# User Manual

Revision 1.009
English

## CANopen / PROFIBUS Slave - Converter

(Order Code: HD67551)

for Website information:
www.adfweb.com?Product=HD67551

for Price information:
www.adfweb.com?Price=HD67551

### Benefits and Main Features:

- Very easy to configure
- Low cost
- PROFIBUS Baudrate up to 12M
- Wide supply input range
- Isolation between two buses
- Industrial temperature range:
  -40°C / 85°C (-40°F / 185°F)

*HD67551*

For others Gateways / Bridges:

**CANopen to Modbus**

See also the following links:
www.adfweb.com?Product=HD67001 (Modbus RTU Master)
www.adfweb.com?Product=HD67502 (Modbus RTU Slave)
www.adfweb.com?Product=HD67504 (Modbus TCP Master)
www.adfweb.com?Product=HD67505 (Modbus TCP Slave)

For others Gateways / Bridges:
For **CAN bus 2.0A** and/or **CAN bus 2.0B** to **Modbus**

See also the following links:
www.adfweb.com?Product=HD67011 (Modbus RTU Slave)
www.adfweb.com?Product=HD67012 (Modbus RTU Master)
www.adfweb.com?Product=HD67514 (Modbus TCP Slave)
www.adfweb.com?Product=HD67515 (Modbus TCP Master)

Do you have an your customer protocol?
See the following links:
www.adfweb.com?Product=HD67003

Do you need to choose a device? do you want help?
Ask it to the following link:
www.adfweb.com?Cmd=helpme

## INDEX:



## UPDATED DOCUMENTATION:

Dear customer, we thank you for your attention and we remind you that you need to check that the following document is:

- Updated
- Related to the product you own

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With this "Document Code" go to web page www.adfweb.com/download/ and search for the corresponding code on the page. Click on the proper "Document Code" and download the updates.

To obtain the updated documentation for the product that you own, note the "Document Code" (Abbreviated written "Doc. Code" on the label on the product) and download the updated from our web site www.adfweb.com/download/

## REVISION LIST:

| Revision | Date | Author | Chapter | Description |
|---|---|---|---|---|
| 1.005 | 26/08/2011 | Dp | All | Added new features |
| 1.007 | 14/12/2012 | Dp | All | Change ID by SDO |
| 1.008 | 14/01/2013 | Nt & Fl | All | Added new chapters |
| 1.009 | 10/09/2013 | Fl | All | Revision |

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## SECURITY ALERT:

### GENERAL INFORMATION

To ensure safe operation, the device must be operated according to the instructions in the manual. When using the device are required for each individual application, legal and safety regulation. The same applies also when using accessories.

### INTENDED USE

Machines and systems must be designed so the faulty conditions do not lead to a dangerous situation for the operator (i.e. independent limit switches, mechanical interlocks, etc.).

### QUALIFIED PERSONNEL

The device can be used only by qualified personnel, strictly in accordance with the specifications.
Qualified personnel are persons who are familiar with the installation, assembly, commissioning and operation of this equipment and who have appropriate qualifications for their job.

### RESIDUAL RISKS

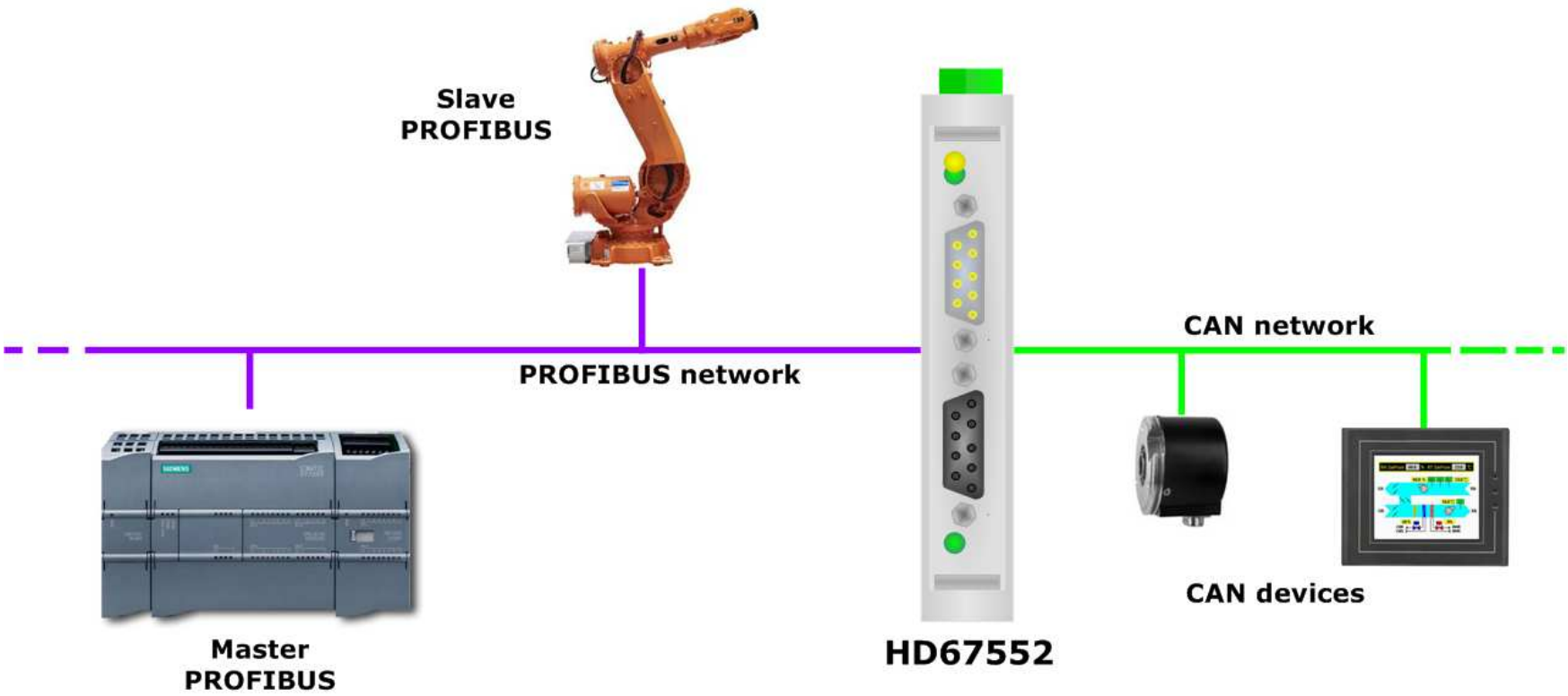
The device is state of the art and is safe. The instrument can represent a potential hazard if they are inappropriately installed and operated by personnel untrained. These instructions refer to residual risks with the following symbol:

This symbol indicates that non-observance of the safety instructions is danger for people to serious injury or death and / or the possibility of damage.

### CE CONFORMITY

The declaration is made by us. You can send an email to support@adfweb.com or give us a call if you need it.

