

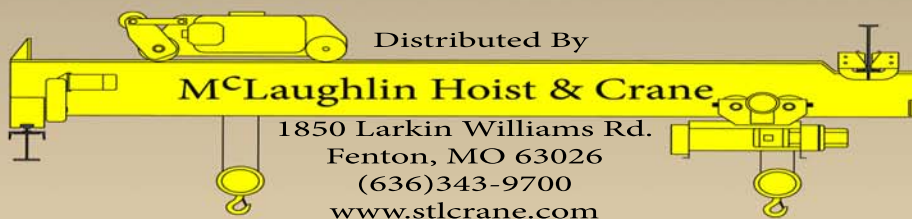
# **Dings Direct-Acting Brakes**

## **A Complete Line of Spring-Set Brakes**



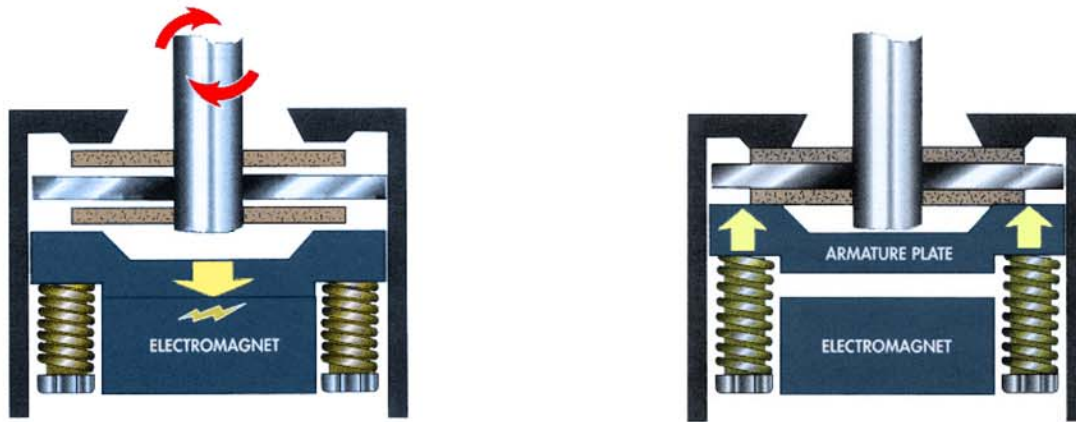
**Dings Company**

*Over 100 Years of Excellence*



# The *DINGS* Difference – Advantages of Our Design

## Direct-Acting Design



## Operation

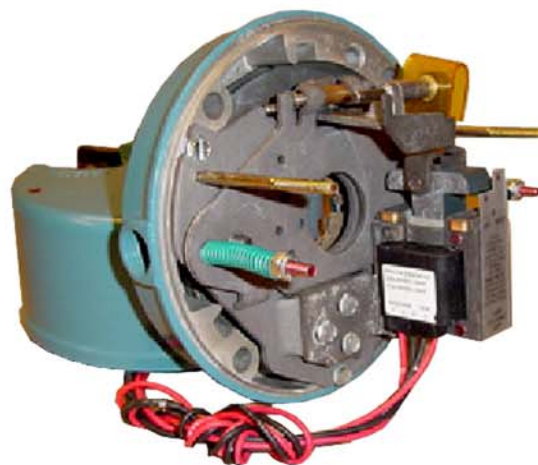
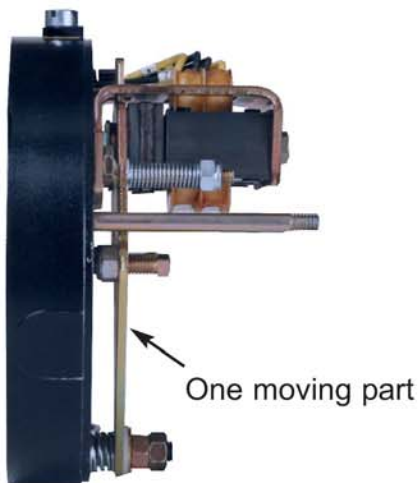
Our brakes operate on a very simple principle:

While the motor is running with power engaged, an electromagnet within the brake pulls back the pressure plate, allowing the friction discs and motor shaft to rotate freely.

When power is cut to the motor, the electromagnet releases, instantly stopping the rotating discs and preventing the motor shaft from turning.

This **direct acting** design has only one moving part with no complicated linkages to break or fail.

## Fewer Parts mean Longer Life



## Dings Direct-Acting Brake

### Solenoid-Actuated Brakes contain many more wear parts

With power supplied to brake, solenoid is energized, pulling in plunger and allowing free shaft rotation. When power is cut off, solenoid is de-energized and plunger is released.

