

WedgeRock RP

Planetary Gear Solutions

Features

- Compact
- Efficient drive train
- Patent pending self-locking technology
- Modular design accommodates multiple applications
 - Quarter Turn
 - Multi-turn
 - Rising stem
- Input shaft projection parallel or perpendicular to output
- Motorized and manual input options
- Splined drive sleeve
- Travel indication
- Great for subsea applications
- Application engineered



Purpose Engineered, Quality Manufactured, Performance Tested



WedgeRock RP

Manual or motorizable operator for quarter, multi-turn, & thrust applications.

Imperial

Planetary Operator Model	Torque Rating*	Max Bore*	Max Key Width W/ Bore*	Max Key Height W/ Bore*	Max Standard Flange*	Min Standard Flange*
	[In-Lbs]	[In]	[In]	[In]		
RP4	5,000	1.75	0.38	0.38	FA12	FA07
RP5	10,000	1.75	0.38	0.38	FA14	FA07
RP6	24,000	2.38	0.63	0.63	FA16	FA12
RP7	38,000	3.25	0.75	0.75	FA25	FA14
RP8	75,000	3.75	0.75	0.75	FA30	FA16
RP9	135,000	4.75	1.25	1.25	FA35	FA19
RP10	225,000	6.75	1.75	1.50	FA40	FA25
RP12	400,000	7.5	2.50	1.75	FA48	FA30
RP14	750,000	9	2.50	1.75	FA60	FA35
RP18	1,350,000	11	2.50	1.75	30" BCD	FA40
RP24	2,250,000	12	2.50	1.75	AS REQUIRED	
RP36	4,000,000	18	2.50	1.75	AS REQUIRED	

Metric

Planetary Operator Model	Torque Rating	Max Bore*	Max Key Width W/ Bore*	Max Key Height W/ Bore*	Max Standard Flange*	Min Standard Flange*
	[Nm]	[mm]	[mm]	[mm]		
RP4	565	44	10	10	F12	F07
RP5	1,130	44	10	10	F14	F07
RP6	2,712	60	16	16	F16	F12
RP7	4,294	83	19	19	F25	F14
RP8	8,475	95	19	19	F30	F16
RP9	15,254	121	32	32	F35	F19
RP10	25,424	171	44	38	F40	F25
RP12	45,198	191	64	44	F48	F30
RP14	84,746	229	64	44	F60	F35
RP18	152,542	279	64	44	760mm BCD	F40
RP24	254,216	305	64	44	AS REQUIRED	
RP36	451,939	457	64	44	AS REQUIRED	

*Dimensions are subject to change

Flange sizes outside of the standard range can be accommodated

The WedgeRock RP allows for modular configurations. If a parallel input vs output is required, only planetary ratios need to be selected. If a perpendicular input vs output is required, or if the RP is being used in a rising stem application, a bevel must be selected. Each frame size can support up to two ratios. When the max ratio of one frame size is exceeded, another RP is sized and mounted in series to add ratio as required.