**EXAMPLE OF CONNECTION:**



**CONNECTION SCHEME:**

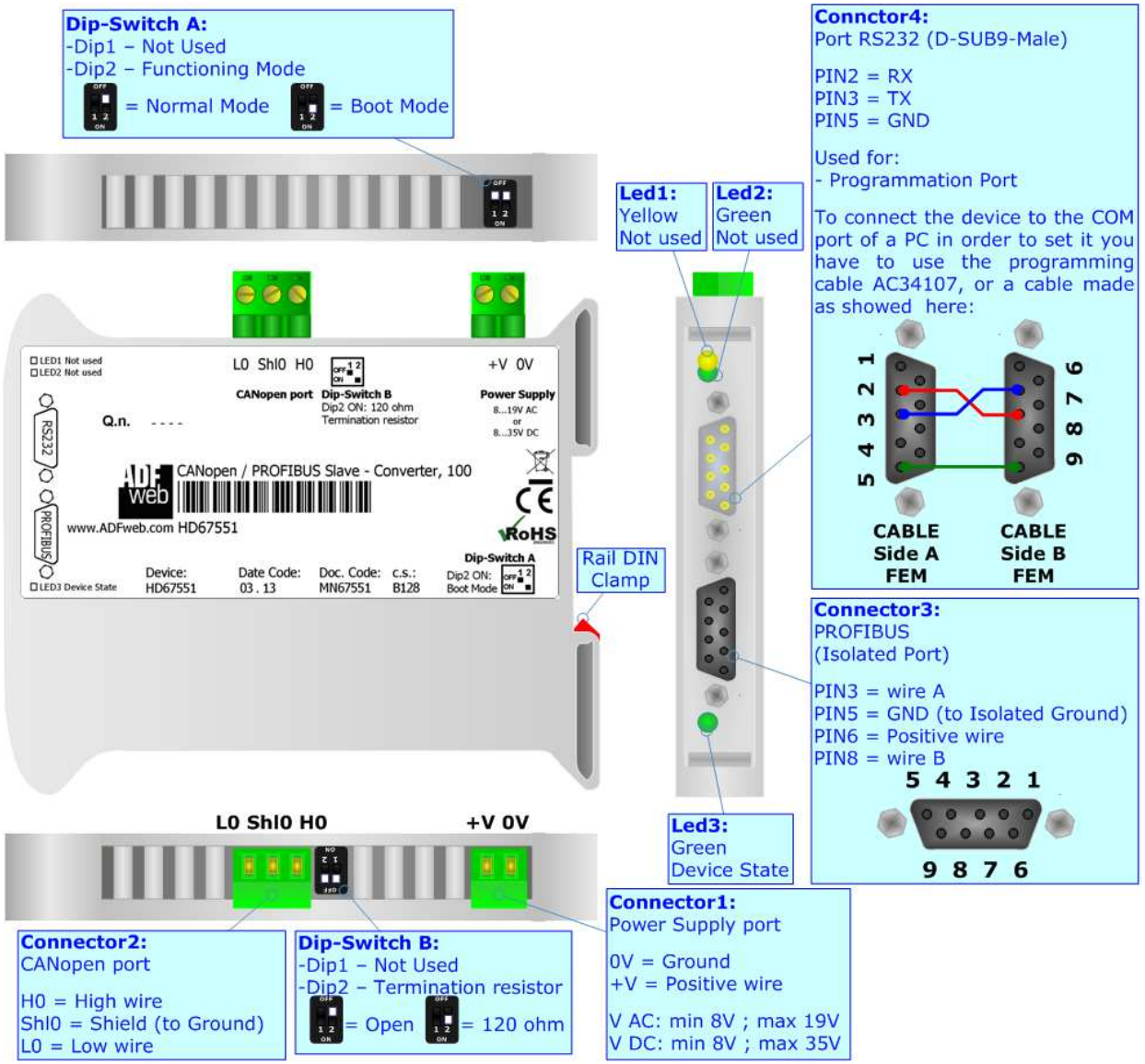



*Figure 1: Connection scheme for HD67551*

**CHARACTERISTICS:**

The Configurable CANopen / PROFIBUS Slave - Converter allows the following characteristics:

- Two-directional information between CANopen network and PROFIBUS;
- Eletrical isolation between two buses;
- Up to 244 bytes in reading and 244 bytes in writing on PROFIBUS;
- Power Supply 8…19V AC or 12…35V DC;
- Mountable on 35mm Rail DIN;
- CANopen Client;
- CANopen Server;
- PDO Producer and Consumer;
- Temperature range -40°C to 85°C.

**CONFIGURATION:**

You need Compositor SW67551 software on your PC in order to perform the following:

- Define the parameter of the CANopen;
- Define the parameter of the PROFIBUS;
- Define SDO Server informations;
- Define SDO Client informations;
- Define PDO informations (RPDO/TPDO);
- Define NodeGuarding informations;
- Transmit CANopen frames;
- Create a GSD File;
- Update the device.

**CHARACTERISTICS OF TERMINAL BLOCKS PLUGS:**

Compatible Terminal Block 2 Wire (Phoenix Contact, order code) : MSTB 2,5 HC/ 2-ST
Compatible Terminal Block 3 Wire (Phoenix Contact, order code) : MSTB 2,5 HC/ 3-ST

**POWER SUPPLY:**

The devices can be powered at 8…19V AC and 8…35V DC. The consumption depends to the code of the device. For more details see the two tables below.

| VAC ~ | | VDC ⎓ | |
|---|---|---|---|
| **Vmin** | **Vmax** | **Vmin** | **Vmax** |
| **8V** | **19V** | **8V** | **35V** |

Consumption at 24V DC:

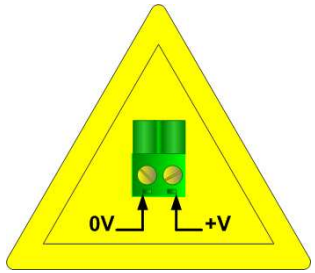
| Device | Consumption [W/VA] |
|---|---|
| HD67551 | 3.5 |

**Connector1:**
Power Supply port

0V = Ground
+V = Positive wire

V AC: min 8V ; max 19V
V DC: min 8V ; max 35V


**Caution: Not reverse the polarity power**




HD67551

**FUNCTION MODES:**

The device has got two functions mode depending of the position of the 'Dip2 of Dip-Switch A':

- The first, with 'Dip2 of Dip-Switch A' at "OFF" position, is used for the normal working of the device.
- The second, with 'Dip2 of Dip-Switch A' at "ON" position, is used for upload the Project and/or Firmware.

For the operations to follow for the updating, see 'UPDATE DEVICE' section.

According to the functioning mode, the LEDs will have specifics functions, see 'LEDS' section.

