|-----|------------------------|-----|--------------|-----|--|-----|--|-----|------------------|-----|--------------------------------|-----|----------------------------|
| T1 | Gear-Driven | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T2 | Gear-Drive | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T3 | Case-Transmission | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T4 | Pan-Oil, Cooler | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T5 | Housing-Bearing | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T6 | Cover-Bearing | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T7 | Gasket-Molded | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T8 | Shaft-Drive </tr <tr><td>T9</td><td>Bearing, Ball, Single Row, 40 x 90 x 23 mm</td></tr> <tr><td>T10</td><td>Spacer-Shaft, Impeller</td></tr> <tr><td>T11</td><td>O-Ring, 4-3/8 x 4-5/8 in</td></tr> <tr><td>T12</td><td>O-Ring, 3-1/4 x 3-1/2 in</td></tr> <tr><td>T13</td><td>Seal-Oil, 1-5/8 x 2-7/16 in</td></tr> <tr><td>T14</td><td>Seal-Oil, 1-5/8 x 2-1/2 in</td></tr> <tr><td>T15</td><td>Ring-Retaining, External, 1-9/16 in Shaft Dia</td></tr> <tr><td>T24</td><td>Screw-Drive, #6 x 1/4 in</td></tr> <tr><td>T25</td><td>Screw-Hex Hd, 3/8-16 x 1 in</td></tr> <tr><td>T26</td><td>Washer-Lock, 3/8 in</td></tr> <tr><td>T27</td><td>Screw-Hex Hd, 1/2-13 x 2-1/4 in</td></tr> <tr><td>T28</td><td>Stud-Coarse, 1/2-13 x 2-1/4 in</td></tr> <tr><td>T29</td><td>Washer-Lock, 1/2 in</td></tr> <tr><td>T30</td><td>Nut-Hex, 1/2-13</td></tr> <tr><td>T36</td><td>Bearing, Ball, Double Row, 35 x 72 x 27 mm</td></tr> <tr><td>T38</td><td>Washer-Lock, Bearing, W07</td></tr> <tr><td>T39</td><td>Nut-Lock, Bearing, N07</td></tr> <tr><td>T41</td><td>Plate-Serial</td></tr> <tr><td>T44</td><td>Bearing, Ball, Single Row, 35 x 80 x 21 mm</td></tr> <tr><td>T45</td><td>Bearing, Ball, Double Row, 35 x 80 x 34.9 mm</td></tr> <tr><td>T46</td><td>Sleeve-Seal, Oil</td></tr> <tr><td>T47</td><td>Nut-Self Locking, 1-20 UNEF-2B</td></tr> <tr><td>T48</td><td>Key-Square, 3/8 x 1-3/4 in</td></tr> | T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm | T10 | Spacer-Shaft, Impeller | T11 | O-Ring, 4-3/8 x 4-5/8 in | T12 | O-Ring, 3-1/4 x 3-1/2 in | T13 | Seal-Oil, 1-5/8 x 2-7/16 in | T14 | Seal-Oil, 1-5/8 x 2-1/2 in | T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia | T24 | Screw-Drive, #6 x 1/4 in | T25 | Screw-Hex Hd, 3/8-16 x 1 in | T26 | Washer-Lock, 3/8 in | T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in | T28 | Stud-Coarse, 1/2-13 x 2-1/4 in | T29 | Washer-Lock, 1/2 in | T30 | Nut-Hex, 1/2-13 | T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm | T38 | Washer-Lock, Bearing, W07 | T39 | Nut-Lock, Bearing, N07 | T41 | Plate-Serial | T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm | T45 | Bearing, Ball, Double Row, 35 x 80 x 34.9 mm | T46 | Sleeve-Seal, Oil | T47 | Nut-Self Locking, 1-20 UNEF-2B | T48 | Key-Square, 3/8 x 1-3/4 in |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T10 | Spacer-Shaft, Impeller | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T11 | O-Ring, 4-3/8 x 4-5/8 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T12 | O-Ring, 3-1/4 x 3-1/2 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T14 | Seal-Oil, 1-5/8 x 2-1/2 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T24 | Screw-Drive, #6 x 1/4 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T26 | Washer-Lock, 3/8 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T28 | Stud-Coarse, 1/2-13 x 2-1/4 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T29 | Washer-Lock, 1/2 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T30 | Nut-Hex, 1/2-13 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T38 | Washer-Lock, Bearing, W07 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T39 | Nut-Lock, Bearing, N07 | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T41 | Plate-Serial | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T45 | Bearing, Ball, Double Row, 35 x 80 x 34.9 mm | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T46 | Sleeve-Seal, Oil | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T47 | Nut-Self Locking, 1-20 UNEF-2B | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| T48 | Key-Square, 3/8 x 1-3/4 in | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | | |



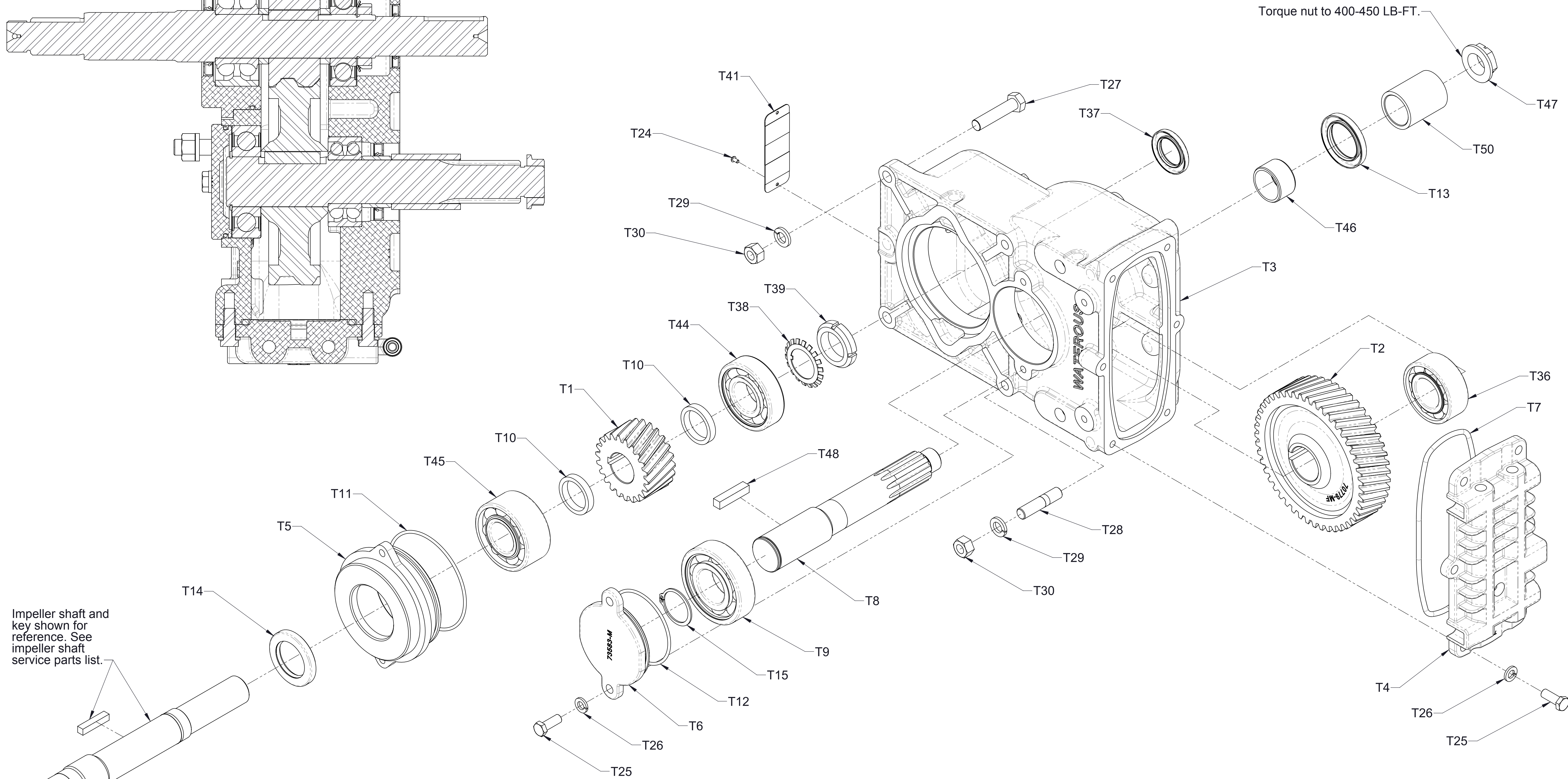
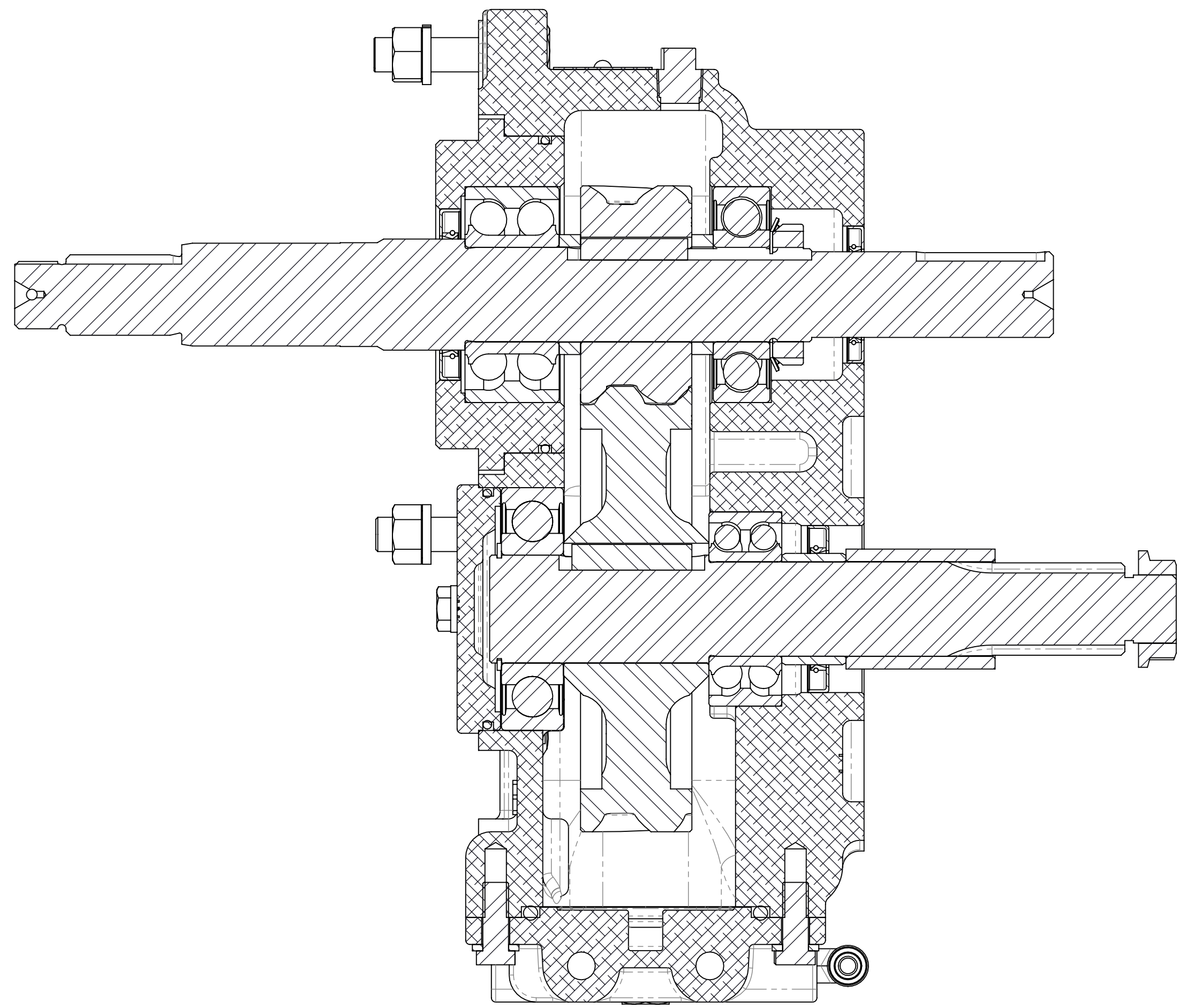
**Transmission Assembly
One Piece Impeller Shaft, 1-3/8in. SAE Splined Input
Without Extended Shaft
CXN, CXS, CXV**

| Ref No. | Description |
|---------|---|
| T1 | Gear-Driven |
| T2 | Gear-Drive |
| T3 | Case-Transmission |
| T4 | Pan-Oil, Cooler |
| T5 | Housing-Bearing |
| T6 | Cover-Bearing |
| T7 | Gasket-Molded |
| T8 | Shaft-Drive |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm |
| T10 | Spacer-Shaft, Impeller |
| T11 | O-Ring, 4-3/8 x 4-5/8 in |
| T12 | O-Ring, 3-1/4 x 3-1/2 in |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in |
| T14 | Seal-Oil, 1-5/8 x 2-1/2 in |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia |
| T24 | Screw-Drive, #6 x 1/4 in |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in |
| T26 | Washer-Lock, 3/8 in |
| T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in |
| T28 | Stud-Coarse, 1/2-13 x 2-1/4 in |
| T29 | Washer-Lock, 1/2 in |
| T30 | Nut-Hex, 1/2-13 |
| T31 | Bushing-Adapter |
| T32 | Adapter-Case Gear, Class C, Hyd Motor |
| T33 | Screw-Cap, Hex Soc Hd, 7/16-14 x 1-1/4 in |
| T36 | Bearing, Ball, Double Row, 40 x 80 x 30.2 mm |
| T38 | Washer-Lock, Bearing, W07 |
| T39 | Nut-Lock, Bearing, N07 |
| T41 | Plate-Serial |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T45 | Bearing, Ball, Double Row, 35 x 80 x 34.9 mm |
| T48 | Key-Square, 3/8 x 1-3/4 in |



