

CEMENT PRODUCTION

Reliable and Efficient Motors and Motor Services for Extreme Working Conditions Found in Cement Plants

Efficient Motors and Reduced Downtime

Louis Allis partners with cement plant owners, operators, and facility managers to ensure their motor equipment is operational and working as efficiently as possible. We understand the costs of running heavy machinery or taking a plant offline, especially with decreasing margins from production to market price.

Every Motor Application

We've been manufacturing motors for over 100 years. Our large, specialty motors are built-to-last and run as efficiently as possible. Today, we manufacture, repair, and maintain **motors found in crushers, raw mills, kiln drivers, clinkers, ID fans, ball mills, and finishing mills**. As part of the Worldwide Electric Corporation, we can also offer standard, off-the-shelf **rock crusher motors** for use on **conveyors** that move materials throughout a cement facility and **motor controls**, such as **Variable Frequency Drives** and **Motor Soft Starters**.

We Know Cement Production

Some of our customers include National Cement, Lhoist NA, Lehigh Hanson, Carmeuse Lime & Stone, Cimbar Performance Minerals, and Argos Cement and Cemex.



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Our Products

- Specialty motor manufacturing for custom, drop-in replacements.
- AC & DC up to 20,000 hp
- Custom replacement motor parts
- Standard, heavy duty motors
- Motor controls - Variable Frequency Drives (VFD) and Soft Starters

Our Services

- Emergency outage support
- Onsite testing and diagnostics
- Onsite motor repair and service
- Factory re-certified motor repair
- Design, engineering, and reverse engineering

CEMENT PLANT MOTOR APPLICATIONS

Abrasion | Dust | Heat | Vibration | Variable Speeds | AC & DC

Crushing

The primary crusher breaks down base materials, such as limestone, shells, or clay. Once crushed, it is stored until needed. Additional materials, such as chalk, sand, fly ash, or iron ore, may be introduced and broken down. Plants often use two crushers, a primary that reduces the initial size and a secondary crusher that takes products down to 1" or smaller. Specialty motor applications include:

- Feeder Motor | AC/DC
- Reclaimer Motor | AC
- Crusher Motor

Raw Mill

The Raw Mill takes dry materials and crushes them into a fine powder. Water is added to the mill if a wet slurry mix is required. Specialty motor applications include:

- Feeder Motor | AC/DC
- Air Separator ID Fan Motor | DC

Preheater and Kiln

Materials are fed into the preheater and kiln on conveyors or bucket elevators for pyroprocessing. Fuels are also delivered to the Kiln via conveyor. Specialty motor applications include:

- Feeder Motor | DC
- Preheater ID Fan Motor | AC/DC
- Kiln Motor | DC

Clinker Cooler

"Clinker" from the Kiln needs to be cooled. It is moved on grates or conveyor belts to storage in silos or warehouses. The abrasive, hot clinker can build up and damage equipment. Specialty motor applications include:

- Cooler Grate Motor | DC
- Exhaust Fan Motor | AC/DC

Finish/Ball Mill

Clinker nodules are moved from storage to the finishing mill and ground into the final cement powder. Specialty motor applications include:

- Roller Press Motor | AC/DC
- Feeder Motor | AC/DC
- Separator Motor | DC

Ventilation and Air Handling

Cement production uses ID fans driven by large motors to feed the preheater and kiln, removing hot and dusty gases from the process or for essential ventilation. Specialty motor applications include:

- Clinker Cooler ID Fan Motor | DC
- Clinker Compartment ID Fan Motor | AC/DC
- Exhaust Gas ID Fan Motor | AC/DC
- Pack House Vent Fan Motor | DC

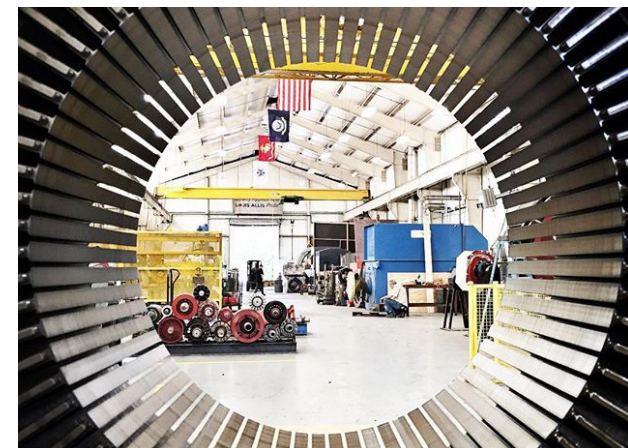
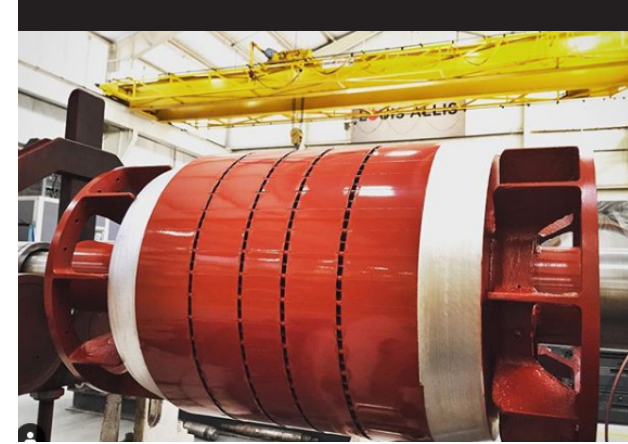
Conveying and Feeding