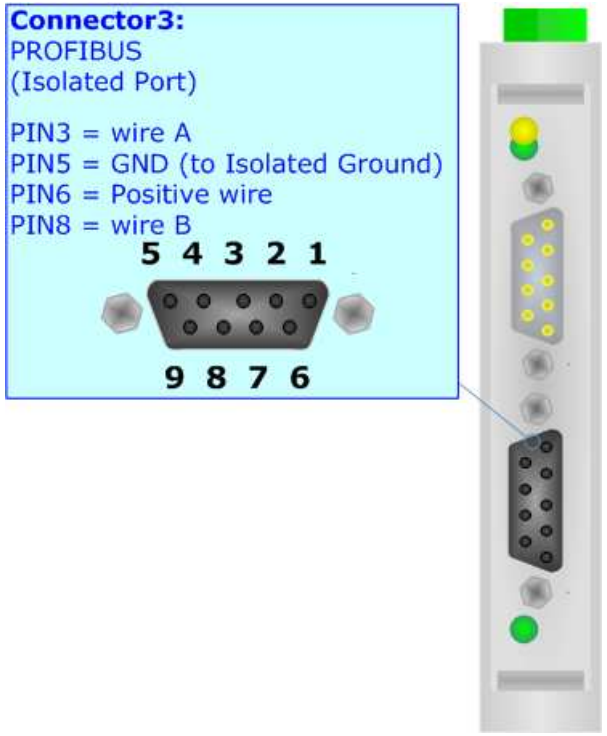
**LEDS:**

The device has got three LEDs that are used to give information of the functioning status.
The various meanings of the LEDs are described in the table below.

| LED | Normal Mode | Boot Mode |
|---|---|---|
| 1: Not used (yellow) | Not used | Not used |
| 2: Not used (green) | Not used | Not used |
| 3: Device State (green) | Blinks slowly (~1Hz) | **Blinks quickly:** Boot state<br>**Blinks very slowly (~0.5Hz):** update in progress |

**PROFIBUS:**

The PROFIBUS uses a 9-pin D-SUB connector. The pin assignment is defined like in the right figure.



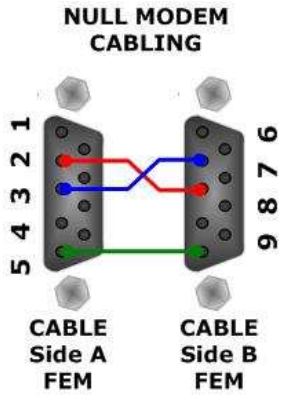

Here some codes of cables:

- Belden: p/n 183079A - Continuous Armor DataBus® ISA/SP-50 PROFIBUS Cable;

**RS232:**

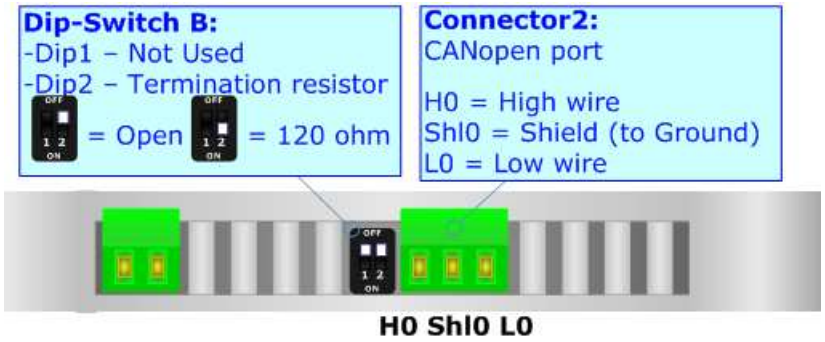
The connection from RS232 socket to a serial port (example one from a personal computer), must be made with a Null Modem cable (a serial cable where the pins 2 and 3 are crossed). It is recommended that the RS232C Cable not exceed 15 meters.

The serial port is used for programming the device.



**CANOPEN:**

For terminate the CANopen line with a 120Ω resistor it is necessary that the Dip1 of 'Dip-Switch B' is at ON position.




Cable characteristics:

| | | | |
|---|---|---|---|
| **DC parameter:** | | Impedance | 70 Ohm/m |
| **AC parameters:** | | Impedance | 120 Ohm/m |
| | | Delay | 5 ns/m |

| **Length** | | **Baud Rate [bps]** | **Length MAX [m]** |
|---|---|---|---|
| | | 10 K | 5000 |
| | | 20 K | 2500 |
| | | 50 K | 1000 |
| | | 100 K | 650 |
| | | 125 K | 500 |
| | | 250 K | 250 |
| | | 500 K | 100 |
| | | 800 K | 50 |
| | | 1000 K | 25 |

## USE OF COMPOSITOR SW67551:

To configure the Converter, use the available software that runs with Windows, called SW67551. It is downloadable on the site www.adfweb.com and its operation is described in this document. *(This manual is referenced to the last version of the software present on our web site)*. The software works with MSWindows (MS 2000, XP, Vista, Seven, 8; 32/64bit).

When launching the SW67552 the right window appears (Fig. 2).

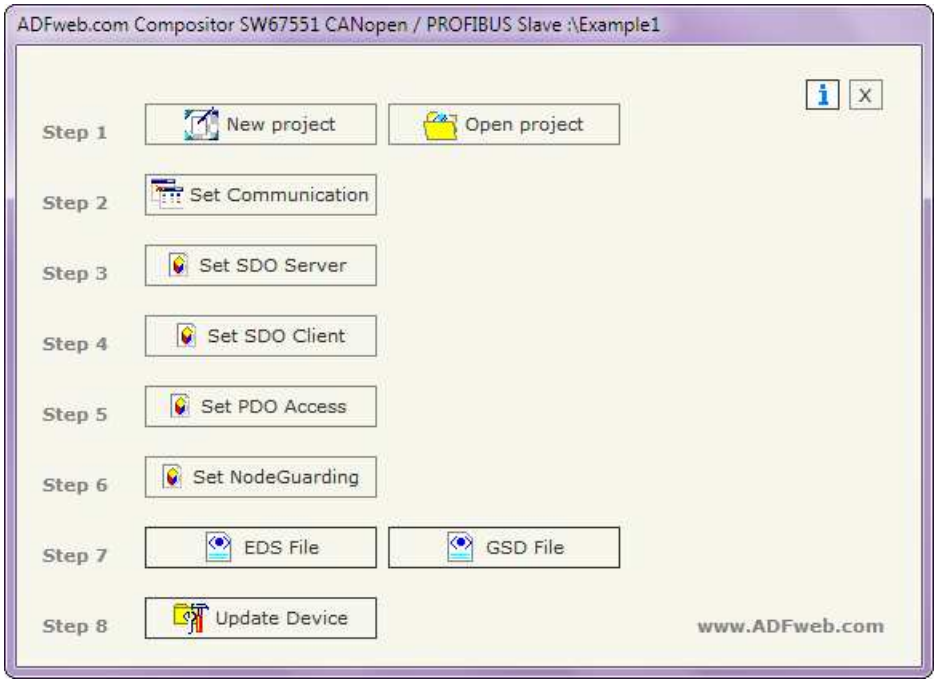
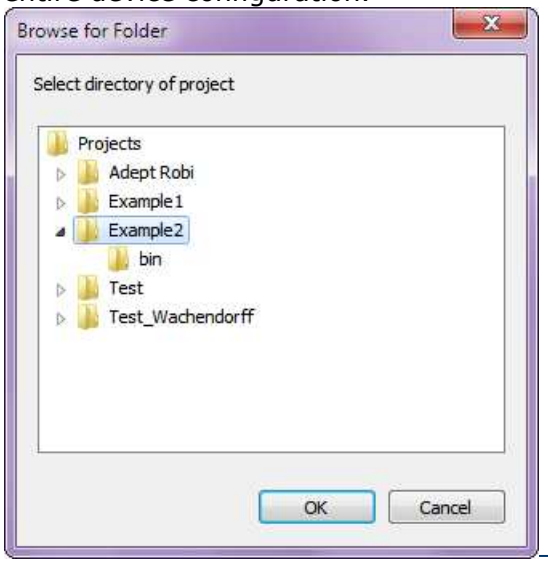



*Figure 2: Main window for SW67551*

## NEW PROJECT / OPEN PROJECT:

The "**New Project**" button creates the folder which contains the entire device configuration.