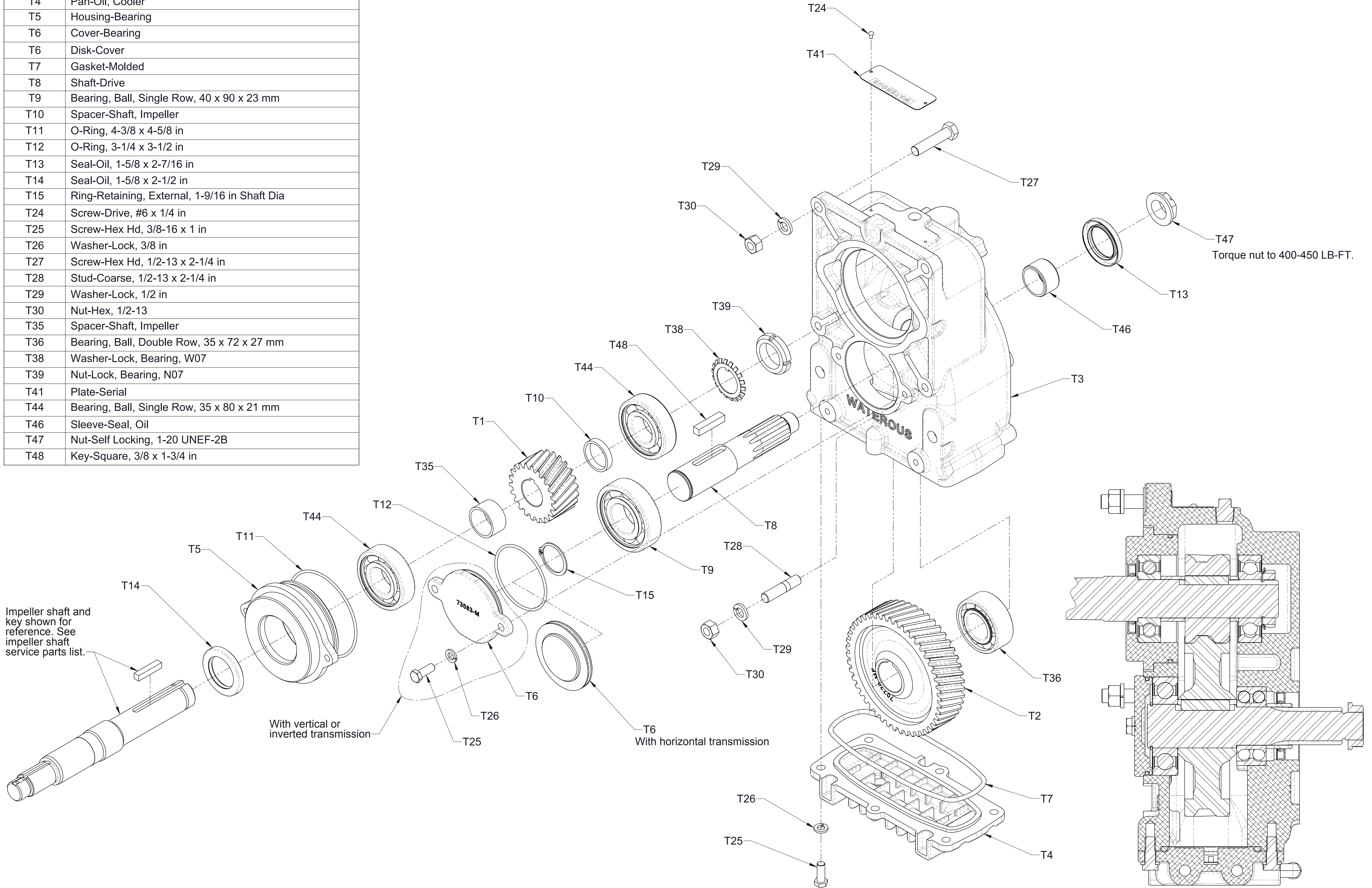
**Transmission Assembly
One Piece Impeller Shaft, SAE Class C Hydraulic Adapter
Without Extended Shaft
CXN, CXS, CXV**

| Ref No. | Description | Ref No. | Description |
|---------|---|---------|--|
| T1 | Gear-Driven | T26 | Washer-Lock, 3/8 in |
| T2 | Gear-Drive | T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in |
| T3 | Case-Transmission | T28 | Stud-Coarse, 1/2-13 x 2-1/4 in |
| T4 | Pan-Oil, Cooler | T29 | Washer-Lock, 1/2 in |
| T5 | Housing-Bearing | T30 | Nut-Hex, 1/2-13 |
| T6 | Cover-Bearing | T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm |
| T7 | Gasket-Molded | T37 | Seal-Oil, 1-1/4 x 2 in |
| T8 | Shaft-Drive, Extended | T38 | Washer-Lock, Bearing, W07 |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm | T39 | Nut-Lock, Bearing, N07 |
| T10 | Spacer-Shaft, Impeller | T41 | Plate-Serial |
| T11 | O-Ring, 4-3/8 x 4-5/8 in | T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T12 | O-Ring, 3-1/4 x 3-1/2 in | T45 | Bearing, Ball, Double Row, 35 x 80 x 34.9 mm |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in | T46 | Sleeve-Seal, Oil |
| T14 | Seal-Oil, 1-5/8 x 2-1/2 in | T47 | Nut-Self Locking, 1-20 UNEF-2B |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia | T48 | Key-Square, 3/8 x 1-3/4 in |
| T24 | Screw-Drive, #6 x 1/4 in | T50 | Spacer-Shaft, Driven |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in | | |



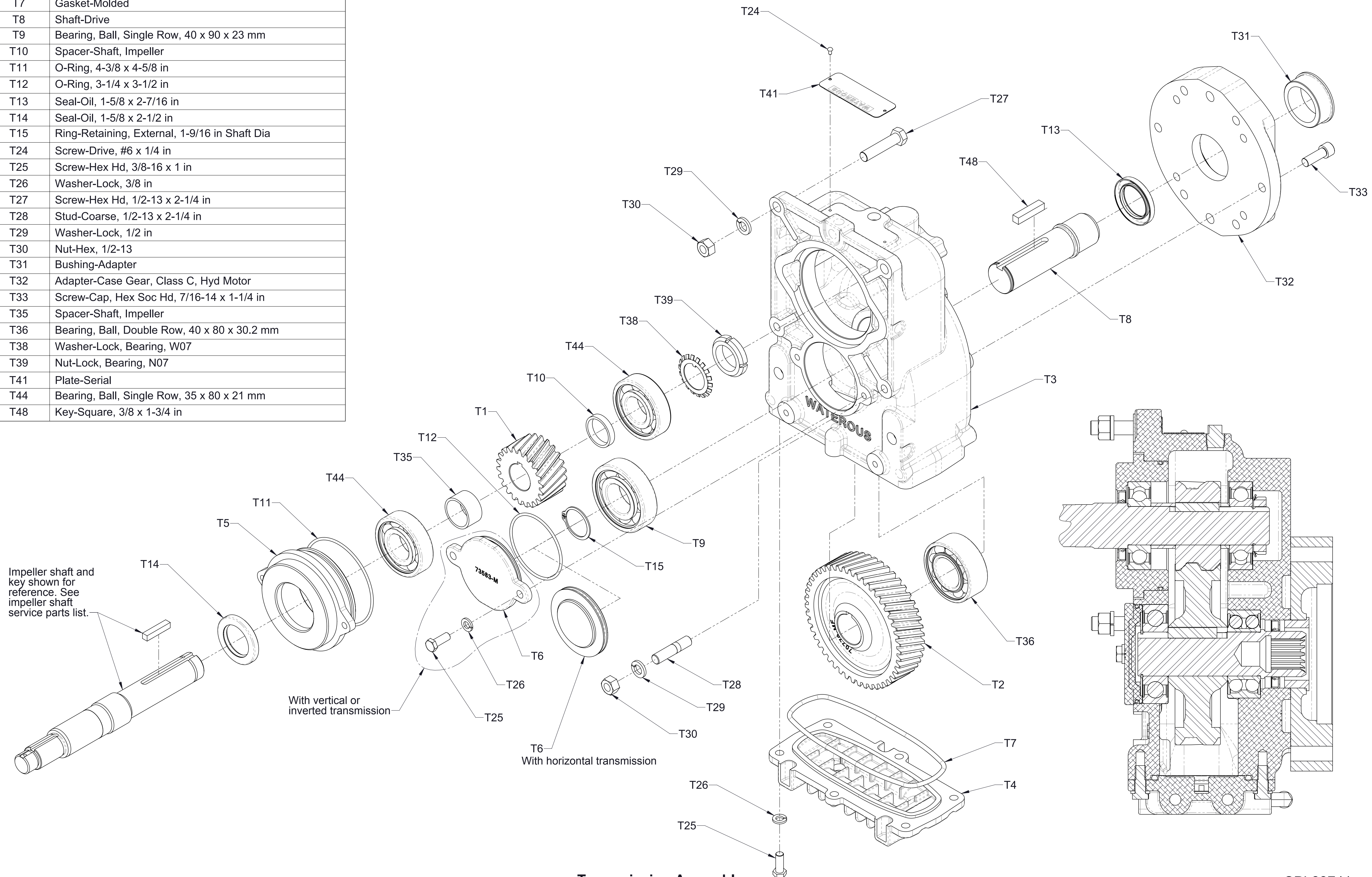
Transmission Assembly
One Piece Impeller Shaft, 1-3/8in. SAE Splined Input
With Extended Shaft for CAFS Drive
CXN, CXS, CXV

| Ref No. | Description |
|---------|---|
| T1 | Gear-Driven |
| T2 | Gear-Drive |
| T3 | Case-Transmission |
| T4 | Pan-Oil, Cooler |
| T5 | Housing-Bearing |
| T6 | Cover-Bearing |
| T6 | Disk-Cover |
| T7 | Gasket-Molded |
| T8 | Shaft-Drive |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm |
| T10 | Spacer-Shaft, Impeller |
| T11 | O-Ring, 4-3/8 x 4-5/8 in |
| T12 | O-Ring, 3-1/4 x 3-1/2 in |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in |
| T14 | Seal-Oil, 1-5/8 x 2-1/2 in |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia |
| T24 | Screw-Drive, #6 x 1/4 in |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in |
| T26 | Washer-Lock, 3/8 in |
| T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in |
| T28 | Stud-Coarse, 1/2-13 x 2-1/4 in |
| T29 | Washer-Lock, 1/2 in |
| T30 | Nut-Hex, 1/2-13 |
| T35 | Spacer-Shaft, Impeller |
| T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm |
| T38 | Washer-Lock, Bearing, W07 |
| T39 | Nut-Lock, Bearing, N07 |
| T41 | Plate-Serial |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T46 | Sleeve-Seal, Oil |
| T47 | Nut-Self Locking, 1-20 UNEF-2B |
| T48 | Key-Square, 3/8 x 1-3/4 in |



