



Features

- DIN rail mount
- DIN module size
- 15 minutes interval setting (Daily)
- 2 hours interval setting (Weekly)
- Power supply indication LED lamp
- 3 state terminal (COM-NO-NC)
- Metal setting pin
- ON-OFF-AUTO switch
- EN50178, DIN57633 conformed

Applications

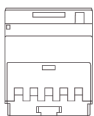
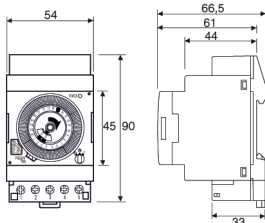
- Lighting Fixture
- Sign board
- Factory facility
- Vending machines
- Pool facility
- Lagoon pump
- Automatic irrigation
- Automated feeding station

Product Types

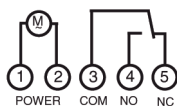
Model No.	Product name	Rated voltage	Power failure backup
TB5560187NJ	Analogue type daily TIME SWITCH (with power failure backup)	220-240VAC	300 hours
TB5630187NJ	Analogue type weekly TIME SWITCH (with power failure backup)	220-240VAC	300 hours
TB5590185NJ	Analogue type daily TIME SWITCH	230VAC	-
TB5640185NJ	Analogue type weekly TIME SWITCH	230VAC	-
TB55603777NJ	Cable cover and wall mounting bracket		

Dimensions

TB5560187



Circuit Diagram

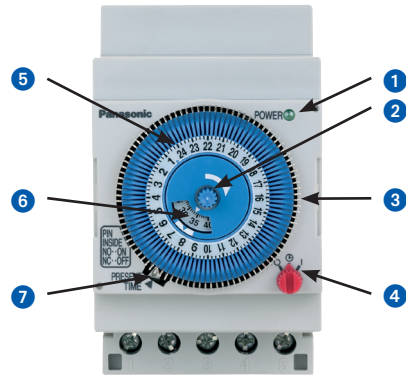


Specifications

Model No.	TB5560187NJ	TB5630187NJ	TB5590185NJ	TB5640185NJ
Program Cycle	Daily Type	Weekly Type	Daily Type	Weekly Type
Driving Method	Quartz motor		AC synchronous motor	
Rated Voltage	220-240VAC		230VAC	
Allowable Operating Voltage	-15% bis +10% of rated voltage			
Rated Frequency	50-60Hz		50Hz	
Power Consumption	2W		2W	
Time Indication	Daily dial	Weekly dial	Daily dial	Weekly dial
Power Supply Indicator	Green LED		Red LED	
Number of Circuit	1-circuit			
Circuit Configuration	Separated Circuit (NO voltage-applied contact output)			
Contact Configuration	Single Pole, Double-through (—) :μ-gap			
Manual ON/OFF	with ON-AUTO-OFF Switch			
Switching Capacity				
Resistive Load (cosφ=1)	250VAC 16A			
Inductive Load (cosφ=0,6)	250VAC 3A			
Setting System	Built-in Pin Setting (inside: ON, Outside: OFF)			
Minimum Setting Unit	15 minutes	2 hours	15 minutes	2 hours
Number of Operation	96 / Day	84 / Week	96 / Day	84 / Week
Running Reserve	300 hours at 20°C (Ni-Cd battery built-in)		-	
Charging Time	about 72 hours		-	
Time Accuracy	±15 sec. / month (at 25°C)		Same as AC frequency	
Working Ambient Temperature	-20°C bis +55°C			
Working Ambient Humidity	-85%RH or less			
Degree of Protection	IP 20 as per EN60529			
Protection Class	Class II as per EN60335-1 if installed as directed			
Pollution Degree	2			
Überspannungskategorie	III			
Wiring Terminal Capacity	1 ~ 2,5mm ²			
Weight	160g		160g	
Option Parts	TB55603777 / Terminal cover and mounting plate for wall mounting			

Parts Identification The figure shows TB556 series

- 1 Power supply indication lamp.
Quartz motor type: GREEN
Synchronous motor type: RED
- 2 Time adjust knob.
- 3 Setting pin.
- 4 ON-AUTO-OFF switch
- 5 Main dial.
24 hour dial (TB556 • TB559)
1 week dial (TB563 • TB564)
- 6 Sub-dial
60 min dial (TB556 • TB559)
24 hour dial (TB563 • TB564)
- 7 Present time index.
- 8 DIN rail fixture.



