

2100, 2200, 4100, 6200, MPB Series Bottom Mount Drive Package for Standard Load 90° Industrial 60 Hz Gearmotors

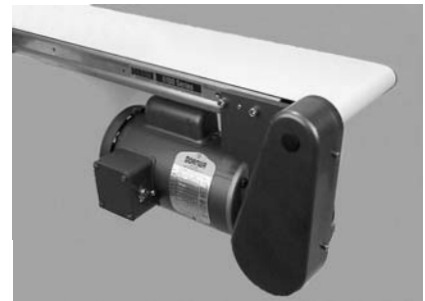


Table of Contents

Warnings – General Safety	2	Preventative Maintenance & Adjustment	10
Introduction	2	Required Tools	10
Product Description	3	Timing Belt Tensioning	10
Specifications	3	Timing Belt Replacement	10
Gearmotors	3	Drive or Driven Pulley Replacement	11
2200 Belt Speeds	4	Gear Reducer Replacement	11
2100, 4100, 6200 Belt Speeds	5	Motor Replacement	13
MPB Belt Speeds	6	Service Parts	14
Installation	7	Bottom Mount Drive Package for Standard	
Required Tools	7	Load 90° Industrial Gearmotors	14
Mounting	7	MPB Series Cleated Belt Bottom Mount	
		Drive Package for Standard Load 90°	
		Industrial Gearmotors	15
		4100 Adapter Components	16
		Gearmotor	16
		Return Policy	20

Warnings – General Safety

	WARNING	
<p>The safety alert symbol, black triangle with white exclamation, is used to alert you to potential personal injury hazards.</p>		

		DANGER
<p>Climbing, sitting, walking or riding on conveyor will cause severe injury. KEEP OFF CONVEYORS.</p>		

		DANGER
<p>Do NOT OPERATE CONVEYORS IN AN EXPLOSIVE ENVIRONMENT.</p>		

		WARNING
<p>Exposed moving parts can cause severe injury. LOCK OUT POWER before removing guards or performing maintenance.</p>		

		WARNING
<p>Gearmotors may be HOT. DO NOT TOUCH Gearmotors.</p>		

		WARNING
<p>Exposed moving parts can cause severe injury. REPLACE ALL GUARDS BEFORE RUNNING CONVEYOR.</p>		

		WARNING
<p>Dorner cannot control the physical installation and application of conveyors. Taking protective measures is the responsibility of the user.</p> <p>When conveyors are used in conjunction with other equipment or as part of a multiple conveyor system, CHECK FOR POTENTIAL PINCH POINTS and other mechanical hazards before system start-up.</p>		

		WARNING
<p>MPB Series Conveyors are not reversible. Reversing creates pinch points which can cause severe injury. DO NOT REVERSE MPB SERIES CONVEYORS.</p>		

Introduction

IMPORTANT: Some illustrations may show guards removed. Do NOT operate equipment without guards.

Upon receipt of shipment:

- Compare shipment with packing slip. Contact factory regarding discrepancies.
- Inspect packages for shipping damage. Contact carrier regarding damage.
- Accessories may be shipped loose. See accessory instructions for installation.

Dorner 2100 Series conveyors are covered by the following patent numbers: 5131529, 5174435, and corresponding patents and patent applications in other countries.

Dorner 4100 Series conveyors are covered by patent number 3923148 and corresponding patents and patent applications in other countries.

Dorner 2200, 6100 & MPB Series conveyors are covered by patent number 5174435 and corresponding patents and patent applications in other countries.

Dorner's Limited Warranty applies.

Dorner reserves the right to make changes at any time without notice or obligation.

Dorner has convenient, pre-configured kits of Key Service Parts for all conveyor products. These time saving kits are easy to order, designed for fast installation, and guarantee you will have what you need when you need it. Key Parts and Kits are marked in the Service Parts section of this manual with the Performance Parts Kits logo



Product Description

Refer to Figure 1 for typical components.

Typical Components	
A	Conveyor
B	Mounting Bracket
C	Gearmotor
D	Timing Belt Tensioner
E	Cover
F	Timing Belt
G	Drive Pulley
H	Driven Pulley

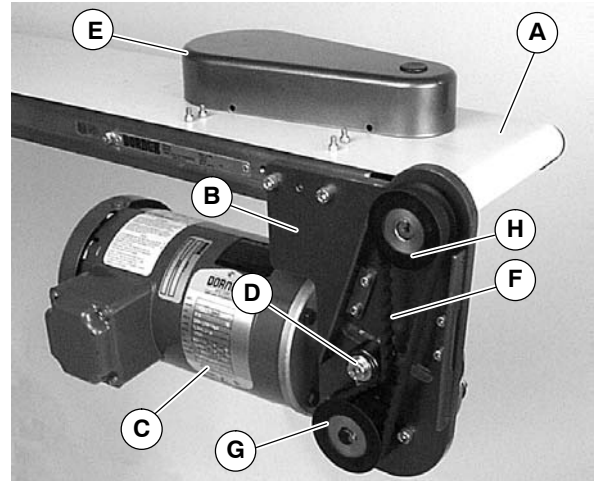


Figure 1

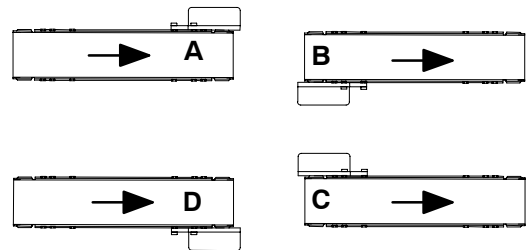
Specifications

Gearmotor Mounting Package Models:

Example:

2 M B H S WW A - 32 32

- 2 = 2100 Series Conveyor
- M = 2200 Series Series Conveyors
- B = 4100 Series Conveyor
- H = 6200 Series Conveyor
- S = 2P = MPB Series Conveyor
- WW = Conveyor Width Reference*
- A = Mount Position = A, B, C or D (see detail to the right)
- = Belt Type (- = flat belt, A through J = cleated belt)
- 32 = Drive Pulley (see Table 2 through 7)
- 32 = Driven Pulley (see Table 2 through 7)
- Standard Load, Industrial = Gearmotor Type
- 90° Industrial = Output Shaft Type
- Bottom Mount = Mount Style
- U.S. English = Language Code



* See "Ordering and Specifications" Catalog for details.

Table 1: Gearmotor Specifications

	Single Phase	Three Phase	DC Variable Speed
Output Power	0.25 hp (0.19 kw)		
Input Voltage	115 Volts A.C.	208 to 230/460 Volts A.C.	130 Volts D.C.
Input Frequency	60 Hz		N/A
Input Current	5.0 Amperes	1.2 /0.6 Amperes	2.2 Amperes
Motor RPM	1725		2500
Gearmotor Ratios	5:1, 10:1, 20:1, 40:1, 60:1		
Frame Size	NEMA 42 CZ		
Motor Type	Totally Enclosed, Fan-cooled		

Specifications

NOTE: For belt speed other than those listed in Tables 2 – 7, contact factory for details.