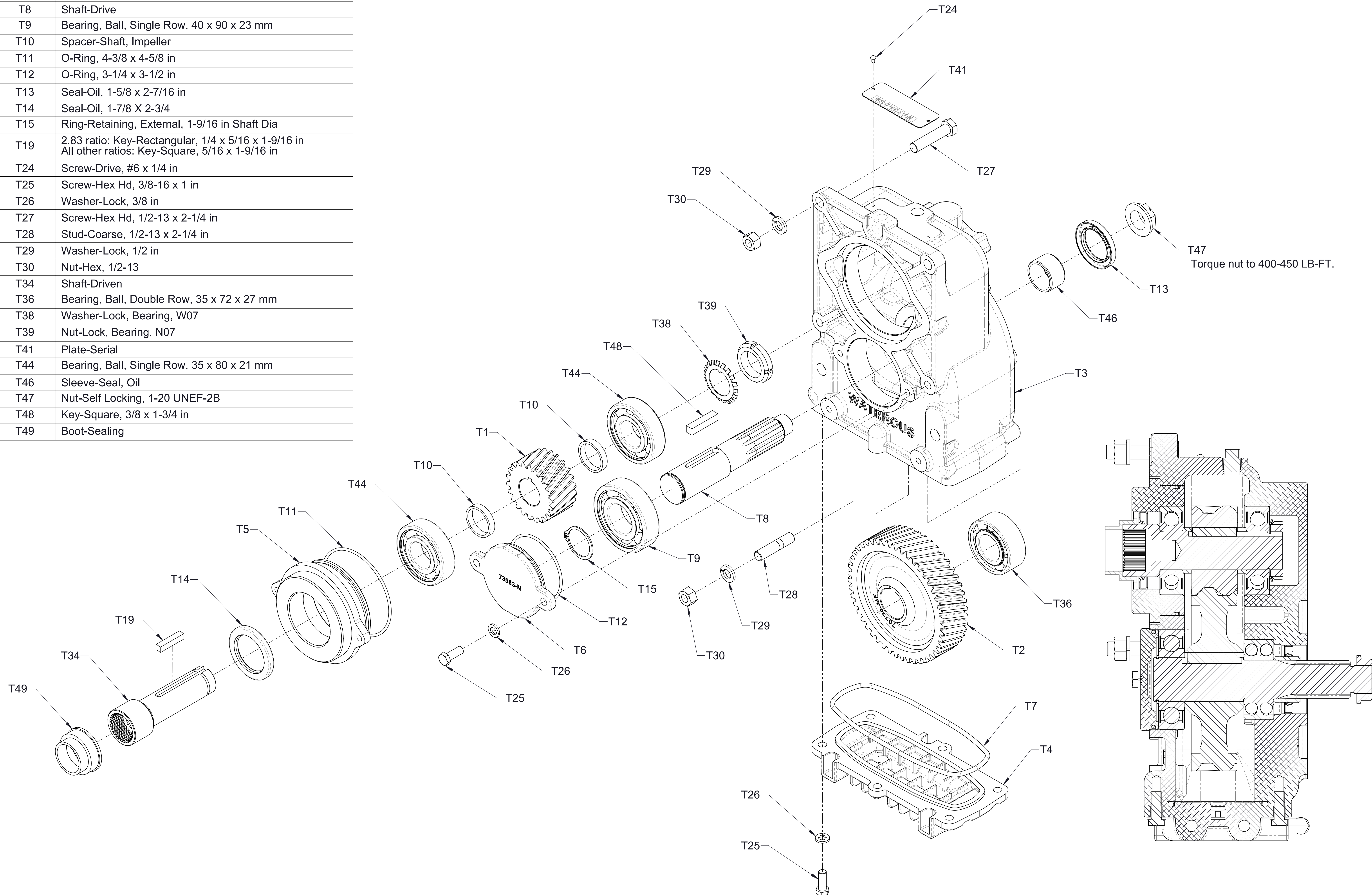
**Transmission Assembly
One Piece Impeller Shaft, 1-3/8in. SAE Splined Input
Without Extended Shaft
CGV, CGVG, CGVR**

| Ref No. | Description |
|---------|---|
| T1 | Gear-Driven |
| T2 | Gear-Drive |
| T3 | Case-Transmission |
| T4 | Pan-Oil, Cooler |
| T5 | Housing-Bearing |
| T6 | Disk-Cover |
| T6 | Cover-Bearing |
| T7 | Gasket-Molded |
| T8 | Shaft-Drive |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm |
| T10 | Spacer-Shaft, Impeller |
| T11 | O-Ring, 4-3/8 x 4-5/8 in |
| T12 | O-Ring, 3-1/4 x 3-1/2 in |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in |
| T14 | Seal-Oil, 1-5/8 x 2-1/2 in |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia |
| T24 | Screw-Drive, #6 x 1/4 in |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in |
| T26 | Washer-Lock, 3/8 in |
| T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in |
| T28 | Stud-Coarse, 1/2-13 x 2-1/4 in |
| T29 | Washer-Lock, 1/2 in |
| T30 | Nut-Hex, 1/2-13 |
| T31 | Bushing-Adapter |
| T32 | Adapter-Case Gear, Class C, Hyd Motor |
| T33 | Screw-Cap, Hex Soc Hd, 7/16-14 x 1-1/4 in |
| T35 | Spacer-Shaft, Impeller |
| T36 | Bearing, Ball, Double Row, 40 x 80 x 30.2 mm |
| T38 | Washer-Lock, Bearing, W07 |
| T39 | Nut-Lock, Bearing, N07 |
| T41 | Plate-Serial |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T48 | Key-Square, 3/8 x 1-3/4 in |



**Transmission Assembly
One Piece Impeller Shaft, SAE Class C Hydraulic Adapter
Without Extended Shaft
CGV, CGVG, CGVR**

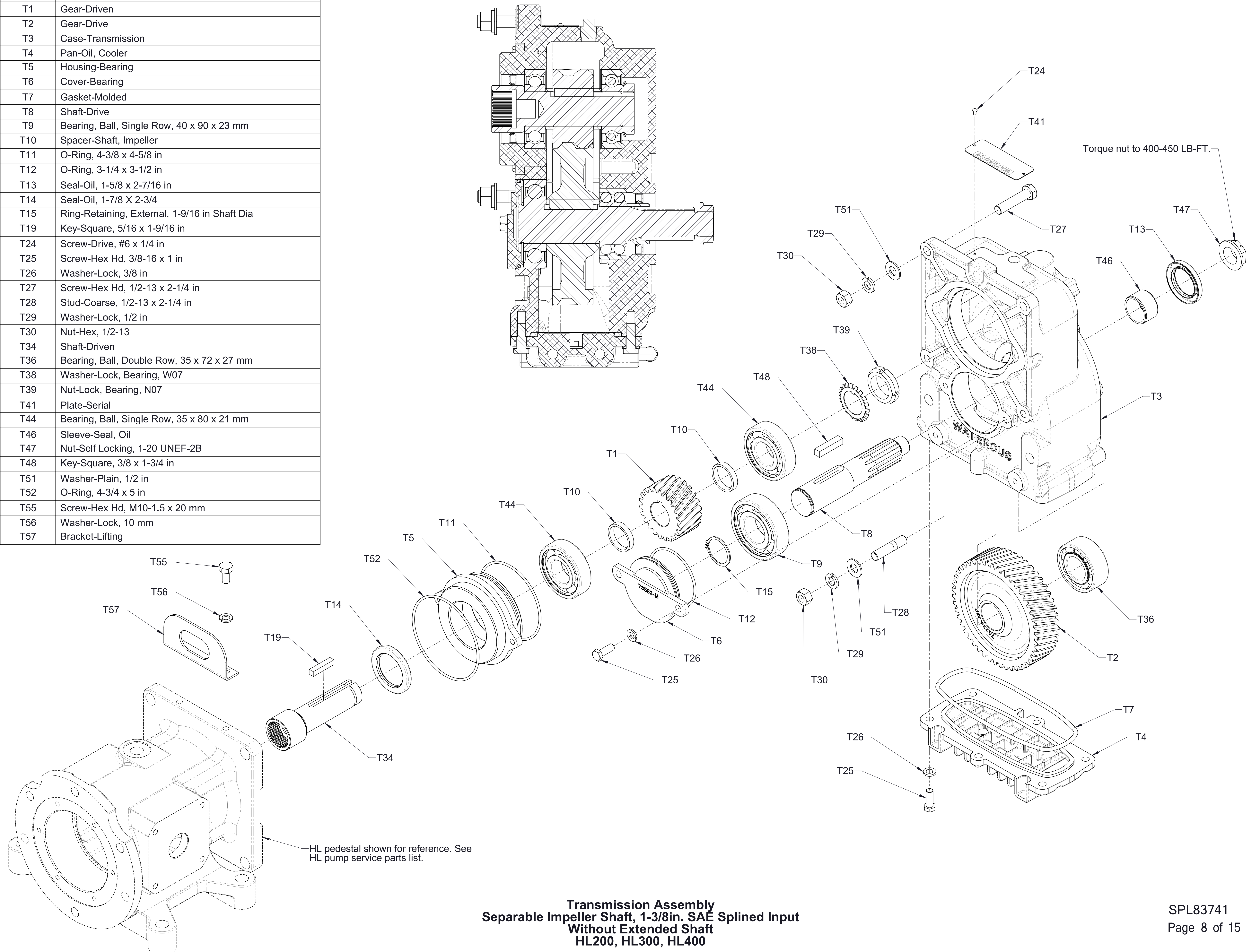
| Ref No. | Description |
|---------|---|
| T1 | Gear-Driven |
| T2 | Gear-Drive |
| T3 | Case-Transmission |
| T4 | Pan-Oil, Cooler |
| T5 | Housing-Bearing |
| T6 | Cover-Bearing |
| T7 | Gasket-Molded |
| T8 | Shaft-Drive |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm |
| T10 | Spacer-Shaft, Impeller |
| T11 | O-Ring, 4-3/8 x 4-5/8 in |
| T12 | O-Ring, 3-1/4 x 3-1/2 in |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in |
| T14 | Seal-Oil, 1-7/8 X 2-3/4 |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia |
| T19 | 2.83 ratio: Key-Rectangular, 1/4 x 5/16 x 1-9/16 in All other ratios: Key-Square, 5/16 x 1-9/16 in |
| T24 | Screw-Drive, #6 x 1/4 in |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in |
| T26 | Washer-Lock, 3/8 in |
| T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in |
| T28 | Stud-Coarse, 1/2-13 x 2-1/4 in |
| T29 | Washer-Lock, 1/2 in |
| T30 | Nut-Hex, 1/2-13 |
| T34 | Shaft-Driven |
| T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm |
| T38 | Washer-Lock, Bearing, W07 |
| T39 | Nut-Lock, Bearing, N07 |
| T41 | Plate-Serial |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T46 | Sleeve-Seal, Oil |
| T47 | Nut-Self Locking, 1-20 UNEF-2B |
| T48 | Key-Square, 3/8 x 1-3/4 in |
| T49 | Boot-Sealing |



Torque nut to 400-450 LB-FT.

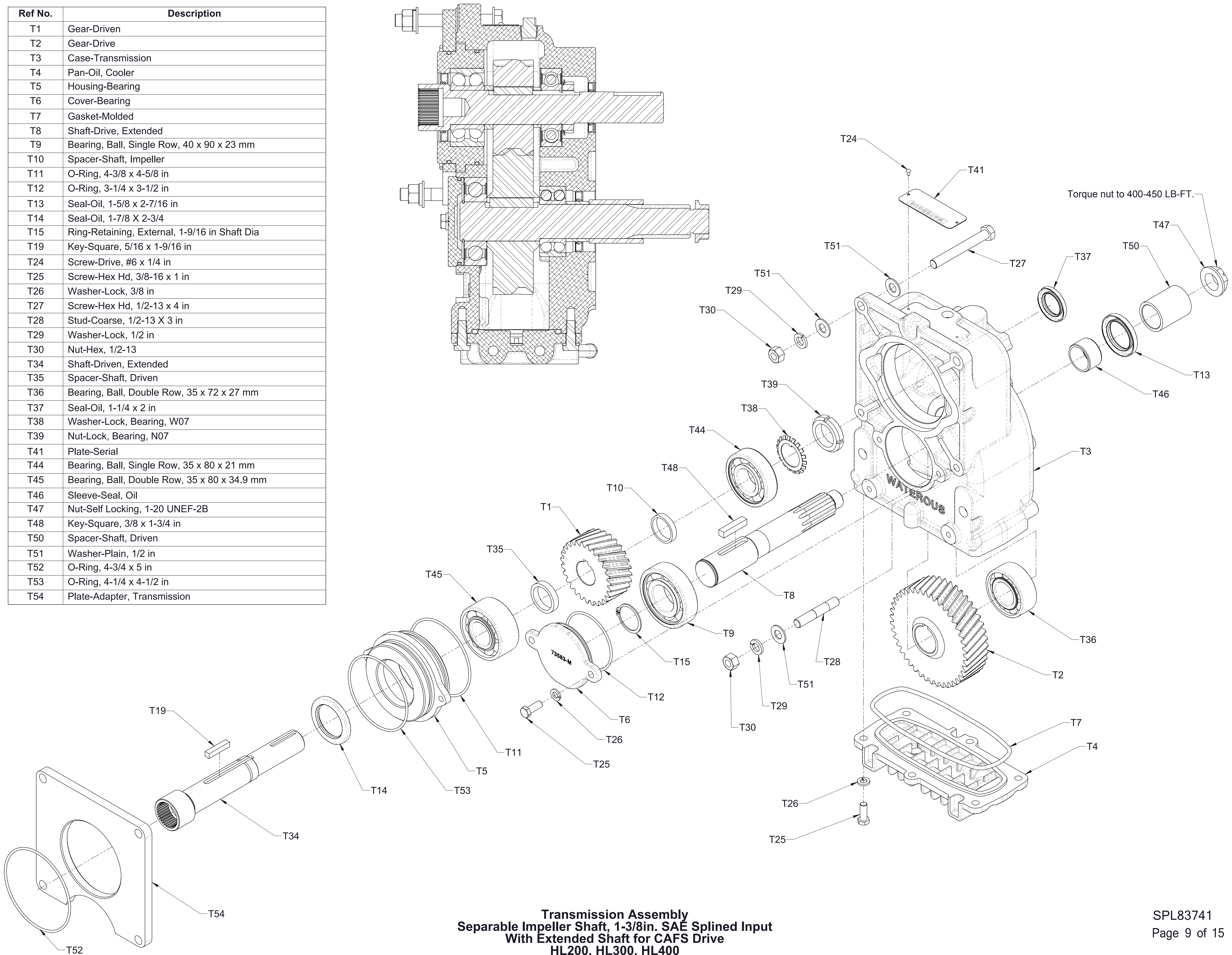
**Transmission Assembly
Separable Impeller Shaft, 1-3/8in. SAE Splined Input
Without Extended Shaft
CM, CS**

