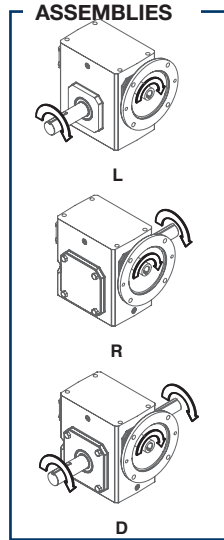
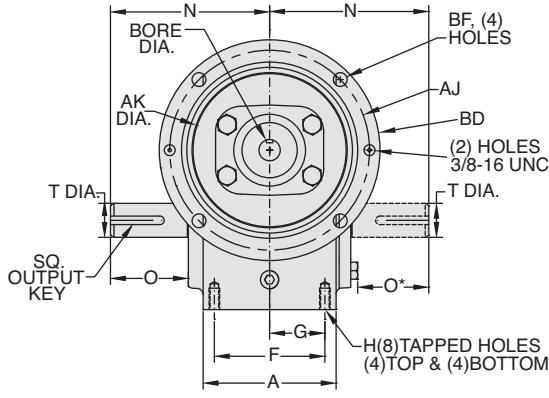
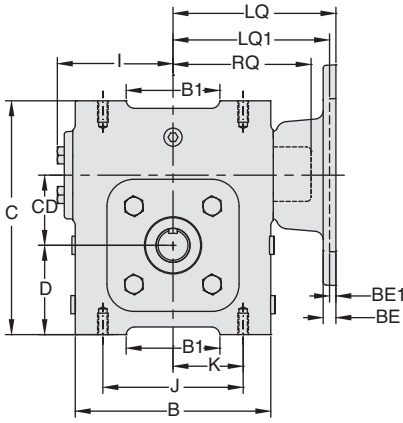


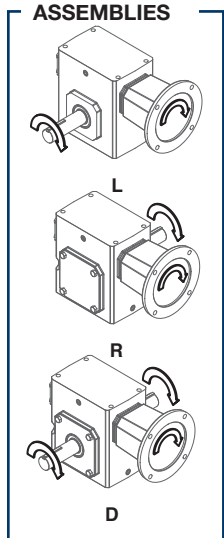
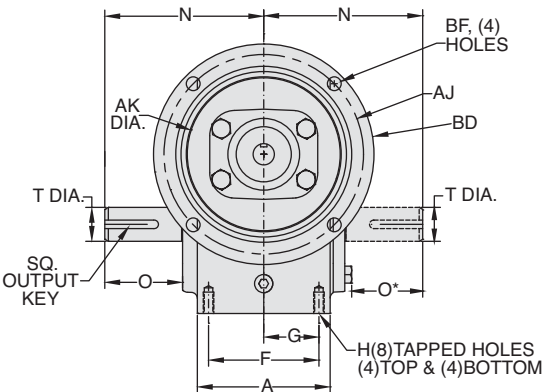
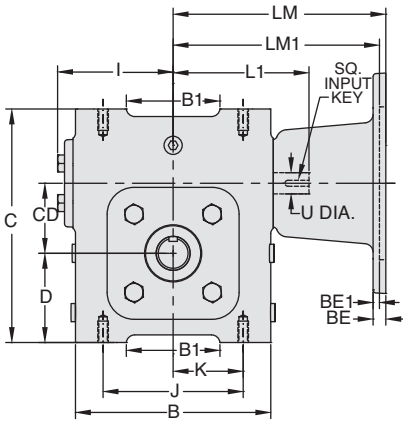
**ELECTRA-GEAR  
EL Series  
Dimensions**

