

Hub City™ HERA® High-Efficiency Right Angle Gear Drives

Selection Procedure

Ratings

SELECT BASIC MODEL

Using the rating chart below, select basic model and ratio based on application HP, service factor and output torque requirements (Please note color-coding for quick selection by motor HP). OR, if interchanging from competitor worm drive, use the interchange chart on back of this brochure to select the basic model.



Try the new HERA® Selector app for Android and iPhone.

Basic Model Quick Selection By Motor HP (1.0 Service Factor @ 1750 RPM Input)

Nom. Ratio	1/2	3/4	1	1-1/2	2	3	5	7-1/2	10	15	20
7/1	35	35	35	35	35	35	45	45	55		
10/1	35	35	35	35	35	45	45	55	55	75	75
15/1	35	35	35	35	35	45	45	55	75	75	
20/1	35	35	35	35	45	45	55	75	75		
30/1	35	35	35	45	45	55	75	75			
40/1	35	35	45	45	45	55	75				
50/1	35	45	45	45	55	75					
60/1	35	45	45	55	55	75					

Consult factory for high efficiency right angle drives suited for these power ratings.

HERA® Gear Drive POWER & TORQUE RATINGS (@ 1.0 Service Factor)

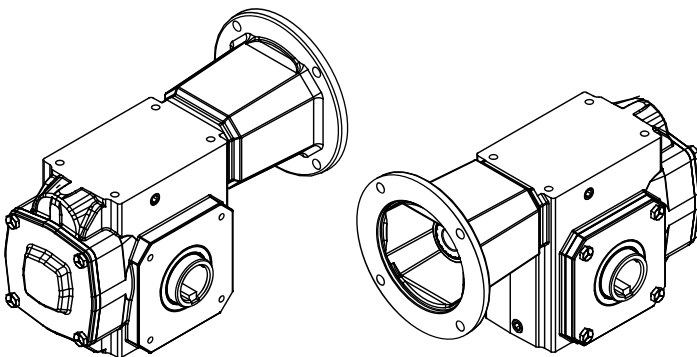
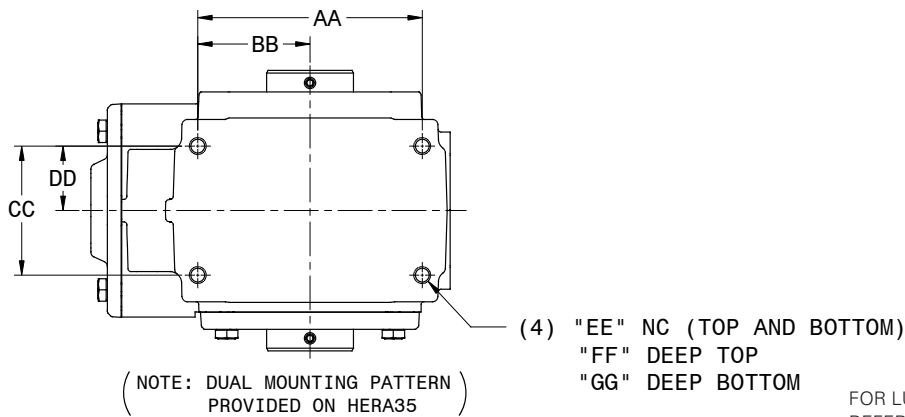
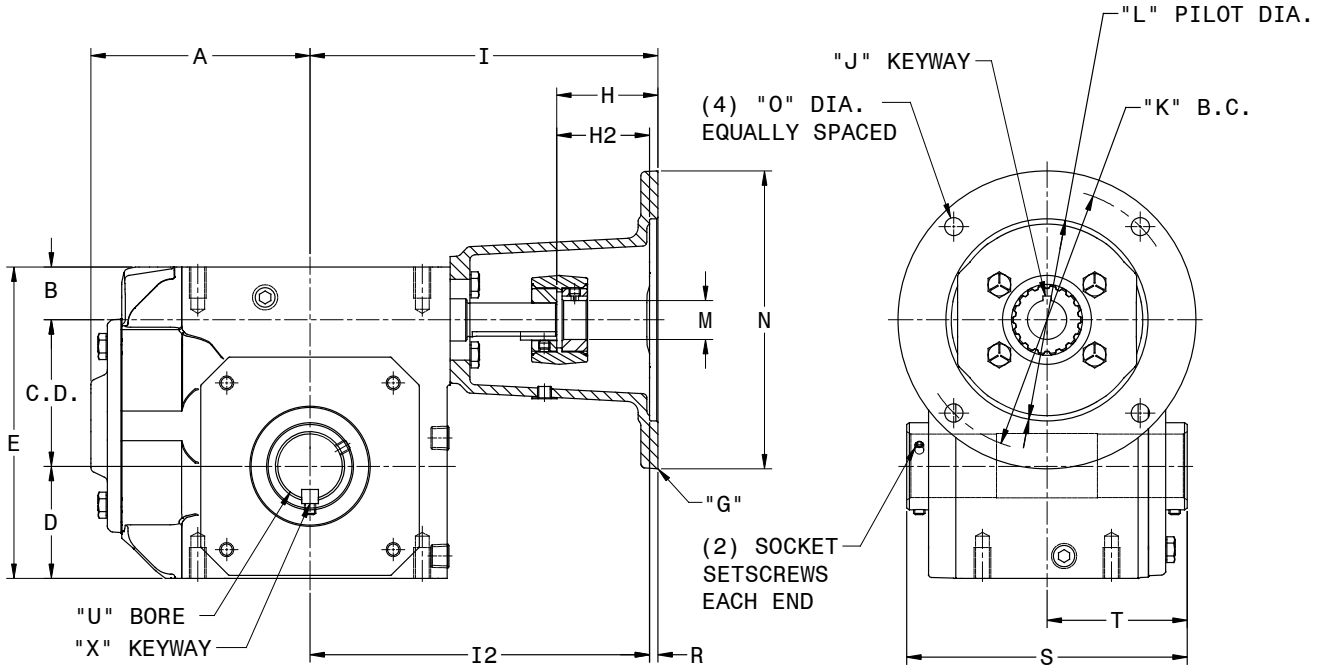
Nom. Ratio	INPUT RPM	Eff. (%)	HERA35			HERA45			HERA55			HERA75		
			Exact Ratio	Input HP	Output Torque (in. lbs.)	Exact Ratio	Input HP	Output Torque (in. lbs.)	Exact Ratio	Input HP	Output Torque (in. lbs.)	Exact Ratio	Input HP	Output Torque (in. lbs.)
7/1	2500	90	8.02	2.0	364	7.80	8.5	1504	7.94	13.0	2342	-	-	-
10/1	2500	90	11.42	2.0	518	11.36	7.5	1933	10.77	13.0	3177	9.58	18.0	3912
15/1	2500	90	15.60	2.0	708	15.60	7.0	2478	15.05	9.5	3244	15.05	15.0	5122
20/1	2500	90	19.93	2.0	905	19.50	5.9	2600	21.15	8.0	3839	21.15	13.0	6238
30/1	2500	90	29.10	1.7	1100	28.01	4.1	2600	30.14	6.6	4500	30.14	12.4	8500
40/1	2500	90	43.53	1.1	1100	39.98	2.9	2600	43.97	4.5	4500	37.33	10.0	8500
50/1	2500	90	52.50	0.9	1100	52.50	2.2	2600	53.03	3.7	4500	53.03	7.1	8500
60/1	2500	90	58.33	0.8	1100	59.79	1.9	2600	58.92	3.4	4500	58.92	6.4	8500
7/1	1750	90	8.02	4.2	1100	7.80	8.5	2149	7.94	13.0	3346	-	-	-
10/1	1750	90	11.42	3.0	1100	11.36	7.1	2600	10.77	13.0	4500	9.58	27.4	8500
