



PRODUCT TECHNICAL DATASHEET

TOWER













TOWER

Electromechanical HIGH SPEED BRUSHLESS motor, low voltage, super intensive 100% duty cycle, with SENSORED digital magnetic encoder at 4096 Pulses Per Revolution (PPR), irreversible.

TW90

with build in controller, for gates up to 600KG and housed in a column as small as 135x140 internal measurement

TW110

with digital controller in pre-wired box, for gates up to 1600KG and housed inside a column as small as 187x220 internal measurement.









Brushless

Intensive Use

nigii speed

Digital Encoder

	TW90	TW110
Max Gate Weight	600 kg	1600 kg
Power Line Supply	230V AC - 50Hz	230V AC - 50Hz
Motor Power Supply	24V AC	36V AC
Power Rating	180W	240W
Duty Cycle	100% Intensive Use	100% Intensive Use
Thrust	540N	1250N
Operating Temperature	-20+55°C	-20+55°C
Protection Level	IP44	IP44
Reductor Type	Irreversible	Irreversible
Manoeuvre Speed	25 m/min (0.42 m/s)	21 m/min (0.35 m/s)
Limit Switch	Without Limit Switches - Optional	Without Limit Switches - Optional
Onboard Control Unit	в70/1т	в70/1ТНР
Encoder	Digital Encoder + Magnetic Digital SENSORED, 4096 PPR	Digital Encoder + Magnetic Digital SENSORED, 4096 PPR
Batteries Recovery	Optional 2 Internal Battery 12V 1.2AH	Optional 2 External Battery 12V 4.5AH
Type Exit Gear	Z15/mod 4	Z17/mod 4







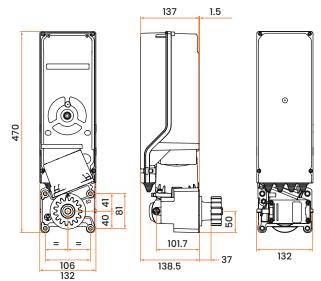




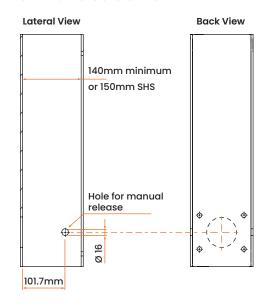
TOWER

Dimensions

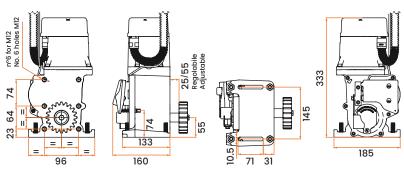
TW90 Motor

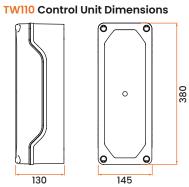


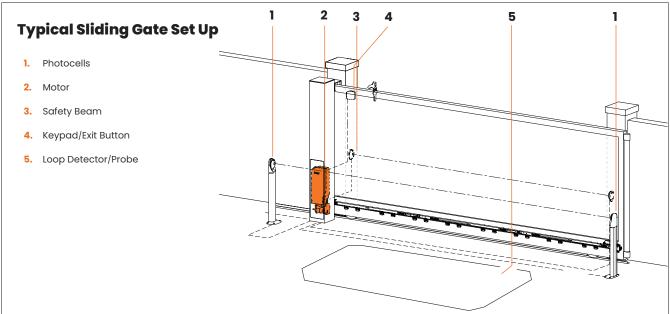
Column dimensions for the TW90



TW110 Motor











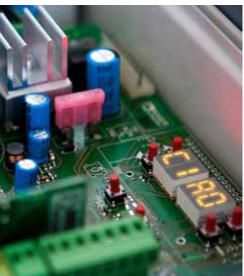


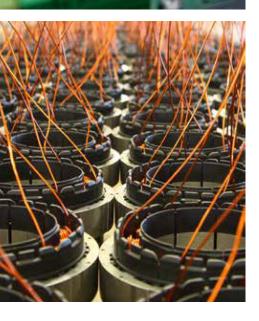












Brushless Digital Motor

This motor uses a permanent magnetic field with neodymium iron baron magnets inside the rotor. It has special coil windings and runs on a three-phase 24V AC for the TW90 and 36V AC for the TW110 power system. The motor is compact, operates at ambient temperature, very low energy consumption and for use in high duty cycle applications.

4096 PPR High Resolution Magnetic Encoder

This encoder ensures precise control of the motor's movements, especially during acceleration and deceleration and detects obstacles accurately.

Precision Engineering

The gear motor is made of aluminum, steel, and bronze. It uses high-quality double-shielded ball bearings for precise alignment and long-lasting, quiet operation.

Compact And Versatile

Our experience in sliding gate automation led us to design a compact, high-performance gearbox that fits columns as small as 135x140 RHS for the TW90 and 250x250 for the TW110.

Lock Release System

The system includes a trilobe key lock on both sides of the column and a magnetic release sensor that communicates with the control unit.

Emergency Battery Back Up

In the event of power failure the TW90 holds two x 12V DC 1.2AH batteries internally and the TW110 requires two x 12V DC 4.5AH batteries in an external box.

Optional Magnetic Limit Switch

An optional limit switch can be added, taking up minimal space in the automation system.

Sustainablity

Roger Technology is a green customer-centric company dedicated to creating sustainable products through environmentally responsible production processes, innovative technologies, and a culture that prioritizes the health, safety, and development of its workers and customers.