**Styles: BMQ, BM, B**

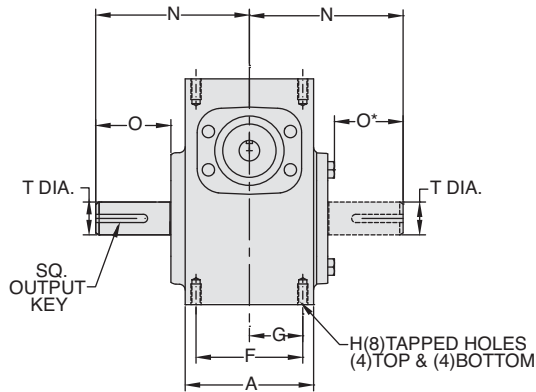
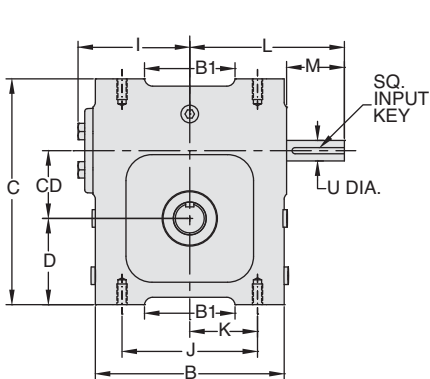
**Style BMQ**



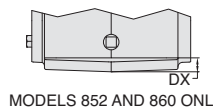
**Style BM**



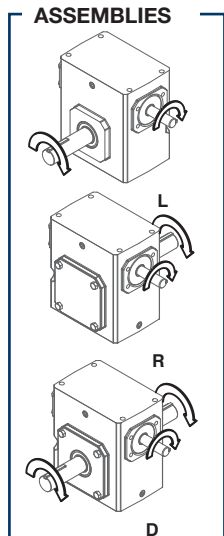
**Style B**



**SIDE VIEW**



**END VIEW**



REVERSE ALL ARROWS FOR OPPOSITE INPUT SHAFT ROTATION. CONTACT FACTORY FOR OTHER MOUNTINGS OR ASSEMBLY POSITIONS.

Single Reduction  
Worm Gear Reducers

Double Reduction  
Worm - Worm Gear Reducers

Double Reduction  
Helical - Worm Gear Reducers

WASHGUARD® Reducers  
and GEAR+MOTOR™

Ratio Multipliers

Accessories and  
Additional Capabilities

### STYLE BMQ, BM, B DIMENSIONS (Inches)

Size	A	B	B1	C	CD	D	DX	F	G	H		I	J	K	L	M	N	O	O*	T +0.000 -0.0015	U +0.000 -0.0015	Input Key (Style B Only)	Input Key (Style BM only)	Output Key
										Tap Size	Depth													
EL813	2.82	3.80	--	4.66	1.33	1.72	--	2.00	1.00	5/16-18	0.50	2.40	3.25	1.63	3.82	1.87	4.00	2.16	1.96	0.625	0.500	1/8 x 1.00	1/8 x 1.00	3/16 x 1.38
EL818	3.50	4.83	2.48	5.86	1.75	2.31	--	2.94	1.47	5/16-18	0.63	3.03	3.69	1.84	4.45	1.78	4.39	2.05	1.85	0.750	0.625	3/16 x1.38	3/16 x .500	3/16 x 1.38
EL821	3.91	5.75	2.76	6.88	2.06	2.63	--	3.25	1.63	3/8-16	0.87	3.40	4.13	2.06	4.82	1.76	4.68	2.29	2.09	1.000	0.625	3/16 x1.38	3/16 x .500	1/4 x 1.44
EL824	4.06	5.86	--	6.94	2.38	2.50	--	2.88	1.44	3/8-16	0.69	3.61	5.00	2.50	5.51	2.45	5.14	2.66	2.46	1.125	0.750	3/16 x1.63	3/16 x .500	1/4 x 1.62
EL826	4.84	7.17	4.21	8.00	2.63	3.25	--	3.38	1.69	3/8-16	0.69	4.17	5.00	2.50	6.07	2.45	5.63	2.73	2.53	1.250	0.750	3/16 x1.63	3/16 x .500	1/4 x 1.62
EL830	5.25	8.11	4.50	8.94	3.00	3.50	--	4.13	2.06	1/2-13	1.00	4.81	5.75	2.88	6.56	2.31	6.62	3.60	3.37	1.500	0.875	3/16 x1.63	3/16 x .500	3/8 x 2.25
EL832	5.25	8.11	4.53	10.50	3.25	4.00	--	4.13	2.06	1/2-13	1.00	5.00	6.63	3.31	6.75	2.31	6.62	3.60	3.37	1.625	0.875	3/16 x1.63	3/16 x .500	3/8 x 2.25
EL842	6.13	9.63	5.71	11.69	4.25	4.50	--	3.75	1.88	5/8-11	1.19	6.15	7.00	3.50	9.57	3.47	8.12	4.50	4.22	1.750	1.250	1/4 x 2.50	1/4 x 2.50	3/8 x 3.00
EL852	7.19	11.50	7.82	12.25	5.25	4.25	0.75	5.25	2.63	3/4-10	1.44	7.55	9.62	4.81	10.88	3.38	9.06	4.78	4.50	2.000	1.250	1/4 x 3.00	1/4 x 3.00	1/2 x 2.50
EL860	7.00	13.50	--	14.25	6.00	5.00	1.63	5.38	2.69	7/8-9	1.63	7.88	11.00	5.50	10.99	3.00	10.75	5.25	5.25	2.250	1.500	3/8 x 3.00	3/8 x 2.75	1/2 x 4.00

