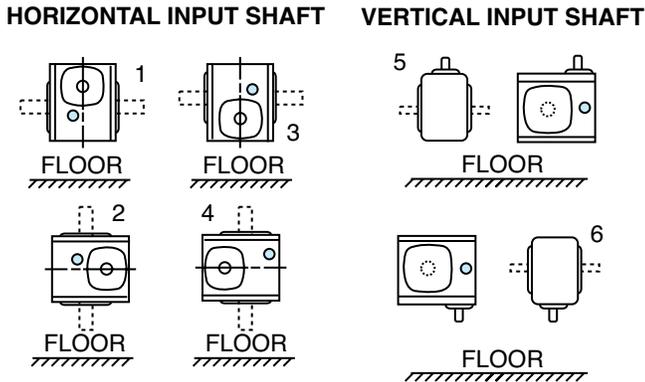


# Oil Capacities

## Single Reduction Models Only

### Oil Levels for typical mounting positions



Double input seals are recommended for mounting positions 2,3,4,6 for the longest seal life. See catalog nomenclature on pages 28 and 30 for the “T” designation required for double input seals.

**CAUTION** Avoiding those positions where the high speed oil seal is immersed in oil will provide greater security against high speed input seal wear.

### Cast Iron Oil Capacity in Fluid Ounces

Unit Size	Positions				
	1	2	3	4	5 & 6
710	2.2	3.3	3.3	3.3	3.3
713	5.5	7.0	7.0	7.0	5.5
715	10.0	15.0	15.0	15.0	13.5
718	12.0	16.0	18.5	16.0	16.0
721	15.0	20.5	20.5	20.5	19.0
724	18.0	24.5	28.5	24.5	24.5
726	28.0	36.0	43.0	36.0	36.0
730	44.0	60.0	67.0	60.0	60.0
732	58.0	84.0	90.0	84.0	80.0
738	85.0	120.0	130.0	120.0	107.0
752	204.0	240.0	245.0	240.0	215.0
760	330.0	400.0	415.0	400.0	370.0

### Stainless Steel Oil Capacity in Fluid Ounces

Unit Size	Positions				
	1	2	3	4	5 & 6
713	3.2	3.2	4.8	3.2	3.2
715	11.2	13.6	17.6	13.6	13.6
718	14.4	17.6	20.8	17.6	17.6
721	17.6	20.8	22.4	20.8	20.8
724	21.0	22.5	25.5	22.5	22.5
726	37.0	37.0	41.5	37.0	37.0
732	81.5	85.0	93.0	85.0	85.0

## Double Reduction Models

The variety of mounting possibilities for double reduction drives makes it impractical to illustrate all mounting positions for these models. The common positions are found on page 6. In general, the vent filler is at the uppermost plug position, and the drain plug at the lowest possible position. The oil level must be at the approximate centerline of both gearboxes. In non stainless steel gearboxes the oil will flow between both gearboxes, so if one gearbox is above the other the lower gearbox must be 100% full. See pages 6 and 7 for more information on the proper lubrication level for each standard mounting position.

## Recommended Lubricants

### Enclosed Worm Gear Reducers

Recommended Oil (or equivalent)	Viscosity Range SUS @ 100°F	Oil Type	ISO Viscosity Grade No. +
Klubersynth* UH1 6-460 Synthetic	1950/2500	PAG	460
Mobil SHC634 Synthetic	1950/2500	PAO	320/460

Ambient temperature range of -20F to +125F is suitable for standard configured products and ratings. Contact technical support for operating conditions beyond this range.

### Worm Gear Lubricants Available from Boston Gear

#### Order By Item Code

Type	Klubersynth	Mobil SHC634	
		QT.	Gallon
Size	QT.	QT.	Gallon
Item Code	65159	51493	51494

**CAUTION** Relubricate more frequently if drive operated in high ambient temperatures or unusually contaminated atmosphere. High loads and operating temperatures will also require more frequent lubrication.

\*Food Grade Synthetic recommendation is exclusively for Klubersynth UH1 6-460.

+Other lubricants corresponding to AGMA/ISO numbers are available from all major oil companies.

\*\*The synthetic lubricant will perform at temperatures considerably higher than 175°F. However, the factory should always be consulted prior to operating at higher temperatures as damage may occur to oil seals and other components.

## Lubricant Interchange

Lubricants are compounded for use in worm gears. Some contain non-corrosive, extreme pressure additives. **DO NOT USE** lubes that contain sulphur and/or chlorine which are corrosive to bronze gears. Extreme pressure lubes, in some cases contain materials that are toxic. Avoid use of these lubes where they can result in harmful effects. If in doubt, consult your lube supplier.

Manufacturer	Lubricant Name	AGMA Rating
Getty Refining Co.	Veedol Asreslube 98	8 EP
Getty Refining Co.	Veedol Asreslube 95	7 EP
Getty Refining Co.	Veedol Asreslube 90	6 EP
Lubrication Engr. Inc.	Almasol 609	8
Lubrication Engr. Inc.	Almasol 608	7
Mobil Oil Corp.	Mobilgear 634	8 EP
Mobil Oil Corp.	Mobil Extra Hecla Super	8
Mobil Oil Corp.	Mobil Cylinder 600W	7
Shell Oil Co.	Omala 460	7 EP
Shell Oil Co.	Valvala J460	7
Shell Oil Co.	Omala 680	8 EP
Shell Oil Co.	Valvala J680	8
Texaco Inc.	Meropa 680	8 EP
Texaco Inc.	Meropa 460	7 EP

## PosiVent® Option

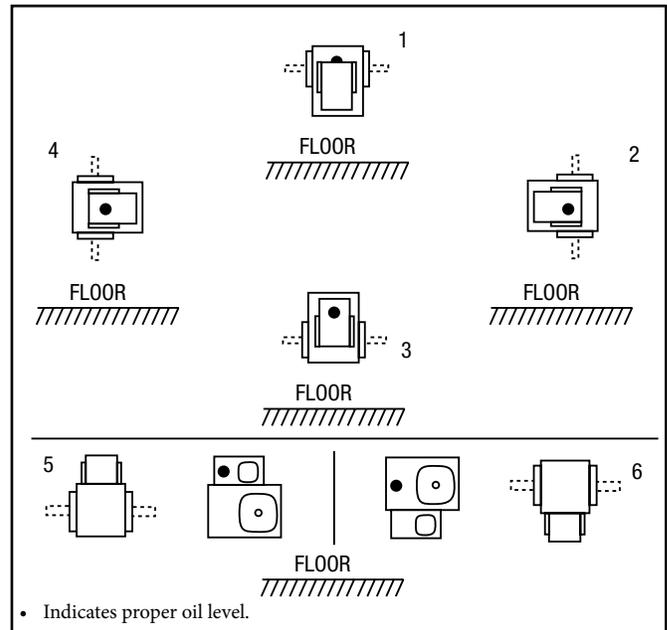
Units supplied with this option are sealed from the environment.

To ensure that the system operates properly, **DO NOT REMOVE THE VENT PLUG FOR ANY REASON.**

## Oil Level/ Mounting Positions

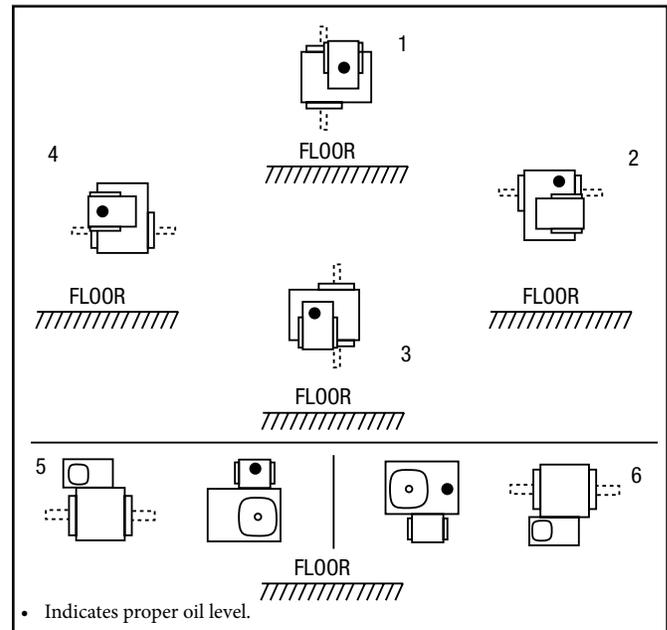
### SFWA700 Series

#### Oil Level/Mounting Position Chart



### SFWC700 Series

#### Oil Level/Mounting Position Chart



### CAUTION

When ordering speed reducers pre-lubricated, the Mounting Position must be indicated to ensure proper oil level.

## Lubrication Ports

The gearbox lubrication level is critical for gearbox performance. Once the gearbox part number and mounting position have been identified the port guide below will help achieve the proper lubrication level.

