



STX-1000 Integration Module Settings Guide

Last update 09/09/2020

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1 Introduction into STX-1000 Module Settings Guide

On the page:

- [Purpose of the document](#)
- [General information about the STX-1000 integration module](#)

1.1 Purpose of the document

This *STX-1000 Module Settings Guide* is a reference manual designed for *STX-1000* Module configuration technicians.

This Guide presents the following materials:

1. general information about the *STX-1000* integration module;
2. configuration of the *STX-1000* integration module;
3. working with the *STX-1000* integration module.

1.2 General information about the STX-1000 integration module

The *STX-1000* module is a component of an ACS built on the *ACFA Intellect* Software System. It was designed to perform the following functions:

1. Configuration of the *STX-1000* hardware;
2. Interaction between the *STX-1000 hardware* and the *ACFA Intellect* Software System.

Note.

Detailed information about the *STX-1000* ACS is presented in the official documentation for this system (manufactured by GS Software).

Before configuration the *STX-1000* ACS integration module, do the following:

1. Install the *STX-1000* hardware on the protected territory (for details, see the *STX-1000* guide).
2. Connect the *STX-1000* ACS hardware to the *Intellect* Server (for details, see the *STX-1000* guide).

2 Supported hardware and licensing of the STX-1000 integration module

Manufacturer	GS Software ul. Póħanki 80 lok 402 30-740 Kraków, Poland Tel.: (+48) 12 444 69 36 www.gs-software.pl
Integration type	Low-level protocol
Equipment connection	RS-232, RS-485

Supported equipment

Equipment	Function	Features
STX-1000	Controller	<ul style="list-style-type: none"> • Communication Interface: RS 232, RS 485 • Data Rate: 9600, 19200, 57600, 115200 bps • 4 inputs, 4 outputs (with installed relays) • Readable Transponder Type: UNIQUE 125 kHz

Licensing

Per 1 controller.

3 Configuration of the STX-1000 integration module

3.1 Pre-configuring the STX-1000 ACS

The *STX-1000* ACS operates with ACFA-Intellect via a serial interface converter in Ethernet Moxa NPort.

The *STX-1000* ACS is pre-configured as follows:

1. Connect the *STX-1000* controller to the Moxa NPort converter, and connect the converter to the ACFA-Intellect.
2. Go to the web interface of the Moxa NPort Converter.
3. In the main menu, select **Operating Settings (1)**.

The screenshot shows the Moxa web interface for the NPort Converter. The left sidebar contains a 'Main Menu' with 'Operating Settings' selected (1). The main content area is titled 'Operating Settings' and is divided into three sections:

- Port 01:**
 - Operation mode: TCP Server Mode (2)
 - TCP alive check time: 7 (0 - 99 min)
 - Inactivity time: 0 (0 - 65535 ms)
 - Max connection: 1
 - Ignore jammed IP: No Yes
 - Allow driver control: No Yes
- Data Packing:**
 - Packing length: 0 (0 - 1024)
 - Delimiter 1: 0 (Hex) Enable
 - Delimiter 2: 0 (Hex) Enable
 - Delimiter process: Do Nothing (Processed only when Packing length is 0)
 - Force transmit: 10 (0 - 65535 ms)
- TCP Server Mode:**
 - Local TCP port: 4001 (3)
 - Command port: 966

A 'Submit' button (4) is located at the bottom right of the form.

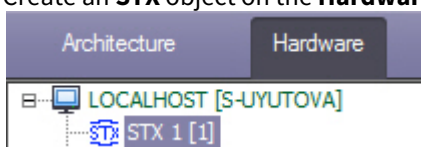
4. In the **Operation mode** drop-down list (2), select **TCP Server mode**.
5. The **Local TCP port** field (3) indicates the port that will need to be specified for connecting the *STX-1000* ACS (see [Configuring the STX-1000 ACS connection](#)).
6. Click the **Submit** button (4) to save the changes.

The *STX-1000* ACS is now pre-configured.