### Motor Mounting Dimensions

#### NEMA DIMENSIONS (Inches)

Size	LM	LM1	L1		LQ	LQ1	RQ	
	56C/140TC	180TC / 210TC	56C/140TC	180TC / 210TC	56C/140TC	180TC / 210TC	56C/140TC	180TC / 210TC
EL813	6.07	--	3.82	--	3.79	--	3.09	--
EL818	5.89	--	3.64	--	4.42	--	3.59	--
EL821	6.26	--	4.00	--	4.79	--	4.06	--
EL824	6.48	7.30	4.29	4.29	4.77	4.77	4.09	4.09
EL826	7.04	7.86	4.88	4.88	5.33	5.33	4.82	4.82
EL830	7.67	8.31	5.38	5.38	5.97	5.97	5.32	5.32
EL832	7.86	8.50	5.56	5.56	6.16	6.16	5.51	5.51
EL842	11.25	12.53	9.57	9.57	6.45	6.45	6.04	6.04
EL852	12.65	13.93	10.88	10.88	7.85	7.85	7.35	7.35
EL860	--	11.94	10.99	10.99	--	--	--	--

#### NEMA DIMENSIONS (Inches)

Frame	AJ	AK	BD	BE	BE1	Bore Dia.	Keyway	BF
56C	5.88	4.50	6.50	0.38	N/A	.625	3/16 X 3/32	0.41
140TC	5.88	4.50	6.50	0.38	N/A	.875	3/16 X 3/32	0.41
180TC	7.25	8.50	9.00	N/A	0.50	1.125	1/4 X 1/8	0.53
210TC	7.25	8.50	9.00	N/A	0.50	1.375	5/16 X 5/32	0.53

- \* Applies to double output shaft
- ◆ Keyway width by depth
- \* Solid input shaft and C-faced coupling input reducers have different input shaft length and key.



**WARNING** For safety, purchaser or user should provide protective guards over shaft extensions and any couplings, sheaves and belts, sprockets and chains, etc., mounted thereon.

### INTEGRAL GEARMOTOR INPUTS AVAILABLE

— Contact Factory for price and availability.

### EL SERIES MOUNTING DIMENSIONS

- EL Series mounting dimensions are the same as the original ELECTRA-GEAR product with an option to match the industry standard dimensions of GR Series.
- See page 52 for GR Series dimensions.

### ELECTRA-GEAR INTERCHANGE GUIDE

Original Style	New Style
MSC or MLSC	BMQ
MC or MLC	BM
M or ML	B
M + "KV" Kit	B + "KV" Kit

Convert Style B to motorized coupling input using kits shown on page 278.

