OPERATORS INSTRUCTION MANUAL

GENERAL SAFETY INSTRUCTION

- > This system must always be installed and commissioned by competent and qualified personnel.
- > The maintenance operations must be carried out exclusively by authorised and appropriately trained personnel.
- > For more information see the Technical Instruction Manual.

GENERAL INTRODUCTION

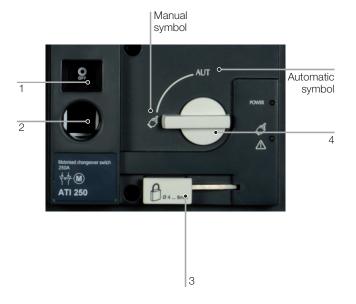
NEW ATI enclosure integrates a new 4-pole changeover switch including electronics' control to meet standard IEC 60947-6-1. ATI enclosure is also available to standard IEC 61439-2.



SWITCH MODULE INTERFACE

The new enclosure design allows switch module front panel direct access without opening of the enclosure for:

- 1. Visualization of the current changeover panel position.
- 2. Handle insertion in manual mode only to guarantee the transfer operation in any situation.
- 3. Padlocking mechanism in the 0 position (standard product) in manual mode (handle out of housing).
- 4. Functioning mode selection (Automatic/Manual).



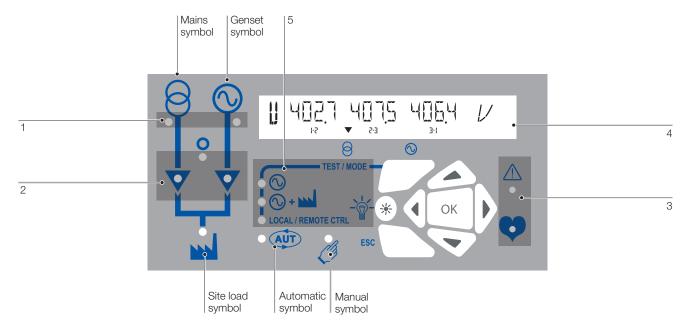
^{*}Please note padlock not supplied with panel.

OPERATORS INSTRUCTION MANUAL

ELETRONIC MODULE INTERFACE

The electronic module, also accessible from the front panel, includes:

- 1. Sources monitoring by Led: availability
- 2. Sources monitoring by Led: positions I-0-II
- 3. Transfer switches monitoring by Led (Functioning modes, Power supply, Fault)
- 4. Metering (Voltage (V) and Frequency (F) as standard), sequences' timers & settings display
- 5. Tests operations (On load & Off load)
- 6. Retransfer inhibit (RTI) Led and push button



OPERATORS INSTRUCTION MANUAL

VISUALISATION

> Led

Sources availability

Sources	Available	Not available
Mains		
	Led on	Led off
Genset	Q	©
	Led on	Led off

• Automatic Transfer Switch positions

Position I	Position I Mains			Position	II Genset
•	¥		Y	Y	
Led on		Led on		Led on	

Operating modes

AUTO	MANUAL
O AUT	O AUT
Led on	Led on

Lamp test



> Timers

Timer menu			
1FT	Loss of mains validation timer (3 sec)		
Once mains has disappeared, 1FT is started. If Mains comes back before 1FT ends, the commutation cycle is not started. (Delay on Gen start.)			
2AT	Genset stabilisation timer (5 sec)		
Generator needs to be stable during 2AT to allow transfer from Mains.			
1RT	Mains Return validation timer	(180 sec)	
Once Mains power has returned 1RT is started. If Mains power disappears before 1RT ends, the			

load is not switched back to the Mains.

• Test modes

On load	Off load
TEST / MODE	TEST / MODE
Led on	Led on

• Power supply

Active	Inactive	Blinking
•	•	Product OK
Software Error	Power supply off	

• Fault synthesis

Active	Inactive	Blinking
<u>^</u>	<u>^</u>	Lightning protection (Option)
Product error	Product OK	

2CT	Run on time timer	(180 sec)
Once the	ne load is switched back from the Ge	enerator
	4 : 00T: 1 1 1 1 0	

to the Mains, 2CT is started and the Generator will stop once 2CT is finished. (Allows generator cool down).

0DT	Dead Band timer	(3 sec)
-----	-----------------	---------

This timer is counted down before transferring the load from the Mains source to the Generator or vice versa.

OPERATORS INSTRUCTION MANUAL

OPERATING

> Automatic





In Auto Mode: O AUT





- Possible:
 - the automatic changeovers.
- Not possible:
 - to insert the handle
 - to pull the padlocking mechanism.

> Manual



In Manual Mode: O AUT





- Possible:
 - to insert the handle and to operate manualy.
- Not possible:
 - to operate electrically
 - to select the auto mode and to padlock if the handle is housing.

> Padlocking







In Padlocking Mode: O AUT





- Possible:
 - to padlock in position 0 with a standard configuration.
- Not possible:
 - to operate electrically.
 - to select the auto mode
 - to insert the handle.

*Please note padlock is not supplied with panel.