| Ref No. | Description |
|---------|---|
| T1 | Gear-Driven |
| T2 | Gear-Drive |
| T3 | Case-Transmission |
| T4 | Pan-Oil, Cooler |
| T5 | Housing-Bearing |
| T6 | Cover-Bearing |
| T7 | Gasket-Molded |
| T8 | Shaft-Drive |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm |
| T10 | Spacer-Shaft, Impeller |
| T11 | O-Ring, 4-3/8 x 4-5/8 in |
| T12 | O-Ring, 3-1/4 x 3-1/2 in |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in |
| T14 | Seal-Oil, 1-7/8 X 2-3/4 |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia |
| T19 | Key-Square, 5/16 x 1-9/16 in |
| T24 | Screw-Drive, #6 x 1/4 in |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in |
| T26 | Washer-Lock, 3/8 in |
| T27 | Screw-Hex Hd, 1/2-13 x 2-1/4 in |
| T28 | Stud-Coarse, 1/2-13 x 2-1/4 in |
| T29 | Washer-Lock, 1/2 in |
| T30 | Nut-Hex, 1/2-13 |
| T34 | Shaft-Driven |
| T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm |
| T38 | Washer-Lock, Bearing, W07 |
| T39 | Nut-Lock, Bearing, N07 |
| T41 | Plate-Serial |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T46 | Sleeve-Seal, Oil |
| T47 | Nut-Self Locking, 1-20 UNEF-2B |
| T48 | Key-Square, 3/8 x 1-3/4 in |
| T51 | Washer-Plain, 1/2 in |
| T52 | O-Ring, 4-3/4 x 5 in |
| T55 | Screw-Hex Hd, M10-1.5 x 20 mm |
| T56 | Washer-Lock, 10 mm |
| T57 | Bracket-Lifting |



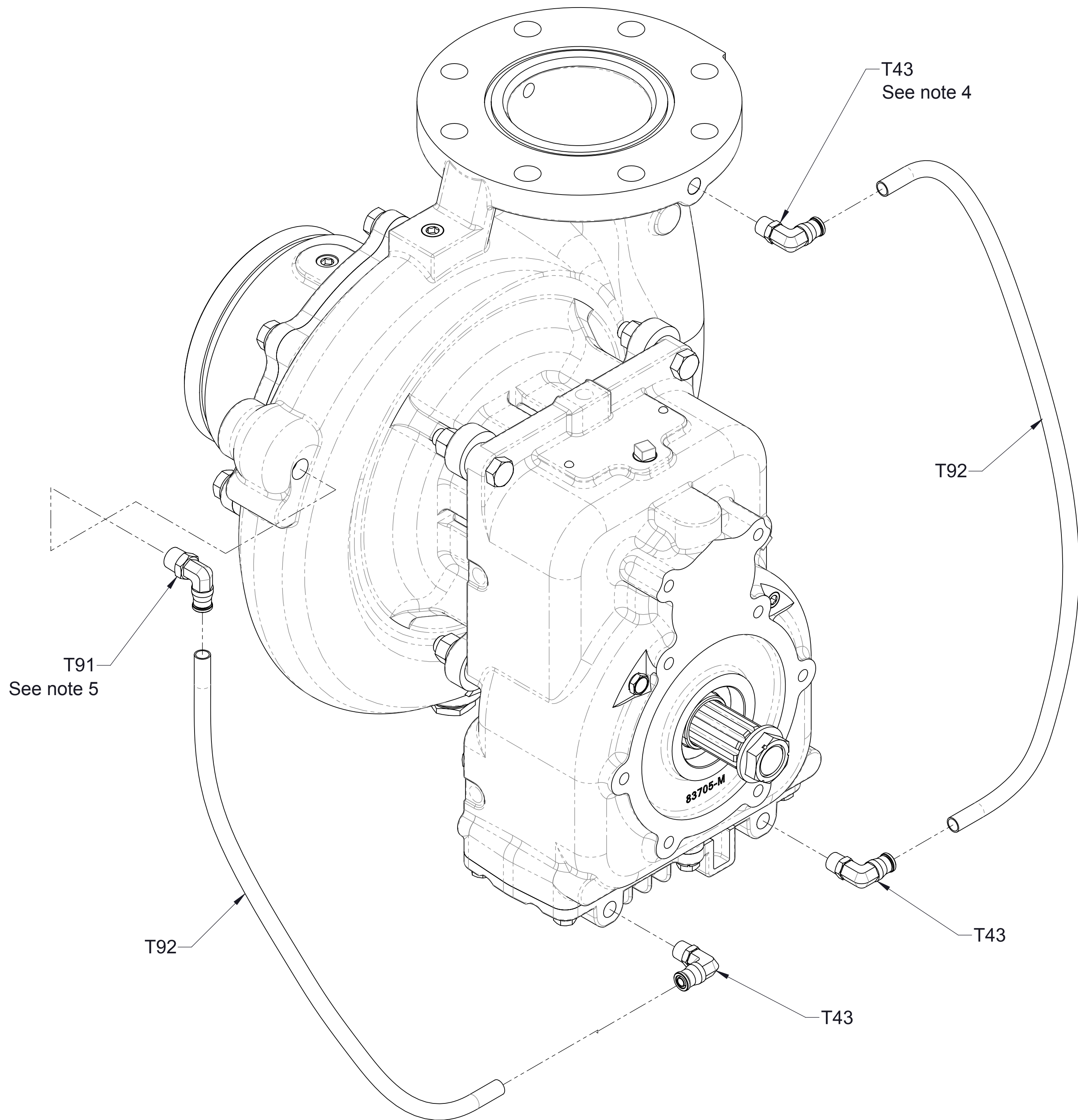
**Transmission Assembly
Separable Impeller Shaft, 1-3/8in. SAE Splined Input
Without Extended Shaft
HL200, HL300, HL400**

| Ref No. | Description |
|---------|---|
| T1 | Gear-Driven |
| T2 | Gear-Drive |
| T3 | Case-Transmission |
| T4 | Pan-Oil, Cooler |
| T5 | Housing-Bearing |
| T6 | Cover-Bearing |
| T7 | Gasket-Molded |
| T8 | Shaft-Drive, Extended |
| T9 | Bearing, Ball, Single Row, 40 x 90 x 23 mm |
| T10 | Spacer-Shaft, Impeller |
| T11 | O-Ring, 4-3/8 x 4-5/8 in |
| T12 | O-Ring, 3-1/4 x 3-1/2 in |
| T13 | Seal-Oil, 1-5/8 x 2-7/16 in |
| T14 | Seal-Oil, 1-7/8 X 2-3/4 |
| T15 | Ring-Retaining, External, 1-9/16 in Shaft Dia |
| T19 | Key-Square, 5/16 x 1-9/16 in |
| T24 | Screw-Drive, #6 x 1/4 in |
| T25 | Screw-Hex Hd, 3/8-16 x 1 in |
| T26 | Washer-Lock, 3/8 in |
| T27 | Screw-Hex Hd, 1/2-13 x 4 in |
| T28 | Stud-Coarse, 1/2-13 X 3 in |
| T29 | Washer-Lock, 1/2 in |
| T30 | Nut-Hex, 1/2-13 |
| T34 | Shaft-Driven, Extended |
| T35 | Spacer-Shaft, Driven |
| T36 | Bearing, Ball, Double Row, 35 x 72 x 27 mm |
| T37 | Seal-Oil, 1-1/4 x 2 in |
| T38 | Washer-Lock, Bearing, W07 |
| T39 | Nut-Lock, Bearing, N07 |
| T41 | Plate-Serial |
| T44 | Bearing, Ball, Single Row, 35 x 80 x 21 mm |
| T45 | Bearing, Ball, Double Row, 35 x 80 x 34.9 mm |
| T46 | Sleeve-Seal, Oil |
| T47 | Nut-Self Locking, 1-20 UNEF-2B |
| T48 | Key-Square, 3/8 x 1-3/4 in |
| T50 | Spacer-Shaft, Driven |
| T51 | Washer-Plain, 1/2 in |
| T52 | O-Ring, 4-3/4 x 5 in |
| T53 | O-Ring, 4-1/4 x 4-1/2 in |
| T54 | Plate-Adapter, Transmission |



**Transmission Assembly
Separable Impeller Shaft, 1-3/8in. SAE Splined Input
With Extended Shaft for CAFS Drive
HL200, HL300, HL400**

| Ref No. | Description |
|---------|--|
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |
| T91 | Fitting-Elbow, 3/8 PTC X 3/8 MNPT, 90° |
| T92 | Tubing, 3/8, Green |

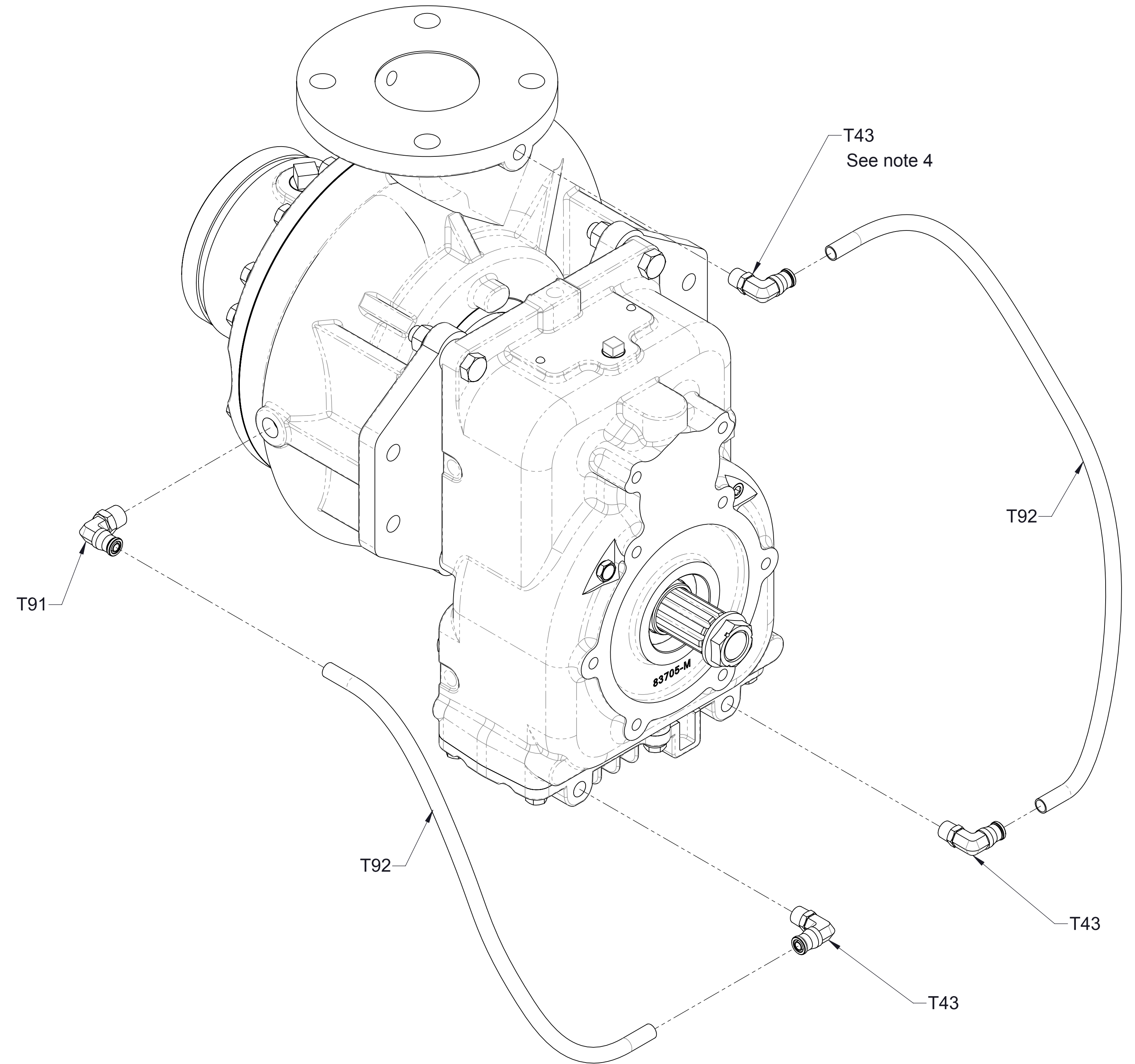


Notes:

1. CW input, vertical transmission, discharge UP shown.
2. Tubing to be cut to required length depending on input rotation and pump/transmission orientation.
3. Route hoses so water drains either through pump or oil cooler
4. Elbow on discharge flange may need to be mounted on opposite side of flange if there is interference with the transmission in certain configurations.
5. Prior to July 22, 2020 T91 elbow was T89 3/8 PTC x 3/8 NPT straight adapter.