A device configuration can also be imported or exported:

- To clone the configurations of a programmable "CANopen / PROFIBUS Slave – Converter" in order to configure another device in the same manner, it is necessary to maintain the folder and all its contents;
- To clone a project in order to obtain a different version of the project, it is sufficient to duplicate the project folder with another name and open the new folder with the button "**Open Project**".

**SET COMMUNICATION:**

This section defines the fundamental communication parameter of two Buses, CANopen and PROFIBUS.

By Pressing the "**Set Communication**" button from the main window for SW67551 (Fig. 2) the window "Set Communication" appears (Fig. 3).

The window is divided in two sections, one for the CANopen and the other for the PROFIBUS.

The means of the fields for "CANopen" are:

- In the field "**ID Dev.**" the address for the CANopen side is defined;
- In the field "**Baud rate**" the baudrate for the CANopen is defined;
- In the field "**Set Operational State at Start-Up**" the state of the CANopen is defined. I.e. if it is checked the board starts in Operational State, else it starts in Preoperational;
- In the field "**Network Start ar Start-Up**" the state of the network CANopen is defined. I.e. if it is checked the board sends a command to set the Operational State of all the devices present in the network;
- In the field "**Delay**" the delay before sending the network command for the CANopen is defined;
- If the field "**Enable Send Start-up**" is checked it is possible to send a command of Network Start.
- In the field "**Write Start-Up**" and "**Read Status Start-Up**" insert the byte of PROFIBUS used for this operation. To send the Start-Up command it is necessary to put the value "0x01" in the PROFIBUS byte defined in "Write Start-Up". When the command is sent the byte "Read Status Start-Up" is set by the Gateway at 0x01. When the "Read Status Start-Up" byte is set the "Write Start-Up" can be put at 0x00 by the master PRFIBUS. Quickly the "Read Status Start-Up" is put at 0x00 and then it is possible to resend the Start-Up again, not before;

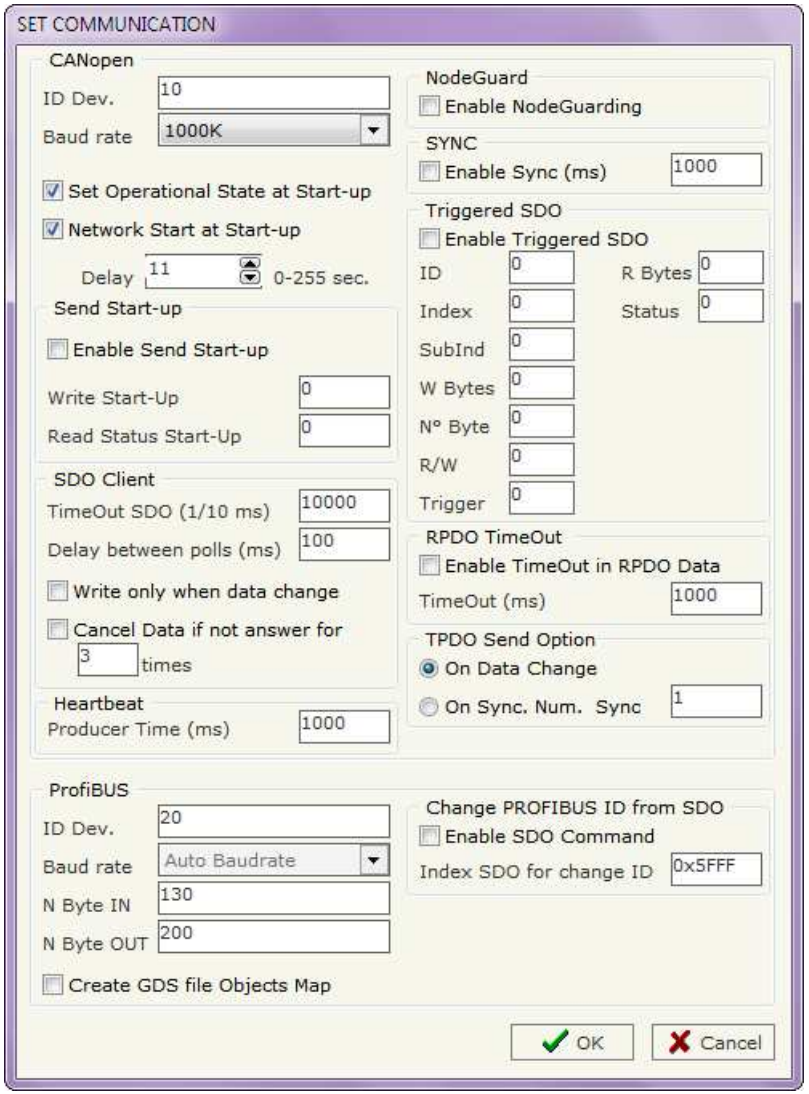



*Figure 3: "Set Communication" window*

- In the field "**Producer Time (mS)**" insert a delay time for sending the Heartbeat in the Network. If the value of this field is zero the gateway send only one Heartbeat when the gateway starts, otherwise it sends this every xx mS;
- In the field "**TimeOut SDO (1/10 ms)**" insert a time. It is the maximum time that the device attends for the answer from the Slave interrogated;
- In the field "**Delay between polls (ms)**" insert a delay time used for the request of SDO;
- If the "**Write only when data change**" field is checked, the CANopen frame is written only when the data change; otherwise the CANopen frame is written after the delay indicated in the "Delay between polls (ms)" field.
- If the "**Cancel Data if not answer**" field is checked, the gateway put to zero the data of that SDO, if it not answer for the number of consecutive times written in the "times" field.
- In the field "**Enable NodeGuarding**" select if enable or not the NodeGuard;
- In the field "**Enable Sync**" select if enable or not the SYNC message. Edit box in the right is used to indicate the delay time for sending SYNC message;
- In the field "**Enable Triggered SDO**" select if enable or not the Triggered SDO. See the section Triggered SDO at page 13 for more info;
- In the field "**ID**" (Triggered SDO section) select which byte in PROFIBUS is used to indicate the ID of the SDO;
- In the field "**Index**" (Triggered SDO section) select which bytes in PROFIBUS are used to indicate the Index of the SDO;
- In the field "**SubInd**" (Triggered SDO section) select which byte in PROFIBUS is used to indicate the SubIndex of the SDO;
- In the field "**W Bytes**" (Triggered SDO section) select which bytes in PROFIBUS are used to indicate the data in a write SDO;
- In the field "**N° Byte**" (Triggered SDO section) select which byte in PROFIBUS is used to indicate the number of byte of the SDO;
- In the field "**R/W**" (Triggered SDO section) select which byte in PROFIBUS is used to indicate if the SDO is in read or write;
- In the field "**Trigger**" (Triggered SDO section) select which byte in PROFIBUS is used to start the operation of the SDO;
- In the field "**R Bytes**" (Triggered SDO section) select which bytes in PROFIBUS are used to read the data in a read SDO;
- In the field "**Status**" (Triggered SDO section) select which byte in PROFIBUS is used to indicate the status of operation with SDO;
- If the "**Enable TimeOut in RPDO Data**" field is checked, if not arrive a RPDO within the time expressed by the field TimeOut, the Data of that RPDO will set to zero;
- If the field "**On Data Change**" (TPDO Send Change section) is checked the PDOs are sending on data change;
- If the field "**On Sync**" (Send Change section) is checked the PDOs are sending when arrive the SYNC messages;
- In the field "**Num. Sync**" (Send Change section) select the number of SYNC messages have to receive the gateway before to send the PDOs. The number of SYNC have to be between 1 and 240.