15/1	1750	90	15.60	2.2	1100	15.60	5.1	2600	15.05	9.2	4500	15.05	17.4	8500
20/1	1750	90	19.93	1.7	1100	19.50	4.1	2600	21.15	6.6	4500	21.15	12.4	8500
30/1	1750	90	29.10	1.2	1100	28.01	2.9	2600	30.14	4.6	4500	30.14	8.7	8500
40/1	1750	90	43.53	0.8	1100	39.98	2.0	2600	43.97	3.2	4500	37.33	7.0	8500
50/1	1750	90	52.50	0.7	1100	52.50	1.5	2600	53.03	2.6	4500	53.03	5.0	8500
60/1	1750	90	58.33	0.6	1100	59.79	1.3	2600	58.92	2.4	4500	58.92	4.5	8500
7/1	1150	90	8.02	2.8	1100	7.80	6.8	2600	7.94	11.5	4500	-	-	-
10/1	1150	90	11.42	2.0	1100	11.36	4.6	2600	10.77	8.5	4500	9.58	18.0	8500
15/1	1150	90	15.60	1.4	1100	15.60	3.4	2600	15.05	6.1	4500	15.05	11.5	8500
20/1	1150	90	19.93	1.1	1100	19.50	2.70	2600	21.15	4.3	4500	21.15	8.2	8500
30/1	1150	90	29.10	0.8	1100	28.01	1.9	2600	30.14	3.0	4500	30.14	5.7	8500
40/1	1150	90	43.53	0.5	1100	39.98	1.3	2600	43.97	2.1	4500	37.33	4.6	8500
50/1	1150	90	52.50	0.4	1100	52.50	1.0	2600	53.03	1.7	4500	53.03	3.3	8500
60/1	1150	90	58.33	0.4	1100	59.79	0.9	2600	58.92	1.6	4500	58.92	2.9	8500
7/1	850	90	8.02	2.1	1100	7.80	5.0	2600	7.94	8.5	4500	-	-	-
10/1	850	90	11.42	1.4	1100	11.36	3.4	2600	10.77	6.3	4500	9.58	13.3	8500
15/1	850	90	15.60	1.1	1100	15.60	2.5	2600	15.05	4.5	4500	15.05	8.5	8500
20/1	850	90	19.93	0.8	1100	19.50	2.0	2600	21.15	3.2	4500	21.15	6.0	8500
30/1	850	90	29.10	0.6	1100	28.01	1.4	2600	30.14	2.2	4500	30.14	4.2	8500
40/1	850	90	43.53	0.4	1100	39.98	1.0	2600	43.97	1.5	4500	37.33	3.4	8500
50/1	850	90	52.50	0.3	1100	52.50	0.7	2600	53.03	1.3	4500	53.03	2.4	8500
60/1	850	90	58.33	0.3	1100	59.79	0.7	2600	58.92	1.1	4500	58.92	2.2	8500
7/1	100	90	8.02	0.2	1100	7.80	0.6	2600	7.94	1.0	4500	-	-	-
10/1	100	90	11.42	0.2	1100	11.36	0.4	2600	10.77	0.7	4500	9.58	1.6	8500
15/1	100	90	15.60	0.1	1100	15.60	0.3	2600	15.05	0.5	4500	15.05	1.0	8500
20/1	100	90	19.93	0.1	1100	19.50	0.2	2600	21.15	0.4	4500	21.15	0.7	8500
30/1	100	90	29.10	0.07	1100	28.01	0.2	2600	30.14	0.3	4500	30.14	0.5	8500
40/1	100	90	43.53	0.04	1100	39.98	0.1	2600	43.97	0.2	4500	37.33	0.4	8500
50/1	100	90	52.50	0.04	1100	52.50	0.09	2600	53.03	0.2	4500	53.03	0.3	8500
60/1	100	90	58.33	0.03	1100	59.79	0.08	2600	58.92	0.1	4500	58.92	0.3	8500