Table 2: Belt Speeds for Standard Load Fixed Speed 90° 60 Hz Gearmotors on 2200 Series Conveyors

Gearmotors				Belt Speed		Drive Pulley	Driven Pulley
Part Number	RPM	In-lb	N-m	Ft/min	M/min		
32M060HL4(vp)F(n)	29	226	25.5	6	1.8	19	32
32M060HL4(vp)F(n)	29	226	25.5	10	3.0	28	28
32M060HL4(vp)F(n)	29	226	25.5	16	4.9	44	28
32M040HL4(vp)F(n)	43	237	26.8	15	4.6	28	28
32M040HL4(vp)F(n)	43	237	26.8	24	7.3	44	28
32M020HL4(vp)F(n)	86	142	16.0	30	9.1	28	28
32M020HL4(vp)F(n)	86	142	16.0	48	14.6	44	28
32M010HL4(vp)F(n)	173	78	8.8	61	18.6	28	28
32M010HL4(vp)F(n)	173	78	8.8	95*	29.0*	44	28
32M010HL4(vp)F(n)	173	78	8.8	104*	31.7*	48	28
32M005HL4(vp)F(n)	345	41	4.6	121*	36.9*	28	28
32M005HL4(vp)F(n)	345	41	4.6	138*	42.1*	32	28
32M005HL4(vp)F(n)	345	41	4.6	176*	53.6*	32	22
32M005HL4(vp)F(n)	345	41	4.6	208*	63.4*	48	28
32M005HL4(vp)F(n)	345	41	4.6	242*	73.8*	44	22
32M005HL4(vp)F(n)	345	41	4.6	264*	80.5*	48	22

(vp) = voltage and phase (n) = Reversing Capability
 11 = 115 V, 1-phase N = No Reversing switch
 23 = 208–230/460 V, 3-phase R = With reversing switch

* = Nosebar transfers operate at maximum 77 Ft/min (23.5 M/min) belt speed

Table 3: Belt Speeds for Standard Load Variable Speed 90° DC Gearmotors on 2200 Series Conveyors

Gearmotors				Belt Speed		Drive Pulley	Driven Pulley
Part Number	RPM	In-lb	N-m	Ft/min	M/min		
32M060HLD3DEN	42	198	22.4	1.8 – 14.0	0.5 – 4.6	28	28
32M060HLD3DEN	42	198	22.4	2.8 – 23.0	0.8 – 7.0	44	28
32M040HLD3DEN	63	163	18.4	2.6 – 22.0	0.8 – 6.7	28	28
32M020HLD3DEN	125	98	11.1	5.3 – 44.0	1.6 – 13.0*	28	28
32M010HLD3DEN	250	54	6.1	10.0 – 88.0*	3.2 – 27.0*	28	28
32M010HLD3DEN	250	54	6.1	17.0 – 138.0*	5.0 – 42.0*	44	28
32M005HLD3DEN	500	28	3.2	21.0 – 176.0*	6.4 – 54.0*	28	28
32M005HLD3DEN	500	28	3.2	33.0 – 276.0*	10.0 – 84.0*	44	28

* = Nosebar transfers operate at maximum 77 Ft/min (23.5 M/min) belt speed

Specifications

Table 4: Belt Speeds for Standard Load Fixed Speed 90° 60 Hz Gearmotors on 2100, 4100 & 6200 Series Conveyors

Gearmotors				Belt Speed		Drive Pulley	Driven Pulley
Part Number	RPM	In-lb	N-m	Ft/min	M/min		
32M060HL4(vp)F(n)	29	226	25.5	6	1.7	22	32
32M060HL4(vp)F(n)	29	226	25.5	8	2.4	28	28
32M060HL4(vp)F(n)	29	226	25.5	12	3.7	48	32
32M040HL4(vp)F(n)	43	237	26.8	12	3.7	28	28
32M040HL4(vp)F(n)	43	237	26.8	18	5.5	48	32
32M020HL4(vp)F(n)	86	142	16.0	25	7.6	28	28
32M020HL4(vp)F(n)	86	142	16.0	37	11.3	48	32
32M010HL4(vp)F(n)	173	78	8.8	49	14.9	28	28
32M010HL4(vp)F(n)	173	78	8.8	74	22.6	48	32
32M005HL4(vp)F(n)	345	41	4.6	99	30.2	28	28
32M005HL4(vp)F(n)	345	41	4.6	148	45.1	48	32
32M005HL4(vp)F(n)	345	41	4.6	169	51.5	48	28
32M005HL4(vp)F(n)	345	41	4.6	197	60.0	44	22
32M005HL4(vp)F(n)	345	41	4.6	215	65.5	48	22
32M005HL4(vp)F(n)	345	41	4.6	249	75.9	48	19

(vp) = voltage and phase
 11 = 115 V, 1-phase
 23 = 208-230/460 V, 3-phase

(n) = Reversing Capability
 N = No Reversing switch
 R = With reversing switch

Table 5: Belt Speeds for Standard Load Variable Speed 90° DC Gearmotors on 2100, 4100 & 6200 Series Conveyors

Gearmotors				Belt Speed		Drive Pulley	Driven Pulley
Part Number	RPM	In-lb	N-m	Ft/min	M/min		
32M060HLD3DEN	42	198	22.4	0.8 – 7.0	0.3 – 2.2	19	32
32M060HLD3DEN	42	198	22.4	1.4 – 12.0	0.4 – 3.6	32	32
32M040HLD3DEN	63	163	18.4	2.1 – 18.0	0.7 – 5.4	32	32
32M020HLD3DEN	125	98	11.1	4.3 – 36.0	1.3 – 11.0	32	32
32M010HLD3DEN	250	54	6.1	9.0 – 71.0	2.6 – 22.0	32	32
32M005HLD3DEN	500	28	3.2	17.0 – 143.0	5.2 – 43.0	32	32
32M005HLD3DEN	500	28	3.2	26.0 – 214.0	7.8 – 65.0	48	32
32M005HLD3DEN	500	28	3.2	29.0 – 245.0	9.0 – 75.0	48	28

Specifications

Table 6: Belt Speeds for Standard Load Fixed Speed 90° 60 Hz Gearmotors on MPB Series Conveyors

Gearmotors						Drive Pulley	Driven Pulley
Part Number	RPM	In-lb	N-m	Ft/min	M/min		
32M060HL4(vp)FN	29	226	25.5	13	4.1	22	32
32M060HL4(vp)FN	29	226	25.5	20	6.0	28	28
32M040HL4(vp)FN	43	237	26.8	29	8.9	28	28
32M040HL4(vp)FN	43	237	26.8	44	13.4	48	32
32M020HL4(vp)FN	86	142	16.0	59	17.9	28	28

(vp) = voltage and phase

11 = 115 V, 1-phase

23 = 208-230/460 V, 3-phase

(n) = Reversing Capability

N = No Reversing switch

R = With reversing switch

Table 7: Belt Speeds for Standard Load Variable Speed 90° DC Gearmotors on MPB Series Conveyors

Gearmotors				Belt Speed		Drive Pulley	Driven Pulley
Part Number	RPM	In-lb	N-m	Ft/min	M/min		
32M060HLD3DEN	42	198	22.4	2.3-19	0.7-5.9	22	32
32M060HLD3DEN	42	198	22.4	3.4-28	1-8.6	22	32
32M060HLD3DEN	42	198	22.4	5.3-44	1.6-13	44	28
32M040HLD3DEN	63	163	18.4	5.1-42	1.6-12.9	28	28
32M020HLD3DEN	125	98	11.1	10-85	3-26	28	28
32M020HLD3DEN	125	98	11.1	15-127	4.7-39	48	32
32M010HLD3DEN	250	54	6.1	20-170*	6-52*	28	28
32M010HLD3DEN	250	54	6.1	31-255*	9-77*	48	32

* = Cleated and Sidewall Cleated belts operate at a maximum of 150 ft/min (45.7 m/min)

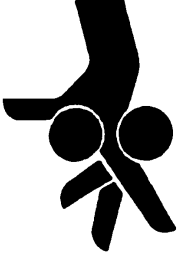

Required Tools

- Hex key wrenches:
2 mm, 2.5 mm, 3 mm, 5 mm
- Straight edge
- Torque wrench

Mounting

	 WARNING
	<p>Exposed moving parts can cause severe injury.</p> <p>LOCK OUT POWER before removing guards or performing maintenance.</p>

	 WARNING
	<p>MPB Series Conveyors are not reversible. Reversing creates pinch points which can cause severe injury.</p> <p>DO NOT REVERSE MPB SERIES CONVEYORS.</p>

	 WARNING
	<p>For MPB Series and Cleated Belt Conveyors Gearmotors must be mounted as shown in Figure 3.</p> <p>Failure to do so creates pinch points which can cause severe injury.</p>

NOTE: Gearmotor position on Flat Belt conveyors shown in Figure 2. Gearmotor position on Cleated Belt and MPB Series conveyors shown in Figure 3.