Operating instructions

1. Set all setting pins to the outside of the dial.

2. Time adjust knob.

Caution:

During this operation, do not operate the setting pins located near the present time index. Before operating these pins, turn the Time adjust knob to move them away of the present time.

Example:

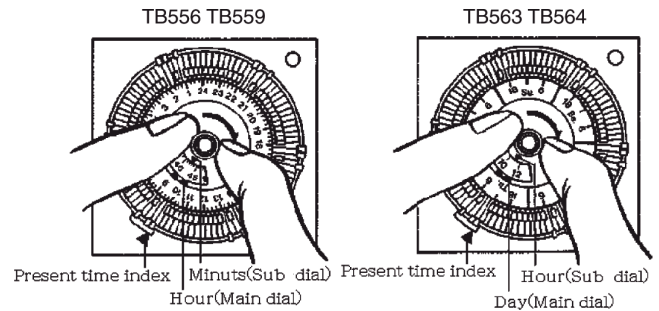
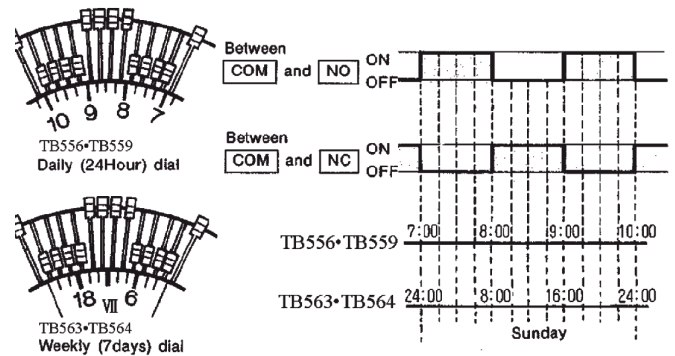
The time chart corresponding to the pin setting is shown below.

3. Adjust the present time.

Turn the Time adjust knob in the arrow direction.

Caution:

unnecessary reverse rotation results in malfunctions.



4. Set the ON-AUTO-OFF switch.

The load can be turned ON and OFF independent of the program by operating the ON-AUTO-OFF switch.

	Between COM and NO	Between COM and NC
	Permanently ON	Permanently OFF
	Permanently OFF	Permanently ON
	EIN/AUS nach Programm	

- 5. Charging battery (TB556 - TB563).
 - Supply AC power to the time switch. The battery will be automatically recharged.
 - If the battery is charged for 3 days , 300-hour power failure will be backed-up. (When it is charged for one hour, approx. 4-hour power failure will be compensated for.)
 - Frequent power failure and long-power failure exceeding the compensation time will shorten the battery life.

• Quartz motor type (TB556 • TB563) contains Nickel-Cadmium battery. The battery must be recycled or disposed of properly.

Safety Instructions

- 1. All operations serving transport, installation, commissioning, troubleshooting and maintenance are to be carried out by skilled technical personnel in accordance with the relevant safety regulations and standards.
- 2. Avoid using the time switch except for the environment condition shown in specifications. Indoor use only.
- 3. Load capacity differs , depending on the type of load. 8See specifications).
- 4. Protect the circuit with a fuse or breaker at the power supply, in accordance with the relevant regulations.
- 5. Synchronous motor type (TB559 • TB564) are not provided with running reserve function. When the time error occurs due to power failure, readjust the present time.
- 6. Make wiring connections, using insulated wire (1,0 to 2,5 mm²).
Flexibles codes conductors 1,0 to 2,5mm².
Fixed wiring conductors 1,5 to 2,5mm².
- 7. After wiring, check that wiring connections are all correct.