Additional ratios from 70/1 to 420/1 are available by adding a Helical Ratio Multiplier to HERA gear drive. See page H-20.
Additional ratios from 86/1 to as high as 3,487/1 are available by ordering a DOUBLE HERA gear drive. See page H-18.

Hub City™ HERA® High-Efficiency Right Angle Gear Drives

Coupled Input

Models: HERA35PS, HERA45PS,
HERA55PS, HERA75PS



FOR LUBRICATION AND INSTALLATION INSTRUCTIONS REFER TO SECTION M.

SPECIAL, METRIC AND SAE HYDRAULIC INPUT FLANGES AVAILABLE. CONSULT FACTORY FOR COMPLETE SPECIFICATIONS.

THESE UNITS CAN BE FURNISHED WITH SOLID OUTPUT SHAFT ON SPECIAL ORDERS.

SHAFT MOUNTED UNITS REQUIRE TORQUE ARMS. TORQUE ARM KITS ARE AVAILABLE. SEE PAGE H-17.

DIMENSIONS SHOWN ARE FOR REFERENCE ONLY. DOWNLOAD AVAILABLE CAD MODELS AT: WWW.HUBCITYINC.COM

CONSULT FACTORY FOR VERTICAL SHAFT LUBRICATION RECOMMENDATIONS.

INPUT SHAFT CAN BE ROTATED IN EITHER DIRECTION.

Hub City™ HERA® High-Efficiency Right Angle Gear Drives

Models: HERA35PS, HERA45PS,
HERA55PS, HERA75PS

Coupled Input

MODEL	C.D.	A	B	D	E	AA	BB	CC	DD	EE	FF	GG
HERA35PS	2.509	4.25	1.178	2.062	5.750	4.188	2.094	2.750	1.375	5/16 UNC	0.63	0.63
						5.000	2.500	2.875	1.438	3/8 UNC	0.69	0.69
HERA45PS	3.263	4.88	1.175	2.500	6.938	5.000	2.500	2.875	1.438	3/8 UNC	0.69	0.69
HERA55PS	3.675	6.15	2.200	3.500	9.375	7.500	3.750	4.000	2.000	7/16 UNC	0.88	0.88
HERA75PS	4.287	8.36	2.650	4.438	11.375	8.500	4.250	5.000	2.500	5/8 UNC	1.00	1.00