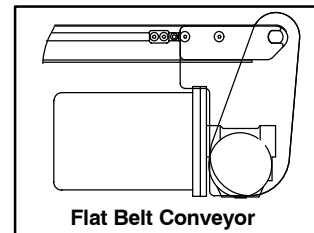


Figure 2

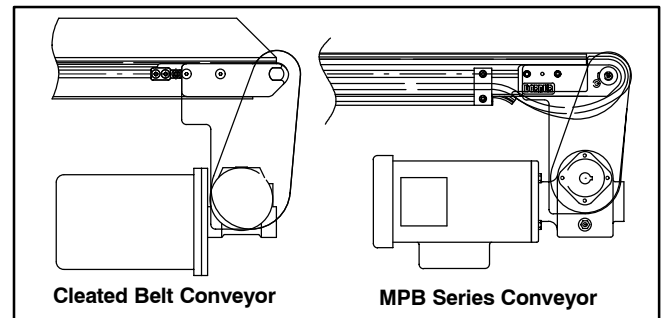


Figure 3

Installation Component List

- | | |
|---|----------------------------|
| I | Bottom Mount Assembly |
| J | Drive Pulley |
| K | Cover |
| L | M4 Socket Head Screws (4x) |
| M | Driven Pulley |
| N | Key |
| O | M6 Socket Head Screws (2x) |
| P | Timing Belt |

1. Typical components (Figure 4)

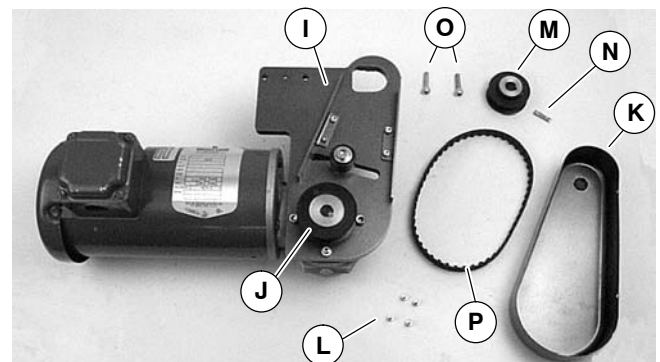


Figure 4

Installation

NOTE: Flat belt mounting package shown above (Figure 4), cleated belt mounting package similar.

- For your reference, the figures below show gearmotor mounting configurations for various conveyor series.

Figure 5 – 2200 Series

Gearmotor is mounted to Head Plate

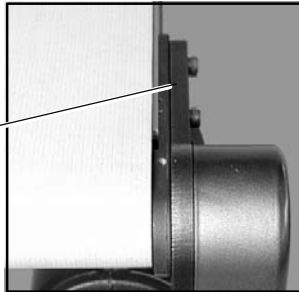


Figure 6 – 6200 Series

Gearmotor is mounted to Drive Spacer

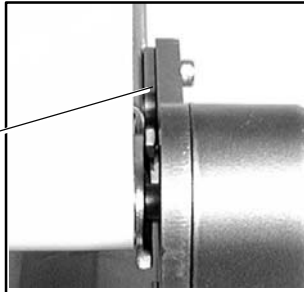


Figure 7 – 4100 Series

Gearmotor is mounted to Drive Adapter Plate

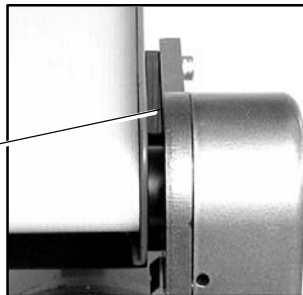


Figure 8 – 2100 Series

Gearmotor is mounted to Head Plate

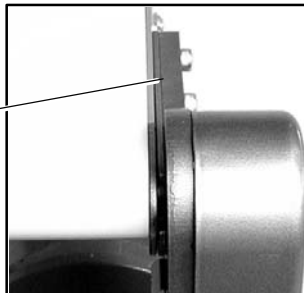
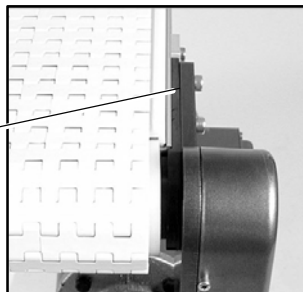


Figure 9 – MPB Series

Gearmotor is mounted to Head Plate



NOTE: Gearmotor may be operated in positions 1, 3 or 4 (Figure 10). Dependent on conveyor belt speed and gearmotor type, position 4 may require a vibration dampening bracket. Order 7018WW for 2200 & MPB conveyors or 7019WW for 2100 & 6100 conveyors. (WW = conveyor width). 4100 conveyors do not require brackets.

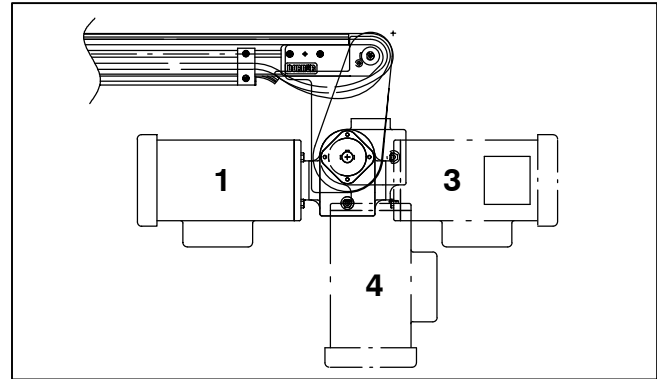


Figure 10

- If required, change gearmotor position by removing four (4) screws (Q of Figure 11). Rotate gearmotor to other position and replace screws (Q). Tighten to 103 in-lb (12 N-m).

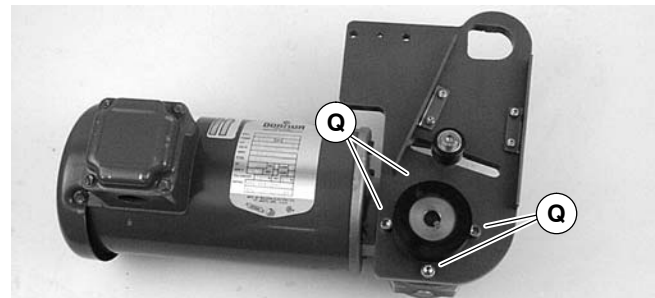


Figure 11

NOTE: 6200 conveyor shown, 2100, 2200, 4100 & MPB similar.