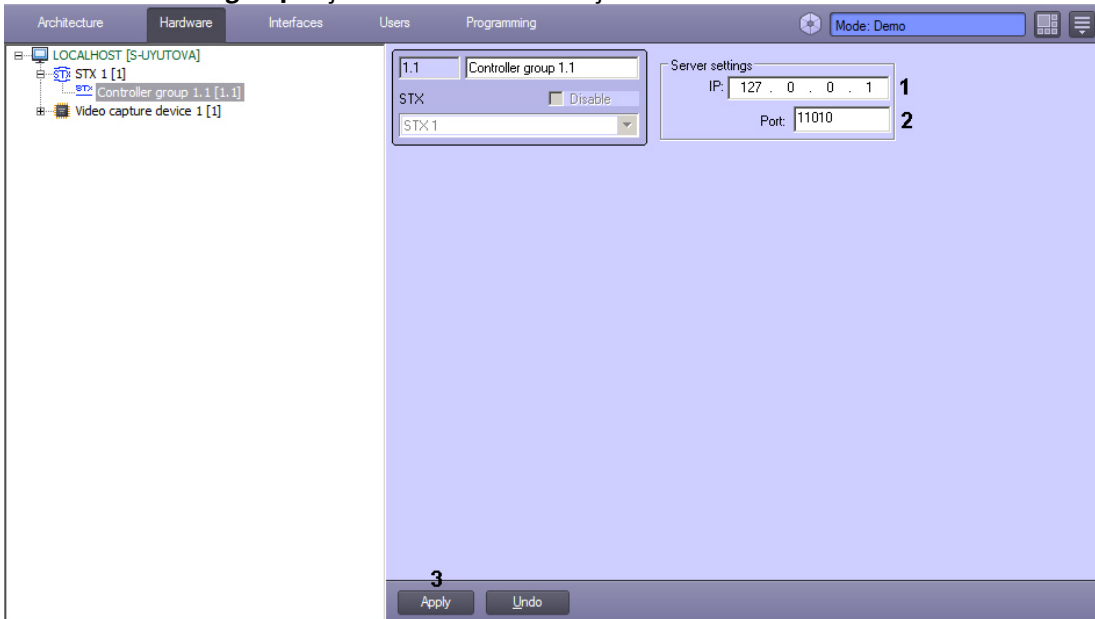
3.2 Configuring the STX-1000 ACS connection

The *STX-1000* ACS connection is configured as follows:

1. Create an **STX** object on the **Hardware** tab.



2. Create a **Controller group** object based on an **STX** object.



3. On the **Controller group** object settings panel, in the **IP (1)** and **Port (2)** fields, specify the IP address and port of the Moxa server (see [Pre-configuring the STX-1000 ACS](#)).
4. Click the **Apply** button (3).

The *STX-1000* ACS connection is now configured.

3.3 Configuring the STX-1000 controller

The *STX-1000* controller is configured as follows:

1. Go to the settings panel of the **STX-1000** object, which is created on the basis of the **Controller group** object.



2. In the **Address** field (1), enter the physical address of the controller.
3. In the **Ping (sec)** field (2), enter the time period of checking the controller communication status in seconds.
4. In the **Polling rate (sec)** field (3), enter the time period of requesting the events from controller in seconds.

- By default, the state of each input is defined as **Disabled**, and when the sensor is triggered, the input becomes **Enabled**. If it is necessary for the state of each input to be defined as **Enabled** by default, and when the sensor is triggered, the input becomes **Disabled**, then set the **Invert input processing logic** checkbox (4) (see also [Managing the STX-1000 controller](#)).
- Click the **Apply** button (5).

The *STX-1000* controller is now configured.