**Oil Cooler Lines and Fittings
CXN, CXS, CXV**

| Ref No. | Description |
|---------|--|
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |
| T91 | Fitting-Elbow, 3/8 PTC X 3/8 MNPT, 90° |
| T92 | Tubing, 3/8, Green |

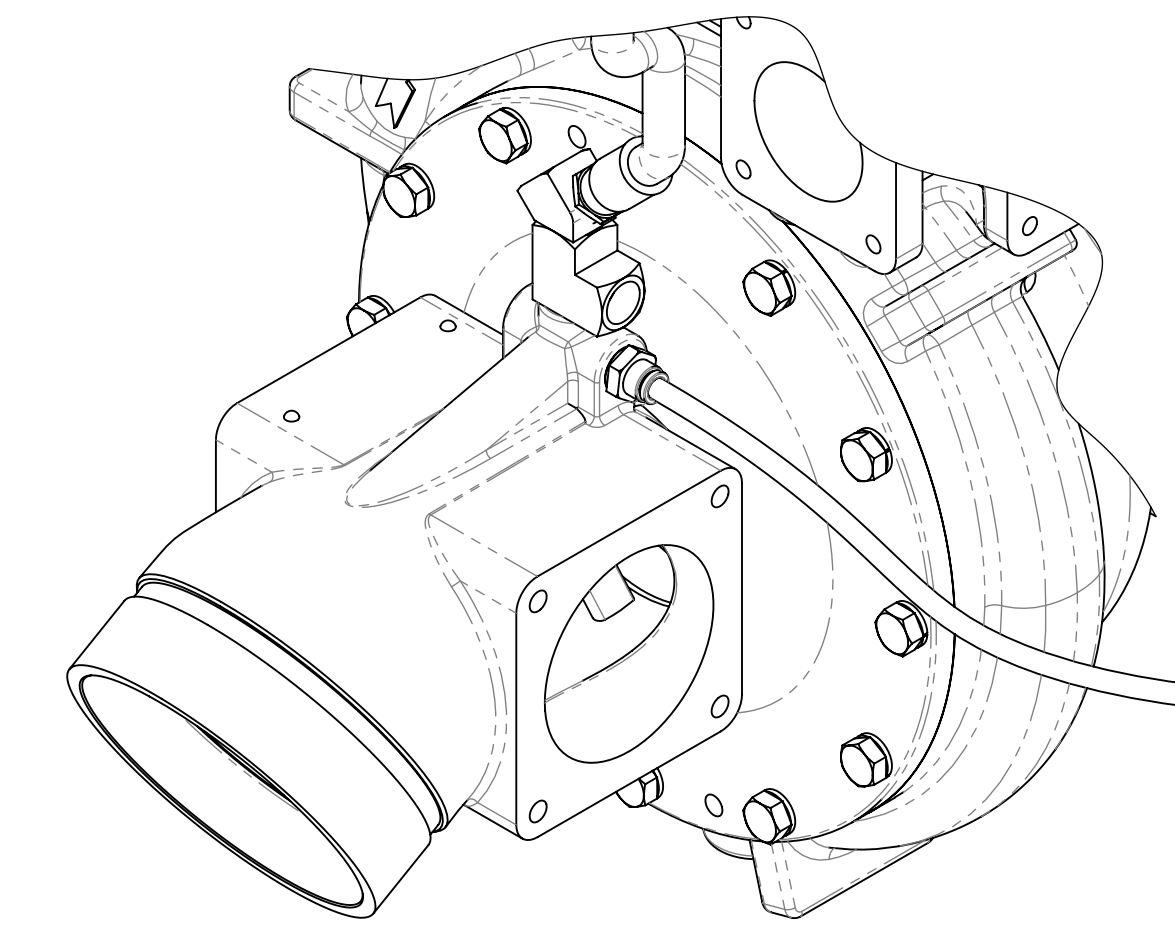


Notes:

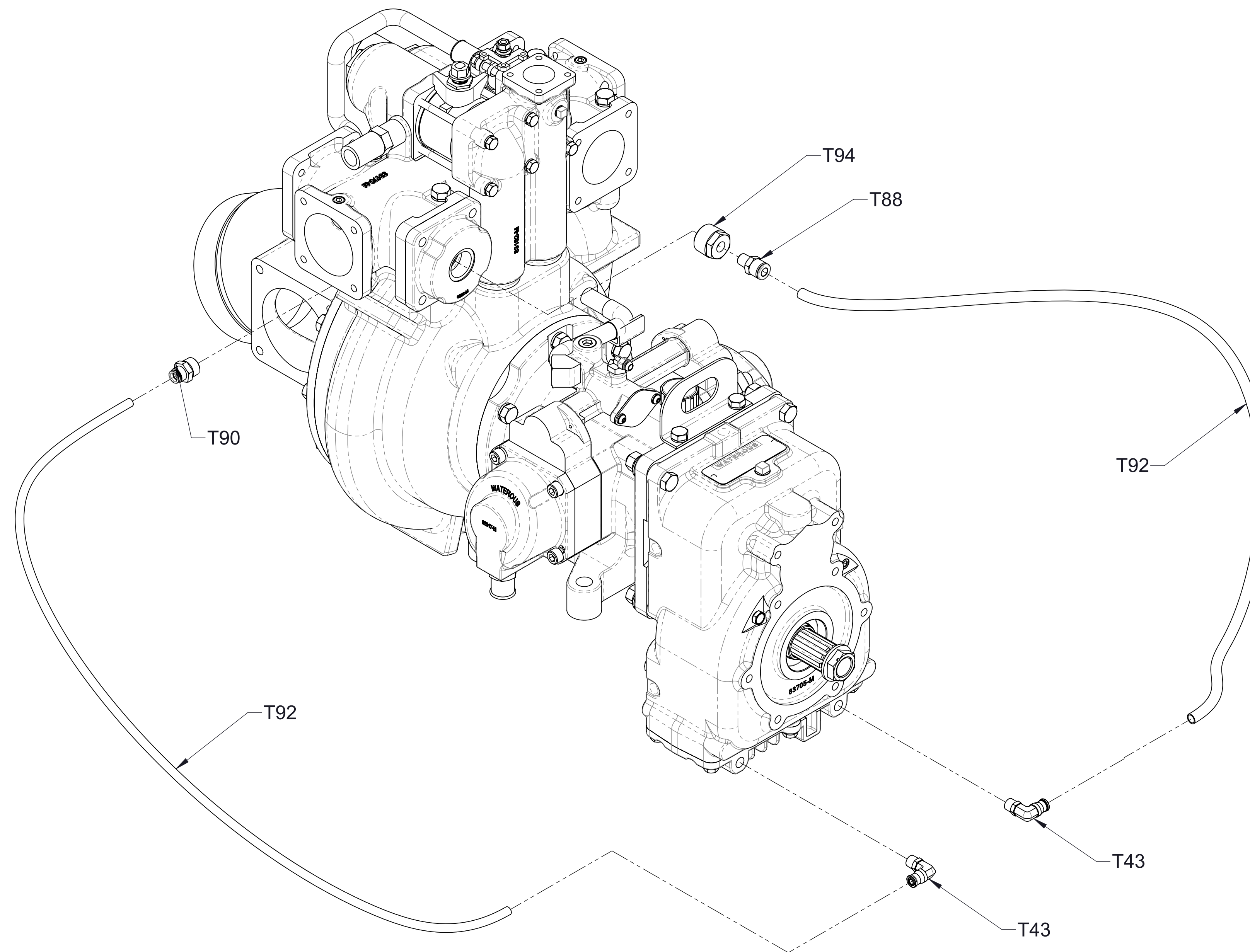
1. CW input, vertical transmission, discharge UP shown.
2. Tubing to be cut to required length depending on input rotation and pump/transmission orientation.
3. Route hoses so water drains either through pump or oil cooler
4. Elbow on discharge flange may be mounted on opposite side of flange if it provides a better hose route depending on the pump and transmission configurations.

**Oil Cooler Lines and Fittings
CGV, CGVG, CGVR**

| Ref No. | Description |
|---------|--|
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |
| T88 | Adapter-3/8 PTC x 1/4 MNPT |
| T90 | Adapter-Straight 3/8 PTC x 1/2 MNPT |
| T92 | Tubing, 3/8, Green |
| T94 | Bushing-Reducing, 1 MNPT x 1/4 FNPT |



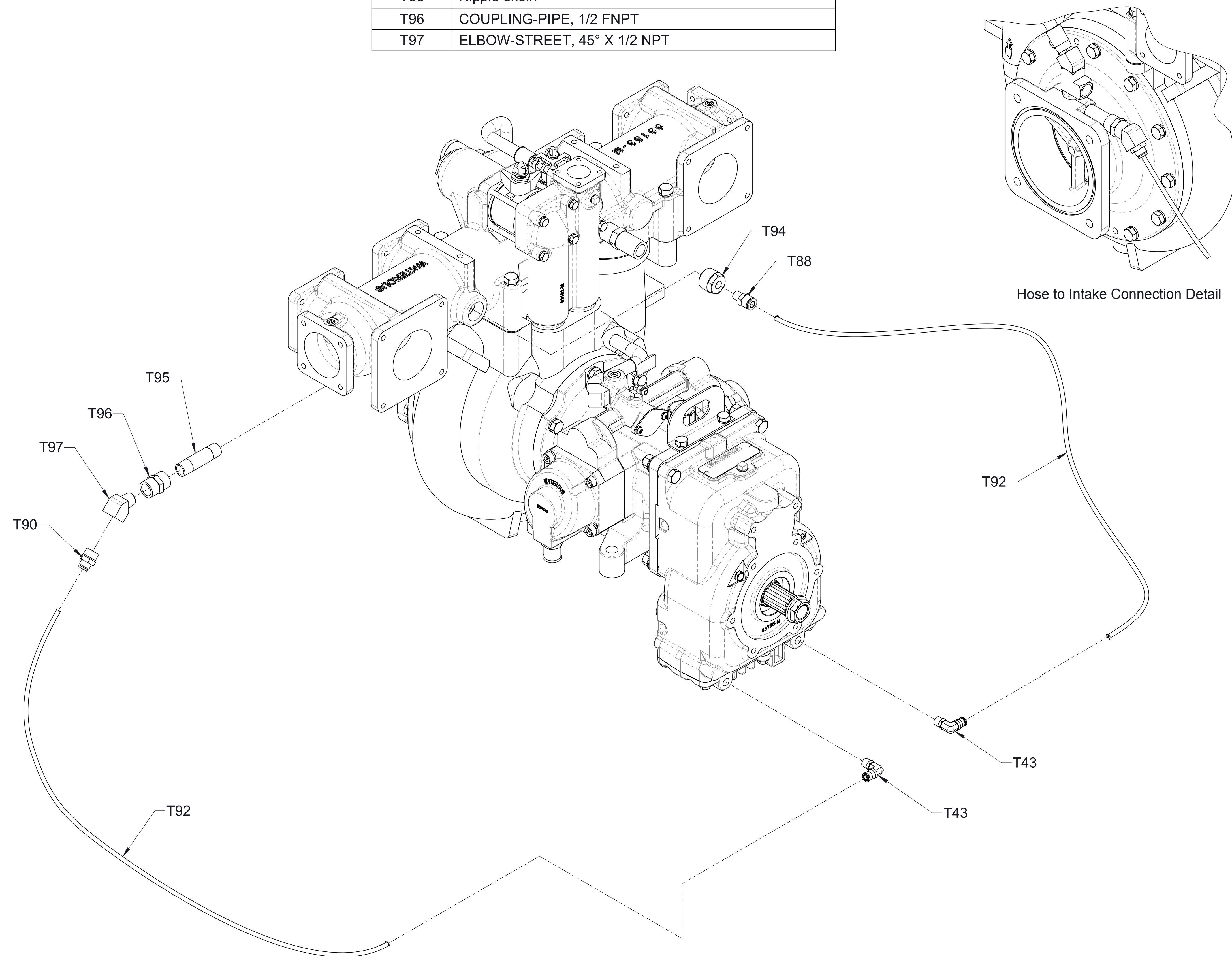
Hose to Intake Connection Detail



Notes:

1. CW input and vertical transmission shown.
2. Tubing to be cut to required length depending on input rotation and transmission orientation.
3. Route hoses so water drains either through pump or oil cooler
4. Cooler lines feeding into oil cooler may be swapped for a better hose routing in certain configurations.