- Locate drive output shaft (R of Figure 12) and remove two (2) screws (S).

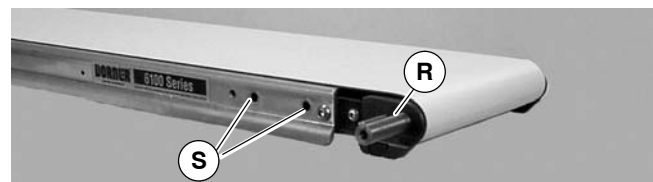


Figure 12

- Attach mounting assembly (I of Figure 13) with screws (O). Tighten to 80 in-lb (9 N-m).

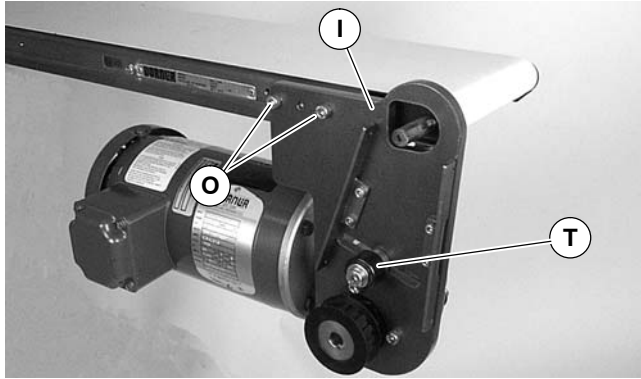


Figure 13



6. Install key (N of Figure 14).

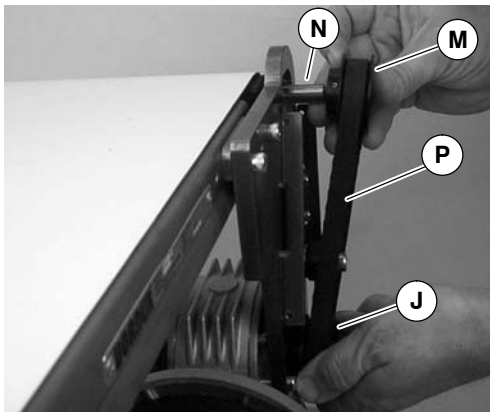


Figure 14

7. Wrap timing belt (P) around driven pulley (M) and drive pulley (J). Install driven pulley (M) onto conveyor shaft.
8. Remove cam bearing and spacer (T of Figure 13). Place the cam bearing and spacer (T of Figure 15) next to the driven pulley (M). Ensure the flanges of the driven pulley are aligned with the cam bearing. Tighten driven pulley set screws (U). This will allow for proper belt alignment while conveyor is in use. Replace cam bearing and spacer (T).

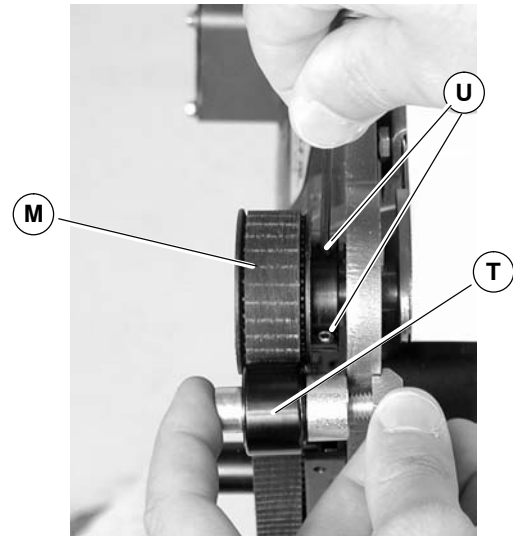


Figure 15

9. Depending on conveyor belt travel (direction 1 or 2), locate timing belt tensioner (V of Figure 16) as shown. Tension timing belt to obtain 0.125" (3 mm) deflection for 1.0 lb (456 grams) of force at timing belt mid-point (W). Tighten tensioner screw to 103 in-lb (12 N-m).

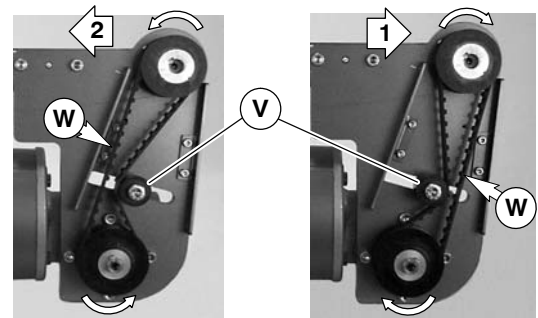


Figure 16

10. Install cover (K of Figure 17) with four (4) screws (L). Tighten to 35 in-lb (4 N-m).

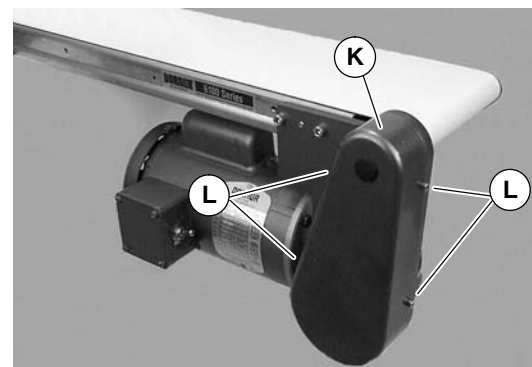


Figure 17

Preventive Maintenance and Adjustment

Required Tools

- Hex key wrenches:
 - 2 mm, 2.5 mm, 3 mm, 5 mm
- Adjustable wrench (for hexagon head screws)
- Straight edge
- Torque wrench

Timing Belt Tensioning



1. Remove four (4) screws (L of Figure 17) and remove cover (K).
2. Loosen tensioner (V of Figure 18).

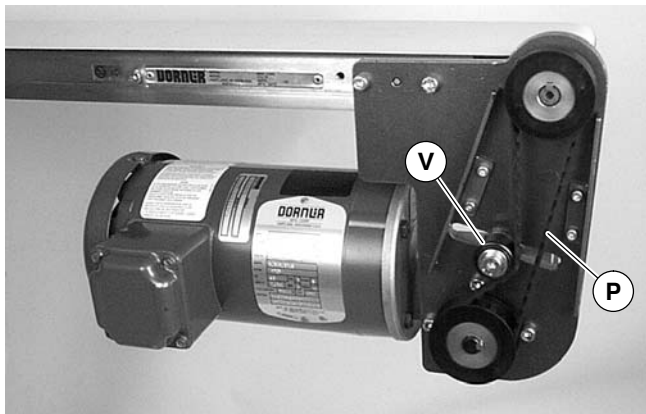


Figure 18

3. Depending on conveyor belt travel (direction 1 or 2), locate timing belt tensioner (V of Figure 16) as shown. Tension timing belt to obtain 0.125" (3 mm) deflection for 1.0 lb (456 grams) of force at timing belt mid-point (W). Tighten tensioner screw to 103 in-lb (12 N-m).
4. Install cover (K of Figure 17) with four (4) screws (L). Tighten to 35 in-lb (4 N-m).

Timing Belt Replacement



1. Remove four (4) screws (L of Figure 17) and remove cover (K).
2. Loosen tensioner (V of Figure 18).
3. Remove timing belt (P of Figure 19).

NOTE: If timing belt does not slide over pulley flange, loosen driven pulley set screws (U of Figure 19) and remove pulley with belt (P). For re-installation, see steps 7 and 8 on page 9.

