## **Drive Motor Forklifts**

Forklift Drive Motor - Motor Control Centers or also called MCC's, are an assembly of one or more enclosed sections, which have a common power bus principally consisting of motor control units. They have been used ever since the 1950's by the vehicle trade, because they utilized lots of electric motors. Today, they are used in other commercial and industrial applications.

Motor control centers are a modern method in factory assembly for some motor starters. This equipment could comprise variable frequency drives, programmable controllers and metering. The MCC's are commonly used in the electrical service entrance for a building. Motor control centers often are utilized for low voltage, 3-phase alternating current motors which range from 230 volts to 600 volts. Medium voltage motor control centers are designed for large motors which vary from 2300 volts to 15000 volts. These units make use of vacuum contractors for switching with separate compartments in order to attain power control and switching.

In factory locations and area which have corrosive or dusty processing, the MCC can be installed in climate controlled separated locations. Usually the MCC would be positioned on the factory floor near the machinery it is controlling.

A MCC has one or more vertical metallic cabinet sections with power bus and provisions for plug-in mounting of individual motor controllers. Smaller controllers could be unplugged from the cabinet to be able to complete maintenance or testing, while really big controllers can be bolted in place. Each motor controller consists of a solid state motor controller or a contractor, overload relays to protect the motor, fuses or circuit breakers to provide short-circuit protection as well as a disconnecting switch to be able to isolate the motor circuit. Separate connectors allow 3-phase power to be able to enter the controller. The motor is wired to terminals located in the controller. Motor control centers supply wire ways for field control and power cables.

In a motor control center, each and every motor controller could be specified with many various choices. Some of the options consist of: pilot lamps, separate control transformers, extra control terminal blocks, control switches, and many types of solid-state and bi-metal overload protection relays. They also have various classes of kinds of circuit breakers and power fuses.

There are lots of alternatives concerning delivery of MCC's to the customer. They can be delivered as an engineered assembly with interlocking wiring to a central control terminal panel board or programmable controller along with internal control. On the other hand, they can be provided set for the client to connect all field wiring.

Motor control centers typically sit on the floor and must have a fire-resistance rating. Fire stops can be needed for cables that go through fire-rated walls and floors.