

# Model: GTS160

## 3-Phase ATS Panel

### Standard Features

- 1 x 4-pole load transfer switch
- 1 x 3-phase and neutral mains detector with hysteresis
- 2 x lamp indicators

### Parameters

| ATS switch model (AISIKAI brand)               |                        | SKT1-160A/4P |
|------------------------------------------------|------------------------|--------------|
| Rated current (In)                             |                        | 160A         |
| Conventional thermal current (Ith)             |                        | 160A         |
| Rated insulation voltage of copper bar (Ui)    |                        | 1000V        |
| Rated impulse withstands voltage (Uimp)        |                        | 12KV         |
| Rated operating voltage of the cooper bar (Ue) |                        | AC440V       |
| Use category                                   |                        | AC-33A       |
| Rated limiting short-circuits current          |                        | 17KA         |
| Rated limiting short-circuits current (Iq)     | Fuses for protection   | 100KA        |
|                                                | Breaker for protection | 50KA         |
| Transferring time (I – II or II – I)           |                        | 1.2S         |
| Control input voltage                          |                        | AC220V       |
| Rated control voltage                          | Start                  | 40W          |
|                                                | Normal                 | 18W          |

### Benefits

- Enhanced safety  
Double-throw contacts with inherent mechanical interlocking to prevent connection of generator and utility sources.
- High reliability, over 8000 times use.  
Electrically operated, mechanically held by a simple, over-center mechanism. The main components are worldwide famous brands.
- High electromagnetic compatibility, strong anti-interference ability.
- Automatization  
No external connection of control components needed.
- Small sized and light.

### Options

- Smartgen HAT560N ATS controller
- ABB ATS switch
- Schneider ATS switch
- SOCOMEC ATS switch

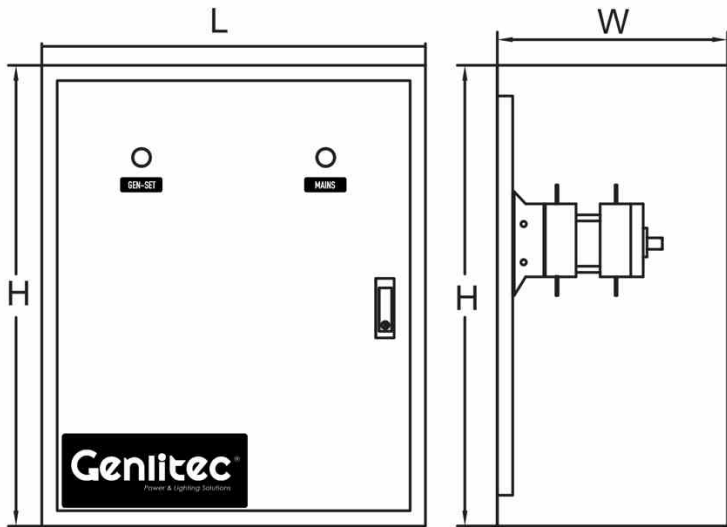
### Standards

- IEC60947-1/GB/T 14048-2000 Low voltage switchgear and control gear – General rules.
- IEC60947-3/GB/T 14048.3 Low voltage switchgear and control gear switches, disconnectors.
- IEC60947-6-1/GB 14048.11 Automatic transfer switchgear equipment.

### Images (for reference)



### Dimension



| Model  | Length | Width | Height |
|--------|--------|-------|--------|
| GTS160 | 500mm  | 300mm | 600mm  |

# HAT560N

## SmartGen ATS controller

(for options)