### Single Reduction

		Mounting Position					
Port	Port Location	1	2	3	4	5	6
Port A	G-side	Fill/Vent	Fill/Vent	Oil Drain	Oil Drain	Oil Level	Oil Level
Port B	Motor-side	Oil Drain	-	Fill/Vent	Oil Level	Fill/Vent	Oil Drain
Port C	J-side	Fill/Vent	Oil Drain	Oil Drain	Fill/Vent	Oil Level	Oil Level
Port D	Nameplate-side	Oil Level	Oil Level	Oil Level	-	Oil Drain	Fill/Vent

### Double Reduction for WA/WB (Parallel Input and Output)

		Mounting Position						
Port	Port Location	1	2	3	4	5	6	
Secondary (Large)	Port A	G-side	Oil Drain	Oil Drain	Fill #2/Vent	Fill #2/Vent	-	Oil Level
	Port B	Motor-side	Fill #2/Vent	Oil Level	Oil Drain	-	Fill #1	Oil Drain
	Port C	J-side	Oil Drain	Fill #2/Vent	Fill #2/Vent	Oil Drain	-	Oil Level
	Port D	Nameplate-side	Oil Level	-	-	Oil Level	Oil Drain	Fill #2/Vent
Prefix (Small)	Port E	Top	Fill #1	Fill #1	Oil Drain	-	Oil Level	-
	Port F	Cover side	-	-	Oil Level	-	Fill #2/Vent	Oil Drain
	Port G	Bottom	Oil Drain	-	Fill #1/Vent	Fill #1	-	Fill #1

### Double Reduction for WC/WD (Perpendicular Input and Output)

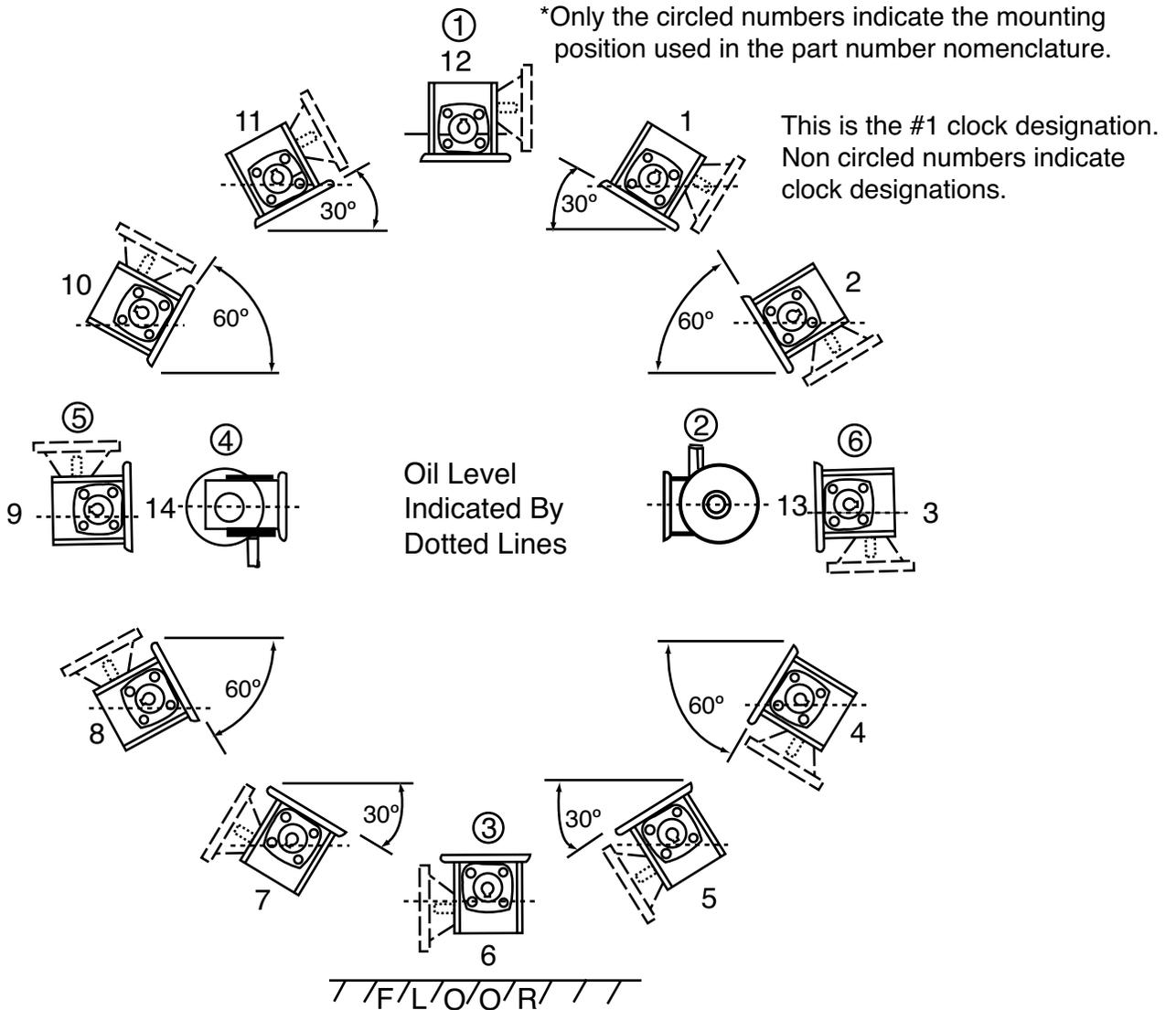
		Mounting Position						
Port	Port Location	1	2	3	4	5	6	
Secondary (Large)	Port A	G-side	-	Oil Drain	Oil Drain	Fill #1/Vent	-	Oil Level
	Port B	Motor-side	Fill #2/Vent	Fill #2/Vent	Oil Level	Oil Drain	Fill #1	Oil Drain
	Port C	J-side	Oil Drain	Oil Drain	Fill #2/Vent	Fill #1/Vent	-	Oil Level
	Port D	Nameplate-side	Oil Level	Oil Level	-	-	Oil Drain	Fill #2/Vent
Prefix (Small)	Port A	Top	Fill #1/Vent	Fill #1	Oil Drain	Oil Drain	Level	-
	Port B	Cover side	-	-	-	Oil Level	Fill #2/Vent	Oil Drain
	Port C	Bottom	Oil Drain	Oil Drain	Fill #1	Fill #2	-	Fill #1