The means of the fields for "PROFIBUS" are:

- In the field "**ID Dev.**" the address for the PROFIBUS side is defined;
- In the field "**N Byte IN**" the number of byte from the master PROFIBUS to the gateway is defined;
- In the field "**N Byte OUT**" the number of byte from the gateway to the master PROFIBUS is defined;
- If the field "**Create GSD file from PDO Map**" is checked when you create the "GSD File" every PDO mapped in "Set PDO Access" is inserted in a Module, otherwise a Module contains up to 64 byte;
- If the field "**Enable SDO Command**" is checked, it is possible to change the address of PROFIBUS through CANopen SDO object;
- In the field "**Index SDO for change ID**" the index of the SDO used to change the address of PROFIBUS is defined.

**SET SDO SERVER:**

By pressing the "**Set SDO Server**" button from the main window for SW67551 (Fig. 2) the window "Set SDO Server Access" appears (Fig. 4).

This window is made to create the SDO in read or write in the CANopen side, and to indicate which bytes are associated to these SDO.

It is divided in two parts, the "ProfiBus IN --> SDO in Read" and the "SDO in Write --> ProfiBus OUT".
The first part "ProfiBus IN --> SDO in Read" is used to read, using the SDO, the data that arrived from the Master PROFIBUS.

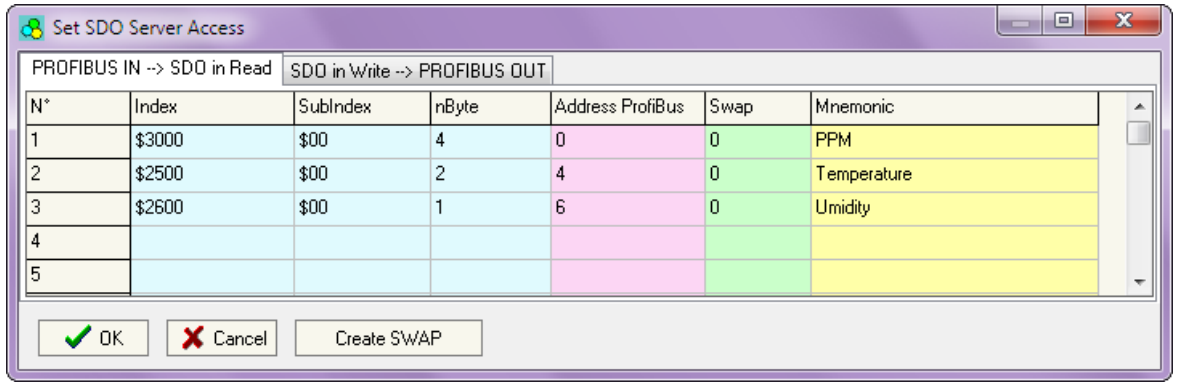



*Figure 4: "Set SDO Server Access" window*

The second part "SDO in Write --> ProfiBus OUT" is used to write, using the SDO, the data that will be sent to the Master PROFIBUS.

The fields in the two tables are the same:

- In the Field "**Index**" the address for the SDO is defined;
- In the Field "**SubIndex**" the second address for the SDO is defined;
- In the Field "**nByte**" the dimension of the SDO is defined (it can be 1, 2, or 4);
- In the Field "**Address ProfiBus**" the first byte where the data will be saved/loaded in the PROFIBUS arrays is defined;
- In the field "**Swap**" if it is necessary, it is possible to swap the SDO data;
- In the field "**Mnemonic**" the description for the SDO is defined.

By pressing the "**Create SWAP**" button from the "Set SDO Server Access" window, the window "Byte Swap" appears (Fig. 5). This window helps modify the "Swap" field.

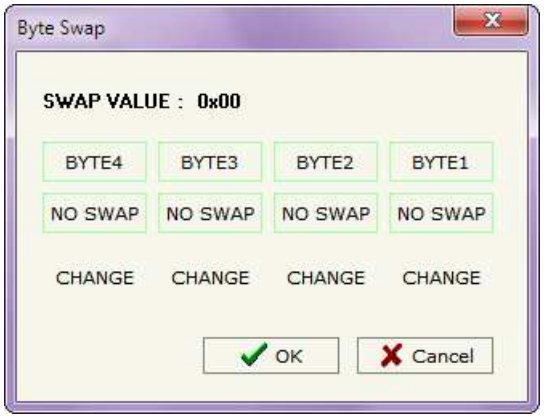



*Figure 5: "Byte Swap" window*

For example in the Figure 4 scenario:
If you want to read the data from the PROFIBUS that are saved in the position 0 of the array, you can create a SDO with index 0x3000, SubIndex 0x00, nByte 4 and Address PROFIBUS 0. In this way you are able to read 4 bytes starting from address 0 of the PROFIBUS array.

**SET SDO CLIENT:**

By pressing the "**Set SDO Client**" button from the main window for SW67551 (Fig. 2) the window "Set SDO Client Access" appears (Fig. 6).

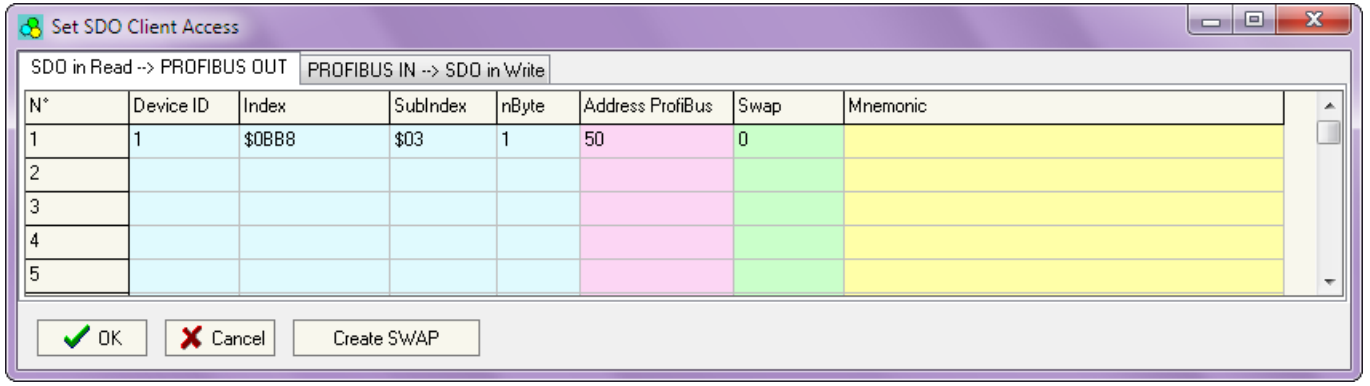



*Figure 6: "Set SDO Client Access" window*

With the SDO Client the HD67551 Gateway can read and/or write the data from other devices connected in the network.

It is divided in two parts, the "ProfiBus IN --> SDO in Read" and the "SDO in Write --> ProfiBus OUT".
The first part "ProfiBus IN --> SDO in Read" is used to read, using the SDO, the data in another device and then put this data in the PROFIBUS registers.
The second part "SDO in Write --> ProfiBus OUT" is used to write, using the SDO, the data present in the"
PROFIBUS in a device defined in the table.

The fields in the two tables are the same:

- In the field "**Device ID**" insert the ID of the device used for read or write the data;
- In the field "**Index**" the address for the SDO is defined;
- In the field "**SubIndex**" the second address for the SDO is defined;
- In the field "**nByte**" the dimension of the SDO is defined (it can be 1, 2, or 4);
- In the field "**Address ProfiBus**" the first byte where the data will be saved/loaded in the PROFIBUS arrays is defined;
- In the field "**Swap**" if it is necessary, it is possible to swap the SDO data;
- In the field "**Mnemonic**" the description for the SDO is defined.

By pressing the "**Create SWAP**" button from the "Set SDO Client Access" window the window "Byte Swap" appears (Fig. 5). This window helps modify the "Swap" field.

For example in the Figure 5 scenario:
You want to read the data from a Device with ID=20, Index=$2200, SubIndex=$00 and put these data in Address PROFIBUS 10, the same for the other two row.

**SET PDO ACCESS:**

By pressing the "**Set PDO Access**" button from the main window for SW67551 (Fig. 2) the window "Set PDO Access" appears (Fig. 7).

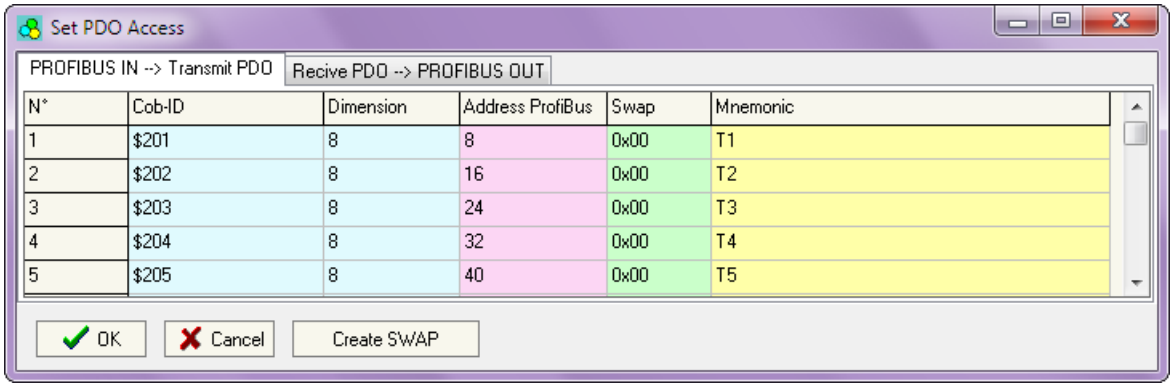



*Figure 7: "Set PDO Access" window*

This window is made to create the Receive and the Transmit PDO in the CANopen side, and to indicate which bytes are associated to these PDO.

It is divided in two parts, the "ProfiBus IN --> Transmit PDO" and the "Receive PDO --> ProfiBus OUT".
The first part "ProfiBus IN --> Transmit PDO" is used to read and transmit in the CANopen network, using the PDO, the data that arrived from the Master PROFIBUS.
The second part "Receive PDO --> ProfiBus OUT" is used to write, using the PDO, the data that will be sent to the Master PROFIBUS.

The fields in the two tables are the same:

- In the Field "**Cob-ID**" the address for the PDO is defined;
- In the Field "**Dimension**" the dimension of the PDO is defined (it can be between 1 and 8);
- In the Field "**Address PROFIBUS**" the first byte where the data will be saved/loaded in the PROFIBUS arrays is defined;
- In the field "**Swap**" if it is necessary, it is possible to create a swap of data bytes;
- In the field "**Mnemonic**" the description for the PDO is defined.

By pressing the "**Create SWAP**" button from the "Set PDO Access" window the window "Byte Swap" appears (Fig. 8).
This window helps modify the "Swap" field.

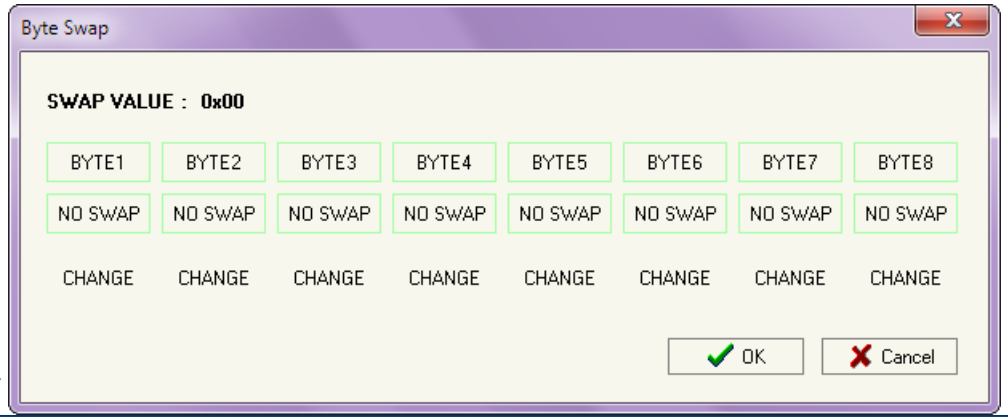



*Figure 8: "Byte Swap" window*

For example in the Figure 7 scenario:
If you want the gateway to send a PDO with Cob-ID=0x201, 8 data bytes and that these bytes start from address 20 of array of the PROFIBUS you have to compile the table such as you see in Figure 6.
I.e. Cob-ID=0x201, Dimension=8 and Address PROFIBUS=20.

**SET NODE GUARDING:**

By pressing the "**Set Node Guarding**" button from the main window for SW67551 (Fig. 2) the window "Set Node Guarding" appears (Fig. 9).

This window is used to select the CANopen devices checked with the Node Guard. This function need to be enable in General parameter section (Fig. 3).