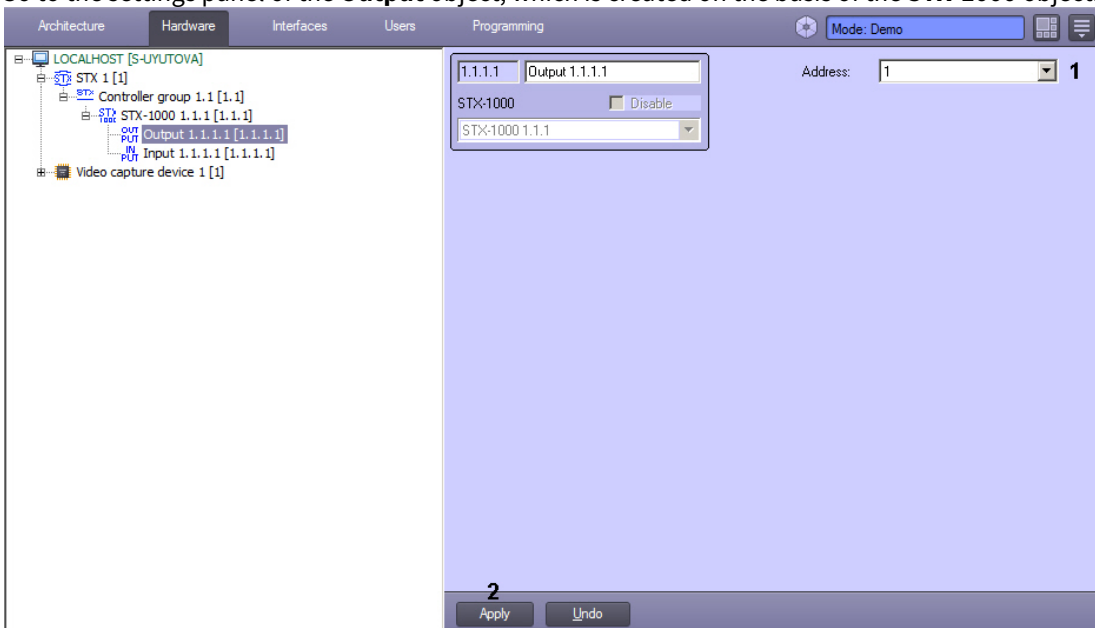
3.4 Configuring the STX-1000 controller inputs and outputs

The *STX-1000* controller inputs and outputs are configured as follows:

- Go to the settings panel of the **Input** object, which is created on the basis of the **STX-1000** object.



- From the **Address** drop-down list (1), select the required input address.
- Click the **Apply** button (2).
- Go to the settings panel of the **Output** object, which is created on the basis of the **STX-1000** object.



- From the **Address** drop-down list (1), select the required output address.
- Click the **Apply** button (2).

The *STX-1000* controller inputs and outputs are now configured.

4 Working with the STX-1000 integration module

4.1 General information about working with the STX-1000 Module

The following interface objects are used for *STX-1000* integration module operation:

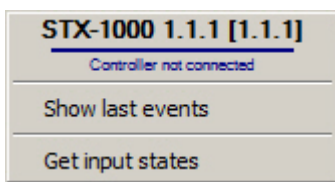
1. **Map;**
2. **Event Log.**

For detailed description of configuring these interface objects, please refer to the [Intellect PSIM Administrator's Guide](#).

For detailed description of using these interface objects, please refer to the [Intellect PSIM Operator's Guide](#).

4.2 Managing the STX-1000 controller

The *STX-1000* controller is managed in the **Map** interactive window using the **STX-1000** object functional menu:



The *STX-1000* object functional menu commands description is given in the table.

Menu command	Function performed
Get input states	Requests the status of the connected inputs. If the inversion of input processing logic is enabled on the <i>STX-1000</i> controller settings panel and all inputs are in the Enabled state, the command will return the No obstacles found event. If at least one input is in the Disabled state, the Obstacle detected event will return. If the inversion of the input processing logic is disabled and all inputs are in the Disabled state, then the command will return the No obstacles found detected event. If at least one input is in the Enabled state, the Obstacle detected event will return. <i>Note.</i> See Configuring the STX-1000 controller .



The *STX-1000* controller object can have the following states:

STX-1000 1.1.1 [1.1.1] 	Controller disconnected
STX-1000 1.1.1 [1.1.1] 	Controller connected



4.3 Managing the STX-1000 controller input and output

The *STX-1000* controller input and output are not managed in the **Map** interactive window.

The *STX-1000* controller input can have the following states:

Input 1.1.1.1 [1.1.1.1] 	Enabled
Input 1.1.1.1 [1.1.1.1] 	Disabled

The *STX-1000* controller output can have the following states:

Output 1.1.1.1 [1.1.1.1] 	Enabled
Output 1.1.1.1 [1.1.1.1] 	Disabled