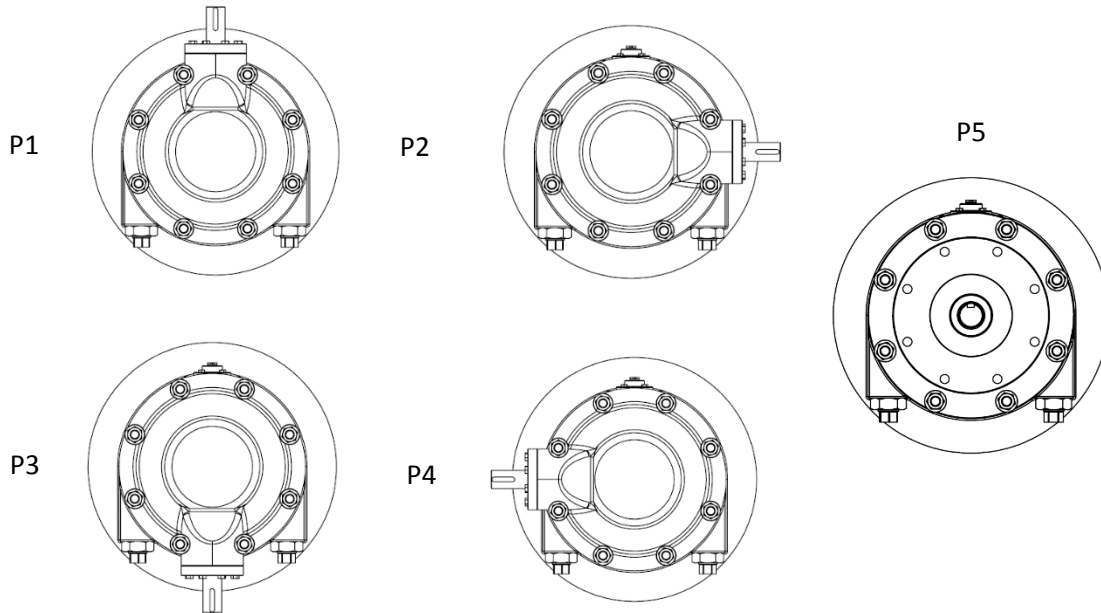
Standard Ratio Selection

RP4		RP5 - RP7		RP8 & UP	
Ratio	MA [$\pm 10\%$]	Ratio	MA [$\pm 10\%$]	Ratio	MA [$\pm 10\%$]
2.50	2.38	2.50	2.38	2.50	2.38
2.71	2.57	2.60	2.47	2.60	2.47
3.00	2.85	2.78	2.64	2.71	2.57
3.40	3.23	3.00	2.85	2.85	2.71
4.00	3.80	3.29	3.13	3.00	2.85
5.00	4.75	3.67	3.49	3.18	3.02
7.00	6.65	4.20	3.99	3.40	3.23
		5.00	4.75	3.67	3.49
		6.33	6.01	4.00	3.80
		9.00	8.55	4.43	4.21
				5.00	4.75
				5.80	5.51
				7.00	6.65
				9.00	8.55

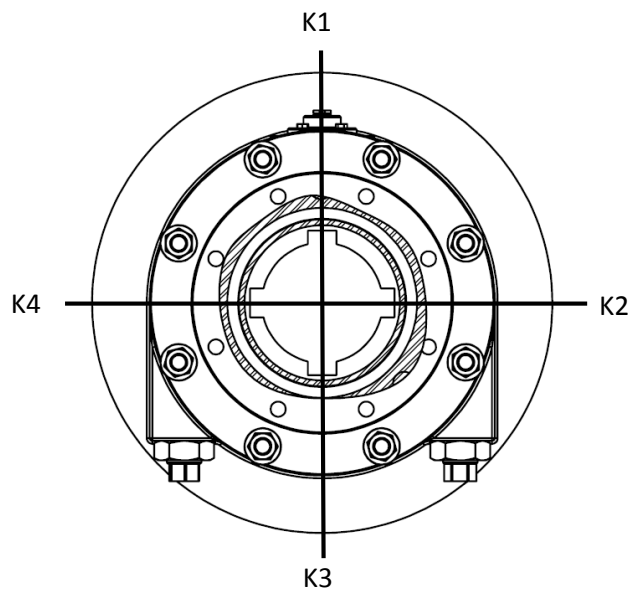
Base ratios capable of full model torque output rating. De-rate all other ratios by 2.5X.