Plunger is screwed to linking mechanism which is fastened with a retaining clip to an offset pivoting lever. Offset lever has a cam which pivots about the support plate. This releases the pressure plate which presses against the rotating discs, stopping shaft rotation.



### **60 Series brakes tested to over 3 million cycles!!**

In our accelerated life cycle tests, 87% of our 60 Series brakes passed the three million cycles mark. Four different torque ratings were tested on motors and energized and de-energized 60 times per minute.

### **RoHS Compliant**

All 40, 50 and 60 Series standard brakes now comply with the requirements of the Restriction of Hazardous Substances Directive. All other series can be ordered as RoHS compliant.

### **Factory-Set Air Gap**

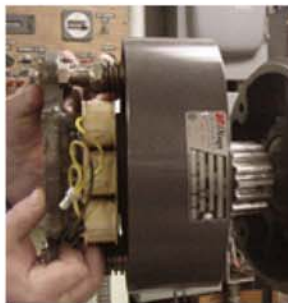
Brake air gap is pre-set, reducing installation time.

### **No Disassembly Required for Mounting**

All brakes through 80 Series (284TC/286TC frame motors) do not need to be disassembled to mount to the motor. Only 3 steps are required for mounting:



1. Position hub on motor shaft



2. Place brake on hub - no disassembly required



3. Connect wiring and replace cover

### **Torque Adjustable**

Brakes for motors 56C through 405TC are torque adjustable.



**DIRECT-ACTING**

# Product Overview

## 40 Series



Small AC and DC Motors  
Torque Ratings: 3/8 and 3/4 lb. ft.  
Enclosure Type: NEMA 2, IP40

## 50 Series



Motor frame 48C  
Torque Ratings: 1.5, 3 & 6 lb. ft.  
Enclosure Type: NEMA 2, IP40  
Manual Release: Non-maintained

## 60 Series End Mount



Motor frame 56C & 143TC/145TC  
Torque Ratings: 1.5 through 25 lb. ft.  
Enclosure:  
NEMA 2, IP40;  
NEMA 4, IP56;  
NEMA 4X, IP56 Washdown  
NEMA 4X, IP56 Washdown in  
Stainless Steel  
Hazardous Location Brake Available  
Manual Release: Maintained/auto reset

## 60 Series Double C face Coupler



Motor frame 56C & 143TC/145TC  
Torque Ratings: 1.5 through 20 lb. ft.  
Enclosure:  
NEMA 2, IP40;  
NEMA 4, IP56;  
NEMA 4X, IP56 Washdown  
NEMA 4X, IP56 Washdown in  
Stainless Steel  
Manual Release: Maintained/auto reset

## 1-70 Series End Mount



Motor frame 182TC/184TC;  
213TC/215TC; 254TC/256TC  
Torque Ratings: 1.5 through 25 lb. ft.  
Enclosure Type: NEMA 2, IP40  
Manual Release: Maintained/auto reset

## 70 Series End Mount

### Standard & Heavy Duty Models

Motor frame 182TC/184TC; 213TC/215TC; 254TC/256TC  
Torque Ratings: 10 through 75 lb. ft.  
Enclosure Type:  
NEMA 2, IP40;  
NEMA 4, IP56;  
NEMA 4X, IP56 Washdown  
Hazardous Location Brake Available  
Manual Release: Maintained/auto reset



## 70 Series Double C face Coupler

Motor frame 182TC/184TC; 213TC/215TC;  
254TC/256TC  
Torque Ratings: 10 through 75 lb. ft.



Enclosure:  
NEMA 2, IP40;  
NEMA 4, IP56  
Manual Release: Maintained with auto reset

## 80 Series

### Standard & Heavy Duty Models

Motor frame 284TC/286TC  
Torque Ratings: 25 through 175 lb. ft.



Enclosure Type:  
NEMA 2, IP40;  
NEMA 4, IP56  
Manual Release: Maintained with auto reset

## 1-90 Series

Motor frame 324TC/326TC; 364TC/365TC;  
404TC/405TC



Torque Ratings: 25 through 175 lb. ft.  
Enclosure Type:  
NEMA 2, IP40  
NEMA 4, IP56  
Manual Release: Maintained with auto reset

## 90 Series



Motor frame 324TC/326TC; 364TC/365TC;  
404TC/405TC  
Torque Ratings: 180 through 450 lb. ft.  
Enclosure Type:  
NEMA 2, IP40  
NEMA 4, IP56  
Manual Release: Maintained with auto reset

 **Dings** DYNAMICS GROUP

