

## FEM 4700FS LSS

# Monitored Weather Resistant Electro-Magnetic Lock

#### Introduction:

The **FEM 4700FS LSS** series electromagnetic lock is designed to be used on external gates or doors that are exposed to the elements. The casing is made of stainless steel and the product is rated to IP67.

The **FEM 4700FS LSS** can be installed on single swing doors or sliding doors and has no residual magnetism.

The electromagnetic lock should always be mounted on the secure side of the door.

The **FEM 4700FS LSS** has a built-in Relay Switch. The functions are generated through three output wires as following:

Red wire- Normally closed; Green wire- Normally open; Black wire- Common.

Relay Switch not Operated- No Power on Magnetic Lock.

Power on Magnetic Lock and Door Open.

Relay Switch Operated- Power on Magnetic Lock and Door Closed.

**RELAY SWITCH CONTACT RATING:** Maximum Switching Voltage: 24VDC

Maximum Switching Current: 1A

### Wiring and Power input requirements:

12 VDC/ 0.43A			24 VDC/ 0.22A	<u> </u>
BROWN ————————————————————————————————————	12VDC INPUT	+	BROWN —	+
BLUE —			BLUE	24VDC INPUT
YELLOW —		-	YELLOW —	

Warning: Misconnection of wiring will cause the TVS surge suppression inside the electromagnetic lock to fail. This will not be covered under warranty.

#### **Important Safety Requirements:**

The armature plate must remain movable to allow surface alignment with the magnet face. The Magnetic Lock will lose holding force without this floating alignment.

Do not trim the rubber washer mounted on the head of the armature centre bolt.

Trimming rubber washers will adversely affect the release of the armature plate from the magnetic lock.

- 1. Apply thread-locker glue (i.g. Loctite) to the thread of the Armature-Plate-Fixing Screw (Allen-Screw) to prevent from becoming loose.
- 2. Locks have to be inspected at regular intervals to ascertain the safety functionality in conjunction with the door environment.
- 3. The supplied Allen screws cater for maximum door-thickness of 45mm.



#### Maintenance:

Contacting surface of the Electro-Magnet and Armature Plate must be kept free of contaminating materials. Surfaces should be cleaned periodically with a non-abrasive cleaner. Do not spray the Electro-magnet or Armature Plate surface with any chemicals such as lacquer, etc. This will cause serious problems with the release of the magnetic Lock and its Armature Plate resulting in serious safety problems.

#### **Trouble Shooting:**

Problem	Possible Cause	Solution
Door will not lock	INO DU VOITAGE TO JOCK	Check power supply and wiring to magnetic lock.
Reduced holding force	and face of magnet	Ensure mating surfaces are clean and in proper alignment and the armature plate floats freely.
	II OW VOITAGE OF WITONG VOITAGE SETTING	Correct to specified voltage setting and power input requirement
Reed Switch Status is incorrect	Misalignment of armature plate.	Correct armature plate alignment.

## **Dimensions and Mounting Options:**

