

# Astra-42A Addressable hardwired smoke detector



# User guide

### Manufacturer:

ZAO NTC TEKO 420108, Russia, Kazan, Gafuri str., 71 Tel.:+7(843) 528-03-69 <u>export@teko.biz</u> www.teko.biz

#### Made in Russia

# **FUNCTION**

The detector is designed for detecting fire smoke, forming a notification of a fire and transferring the notification to the Astra-A RPA via Signaling Line Circuit (SLC). Compatible with control panels: Astra–812 Pro or Astra–8945 Pro (firmware version 4\_0 or version above).

The detector provides measurement and transmission via SLC according to Astra-A RPA Extender parameters:

a) dustiness of the smoke chamber (%)

b) ambient temperature (°C)

• Astra - 42A is powered by Astra-A RPA Extender

# **2 SPECIFICATION**

Power supply voltage, V	7.5 - 27.6
Maximum current consumption, mA	0.5
Detector's sensitivity, dB/m	0.05 - 0.2
Response, time, seconds,	10
Controlled area, m2, max. m	110
Maximum installation beight m	10

Dimensions, mm:	
- diameter	
- height	60

#### **Operating Conditions**

Temperature, °C	from - 30 to + 55
Relative air humidity, %	up to 93 at +40°C
	without moisture condensation

### **3 DELIVERY SET**

Delivery set includes: fastening parts (dowels - 2, screws - 2), protective cover – 1, sticker – 2, user guide – 1.

# **4 INDICATION**

Mode	Red LED
Standby mode	1-time flash with a period of 8-9 sec
Fire	1 time flash with a period of 2 sec when smog comes to response threshold
Test fire	1 time flash with a period of 2 sec during 30 sec after receiving an Astra-942 test command
Astra – 42A default	3 times flashes with a period of 25 sec until the default is fixed
Command receiving (laser remote)	1 time switching on for 2-5 sec

### **5 REGISTRATION IN THE SYSTEM**

1) Connect the Extender to the Control Panel using RS-485 interface.

 Register the Astra-A RPA Extender into the Control Panel according to the user guide of the panel Astra-812
 manual built into the PKM Astra Pro or Pconf-Pro software.

3) Remove the detector cover by turning it counterclockwise relative to the base (leave the protective cover on). Mounting holes

protective cover on). 4) Connect the SLC power (terminals "+" and "-") and the SLC interface (terminals "A" and "B") from the Astra-A RPA to the terminals on the base.

5) Run the registration expender mode according to use recommendations. It takes 60 sec to register a detector.



Wire entry holes

6) run registration mode via two possible ways:
First way: set the detector on the base (p. 8, a. 5) (power is switched on and SLC connected);

- Second way: with laser pointer (if the detector is on the base), direct the Astra-942 laser beam to the detector's LED using the third laser button for at least 1 sec.

#### WARNNING!

#### Running registration for several detectors at the same time is forbidden.

- 7) Registration running check:
  - In case of successful registration, you will see "SD" in the Configuration module of the "PKM Astra Pro" or "Pconf-Pro" software, or you can see "SD xxx is registered" on the Astra-812 Pro LCD screen.
  - In case of unsuccessful registration repeat actions from 5) to 7).

Notice: It is possible to start the registration mode on a detector previously registered in another Extender and not removed from it only using Laser Pointer (Astra 942).

#### **6 REMOVING DETECTOR FROM SYSTEM**

Removing a detector form Extender's memory can be held using Configuration module of "PKM Astra-Pro, Pconf-Pro or Astra-812 Pro menu.

#### **7 INSTALLATION PLACE**

1) The distance between the ceiling and sensitive element of the detector (the upper edge of the entry of smoke flows into the detector housing) in the place of its installation must be at least 25 mm and not more than 600 mm. When the detector is located at a height of more than 6 m. as well as under raised floors and above suspended ceilings, the option of access for maintenance and repair must be determined.

#### Do not install the detector:

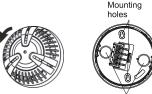
- across from the air conditioner (the further the better);

- across from the windows (decrease of the temperature or dust may cause false alarms):

3) Do not mask the detector (smoke should freely enter the smoke chamber).

### **8 INSTALLATION PROCEDURE**

1) Remove the electronic unit from the base



Wire entry holes

2) Mark the ceiling through the base

3) Insert cables through the mount holes in the detector base and connect with terminals (terminals + and - ; terminals A and B). 4) Cable type: FRLS 2×2×0.5.

Mount the base on the ceiling

6) Install the electronic unit into the base according to the picture

Remove the protective cover before launching the detector into service!

# 9 TEST

Run mode testing by using Laser pointerAstra-942:

- press the top button of the laser pointer

- direct the laser beam to the detector's LED and irradiate the LED for 1 sec.

- receive a notice Test fire in 5 sec (1x flashes with a period of 2 sec. during 30 sec.). An entry "Test fire" will be made in the event log of the Control Panel Astra-812 Pro or PKM Astra Pro, the message "Test fire" will be displayed in the PC software Pconf-Pro.

### **10 WARRANTY**

The operation warranty period is 5 years from the date of operation start-up but no longer than 5 years 6 months from the date of manufacturing subject to the requirements of User quide.