MODEL	G	H	H2	I	I2	J	K	L	M	N	O	R	Wt. Lbs.
HERA35PS	56C	2.25	N/A	7.57	N/A	3/16 X 3/32	5.875	4.501/4.503	0.625	6.63	13/32	0.188	32
	143TC								0.875				
HERA45PS	56C	2.25	N/A	7.76	N/A	3/16 X 3/32	5.875	4.501/4.503	0.625	6.63	13/32	0.188	44
	143TC								0.875				
	182TC	N/A	3.25	N/A	8.76	1/4 X 1/8	7.250	8.501/8.503	1.125	9.00	17/32	0.188	54
HERA55PS	56C	2.25	N/A	9.00	N/A	3/16 X 3/32	5.875	4.501/4.503	0.625	6.50	13/32	0.188	83
	143TC								0.875				
	182TC	N/A	3.25	N/A	10.00	1/4 X 1/8	7.250	8.501/8.503	1.125	9.00	17/32	0.188	91
	213TC					5/16 X 5/32			1.375				
HERA75PS	56C	2.25	N/A	9.88	N/A	3/16 X 3/32	5.875	4.501/4.503	0.625	6.50	13/32	0.188	169
	143TC								0.875				
	182TC	N/A	3.25	N/A	10.88	1/4 X 1/8	7.250	8.501/8.503	1.125	9.00	17/32	0.188	178
	213TC					5/16 X 5/32			1.375				

Stock Bores

MODEL	S	T	U	X	Key Furnished
HERA35PS	5.50	2.75	3/4	3/16 X 3/32	3/16 Sq.
			7/8	3/16 X 3/32	3/16 Sq.
			1	1/4 X 1/8	1/4 Sq.
			1-1/8	1/4 X 1/8	1/4 Sq.
			1-3/16	1/4 X 1/8	1/4 Sq.
			1-1/4	1/4 X 1/8	1/4 Sq.
			1-7/16	3/8 X 1/8	3/8 X 5/16
HERA45PS	6.25	3.13	1	1/4 X 1/8	1/4 Sq.
			1-1/8	1/4 X 1/8	1/4 Sq.
			1-3/16	1/4 X 1/8	1/4 Sq.
			1-1/4	1/4 X 1/8	1/4 Sq.
			1-7/16	3/8 X 1/8	3/8 X 5/16
HERA55PS	7.50	3.75	1-3/16	1/4 X 1/8	1/4 Sq.
			1-1/4	1/4 X 1/8	1/4 Sq.
			1-7/16	3/8 X 3/16	3/8 Sq.
			1-1/2	3/8 X 3/16	3/8 Sq.
			1-1/2	3/8 X 3/16	3/8 Sq.

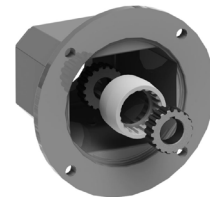
MODEL	S	T	U	X	Key Furnished
HERA55ES (Cont.)	7.50	3.75	1-5/8	3/8 X 3/16	3/8 Sq.
			1-11/16	3/8 X 3/16	3/8 Sq.
			1-3/4	3/8 X 3/16	3/8 Sq.
			1-7/8	1/2 X 1/4	1/2 Sq.
			1-15/16	1/2 X 3/16	1/2 X 7/16
			2	1/2 X 3/16	1/2 X 7/16
			2-3/16	1/2 X 1/8	1/2 X 3/8
HERA75ES	9.50	4.75	1-7/16	3/8 X 3/16	3/8 Sq.
			1-1/2	3/8 X 3/16	3/8 Sq.
			1-15/16	1/2 X 1/4	1/2 Sq.
			2	1/2 X 1/4	1/2 Sq.
			2-3/16	1/2 X 1/4	1/2 Sq.
			2-7/16	5/8 X 5/16	5/8 Sq.
			3	3/4 X 3/8	3/4 Sq.
3-7/16	7/8 X 1/4	7/8 X 11/16			

Bore tolerance nominal + .0025

Nema "C" Flange Adaptor Kits

SERIES	BASE UNIT REQUIRED		"C-FLANGE KIT NO."	SHIPPING Wt. Lbs.	G
	MODEL	SIZE REF.			
HERA35	HERA35AS	24	0259-00079	12	56C
			0259-00080	12	143TC
HERA45	HERA45AS	24	0259-00079	12	56C
			0259-00080	12	143TC
			0259-00081	20	182TC
HERA55	HERA55AS	32	0259-00108	14	56C
			0259-00109	14	143TC
			0259-00110	22	182TC
			0259-00111	22	213TC
HERA75	HERA75AS	32	0259-00108	14	56C
			0259-00109	14	143TC
			0259-00110	22	182TC
			0259-00111	22	213TC

Nema C-Flange Adaptor Kits can be ordered separately and attached to HERA_AS models. See chart for base unit requirements onto which they can be attached.



Torque Arm Kits Required for Shaft Mounted applications – See Page H-17