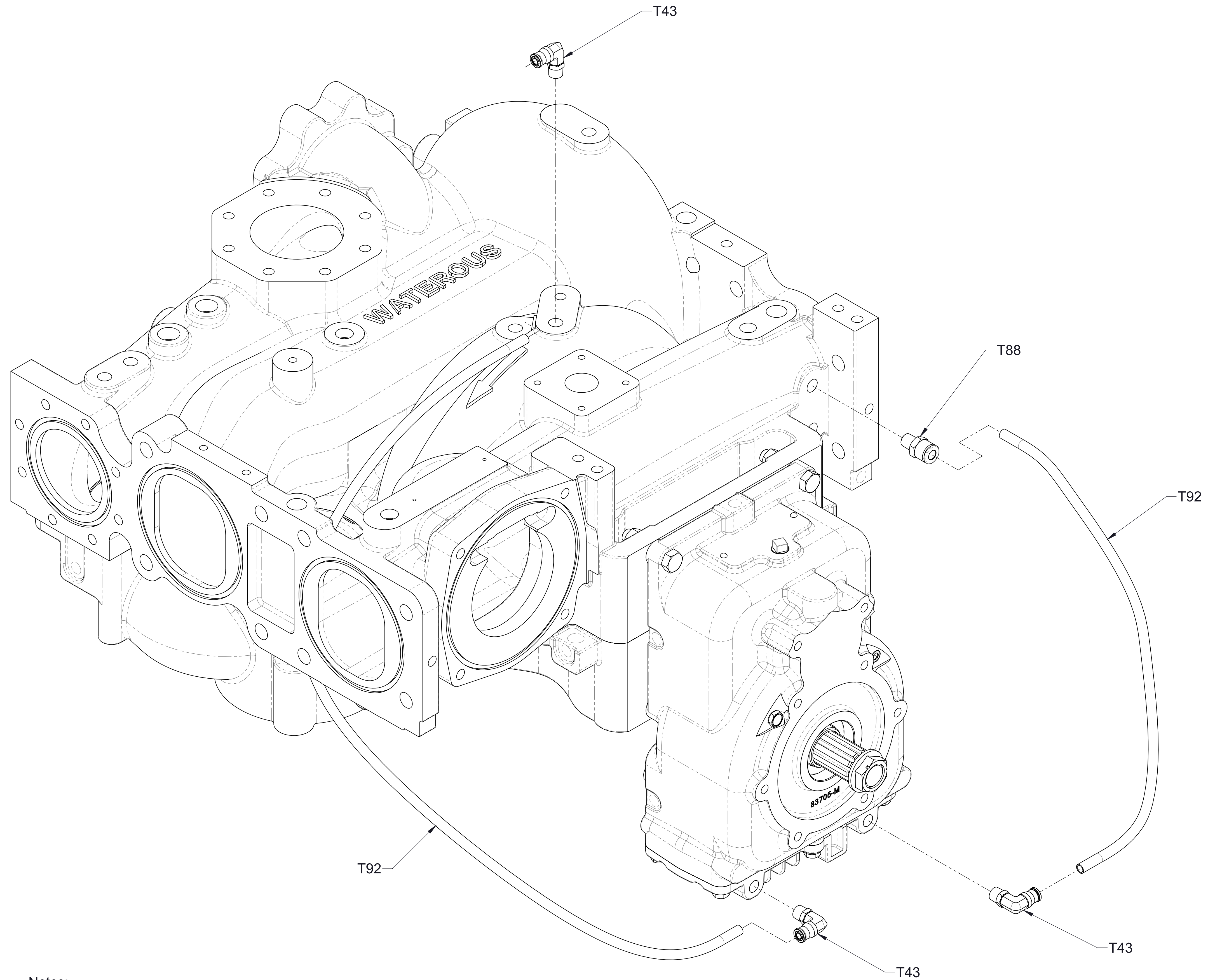
| Ref No. | Description |
|---------|--|
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |
| T88 | Adapter-3/8 PTC x 1/4 MNPT |
| T90 | Adapter-Straight 3/8 PTC x 1/2 MNPT |
| T92 | Tube-Air Brake |
| T94 | Bushing-Reducing, 1 MNPT x 1/4 FNPT |
| T95 | Nipple 8x3in |
| T96 | COUPLING-PIPE, 1/2 FNPT |
| T97 | ELBOW-STREET, 45° X 1/2 NPT |



- Notes:
1. CW input and vertical transmission shown.
 2. Tubing to be cut to required length depending on input rotation and transmission orientation.
 3. Route hoses so water drains either through pump or oil cooler
 4. Cooler lines feeding into oil cooler may be swapped for a better hose routing in certain configurations.