The fields are:

- In the field "**Node ID**" insert the ID of the CANopen device to be check;
- In the field "**Guard Time**" insert the delay time of Node Guarding request;
- In the field "**Life Time Factor**" insert the number of attempts without answer before to count the CANopen device offline;

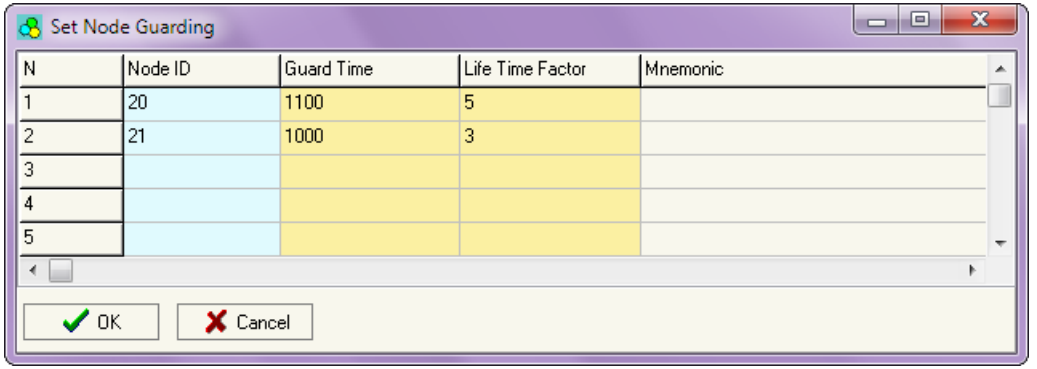



*Figure 9: "Set Node Guarding" window*

The state of the CANopen devices are saved in the last bytes of the PROFIBUS data. If you have until 8 devices to check it use 1 byte, if you have until 16 devices it use 2 bytes and so on until 4 bytes (32 devices).
Every bit rappresent a CANopen device, if it is present it equal to 1 otherwise 0.

**EDS FILE:**

By pressing the "EDS File" button it is possible to save the EDS file for the CANopen side. With this feature you can save the configuration of the gateway of the CANopen side.

**GSD FILE:**

By pressing the "***GSD File***" button it is possible to save the GSD file for the PROFIBUS side.
With this feature you can save the configuration of the gateway of the PROFIBUS side.

Note:
When you import the .gsd file on your Master PROFIBUS you have to add all the modules that are present inside it.

**TRIGGERED SDO:**

The Trigger SDO is used to send SDO request not added in the Set SDO Client Access section. To use this option is neccessary to enable it in the Set Communication Section (Fig. 3). It is neccessary to indicate where in the PROFIBUS data are present the parameter of the SDO. The Parameter write by PROFIBUS master are:

- ID. It is the ID of the CANopen device for the SDO. It use 1 byte;
- Index. It is the Index of SDO. It use 2 bytes;
- SubInd. It is the SubIndex of the SDO. It use 1 byte;
- W Byte. It is the data bytes for a Write SDO. It use 4 bytes;
- N° Byte. It is the dimension in byte of the read/write SDO. It use 1 byte;
- R/W. It is used to send a read SDO request (equal to 0), or a write SDO request (equal to 1). It used 1 byte;
- Trigger. It is used to send the SDO request.

The parameters read from PROFIBUS master are:

- R Byte. It is the data bytes read from a read SDO. It use 4 bytes;
- Status. It is the status of the SDO request. It use 1 byte.

The status can have these values:

- 0 = SDO Transaction OK and finished;
- 1 = SDO Transaction currently running;
- 2 = SDO Transaction failed;
- 3 = The gateway can accept another SDO request;

When the Trigger byte is setted to 1 the SDO request is sended to the CANopen network. The Status byte is setted to 1. If there is some error in the request the Status takes the value 2 else takes the value 0. When the SDO request is finish the Trigger byte have to set to 0 and the Status Byte become to 3. At this poit is possible to do another request.

**CHANGE PROFIBUS ID FROM SDO:**

The Change PROFIBUS ID from SDO is used to change the address of PROFIBUS (of the HD67551) using a CANopen SDO object. To use this option is necessary to enable it in the Set Communication Section (Fig. 3). It is also necessary to indicate the index of the SDO to use for change the ID PROFIBUS, the SubIndex is fixed to 0.

The SDO is available in Read and Write mode.

In Read mode is possible to know the ID PROFIBUS saved in the Flash memory of the Converter and the current ID used by the HD67551. The reading SDO return two bytes, in the first (MSB) the Address of PROFIBUS saved in flash memory is available, in the second byte (LSB) the current Address of PROFIBUS is available.

For example if the SDO return the value 0x0706 that means:

- 07 is the ID PROFIBUS saved in the Flash Memory
- 06 is the current ID PROFIBUS of the converter

In Write mode is possible to set the PROFIBUS address and/or save in flash memory.
The SDO in write use two bytes. The first (MSB) is used to understand the operation to execute, in second (LSB) is used to write the new ID PROFIBUS.

For example if write the value 0x0305 in the SDO that means:

- 03 is the operation to do with the new ID PROFIBUS
  - Bit 0 (LSB) means the new ID is saved in the Flash Memory
  - Bit 1 means the Convert reboot with the new ID
- 05 is the new ID PROFIBUS. Attention! The value for this field must be between 1 and 126.

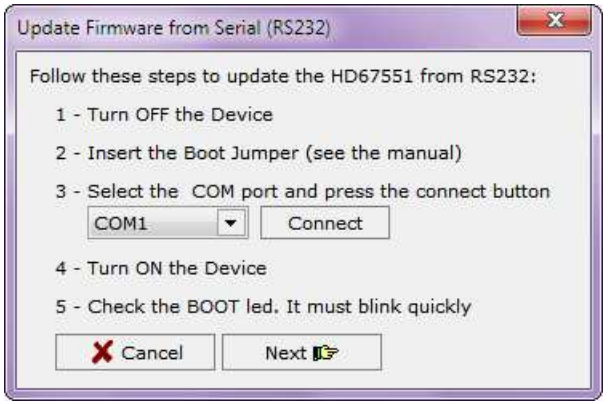
**UPDATE DEVICE:**

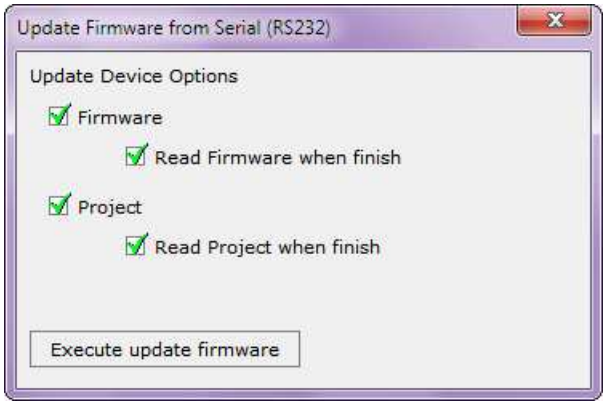
By pressing the "**Update Device**" button it is possible to load the created Configuration into the device; and also the Firmware, if is necessary.