#### Notes:

- Oil Drain** Plugged from factory. Port used during regular maintenance intervals for draining used oil. Re-plug prior to oil-fill. There may be more than one Drain port.
- Oil Level** Plugged from factory. Port used during regular maintenance intervals. Defines recommended oil-level during operation for both gear housings.
- Vent** Plugged from factory except when Reducer is shipped Dry. Port used during regular maintenance intervals to fill Reducer with new oil after draining. Defines optional location for installation of a blue pressure vent, that is supplied uninstalled with each Reducer.
- Fill #1** Add lubrication via this port first
- Fill #2** Add lubrication via this port second

For stainless steel double reduction reducer, fill each reducer independently using the single reduction guidelines for each.

# Lubrication Instructions for Non-Standard Mounting Positions



**For Single Reduction Cast Iron Units Only: Refer To Lubrication & Installation Instructions**  
**Please note the clock designations (1 through 12) do not correlate with the part number nomenclature.**

		Unit Size											
Oil Capacity In Ounces	Clock Designation	710	713	715	718	721	724	726	730	732	738	752	760
	1	3.00	6.37	9.30	12.85	14.04	16.97	28.50	42.60	56.80	71.60	162.0	255.7
	2	3.30	7.16	9.25	15.04	16.81	19.93	32.00	50.00	67.30	79.70	195.2	265.9
	3	3.30	5.50	13.50	16.00	19.00	24.50	36.00	60.00	80.00	107.0	215.0	370.0
	4	3.55	7.98	12.06	18.00	20.28	24.95	37.70	57.00	77.10	102.0	209.5	321.7
	5	3.98	8.18	12.30	18.69	21.45	26.95	40.00	60.40	80.90	106.7	192.0	357.0
	6	3.30	7.00	15.00	18.50	20.50	28.50	43.00	67.00	90.00	130.0	245.0	415.0
	7	3.98	8.18	12.30	18.69	21.45	26.95	40.00	60.40	80.90	106.7	192.0	357.0
	8	3.55	7.96	12.06	18.00	20.28	24.95	37.70	57.00	77.10	102.0	209.5	321.7
	9	3.30	5.50	13.50	16.00	19.00	24.50	36.00	60.00	80.00	107.0	215.0	370.0
	10	3.31	7.16	9.25	15.04	16.81	19.93	32.00	50.00	67.30	79.70	195.2	265.9
	11	3.00	6.37	9.30	12.85	14.04	16.97	28.50	42.60	56.80	71.60	162.0	255.7
	12	2.20	5.50	10.00	12.00	15.00	18.00	28.00	44.00	58.00	85.00	204.0	330.0
	13	3.30	7.00	15.00	16.00	20.00	24.50	36.00	60.00	84.00	120.0	240.0	400.0
14	3.30	7.00	13.50	16.00	19.00	24.50	36.00	60.00	80.00	120.0	240.0	400.0	