**Oil Cooler Lines and Fittings
HL400 with Short Intake Fitting**

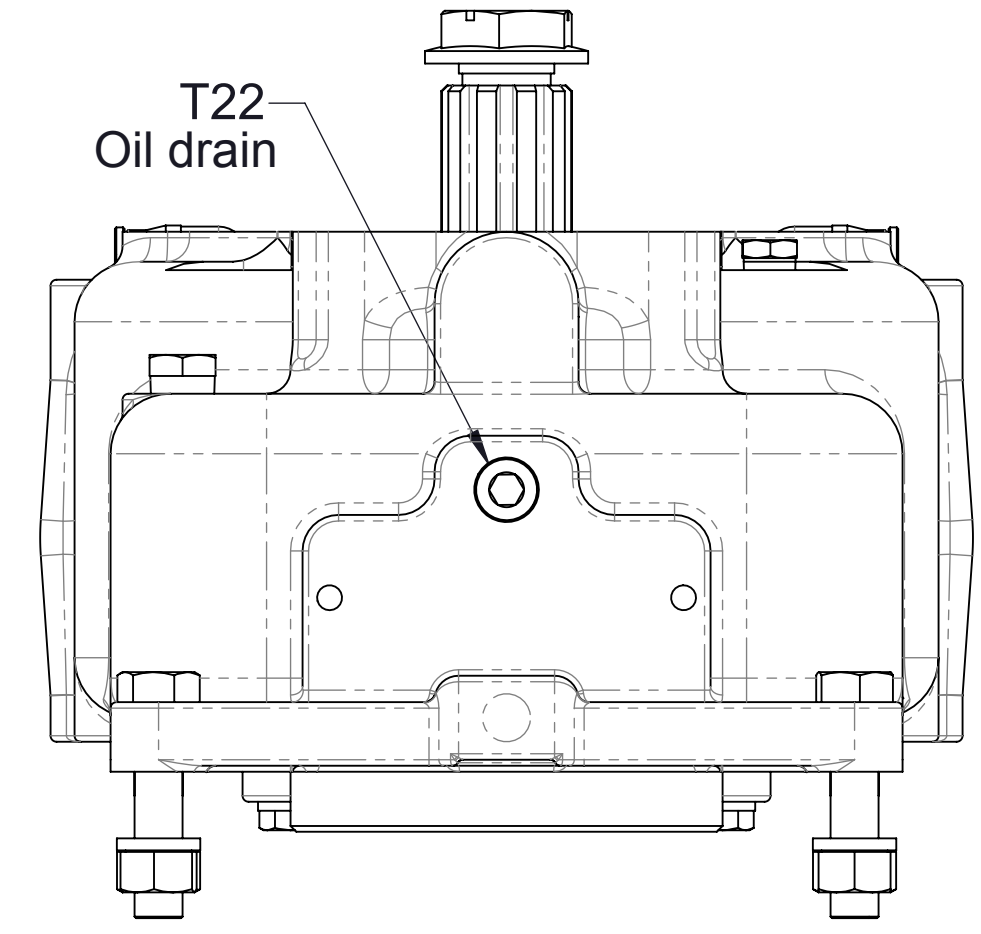
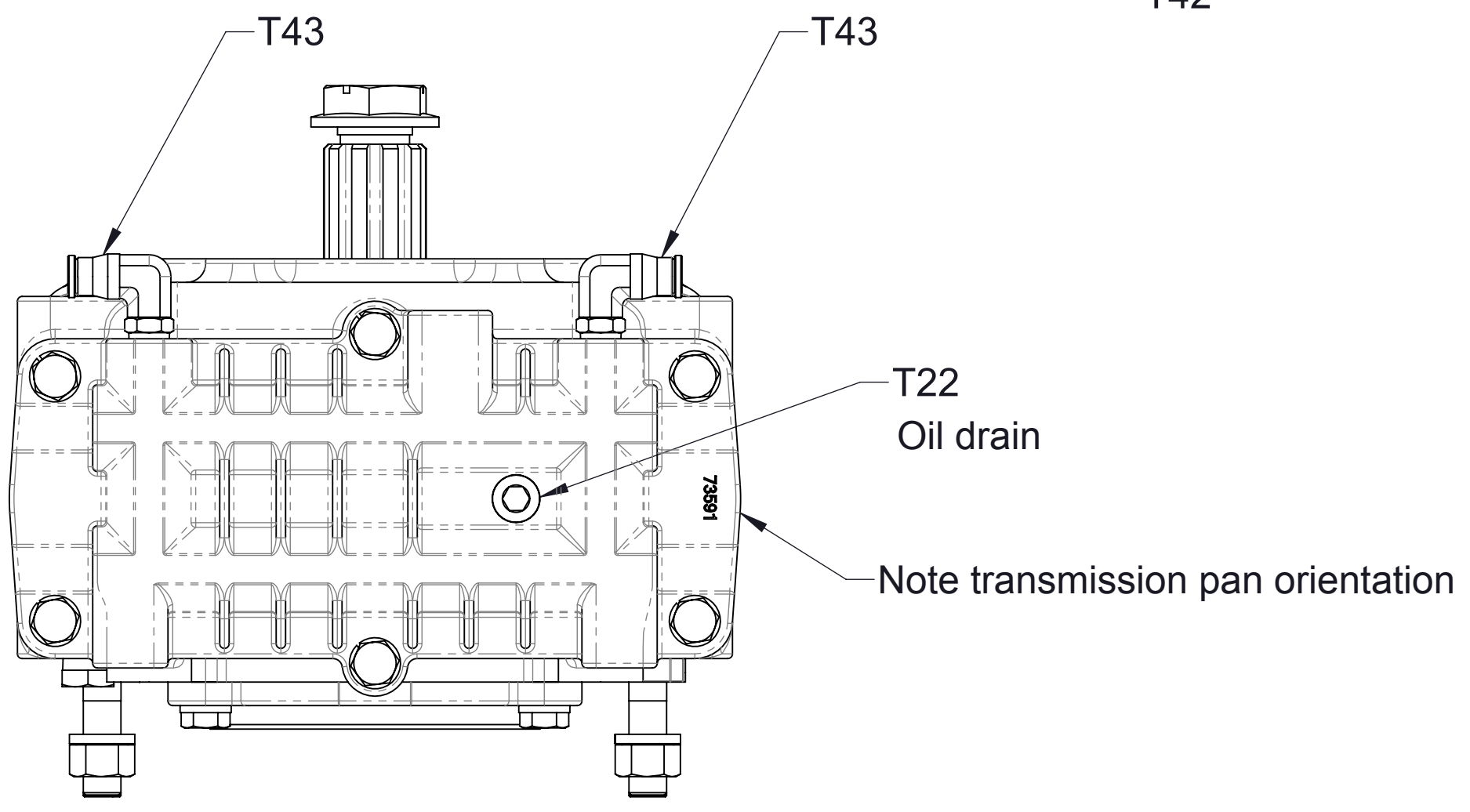
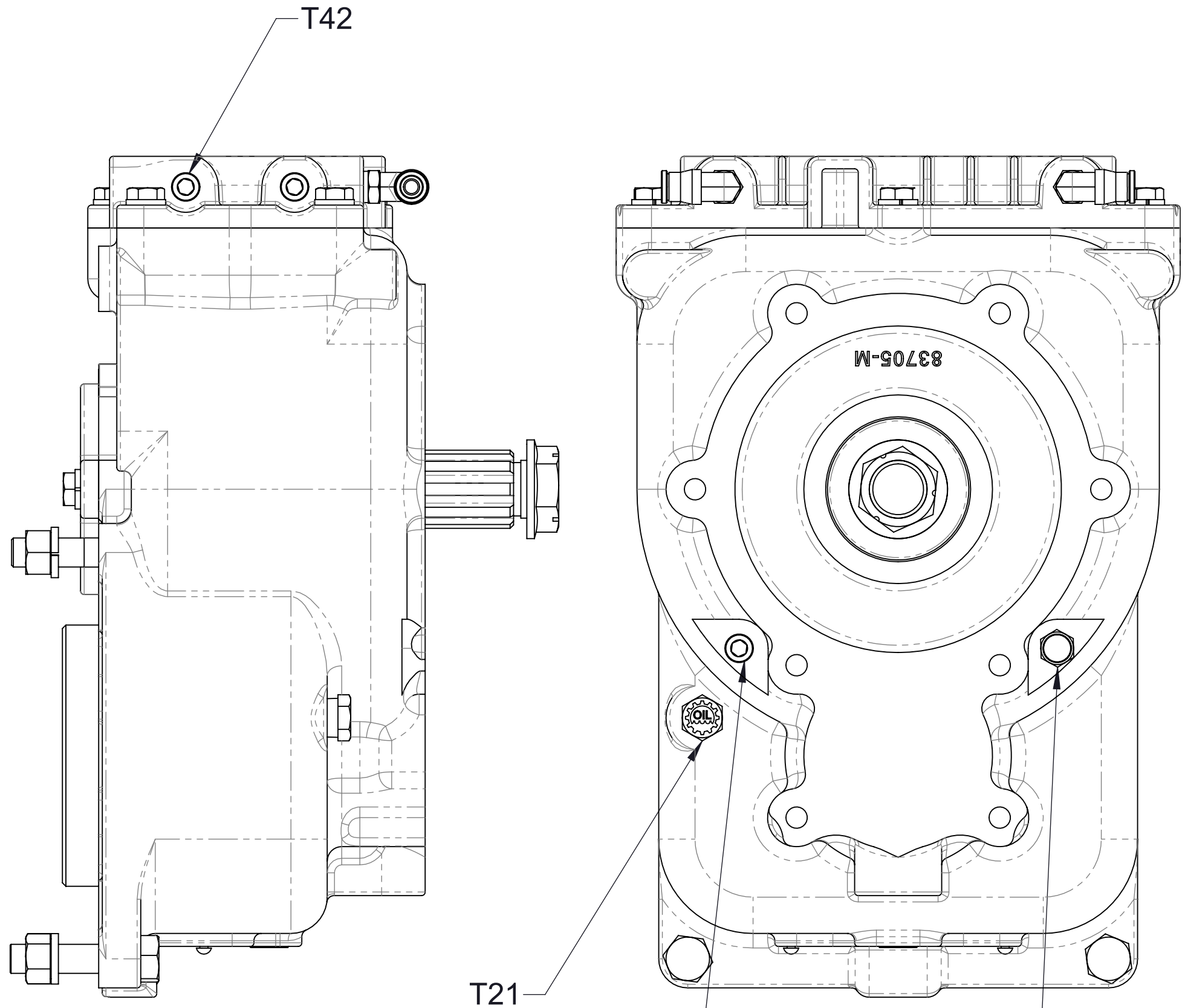
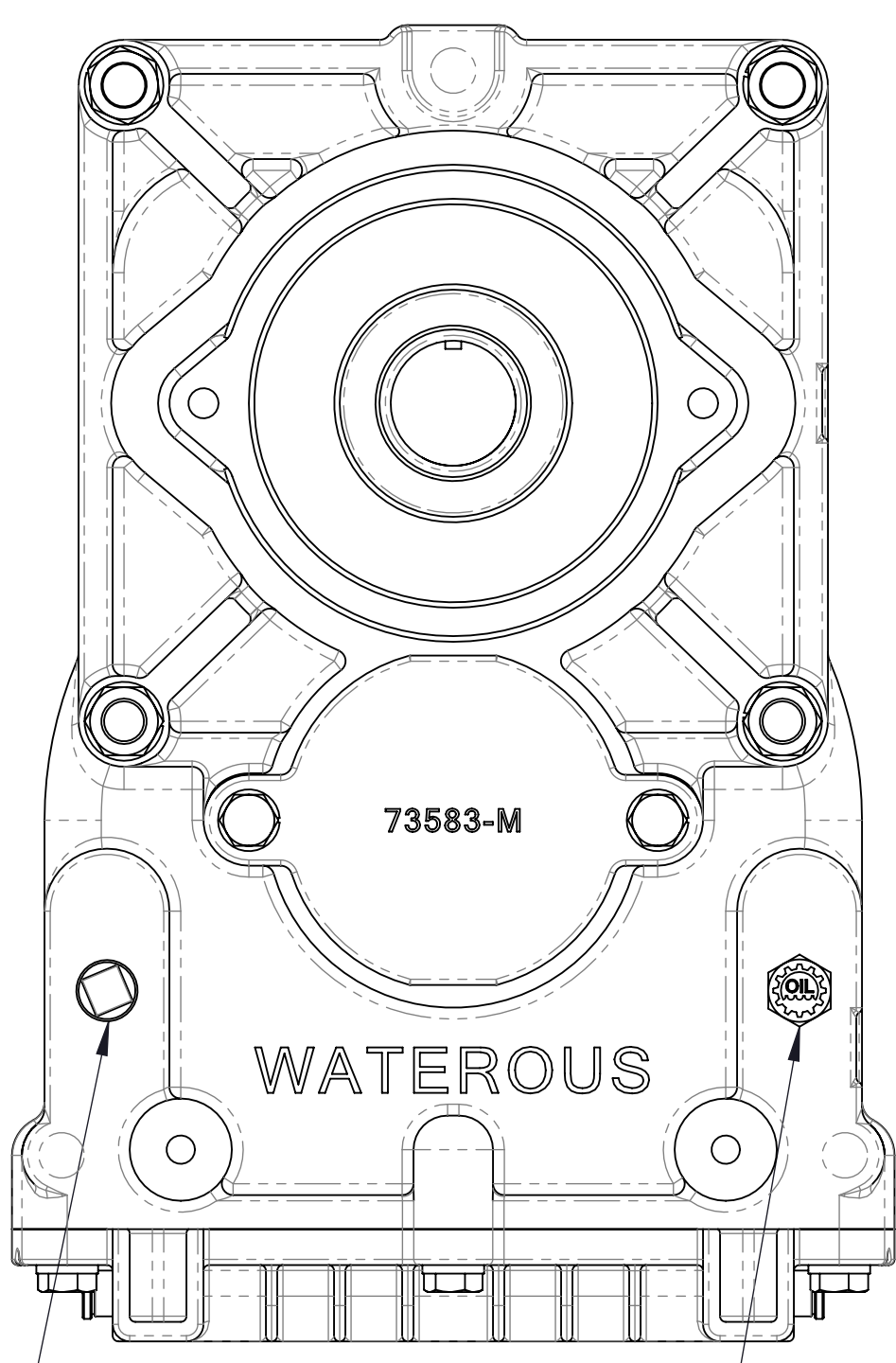
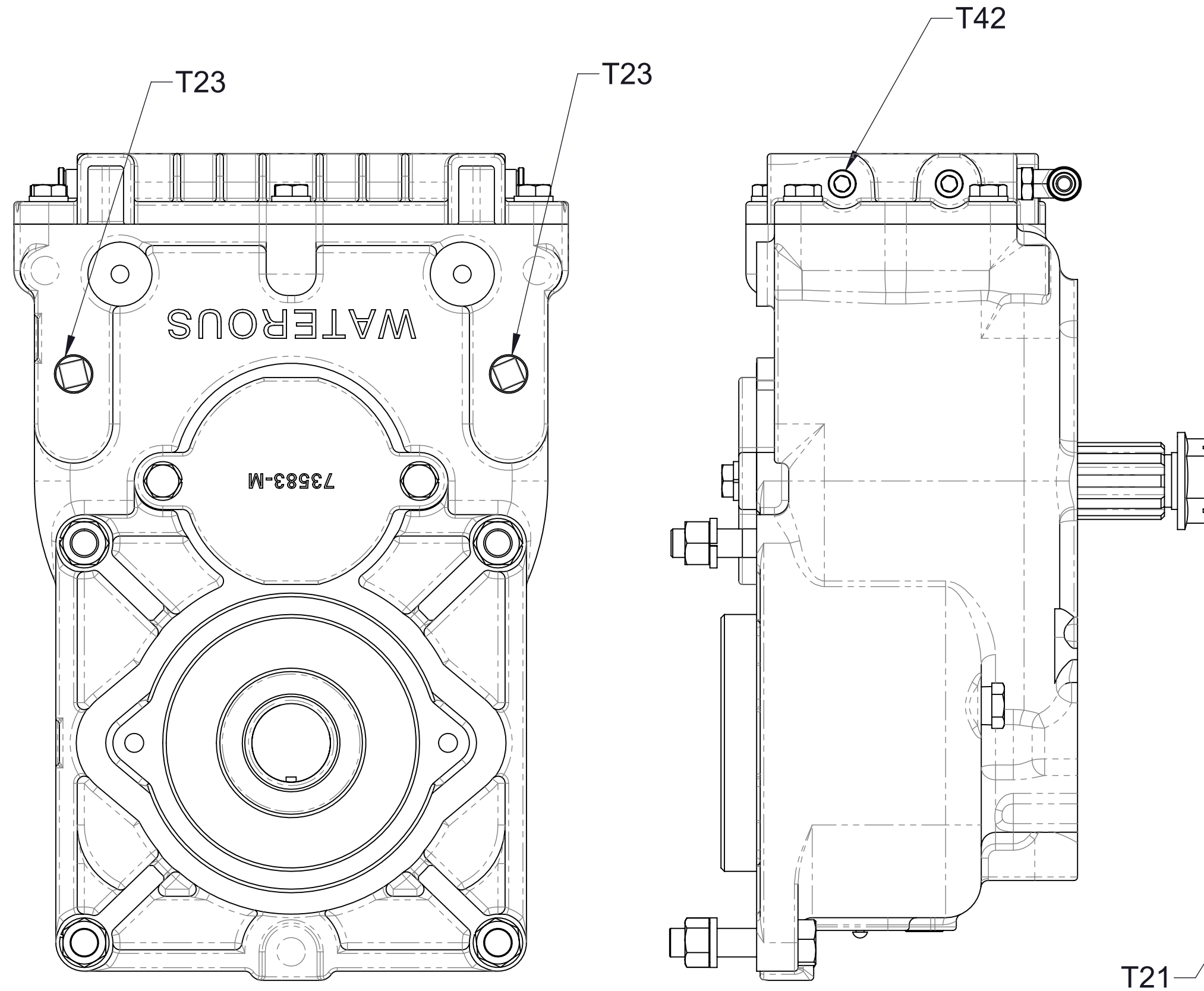
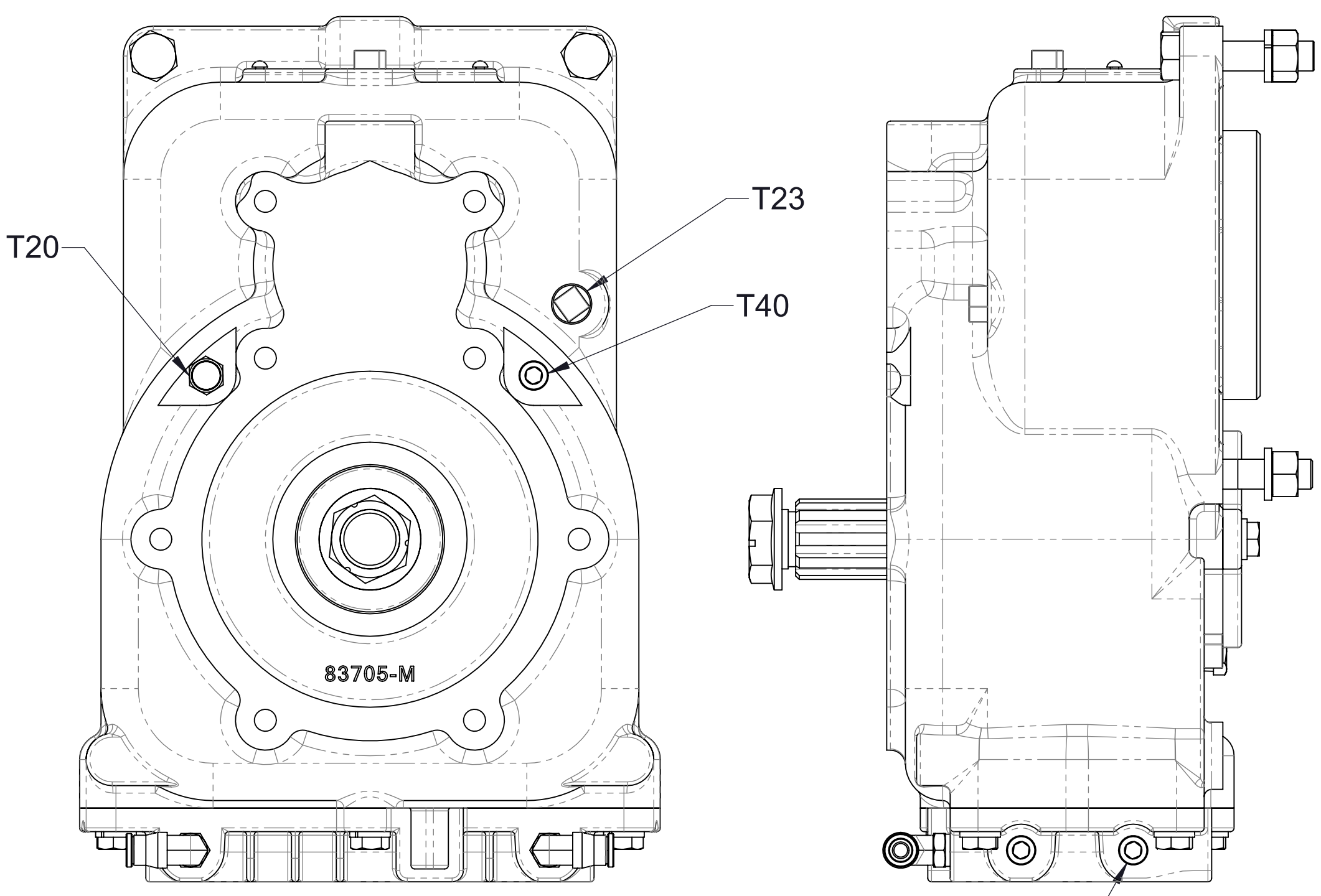
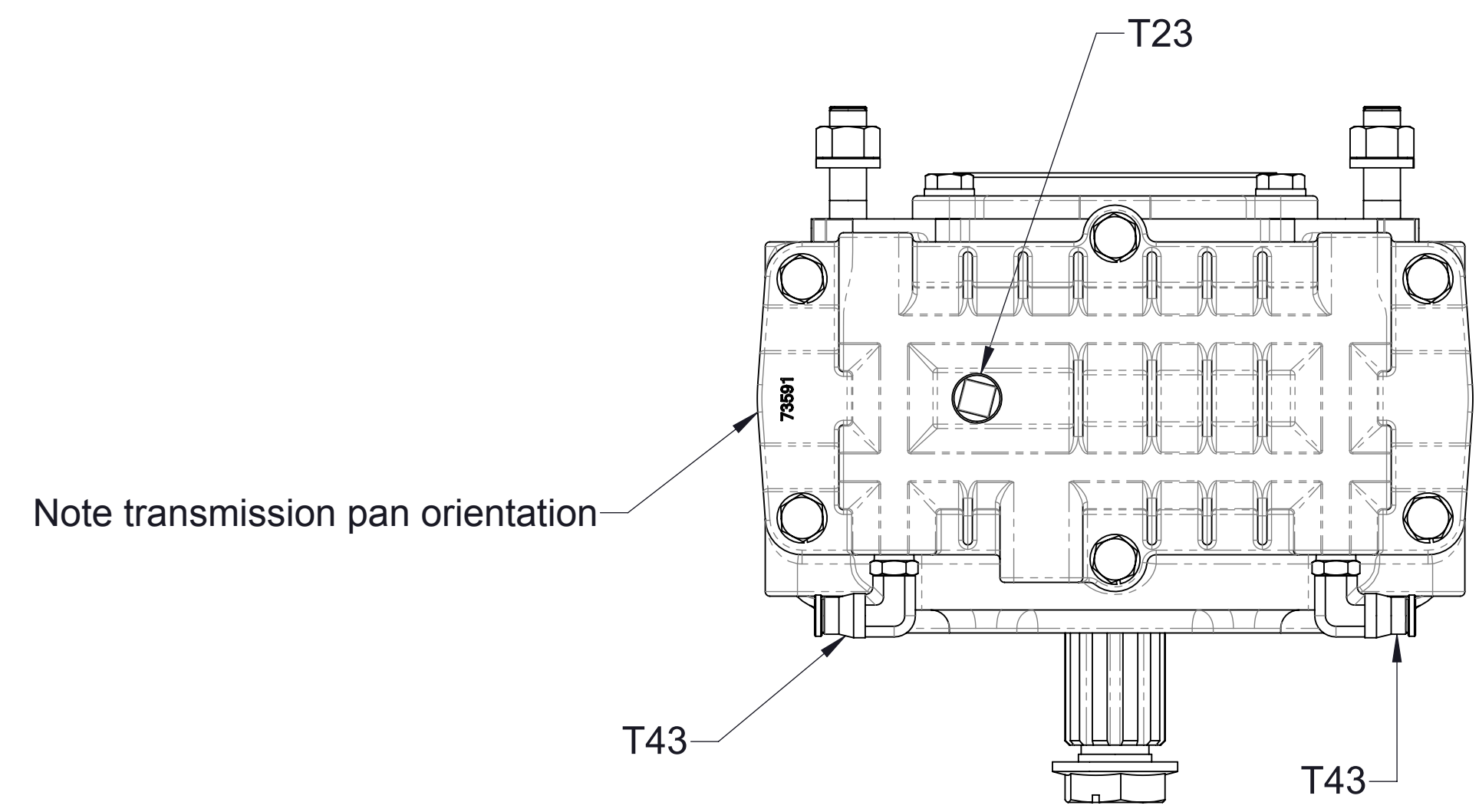
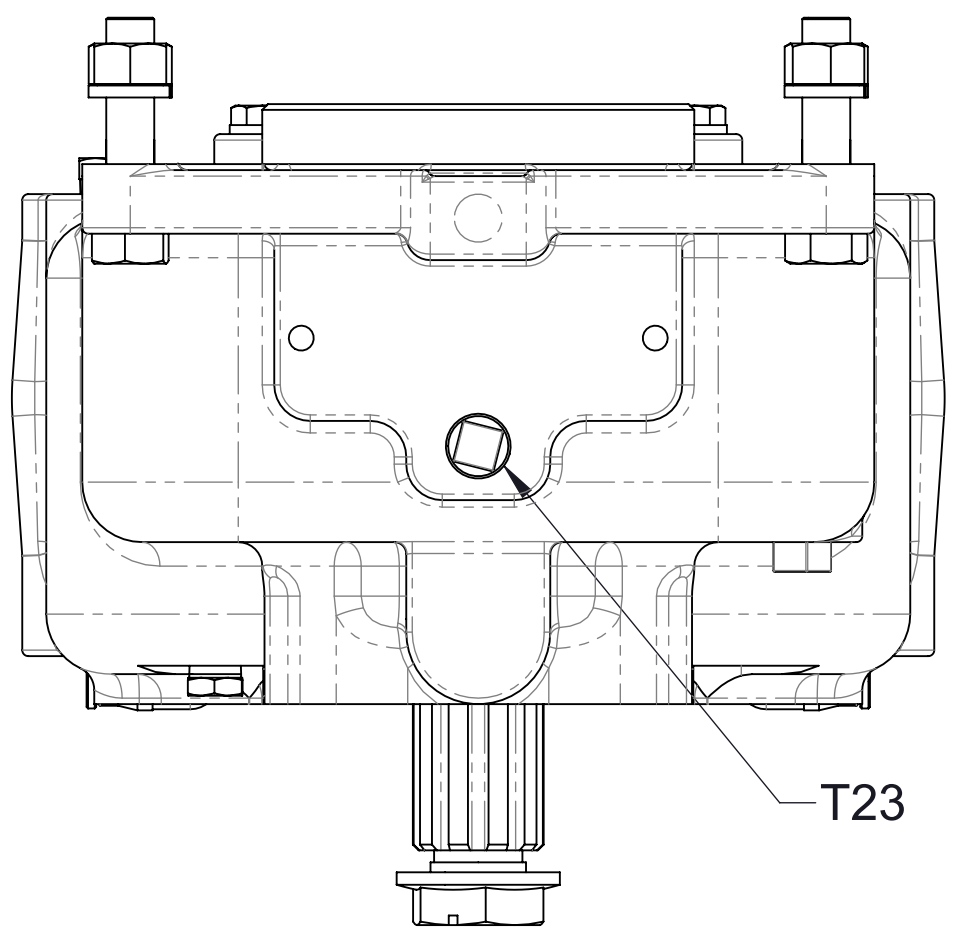
| Ref No. | Description |
|---------|--|
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |
| T88 | Adapter-3/8 PTC x 1/4 MNPT |
| T92 | Tubing, 3/8, Green |