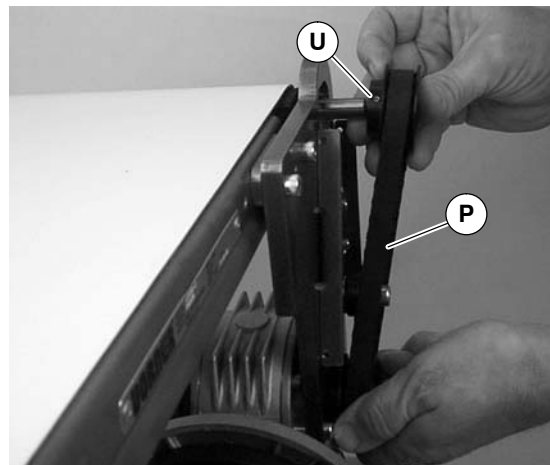


Figure 19

4. Install new timing belt.
5. Depending on conveyor belt travel (direction 1 or 2), locate timing belt tensioner (V of Figure 16) as shown. Tension timing belt to obtain 0.125" (3 mm) deflection for 1.0 lb (456 grams) of force at timing belt mid-point (W). Tighten tensioner screw to 103 in-lb (12 N-m).
6. Install cover (K of Figure 17) with four (4) screws (L). Tighten to 35 in-lb (4 N-m).

Preventive Maintenance and Adjustment

Drive or Driven Pulley Replacement



1. Complete steps 1 through 3 of “Timing Belt Replacement” section on page 10.
2. Loosen set screws and remove drive or driven pulley.

NOTE: If drive pulley (J of Figure 20) is replaced, wrap timing belt around drive pulley and complete step 3.

3. Complete steps 7 through 10 of “Installation” section on page 8.

Gear Reducer Replacement



1. Remove four (4) screws (L of Figure 17) and remove cover (K).
2. Loosen tensioner (V of Figure 18).
3. Loosen drive pulley set screws (X of Figure 20). Remove drive pulley (J) and timing belt (P).

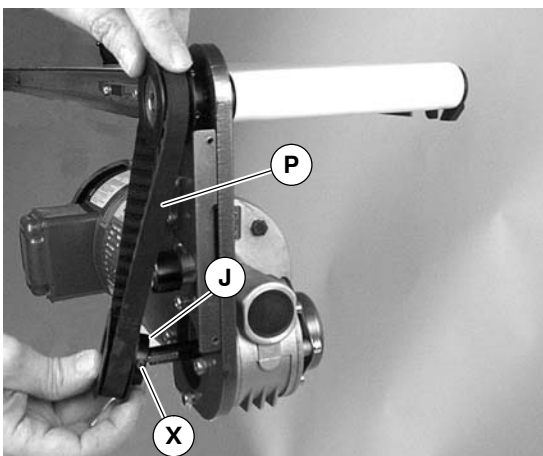


Figure 20

4. Remove four (4) gear reducer mounting screws (Q of Figure 21). Remove gearmotor.



Figure 21

5. Remove four screws (Y of Figure 22). Detach motor (Z) from gear reducer (AA). Retain motor output shaft key (AB).

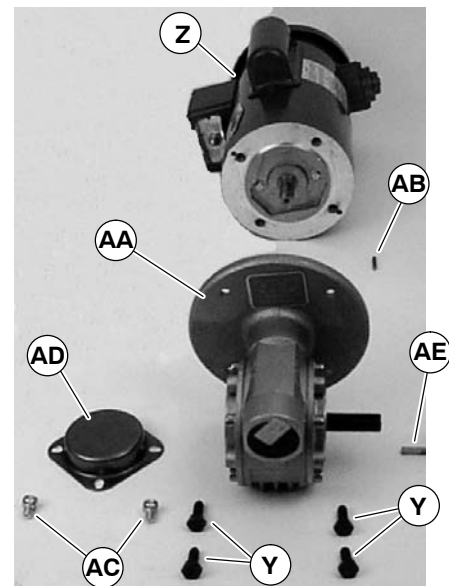


Figure 22

6. Remove two (2) screws (AC) and detach output shaft cover (AD).
7. Remove gear reducer output shaft key (AE).

Preventive Maintenance and Adjustment

- Loosen six (6) set screws (AF of Figure 23). Remove drive shaft (AG) and key (AH).

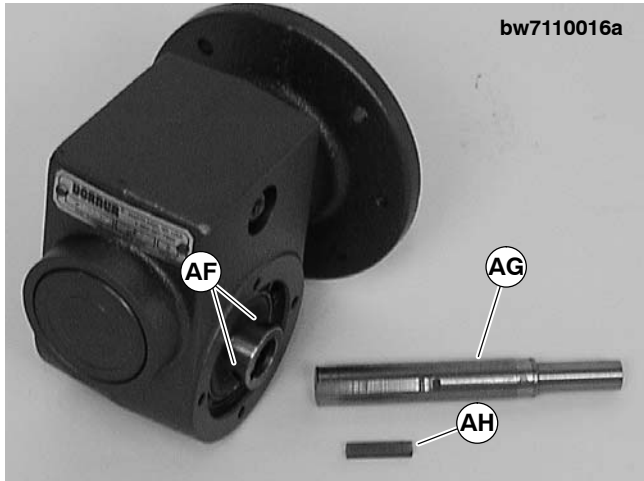


Figure 23

- Apply grease (AI of Figure 24) to shaft.

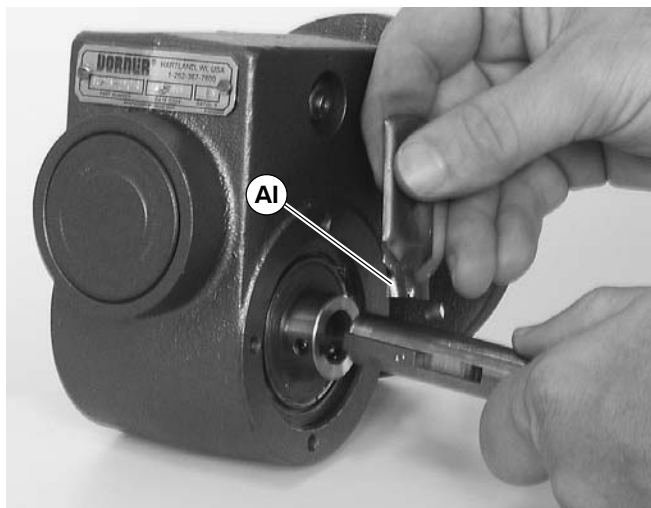


Figure 24

- Replace the original shaft components into new gear reducer (see Figure 23). Tighten set screws (AF) to 26 in-lb (3 N-m).

IMPORTANT: Be extremely careful when coupling motor to gear reducer. Avoid misalignment and forcing the connection causing possible permanent gear reducer seal damage.

- With key (J of Figure 22) in keyway, slide motor (Z) and gear reducer (AA) together. Install screws (Y) and tighten.

NOTE: Gearmotor position on Flat Belt conveyors shown in Figure 25. Gearmotor position on Cleated Belt and MPB Series conveyors shown in Figure 26.

