

INSTALLATION INSTRUCTIONS

PM570KT

*Rollers do not come with driver cards

Thank you for your purchase of the Power Moller 24®. Please read these handling instructions first to understand the product, safety information, and cautions before using the product. Keep these handling instructions in a safe and easily accessible place. Make sure that the product you received matches your purchase order, with its designation, specifications, and operating voltage.

To Use the Product Properly and Safely

- Do not use this product in explosive, ignitable gas, corrosive, or wet environment (except waterproof or drip proof unit), or around flammable products.
- Switch off the power when conveyor removal, wiring, or maintenance is done in order to avoid risk of electrical shock or injury
- Respect the electrical regulations of the site or equipment where the product is installed (labor and safety regulations, electrical equipment technical standard, etc.)
- Make sure the conveyor is grounded properly
- Make sure the Power Moller's shafts are tightly fixed using the standard mounting brackets supplied together, before operating the unit
- Do not damage, pull, twist, cut, or additionally process the power cable

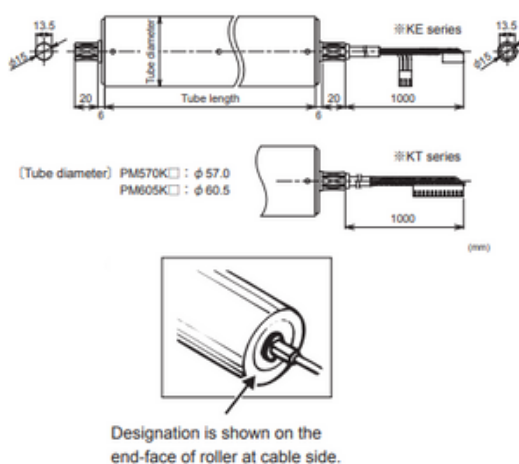
Power Source

- 24V DC battery, or 24V DC power supply
- Battery or fullwave rectified and smoothed current <10% Ripple

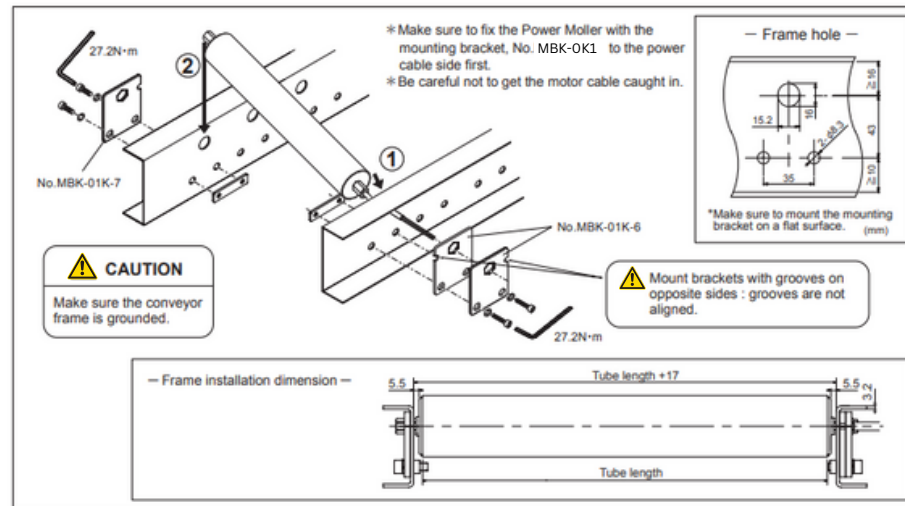
Specifications

Input voltage	24VDC (±10 %)
Motor	Brushless DC motor
Insulation class	Class E
Tube diameter	φ 60.5mm / φ 57.0mm
Tube wall thickness	φ 60.5mm : 3.2mm φ 57mm : 1.5mm
Tube material	STKM, Zinc plating
Tube cover	SS400, Zinc plating
Shaft diameter	φ 20

Confirmation of the Product

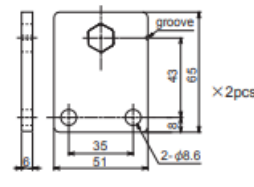


Installation



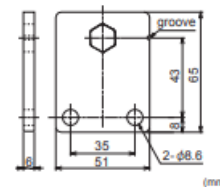
Mounting Bracket No. MBK-0K1

Includes 2 pcs. of the fixing bracket
MBK-0K1 is mounted to the power cable side



No. MBK-0K1-7

Includes 1 pc. of the fixing bracket
MBK-0K1-7 is mounted to the spring-loaded shaft





Mounting Screws & Nuts

- Screw: M8×25 (4pcs)
- Washer: M8 (4pcs)
- Dedicated nut: D-35 (2pcs)

Shaft shape	Hexagon
Shaft surface finishing	Parker finishing
Protection	IP50
Ambient temperature	0~40°C
Ambient humidity	≤ 90% RH (No condensation)
Atmosphere	No corrosive gas
Vibration	≤ 0.5G

PM570KT Additional Safety Precautions

 Warning	Failure to comply with instruction may cause death or serious injury
 Caution	Failure to comply with instruction may cause injury, disability or physical damage.