- Notes:
1. Tubing to be cut to required length.
 2. Route hoses so water drains either through pump or oil cooler

**Oil Cooler Lines and Fittings
CM, CS**

| Ref No. | Description |
|---------|--|
| T20 | Breather, 1/4 NPT |
| T21 | Plug-Level, Oil, 3/8 |
| T22 | Plug-Drain, Magnetic, 3/8, Headless |
| T23 | Plug-Pipe, Square Hd, 3/8 NPT |
| T40 | Plug-Pipe, Headless, 1/4 NPT |
| T42 | Plug-Pipe, Headless, 1/4 NPT |
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |

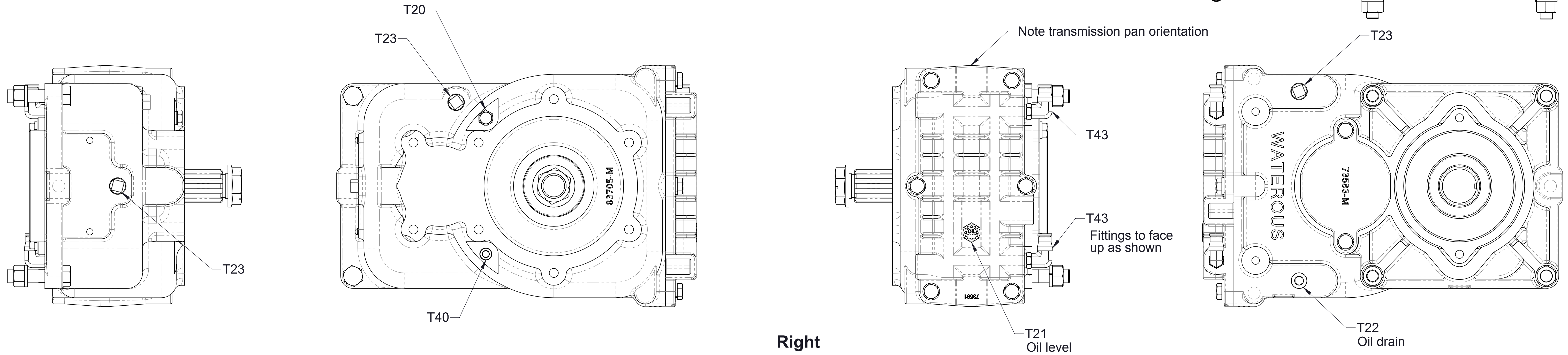


Vertical

Inverted

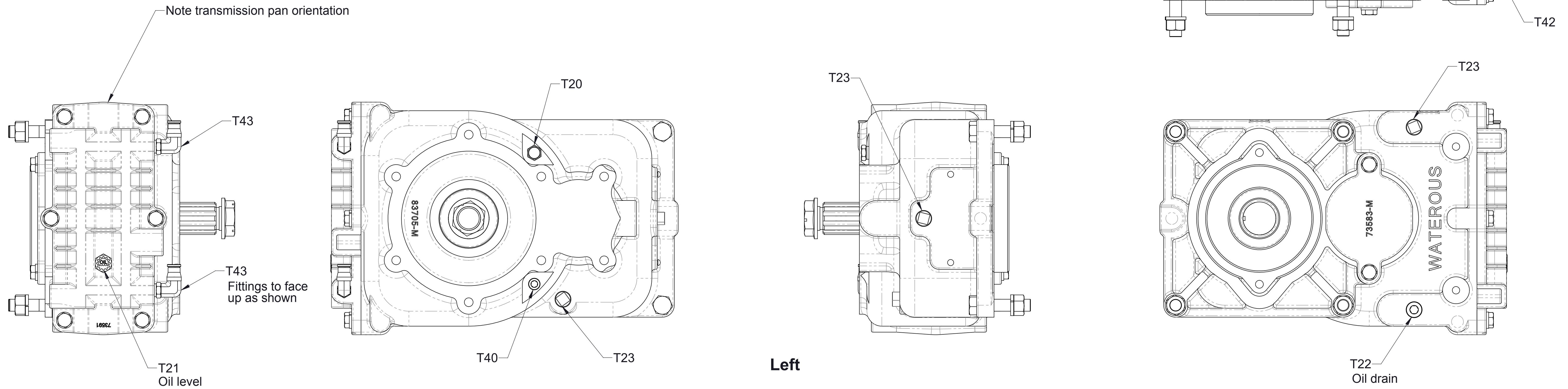
Breather, Drain, Oil Level, Plug, and Cooler Elbow Locations
Vertical and Inverted Mounting Positions

| Ref No. | Description |
|---------|--|
| T20 | Breather, 1/4 NPT |
| T21 | Plug-Level, Oil, 3/8 |
| T22 | Plug-Drain, Magnetic, 3/8, Headless |
| T23 | Plug-Pipe, Square Hd, 3/8 NPT |
| T40 | Plug-Pipe, Headless, 1/4 NPT |
| T42 | Plug-Pipe, Headless, 1/4 NPT |
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |



Right

| Ref No. | Description |
|---------|--|
| T20 | Breather, 1/4 NPT |
| T21 | Plug-Level, Oil, 3/8 |
| T22 | Plug-Drain, Magnetic, 3/8, Headless |
| T23 | Plug-Pipe, Square Hd, 3/8 NPT |
| T40 | Plug-Pipe, Headless, 1/4 NPT |
| T42 | Plug-Pipe, Headless, 1/4 NPT |
| T43 | Fitting-Elbow, 3/8 PTC x 1/4 MNPT, 90° |



Left

Breather, Drain, Oil Level, Plug, and Cooler Elbow Locations
Vertical and Inverted Mounting Positions