Bevel	
Ratio	MA [$\pm 10\%$]
1.00	0.95
3.00	2.85

INPUT SHAFT PROJECTION



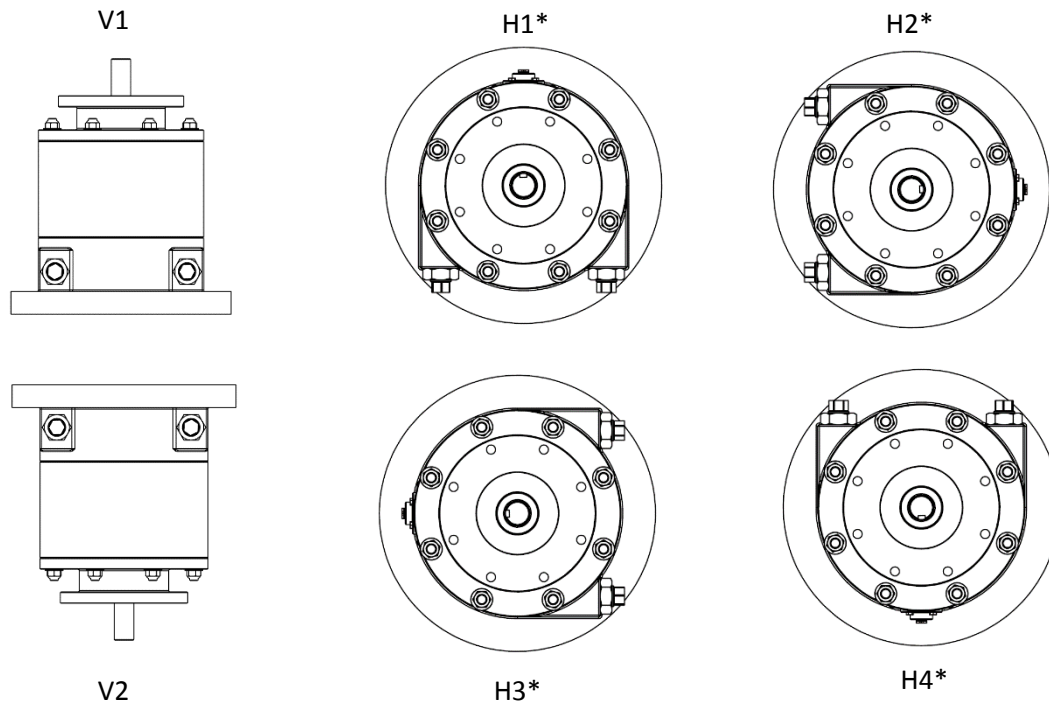
KEYWAY POSITION



TOP VIEW WITH QUADRANT IN FULLY CLOCKWISE CLOSED POSITION

GEARBOX ORIENTATION

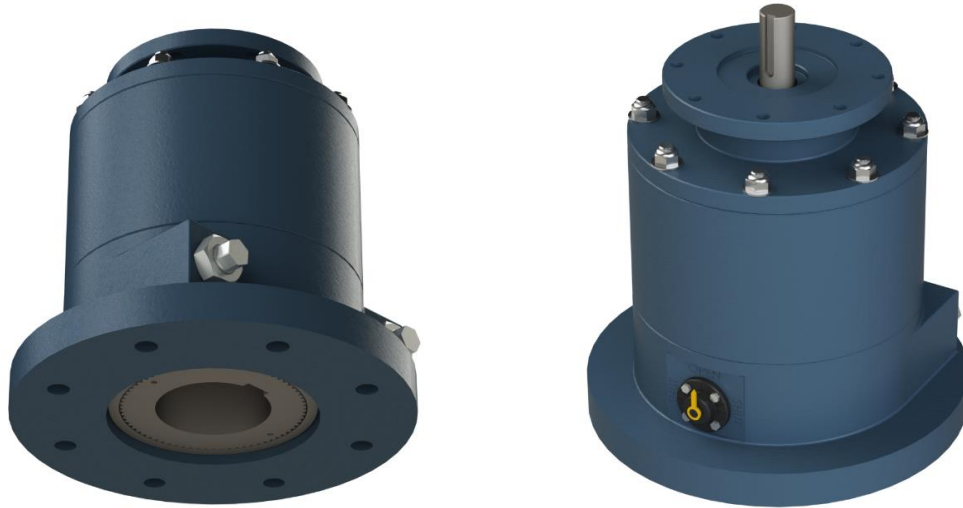
Gearbox orientation allows for proper configuration of gearbox for proper venting.



*Use V1, V2 or H for multi-turn applications

WedgeRock RPq

Quarter turn planetary gearbox can be configured with any available ratio offered. It comes with a base which houses indication and stops.