A cement plant makes extensive use of belt and chain drive conveyors, rollers and bucket elevators to move materials from or feed materials into the process.

- Heavy Duty Rock Crusher Motors
- Gears and Reducers

Storage and Packing

The final cement product is moved pneumatically in pipes. Bagging operations in a "pack house" use conveyors to move and ship bags of cement.



Connect with Us



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CEMENT PLANT PROCESS

Abrasion | Dust | Heat | Vibration | Variable Speeds | AC & DC

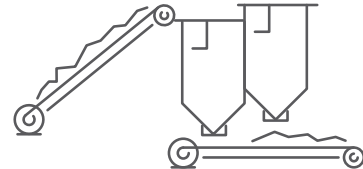


Quarry



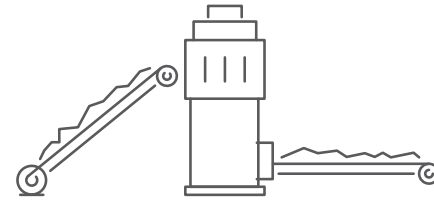
Crushing

- Feeder Motor | AC/DC
- Reclaimer Motor | AC
- Crusher Motor



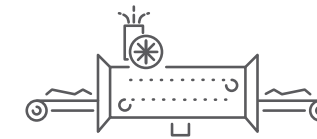
Storage

- Feeder Motor | AC/DC
- Reclaimer Motor | AC
- Crusher Motor



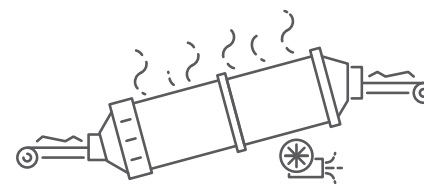
Raw Mill

- Feeder Motor | AC/DC
- Air Separator ID Fan Motor | DC



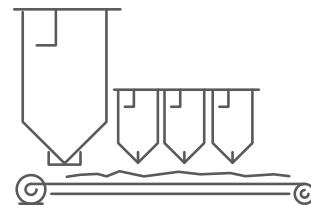
Preheater

- Feeder Motor | DC
- Preheater ID Fan Motor | AC/DC



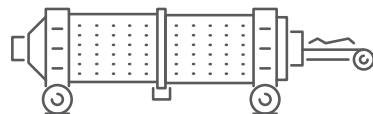
Kiln

- Kiln Motor | DC
- Exhaust Gas ID Fan Motor | AC/DC



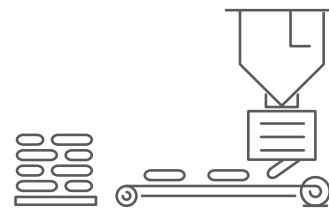
Clinker & Mixing

- Cooler Grate Motor | DC
- Exhaust Fan Motor | AC/DC



Finish/Ball Mill

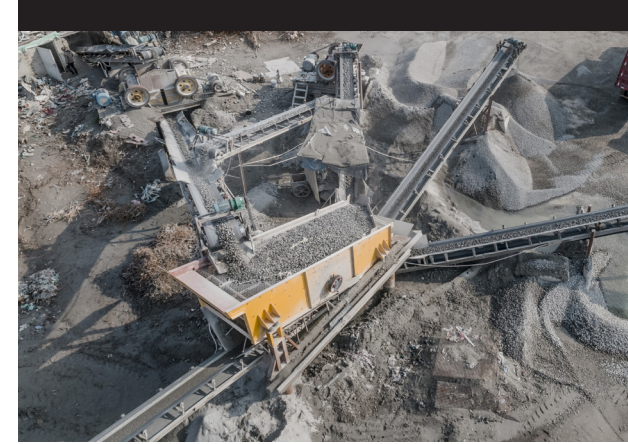
- Roller Press Motor | AC/DC
- Feeder Motor | AC/DC
- Separator Motor | DC



Packing & Distribution

Ventilation and Air Handling

- Clinker Cooler ID Fan Motor | DC
- Clinker Compartment ID Fan Motor | AC/DC
- Exhaust Gas ID Fan Motor | AC/DC
- Pack House Vent Fan Motor | DC



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