Style WBMQ

Style WHMQ



**821 Series**

Ratio	Input RPM	Output RPM+	Input HP	Output HP	Output Torque (lb-in)	NEMA C Input Frame▲	Left Hand Catalog No.	Right Hand Catalog No.	Double Extension Catalog No.	Hollow Output Catalog No.*
<b>5</b>	1750	350.0	3.653	3.410	614	56C	<u>8213001</u>	<u>8213013</u>	<u>8213025</u>	<u>8213501.XX</u>
						143-5TC	<u>8213037</u>	<u>8213049</u>	<u>8213061</u>	<u>8213513.XX</u>
<b>7.5</b>	1750	233.3	2.793	2.562	692	56C	<u>8213002</u>	<u>8213014</u>	<u>8213026</u>	<u>8213502.XX</u>
						143-5TC	<u>8213038</u>	<u>8213050</u>	<u>8213062</u>	<u>8213514.XX</u>
<b>10</b>	1750	175.0	2.464	2.235	805	56C	<u>8213003</u>	<u>8213015</u>	<u>8213027</u>	<u>8213503.XX</u>
						143-5TC	<u>8213039</u>	<u>8213051</u>	<u>8213063</u>	<u>8213515.XX</u>
<b>15</b>	1750	116.7	1.887	1.661	897	56C	<u>8213004</u>	<u>8213016</u>	<u>8213028</u>	<u>8213504.XX</u>
						143-5TC	<u>8213040</u>	<u>8213052</u>	<u>8213064</u>	<u>8213516.XX</u>
<b>20</b>	1750	87.5	1.584	1.338	964	56C	<u>8213005</u>	<u>8213017</u>	<u>8213029</u>	<u>8213505.XX</u>
						143-5TC	<u>8213041</u>	<u>8213053</u>	<u>8213065</u>	<u>8213517.XX</u>
<b>25</b>	1750	70.0	1.333	1.094	985	56C	<u>8213006</u>	<u>8213018</u>	<u>8213030</u>	<u>8213506.XX</u>
						143-5TC	<u>8213042</u>	<u>8213054</u>	<u>8213066</u>	<u>8213518.XX</u>
<b>30</b>	1750	58.3	1.129	0.896	968	56C	<u>8213007</u>	<u>8213019</u>	<u>8213031</u>	<u>8213507.XX</u>
						143-5TC	<u>8213043</u>	<u>8213055</u>	<u>8213067</u>	<u>8213519.XX</u>
<b>40</b>	1750	43.8	0.916	0.674	971	56C	<u>8213008</u>	<u>8213020</u>	<u>8213032</u>	<u>8213508.XX</u>
<b>50</b>	1750	35.0	0.769	0.539	970	56C	<u>8213009</u>	<u>8213021</u>	<u>8213033</u>	<u>8213509.XX</u>
<b>60</b>	1750	29.2	0.674	0.435	940	56C	<u>8213010</u>	<u>8213022</u>	<u>8213034</u>	<u>8213510.XX</u>
<b>80</b>	1750	21.9	0.304	0.190	547	56C	<u>8213011</u>	<u>8213023</u>	<u>8213035</u>	<u>8213511.XX</u>
<b>100</b>	1750	17.5	0.217	0.122	439	56C	<u>8213012</u>	<u>8213024</u>	<u>8213036</u>	<u>8213512.XX</u>

For input/ output shaft overhung load and thrust load ratings, refer to pages 419-422.

▲ Contact Factory for other motor flanges available.

+ For gear reducer ratings at other input speeds, refer to basic reducer selection tables on pages 28-29.

**How To Build a Part Number For Size GRG821, GRL821, EL821**

1. Select partial catalog number from the selection table
2. Replace leading “\_” with series code (GRG, GRL, EL)
3. For Hollow output, replace “XX” suffix with bore code.

**Example:**

GR Series Style WBMQ, 10:1 Left Hand Output, 56C  
GRG-WBMQ821-10-L-56, GRG8213003

**GRG = GROVE GEAR**

- Direct replacement to Grove Gear Flexaline
- Mounting footprint 3.00” x 4.75”
- See pages 52-73 for dimensions



**GRL = IRONMAN Interchange**

- Direct replacement to LEESON IRONMAN & major brands.
- Mounting footprint 2.88” x 5.00”
- See pages 52-73 for dimensions

**Available bore codes**

Fraction Size	1”	1-1/8”	1-3/16”	1-1/4”	1-7/16”	1-1/2”
Decimal Size	1.000	1.125	1.188	1.250	1.438	1.500
Output Bore Code	16	18	19	20	23	24

\* Catalog numbers are for hollow output shaft reducers. When ordering, substitute the XX suffix with the required output bore code.

Single Reduction Worm Gear Reducers  
Double Reduction Worm - Worm Gear Reducers  
Double Reduction Helical - Worm Gear Reducers  
WASHGUARD® Reducers and GEAR+MOTOR™  
Ratio Multipliers  
Accessories and Additional Capabilities