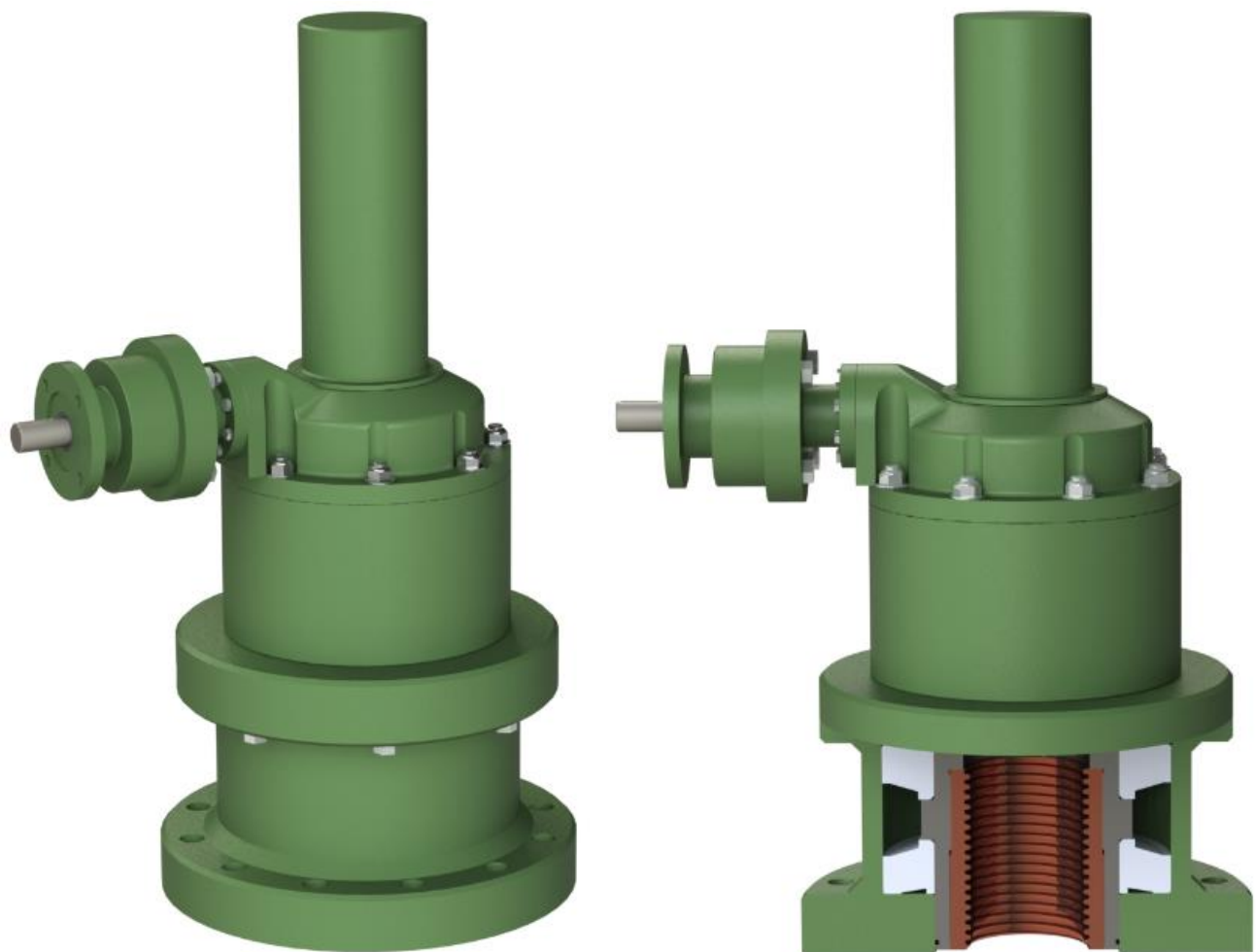
Motorized



Manual

WedgeRock RPt

Multi turn, thrust capable gearbox for rising stem applications must be configured with any planetary base ratio before a bevel gear is used. This will allow the stem to rise up through the gearbox. A bevel gear must be used in order to keep the rising stem from interfering with the input shaft. An RT thrust base is mounted to the bottom.



WedgeRock RPs

Subsea planetary gear offers a robust concentric design.

Features

- Many gear solutions and configurations available
- Engineered to meet API specifications
- Designed per project specifications
- Quick delivery
- Application engineered
- Super duplex input shafts
- Dual mechanical seals at all interfaces
- Compensation to any required depth
- Non compensated shallow subsea to 300 ft [100m]