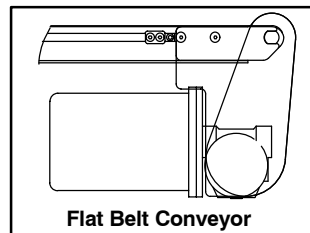


Figure 25

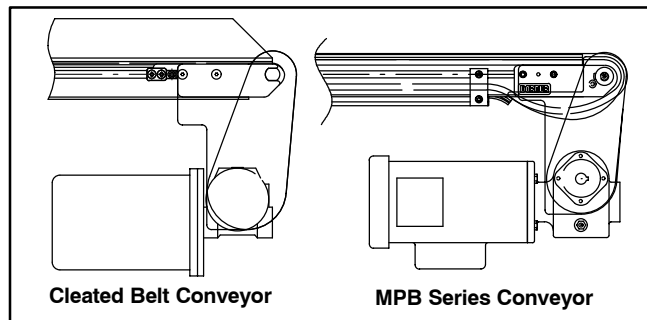


Figure 26

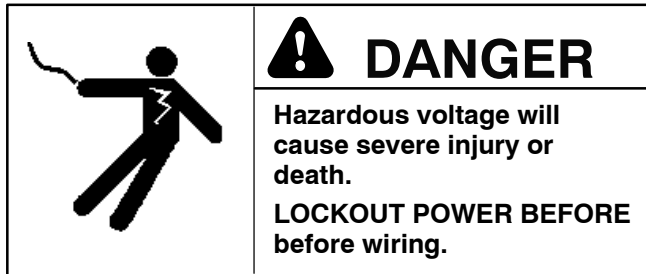
- Install gearmotor to mounting bracket and tighten screws (Q of Figure 21) to 103 in-lb (12 N-m).

NOTE: Drive pulley (J of Figure 20) is removed. Wrap timing belt around drive pulley and complete step 13.

- Complete steps 7 through 10 of “Installation” section on page 8.

Preventive Maintenance and Adjustment

Motor Replacement



1. For single phase motor, unplug power cord from outlet.
2. For three phase motor:
 - a. Loosen terminal box screws (AJ of Figure 27) and remove cover (AK).

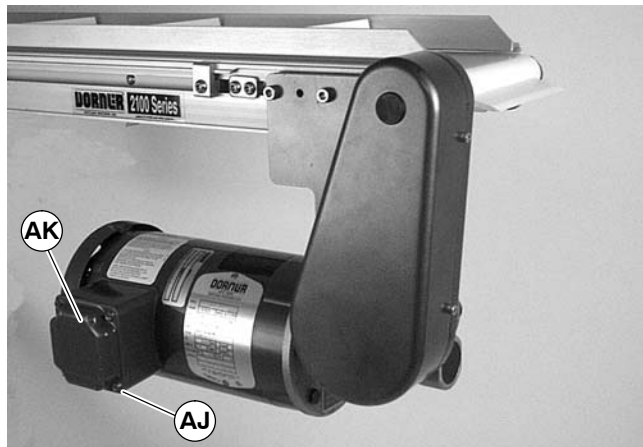


Figure 27

- b. Record wire colors on terminals 1, 2 and 3. Loosen wire nuts and remove wires 1, 2 and 3.
 - c. Loosen cord grip and remove cord.
3. For DC variable speed motor, unplug motor cord at disconnect (AL of Figure 28).

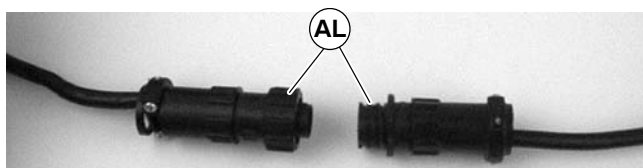


Figure 28

4. Remove four screws (Y of Figure 29). Detach motor (Z) from gear reducer (AA). Retain motor output shaft key (AB).

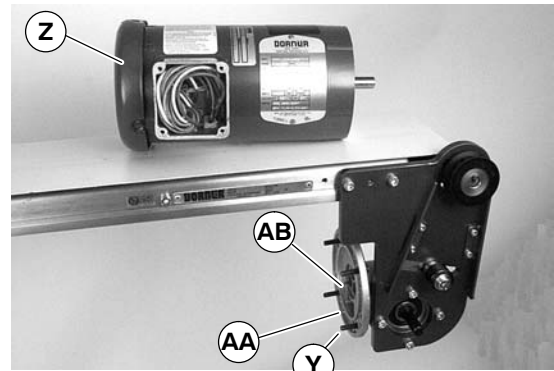


Figure 29

IMPORTANT: Be extremely careful when coupling motor to gear reducer. Avoid misalignment and forcing the connection causing possible permanent gear reducer seal damage.

5. With key (AB of Figure 30) in keyway, slide motor and gear reducer together. Install screws (Y) and tighten.

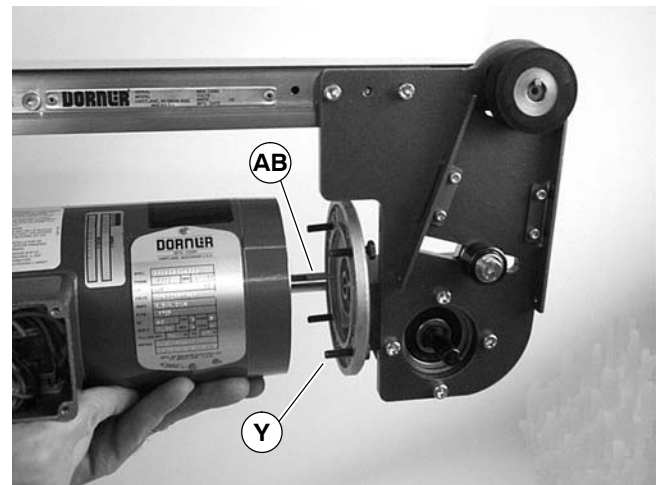


Figure 30

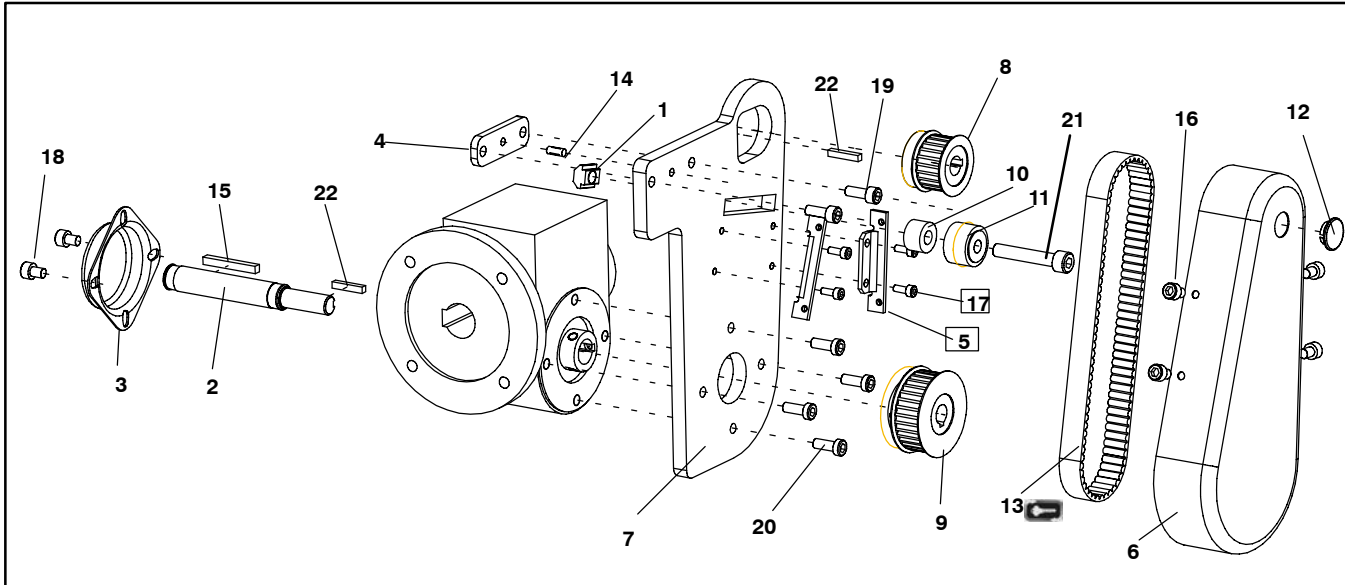
6. Replace wiring:

- For a single phase motor, reverse step 1 on this page.
- For a three phase motor, reverse step 2, on this page.
- For a DC variable speed motor, reverse step 3 on this page.