■ Installation/Wiring

WARNING

- Follow the operating voltage and wiring diagram to ensure the correct wiring, to avoid electrical shock and fire.
- Respect the procedure and make sure the connection and wiring for the product is correct.
- Do not use the product in explosive, ignitable gas, corrosive, watery environment, or around flammable products.
- Switch off the power, when conveyor removal, wiring or maintenance is done, otherwise you will risk electrical shock or injury.
- Respect the electrical regulations of the site or the equipment, where the product is installed. (labor safety and sanitary regulations, electrical equipment technical standard, etc.)
- Follow the usage advisory about usage conditions including usage voltage and environment. Otherwise, it might cause injury or a decrease in product life time.

CAUTION

- Earth leakage circuit breaker for high-frequency wave must be used.
- In connecting to the driver card, take care not to damage the driver card and peripheral parts.
- Make sure to put on an antistatic belt when you wire the power cable and the control cable to the driver.
- Install the driver on the metallic surface which is exoergic. Otherwise, heat may cause damage.
- Make sure the Power Moller is tightly fixed in place before operation, (use the proper mounting bracket we specify) to avoid injury or damage to the equipment.
- Check the rotating direction of the Power Moller before installation to the conveyor frame, to avoid injury or damage to the equipment.
- Make sure not to damage a cable sheath when it goes through the conveyor frame.
- Make sure the Power Moller and mounting bracket is properly fixed in the frame at our specified fastening torque.
- Leave about 2-5mm between the Power Moller and the frame when mounting.
- Adjust the horizontal level of the Power Moller and adjacent idler rollers so that the load will be applied evenly to each rollers.
- Make sure the conveyor frame is grounded.
- A device should be set up so that all of the Power Moller starting are monitored from the operation position.
- Do not pull (force > 1N), damage, twist, modify, or forcibly bend the power cable or leadwires.
- Do not stack, crush, or put heavy loads on the power cable. This can cause serious electric hazard, fire, or motor failure.
- Avoid strong impact load to the Power Moller such as drops or strikes, so as not to damage the unit.

■ Operation

WARNING

- In case of electricity failure, turn the RUN/STOP switch to STOP, to avoid the risk of injury by the possible sudden restart.
- For accident avoidance, only the person designated by the employer with training on the operation and maintenance method is allowed to operate.
- The failure of the driver card can make the input/output ON or OFF. Monitoring control equipment should be set up in the place where the accident could happen so as to respond immediately.
- When the unit is powered, do not touch the Power Moller and the belts. And, keep loose articles of clothing away from the unit so they do not get caught.
- Shortly after stopping, do not touch the unit to avoid burn injury from heat.

CAUTION

- Do not ride on the conveyor where the Power Moller is installed, to avoid injury or damage to the equipment.
- At the time of the startup, please confirm the safety and make sure that nobody touches the Power Moller.
- An emergency stop button should be readily available before starting the operation, to avoid injury or damage to the equipment.
- Switch off the power immediately if abnormal situation arises, to avoid electrical shock, injury, or fire.
- Keep area surrounding the Power Moller clear of debris. Packing materials could tangle around the Power Moller and cause an unexpected accident.
- Make sure to load homogeneously. (There is a risk that the Power Moller get broken and its product lifetime decreases.)
- Never start up and shut down the Power Moller with PS. (There is a risk that the Power Moller get broken and its product lifetime decrease.)
- Do not switch on/off the relay or the contactor. It makes a loud noise to cause the machine blunder.
- The input signal should last longer than 15ms. Otherwise no reaction or the machine malfunction is caused.
- After power-on, the Power Moller may take a few seconds to start.

■ Transport

CAUTION

- Do not carry the product from the power cable or motor shaft, to avoid injury caused by dropping the product or electrical shock by disconnection.
- Do not go underneath a product that is not secured, to avoid injury by a falling product.

■ Other

CAUTION

- Do not disassemble, repair, or modify the product (for which we do not warrant). It might be the cause of electrical shock, injury or fire.
- If renting out or transferring this product, include this manual.
- Dispose this product in industrial waste.
- At the time of the maintenance, make sure the main power is switched off, prohibiting the machine to operate.