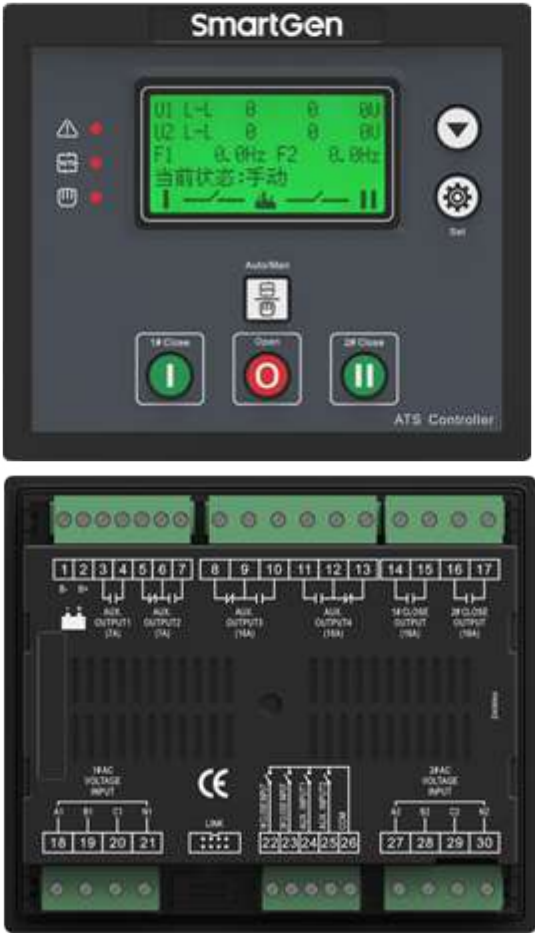
■ Description

Smartgen HAT560N series dual power ATS controller is an intelligent dual power supply module integrated with configurable function, automatic measurement, LCD display, and digital communication. It combines digitalization, intelligence, and networking together, which realizes automation for measuring and control process, reducing artificial operation mistakes. It is the ideal product for dual power transfer.

■ Features

- System type can be set to: Mains (1#) & Generator (2#), Generator (1#) & Mains (2#), Mains (1#) & Mains (2#), Generator (1#) & Generator (2#)
- 132x64 LCD with backlight, optional Chinese and English display, push-button operation
- Measure and display 2-channel 3 phase voltage and frequency.
- Over/under voltage, loss of phase, reverse phase sequence, over/under frequency protection function.
- Auto/Manual mode transfer function: in manual mode, it can force the switch to close or open.
- All parameters are configurable. Two level password ensures authorized staff operation only.
- On-load or Off-load commissioning operation on the genset can be set on site.
- ATS Controller has function of automatic Re-closing.
- Breaker close output can be set to pulse or steady output.
- Applicable for ATS of one neutral position, two neutral position and non-position.
- Design of 2 isolated neutral line.
- Real-time clock (RTC).
- Event log function allows to record 50 items circularly.
- Scheduled start & stop generator function: running once monthly/weekly, and on-load/off-load running are configured.
- It can control two generators to work cyclically, and genset running time and crank rest time can also be set.
- Optional AC system or DC system.
- LINK communication port: has "remote control, remote measuring, remote communication" function with Modbus communication protocol; genset start, genset stop, ATS close/open can be controlled remotely.
- Current controller status can be checked (digital input port, digital output port, over voltage, under voltage, over frequency, under frequency etc. circuit abnormal statuses).
- Suitable for various wiring connection type (3 phase 4-wire, 3-phase 3-wires, single-phase 2-wire, and 2-phase 3-wire).
- Modular design, self-extinguishing ABS plastic shell, pluggable terminal, built-in mounting, compact structure with easy installation.

■ Images (for reference)



■ Specifications

|                          |              |                                                                                                    |
|--------------------------|--------------|----------------------------------------------------------------------------------------------------|
| Operating Voltage        |              | <ul style="list-style-type: none"><li>• DC8.0V~35.0V continuous</li><li>• AC (170V~277V)</li></ul> |
| Power consumption        |              | <3W (Standby mode: <2W)                                                                            |
| AC voltage input         | 3P4W (ph-N)  | AC30V~AC360V                                                                                       |
|                          | 3P3W (ph-ph) | AC60V~AC620V                                                                                       |
|                          | 1P2W (ph-N)  | AC30V~AC360V                                                                                       |
|                          | 2P3W (ph-N)  | AC30V~AC360V                                                                                       |
| Rated Frequency          |              | 50/60Hz                                                                                            |
| Close Relay Output       |              | 16A AC250V Volts free output                                                                       |
| Auxiliary Relay Output 1 |              | 7A AC250V Volts free output                                                                        |
| Auxiliary Relay Output 2 |              | 7A AC250V Volts free output                                                                        |
| Auxiliary Relay Output 3 |              | 16A AC250V Volts free output                                                                       |
| Auxiliary Relay Output 4 |              | 16A AC250V Volts free output                                                                       |
| Digital Input            |              | GND connected is active                                                                            |
| Communication            |              | LINK interface, MODBUS Protocol                                                                    |
| Case Dimensions          |              | 139mmx120mmx50mm                                                                                   |
| Panel Cutout             |              | 130mmx111mm                                                                                        |
| Working Temperature      |              | (-25~+70) °C                                                                                       |
| Working Humidity         |              | (20~93) %RH                                                                                        |
| Protection Leve          |              | IP55 Gasket                                                                                        |

