

Cranes... Look up, they run most facilities.



How many times have you driven down the street and marveled at the huge construction crane on a building site? How many times have you walked through a manufacturing facility and never noticed the overhead cranes? If you are like most people, you have marveled at the construction cranes but never given a second look at the overhead cranes. Overhead Cranes are life-blood of many manufacturing facilities. Without these 2 ton to 50 ton cranes, production would literally stand still. But they are often the forgotten system when it comes to routine maintenance and especially when it comes to upgrades.

Cranes are pretty simple systems – a drive system consisting of a motor, gearbox, brake, drum, wire, and of course the hook; and a structural system consisting of rails, a bridge, and a trolley. As long as you don't overload the crane and protect it from rust, the crane structure should last 40 years or more. The drive systems are typically robust also. Some cranes will have as many as five drive systems (two bridge drives, two trolley drives and one hoist drive). The motors are very reliable - totally enclosed and fan cooled. The gearboxes are designed with a good safety margin and typically use high-grade synthetic oil that never needs changing. **The weak link tends to be the brake.** Typical brakes have brake pads that must be continually adjusted and changed every 1–2 years. If they are not changed, the crane rolls 5 to 10 feet before stopping. The operator, in turn, learns to reverse the crane to stop it. This "Reverse Plug" will damage the gearbox.

Force Control's Magnashear brakes are a great alternative to eliminate brake maintenance and problems. Magnashear brakes are typically a direct replacement for existing brakes. They can be mounted either to the motor or the gearbox depending on the original configuration. They **NEVER** need adjustment. They are **sealed from the environment** – so dirt and oil that destroys other brakes can't hurt Magnashear brakes. They **last 5 to 10 times** as long as typical brakes.

So quit working on your cranes, install a Magnashear brake and forget about them. As one customer says "If I replace my existing brake with a Magnashear brake, I know I have a **Brake for Life**"

For more information, please consult our website at www.forcecontrol.com or call us at 513-868-0900.



**Recommend Brake based on Motor HP using Standard
Torque Value (2x Safety Factor)**

Motor HP	Motor RPM	NEMA FRAME	Minimum Brake Torque	Magnashear Brake
1/2	1200	056	4	MSB2-4-H-006-S-A-1
	1800	056	3	MSB2-4-H-006-S-A-1
3/4	1200	056	7	MSB2-4-H-008-S-A-1
	1800	056	4	MSB2-4-H-006-S-A-1
1	1200	145T	9	MSB2-4-H-012-S-A-1
	1800	143T	6	MSB2-4-H-006-S-A-1
1 1/2	1200	182T	13	MSB2-4-H-012-S-0-1
	1800	145T	9	MSB2-4-H-012-S-A-1
2	1200	184T	18	MSB4-5-H-021-S-0-1
	1800	145T	12	MSB2-4-H-012-S-A-1
3	1200	213T	26	MSB4-5-H-033-S-1-1
	1800	182T	18	MSB4-5-H-021-S-0-1
5	1200	215T	44	MSB6-8-H-062-S-1-1
	1800	184T	29	MSB4-5-H-033-S-1-1
7 1/2	1200	254T	66	MSB6-8-H-086-S-3-1
	1800	213T	44	MSB6-8-H-062-S-1-1
10	1200	256T	88	MSB6-8-H-100-S-3-1
	1800	215T	58	MSB6-8-H-062-S-3-1
15	1200	284T	131	MSB8-R-150-R-5-1
	1800	254T	88	MSB6-8-H-100-S-3-1
20	1200	286T	175	MSB8-R-200-R-5-1
	1800	256T	117	MSB8-Q-150-R-3-1
25	1200	324T	219	MSB9-S-250-R-7-1
	1800	284T	146	MSB8-R-150-R-5-1
30	1200	324T	263	MSB9-S-300-R-7-1
	1800	286T	175	MSB8-R-200-R-5-1
40	1200	364T	350	MSB9-S-350-R-E-1
	1800	324T	233	MSB9-S-250-R-7-1
50	1200	365T	438	MSB9-S-450-R-E-1
	1800	326T	292	MSB9-S-300-R-7-1
60	1200	404T	525	MSB10-S-650-R-E-1
	1800	364TS	350	MSB9-S-350-R-7-1
75	1200	405T	656	MSB10-S-650-R-E-1
	1800	365TS	438	MSB9-S-450-R-E-1
100	1200	444T	875	MSB12-T-950-R-?-1
	1800	404TS 405TS	583	MSB10-S-650-R-E-1
125	1200	445T	1,094	MSB12-T-1250-R-?-1
	1800	405TS 444TS	729	MSB10-S-650-R-E-1
150	1800	444TS 445TS	875	MSB12-T-950-R-?-1