In order to load the parameters or update the firmware in the Converter, follow these instructions:

- Turn off the Device;
- Connect the Null Modem Cable form your PC to the Converter;
- Put Dip2 of Dip-Switch A at "ON" position (see "FUNCTION MODES" section);
- Select the "**COM port**" and press the "***Connect***" button;
- Turn on the device;
- Check the BOOT Led. It must blink quickly (see "LEDS" section);
- Press the "***Next***" button;
- Select which operations you want to do.
- Press the "***Execute update firmware***" button to start the upload;
- When all the operations are "OK" turn off the device;
- Put Dip2 of Dip-Switch A at "OFF" position;
- Disconnect the RS232 cable;
- Turn on the device.

At this point the configuration/firmware on the device is correctly update.



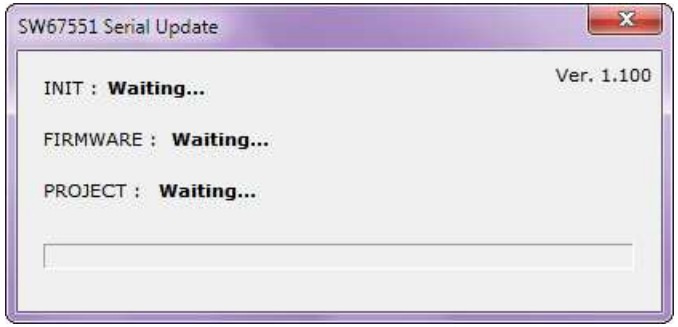




*Figure 10: "Update Device" windows*

Note:
When you install a new version of the software it is better if the first time you do the update of the Firmware in the HD67551 device.

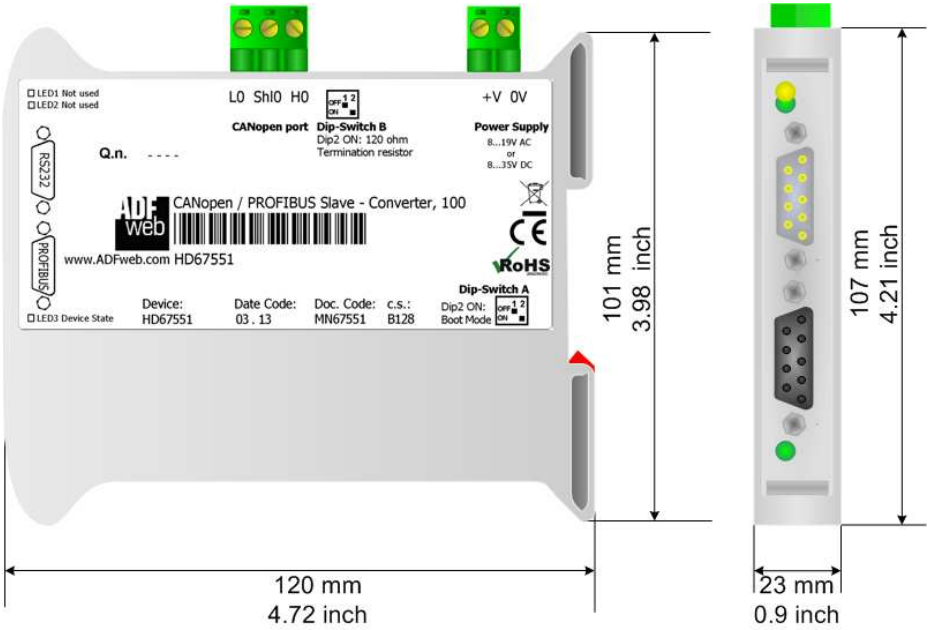
Note:
When you receive the device, for the first time, you have to update also the Firmware in the HD67551 device.

Warning:
If the Fig. 9 appears when you try to do the Update before require assistance try these points:

- Check if the serial COM port selected is the correct one;
- Check if the serial is connected between the PC and the device;
- Try to repeat the operations for the updating;
- If you are using a dongle try with a native COM port or change the dongle;
- Try with another PC;
- Try to restart the PC;
- If you are using the program inside a Virtual Machine, try to use in the main Operating System;
- If you are using Windows Seven or Vista or 8, make sure that you have the administrator privileges;
- Take attention at Firewall lock.


*Figure 11: "Protection" window*

**MECHANICAL DIMENSIONS:**




Housing: PVC
Weight: 200g (Approx)

*Figure 12: Mechanical dimensions scheme*

**ORDER CODE:**

Order Code: **HD67551** **-** CANopen / PROFIBUS Slave - Converter

**ACCESSORIES:**

Order Code: **AC34107** **-** Null Modem Cable Fem/Fem DSub 9 Pin 1,5 m
Order Code: **AC34114** - Null Modem Cable Fem/Fem DSub 9 Pin 5 m
Order Code: **AC34001** **-** Rail DIN - Power Supply 220/240V AC 50/60Hz – 12 V AC
Order Code: **AC34002** **-** Rail DIN - Power Supply 110V AC 50/60Hz – 12 V AC

## DISCLAIMER

All technical content within this document can be modified without notice. The content of the document content is a recurring audit.
For losses due to fire, earthquake, third party access or other accidents, or intentional or accidental abuse, misuse, or use under abnormal conditions repairs are charged to the user. ADFweb.com S.r.l. will not be liable for accidental loss of use or inability to use this product, such as loss of business income. ADFweb.com S.r.l. shall not be liable for consequences of improper use.

## OTHER REGULATIONS AND STANDARDS

### WEEE INFORMATION

Disposal of old electrical and electronic equipment (as in the European Union and other European countries with separate collection systems).
This symbol on the product or on its packaging indicates that this product may not be treated as household rubbish. Instead, it should be taken to an applicable collection point for the recycling of electrical and electronic equipment. If the product is disposed correctly, you will help prevent potential negative environmental factors and human health, which could otherwise be caused by inappropriate disposal. The recycling of materials will help to conserve natural resources. For more information about recycling this product, please contact your local city office, your household waste disposal service or the shop where you purchased the product.

### RESTRICTION OF HAZARDOUS SUBSTANCES DIRECTIVE


The device respects the 2002/95/EC Directive on the restriction of the use of certain hazardous substances in electrical and electronic equipment (commonly referred to as Restriction of Hazardous Substances Directive or RoHS).

### CE MARKING

The product conforms with the essential requirements of the applicable EC directives.

**WARRANTIES AND TECHNICAL SUPPORT:**

For fast and easy technical support for your ADFweb.com SRL products, consult our internet support at www.adfweb.com.
Otherwise contact us at the address support@adfweb.com

**RETURN POLICY:**

If while using your product you have any problem and you wish to exchange or repair it, please do the following:

1) Obtain a Product Return Number (PRN) from our internet support at www.adfweb.com. Together with the request, you need to provide detailed information about the problem.
2) Send the product to the address provided with the PRN, having prepaid the shipping costs (shipment costs billed to us will not be accepted).

If the product is within the warranty of twelve months, it will be repaired or exchanged and returned within three weeks. If the product is no longer under warranty, you will receive a repair estimate.