Service Parts

NOTE: For replacement parts other than those shown on this page, contact an authorized Dorner Service Center or the factory. Key Service Parts and Kits are identified by the Performance Parts Kits logo. Dorner recommends keeping these parts on hand.

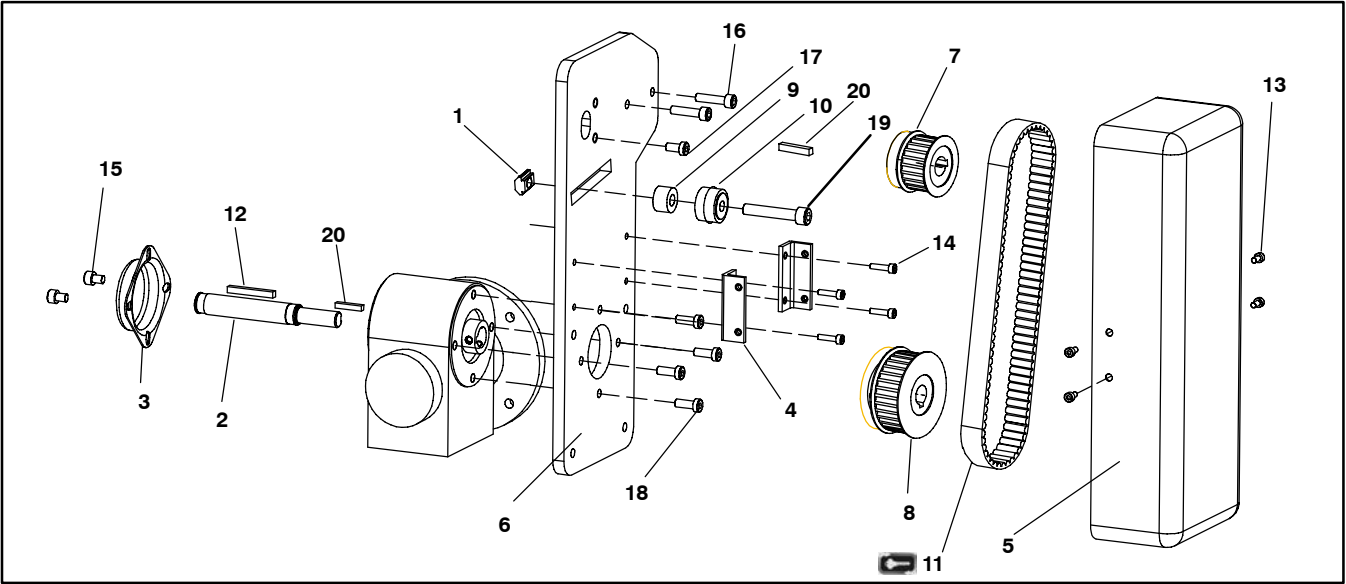
2100, 2200, 4100, 6200 Series and MPB Series Flat Belt Conveyors Bottom Mount Drive Package for Standard Load 90° Industrial Gearmotors



Item	Part Number	Description
1	202390M	Nut Follower Cam
2	450444M	Output Shaft 12mm
3	300139M	Drive Bearing Shaft Cover
4	450027M	Drive Spacer (for 6100 Conveyor)
5	450375M	Mounting Cover Bracket
6	450376M	Drive Guard
7	450443M	Mounting Plate
	242532	Mounting Plate (Flush Drive Only)
8	243325	Driven Pulley, 16Tooth (Flush Drive Only)
	450365MP	Driven Pulley, 19Tooth
	450366MP	Driven Pulley, 22Tooth
	450367MP	Driven Pulley, 28Tooth
	450368MP	Driven Pulley, 32Tooth
9	450365MP	Drive Pulley, 19Tooth
	450366MP	Drive Pulley, 22Tooth
	450367MP	Drive Pulley, 28Tooth
	450368MP	Drive Pulley, 32Tooth
	450369MP	Drive Pulley, 44Tooth
	450370MP	Drive Pulley, 48Tooth
	450371MP	Drive Pulley, 60Tooth
10	450445	Spacer

11	802-046	Bearing
12	807-226	Snap-out Plastic Plug
13	814-104	Timing Belt, 15mm W x 450mm L
	814-105	Timing Belt, 15mm W x 460mm L
	814-065	Timing Belt, 15mm W x 475mm L
	814-112	Timing Belt, 15mm W x 495mm L
	814-101	Timing Belt, 15mm W x 500mm L
	814-108	Timing Belt, 15mm W x 520mm L
	814-064	Timing Belt, 15mm W x 535mm L
	814-099	Timing Belt, 15mm W x 565mm L
14	807-952	Groove Pin (for 6100 Conveyor)
15	912-084	Square Key .188" x 1.50"
16	920406M	Socket Head Screw M4 x 6mm
17	920410M	Socket Head Screw M4 x 10mm
18	920608M	Socket Head Screw M6 x 8mm
	920622M	Socket Head Screw M6 x 22mm
19	920616M	Socket Head Screw M6 x 16mm (4100 Conveyors)
	920693M	Socket Head Screw M6 x 16mm
20	920694M	Socket Head Screw M6 x 20mm (6100 & 4100 Conveyors)
	920845M	Socket Head Screw M8 x 45mm
21	920845M	Socket Head Screw M8 x 45mm
22	980422M	Square Key 4mm x 22mm

MPB Series Cleated Belt Conveyor Bottom Mount Drive Package for Standard Load 90° Industrial Gearmotors



Item	Part Number	Description
1	202390M	Nut Follower Cam
2	450444M	Output Shaft 12mm
3	300139M	Drive Bearing Shaft Cover
4	243402	Mounting Cover Bracket
5	300871M	Drive Guard
6	243401	Mounting Plate
7	450366MP	Driven Pulley, 22Tooth
	450367MP	Driven Pulley, 28Tooth
	450368MP	Driven Pulley, 32Tooth
8	450365MP	Drive Pulley, 19Tooth
	450366MP	Drive Pulley, 22Tooth
	450367MP	Drive Pulley, 28Tooth
	450368MP	Drive Pulley, 32Tooth
	450369MP	Drive Pulley, 44Tooth
	450370MP	Drive Pulley, 48Tooth
	450371MP	Drive Pulley, 60Tooth
9	450445	Spacer

10	802-046	Bearing
11	814-101	Timing Belt, 15mm W x 500mm L
	814-108	Timing Belt, 15mm W x 520mm L
	814-064	Timing Belt, 15mm W x 535mm L
	814-099	Timing Belt, 15mm W x 565mm L
	814-109	Timing Belt, 15mm W x 580mm L
	814-115	Timing Belt, 15mm W x 600mm L
	814-110	Timing Belt, 15mm W x 615mm L
12	912-084	Square Key .188" x 1.50"
13	920408M	Socket Head Screw M4 x 8mm
14	920416M	Socket Head Screw M4 x 16mm
15	920608M	Socket Head Screw M6 x 8mm
16	920625M	Socket Head Screw M6 x 25mm
17	920692M	Stabilization Screw M6 x 12mm Low Hd
18	920693M	Socket Head Screw M6 x 16mm
19	920845M	Socket Head Screw M8 x 45mm
20	980422M	Square Key 4mm x 22mm

Service Parts

4100 Adapter Package

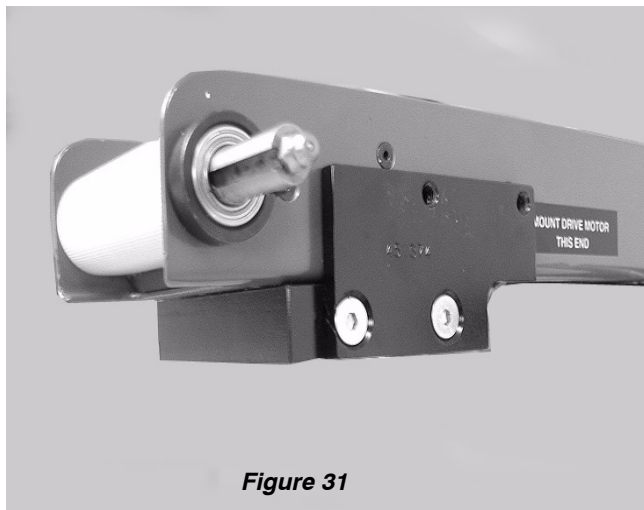
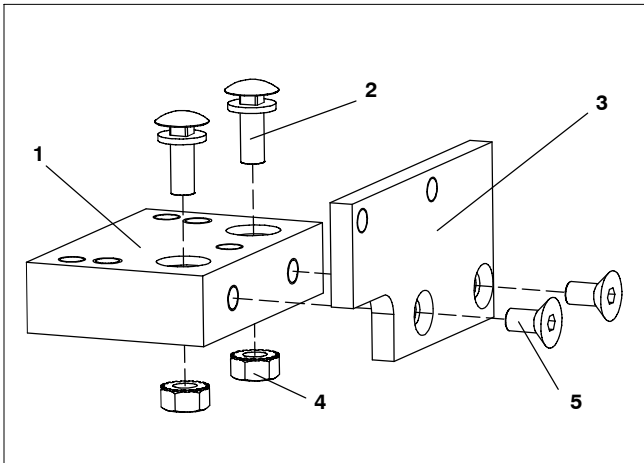
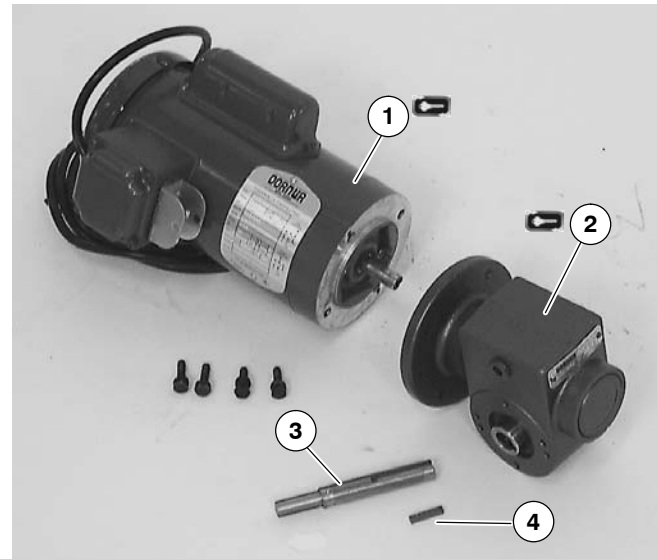


Figure 31

Item	Part No.	Part Description
1	609486	Mounting Block 1" (25mm)
	609487	Mounting Block 2" (51mm)
	609488	Mounting Block 3" (76mm)
	609479	Mounting Block 4" (102mm)
	609480	Mounting Block 5" (127mm)
	609481	Mounting Block 6" (152mm)
	609482	Mounting Block 7" (178mm)
	609483	Mounting Block 8" (203mm)
	609484	Mounting Block 10" (254mm)
	609485	Mounting Block 12" (305mm)
2	613602P	Bolt & Flat Washer Assembly
3	450374	Drive Adapter Plate
4	910-126	Hex Nut with Lock Washer
5	930612M	Flat Head Screw M6 x 12mm

Gearmotor



Item	Part No.	Part Description
1	62MS411FN	Motor, 0.25 hp (0.19 Kw) 115/230 Volts, 60 Hz, 1-Phase
	62MS411FR	Motor, 0.25 hp (0.19 Kw) 115/230 Volts, 60 Hz, 1-Phase with Reversing
	62MS423	Motor, 0.25 hp (0.19 Kw) 208-230/460 Volts, 60 Hz, 3-Phase
	62MSD3DEN	Motor, 0.25 hp (0.19 Kw) 130 Volts DC
	32MS423EI	Motor, 0.25 hp (0.19 Kw) 230/460Volts, 60 Hz, 3-Phase Variable frequency/Indexing
2	32M005HL	Gear Reducer, 5:1, 42 CZ
	32M010HL	Gear Reducer, 10:1, 42 CZ
	32M020HL	Gear Reducer, 20:1, 42 CZ
	32M040HL	Gear Reducer, 40:1, 42 CZ
	32M060HL	Gear Reducer, 60:1, 42 CZ
3	450444M	Gear Reducer Shaft
4	912-084	Key, Square, 0.188" x 1.5" L

Return Policy

No returns will be accepted without prior written factory authorization. When calling for authorization, please have the following information ready for the Dorner Factory representative or your local distributor:

1. Name and address of customer.
2. Item(s) being returned.
3. Reason for return.
4. Customer's original order number used when ordering the item(s).
5. Dorner or distributor invoice number.

A representative will discuss action to be taken on the Returned items and provide a Returned Goods Authorization Number to reference.

There will be a 15% restocking charge on all new items returned for credit where Dorner was not at fault. These will not be accepted after 60 days from original invoice date. The restocking charge covers inspection, cleaning, disassembly, and reissuing to inventory.

If a replacement is needed prior to evaluation of returned item, a purchase order must be issued. Credit (if any) is issued only after return and evaluation is complete.

Dorner has representatives throughout the world. Feel free to contact Dorner for the name of your local representative. Our technical sales and service staff will gladly help with your questions on Dorner products.

For a copy of Dorner's Limited Warranty, contact factory, distributor, service center or visit our website at www.dorner.com

**For replacement parts, contact an authorized
Dorner Service Center or the factory.**

DORNER[®]

Dorner Mfg. Corp. reserves the right to change or discontinue products without notice. All products and services are covered in accordance with our standard warranty. All rights reserved. ©Dorner Mfg. Corp. 2000

DORNER MFG. CORP.

975 Cottonwood Ave. PO Box 20
Hartland, WI 53029-0020 USA

USA
TEL 1-800-397-8664 (USA)
FAX 1-800-369-2440 (USA)

Internet: www.dorner.com

Outside the USA:
TEL 1-262-367-7600
FAX 1-262-367-5827