> Start/Stop group contact connection

Start Signal; Start & Stop (X & Y) should be connected to "control panel autostart signal". Refer to control panel schematic for details.

OPERATORS INSTRUCTION MANUAL

FAULT FINDING GUIDE

Symptom	Step	Result
01 Automatic operations availability.	01 AUTO Led is on. 02 Fault synthesis Led	 NEGATIVE Check that the switch has not been padlocked. Check that the manual operating handle has been removed from housing. Check that the selector has been put in AUT position. Then consult your local dealer. POSITIVE Go to the next step. NEGATIVE Led is blinking
	is off.	Check the lightning protection option and replace the fuse if damaged. Replace the fuses or the lightning protection module if damaged. Then consult your local dealer. Led is on Try to reset the product (see the instructions below). Then consult your local dealer.
		• Reset Level 1
		Level 2 Switch off the power supply during 3 minutes by removing the power supply. Open site mains breaker and generating set breaker (position 0). > POSITIVE
	03 Power supply Led is blinking.	Go to the next step. NEGATIVE Led is on: Try to reset the product (see the instructions above). Then consult your local dealer. POSITIVE
02 The mains availability.	01 Mains availability Led is on.	 Go to the next symptoms. NEGATIVE Check lamp test. Check that the mains return timer (1RT) is still not counting down. Check that the mains protection system (breaker) is on (Position 1). Then consult your local dealer. POSITIVE Go to the next steps or symptoms.
03 The genset availability (genset supposed started).	01 Genset availability Led is on.	 NEGATIVE Check lamp test. Check that the genset stabilisation timer (2AT) is still not counting down. Check that the genset protection system (breaker) is on (Position 1). Then consult your local dealer. POSITIVE Go to the next steps or symptoms.

OPERATORS INSTRUCTION MANUAL

FAULT FINDING GUIDE

Symptom	Step	Result
04 The product doesn't transfer to the	01 AUT Led is on & Fault synthesis Led	> NEGATIVE • Go to symptom 01.
genset in case of mains failure or test on load.	is off & Power supply Led is blinking.	> POSITIVE • Go to the next step.
	02 Genset is started.	 NEGATIVE Check that the mains failure timer (1FT) is still not counting down. Check the genset control panel is set to the auto position. Then consult your local dealer. POSITIVE Go to the next step.
	03 Genset availability Led is on.	> NEGATIVE • Go to symptom 03. > POSITIVE • Consult your local dealer.
O5 The product doesn't transfer to the mains in case of mains return or test on load end.	O1 AUT Led is on & Fault synthesis Led is off & Power supply Led is blinking.	> NEGATIVE • Go to symptom 01. > POSITIVE • Go to the next step.
Crid.	02 Mains availability Led is on.	> NEGATIVE • Go to symptom 02. > POSITIVE • Go to the next step.
	03 Retransfer inhibit (RTI) function is off.	> NEGATIVE • Push the ESC push button > POSITIVE • Consult your local dealer.
O6 Genset keeps on running after mains restores and switch retransfers to the mains position.	01 AUT Led is on & Fault synthesis Led is off & Power supply	> NEGATIVE • Go to symptom 01. > POSITIVE
	Led is blinking.	Go to the next step.
	The run on time timer (2CT) is still counting down (visible on the display).	 NEGATIVE Check the genset control panel is set to the auto position. Then consult your local dealer. POSITIVE Wait for the 2CT end.

OPERATORS INSTRUCTION MANUAL

FAULT FINDING GUIDE

Symptom	Step	Result
07	01	> NEGATIVE
Switch manual	Manual Led is on.	Turn the selector to the manual position.
operations are not		> POSITIVE
possible.		Go to the next step.
	02	> NEGATIVE
	The manual handle	Check that the switch has not been padlocked.
	introduction is	> POSITIVE
	possible.	Go to the next step.
	03	> NEGATIVE
	The manual	Check the required rotation of the switch.
	operation is	Check that the sufficient torque has been applied.
	possible.	Then consult your local dealer.
		> POSITIVE
		Goal reached.
08	01	> NEGATIVE
Switch padlocking	Manual Led is on.	Turn the selector to the manual position.
operations are not		> POSITIVE
possible.		Go to the next step.
	02	> NEGATIVE
	Possible to pull	Check that the product is in the 0 position for standard
	the padlocking	product.
	mechanism.	Check that the manual operating handle has been removed
		from housing.
		Then consult your local dealer.
		> POSITIVE
		Goal reached.

OPERATORS INSTRUCTION MANUAL

CONDITIONS OF USE



Hygrometry:

- 80% humidity without condensation at 55 °C
- 95 % humidity without condensation at 40 °C



Storage:

- Temperature -20 to +40 °C
- Period: 1 year max



Temperature:

- -10 +40 °C without de-rating
- +40 +65 °C with de-rating*



Power input:

• Vn = 230Vac --> [208 / 277 Vac]

* For de-rating information see Instruction Manual.

Ingress Protection:

- Enclosed: IP41
- Loose: IP2x

INSTRUCTION MANUAL REFERENCE

> For detailed instruction & installation guide, please refer to:

