

# Company profile

Smart devices for residential and industrial automation



## ELKO EP Holding

We are a traditional, innovative and purely Czech manufacturer of electronic devices and we have been your partner in the field of electro-installations for 25 years. Thanks to the many years of experience and our market activities we are able to say that we have become specialists in the field of modular electronic devices - relays, of which we produce more than 200 types. Our own production, modern tools and devices, research and development center. All these allow us to head towards development of the most sought-after technology: the intelligent electro-installation iNELS system.



[www.elkoep.com](http://www.elkoep.com)



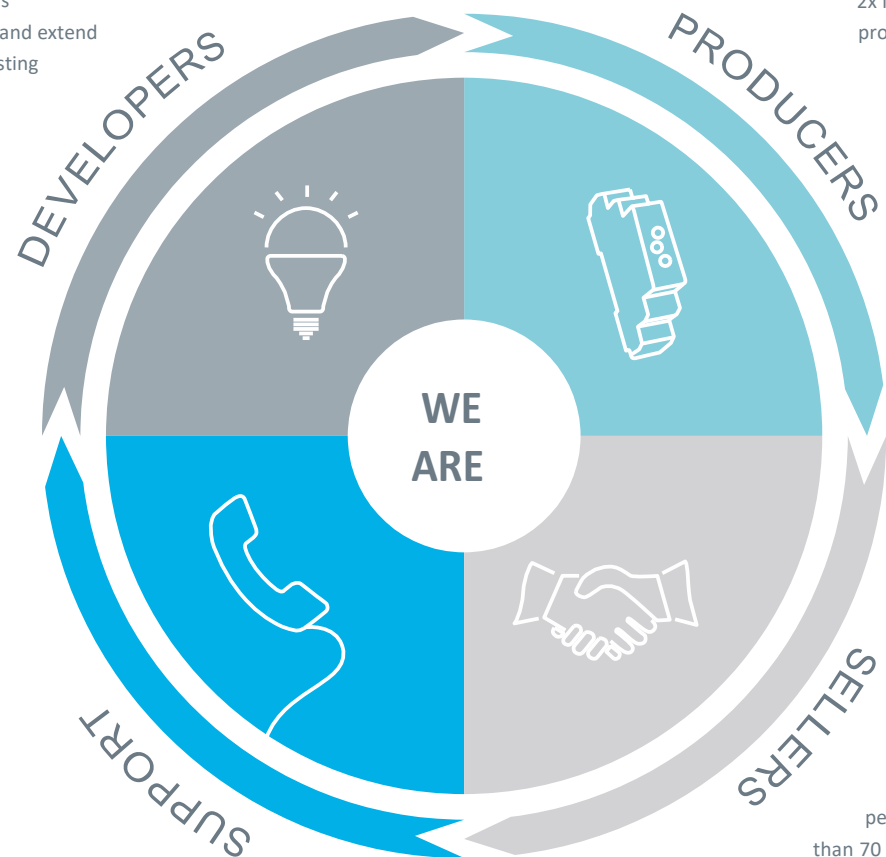
# Everything under one roof

## Research & development

In the new R&D center, more than 30 engineers develop new products and extend the functionality of existing products

## Manufacturing

modern antistatic spaces, 2x fully automated SMD production lines, 2 shift operations



## Support

24 hours / 7 days / 360 days we not only provide technical support but also logistics.

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## Sales

personal access to more than 70 sales representatives in ELKO EP Holding provides impeccable services and superior products at an affordable price.

# Product groups

## Relays

- Time relays
- Latching relays
- Auxiliary relays
- Staircase switches
- Dimmers
- Thermostats
- Level switches
- Power supplies
- Monitoring voltage relays
- Monitoring current relays

## Lighting

- LED Bulbs
- LED Tube
- LED Panel
- LED Downlight LED
- Strips
- DALI control
- DMX control

## LOGUS<sup>90</sup>

- Design lines / frame
- Sockets
- Switches and over-switches
- Pushbuttons
- Thermostats
- Motion detectors

## iNELS RF Control

- Transmitters
- Switching actuators
- Shutter actuators
- Dimming actuators
- Temperature actuators
- Analog actuators
- Smart Kits
- Apps

## iNELS BUS System

- Switching actuators
- Shutter actuators
- Dimming actuators
- Input units
- Converters
- Energy management Wall
- Controllers
- Apps

## Audio/Video

- A/V distribution
- Multimedia
- LARA
- Infra Red control
- Intercom/videophone
- Weather stations
- 3<sup>rd</sup> parties devices & systems integration

## Energy Management

- Solutions for existing buildings
- Solutions for new buildings
- Energy gateway
- Pulse converter
- Sensors
- Cloud
- Apps

## iNELS Air

- Sensors and actuators on the IoT platform

## Smart City

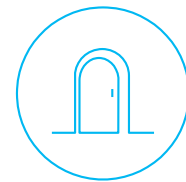
- Smart Building
- Smart Traffic
- Smart Parking
- Smart Street Lights Smart
- Cameras



## Smart Home & Building solutions

## New price configurator

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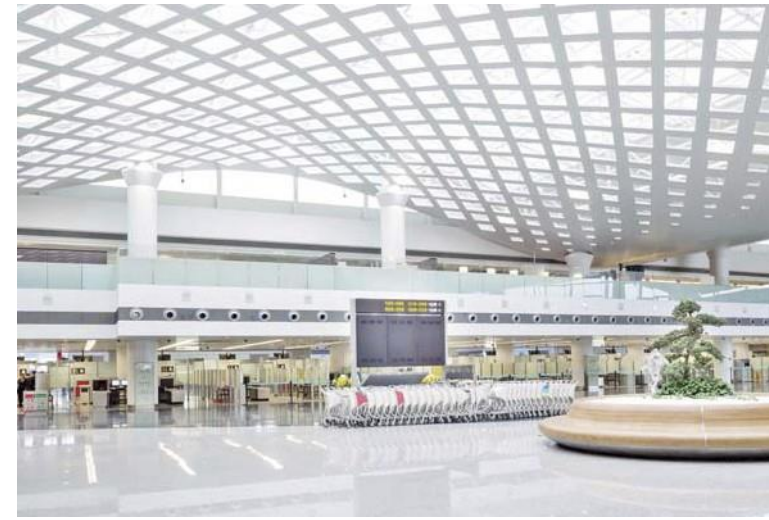
### Apartment

Wireless installation in an existing flat / apartment.



### Future office

Healthy, economical and efficient workspaces.



### Villa / House

When technologies understand each other!



### Commercial

Efficient use of technologies and energy.



### Hotel

First controller that guests can understand well.



### Smart City

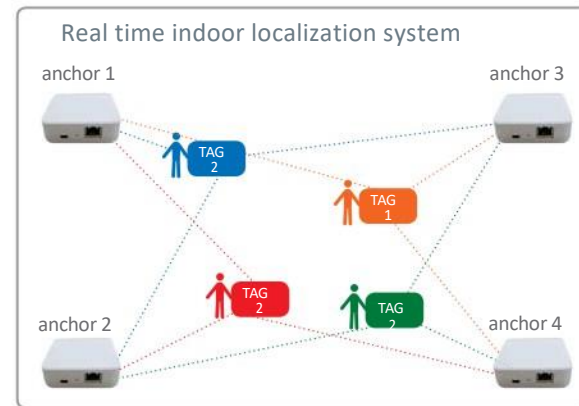
iNELS as a way to effectively manage the city.



# Future Office

The system controlling entry to the building and to the individual zones is a key factor that affects the safety of people, property and information. Automated control technologies, such as lighting, HVAC and shading again provide the optimum working environment while efficiently using energy.

[inels.com/future-office](http://inels.com/future-office)



# Smart City & iNELS Air

Functional, efficient, safe, connected smart cities. Headquarters, whose infrastructure helps to improve services that create places which allows better living and working environments. Solutions to save and help people spend ten minutes less in traffic jams or in finding parking places.

[inels.com/smart-city](http://inels.com/smart-city)



- CHYTRÉ KAMERY
- CHYTRÉ SEMAFORY
- CHYTRÉ VEŘEJNÉ OSVĚTLENÍ
- CHYTRÉ BUDOVOY
- CHYTRÁ PARKOVIŠTĚ

# High-level technology...

- more than 90 % share formed by SMD components 2x fully
- automated Samsung SMD production lines capacity: 45.000 components / hour
- the minimum chip size is 0105 (0.4 x 0.2 mm), the maximum size is qfp 55 x 55 mm



## Loader

A device that loads printed circuit boards from a magazine on a line conveyor belt.

## Screen printing

Flexible, fully automatic in-line screen printing for printing adhesives and paste on DPS with 2D inspection.

## 2x pick & place machines

It mounts chips from 0201 (0.6 x 0.3mm), through CSP up to BGA with dimensions of 55 x 55mm with terminal spacing of 0.3 mm. The machine has six heads with its own video camera.

## Inspection station conveyor

Used to perform optical inspection of previous processes.

## Reflow soldering oven

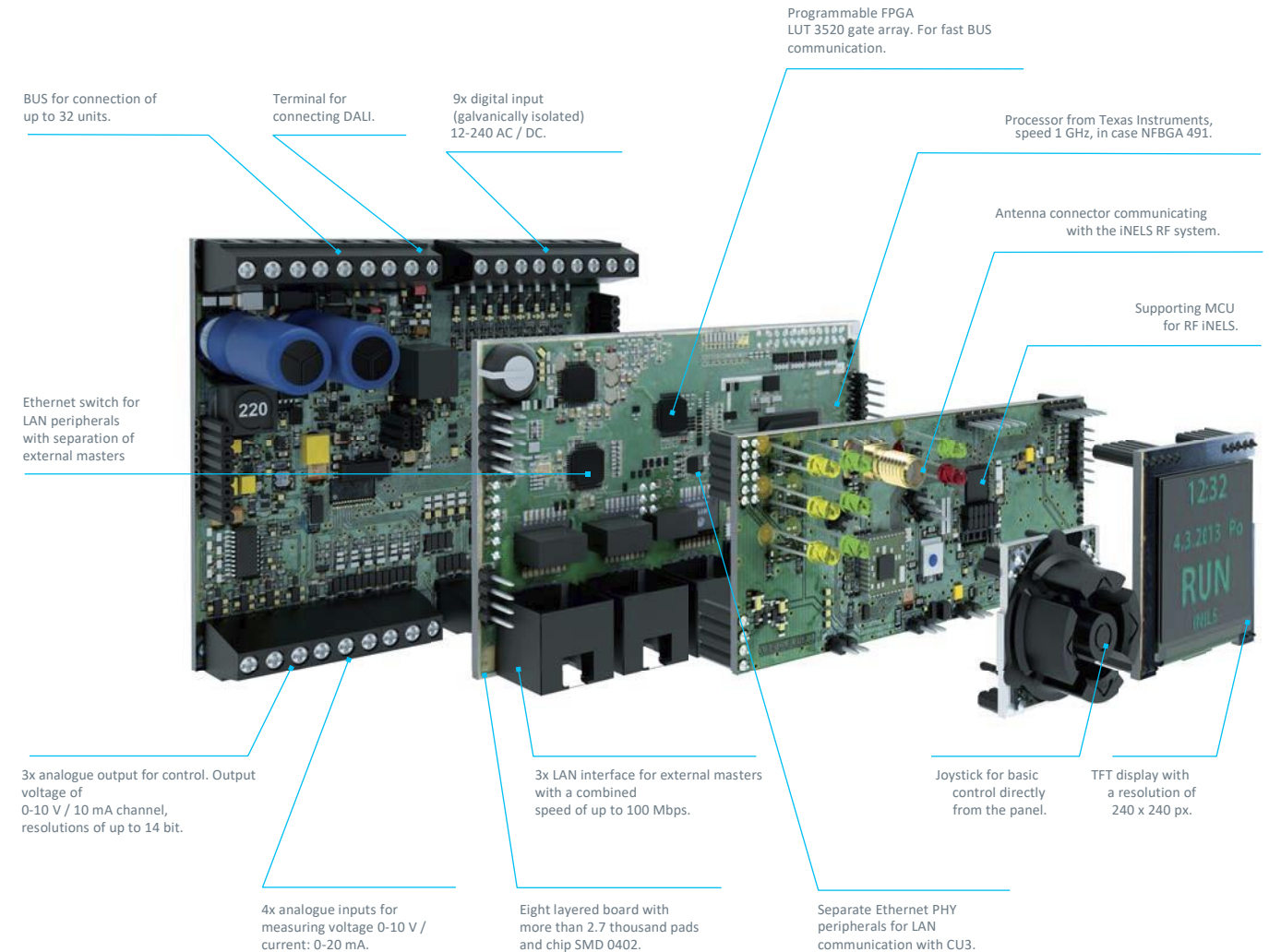
Based on type of chosen technology, it activates an adhesive or directly reflows paste in the soldered joint. In fourteen zones, it is possible to set the ideal soldering process curve.

## Unloader

A machine that loads PCBs from the conveyor belt into the magazine.

# ...allows us to make high-tech products

This is how the new iNELS BUS system central unit looks!





## Apartment

- **NIKOLA TESLA**  
Prague, Czech Republic
  - 8 apartments
  - LARA Intercom
  - lighting control



- **APARTMENT**  
Prostějov, Czech Republic
  - wireless control
  - lights
  - home appliance integration



- **APARTMENT**  
Prague, Czech Republic
  - 6 dimm, 25 switch lights
  - shutters, curtains
  - individual heating control

## Villa

- **VILLA**  
Dubaj, UAE
  - garden irrigation
  - home appliance integration
  - intercom and LARA



- **VILLA**  
Brno, Czech Republic
  - integrate security system
  - 10 dimm, 35 switch light
  - sauna, whirlpool
  - home appliances



- **A HOUSE ON ITS ROOF**  
Liptovský Mikuláš, Slovakia
  - control the switching and dimming of lights control
  - machines (helicopter, motorcycle, ...) sound and
  - lighting effects triggered by motion detectors
  - machines controlled via tablet





## Hotel

### ○ KEMPINSKI

Almaty, Kazakhstan

- 5-star hotel in Almaty Kazakhstan lighting
- control in public areas
- more than 15 000 lighting are control through the DALI protocol
- setup scenes



### ○ MERIT PREMIUM

Kyrenia, Cyprus

- lighting control
- crystal chandelier
- starry night sky control
- audio/video system



### ○ MARRIOTT MARQUIS

Doha, Qatar

- 5-star hotel in the Doha City center
- 44 floors, 397 rooms, 182 suites, 18 meeting rooms
- lighting control
- HVAC control
- master switch OFF

## Commercial

### ○ JAMIE'S ITALIAN CASTLE

Budapest, Hungary

- iNELS BUS System is controlling lighting and terrace-cooling/heating in the restaurant
- additional switched lighting circuits
- are controlled by 5 piece of SA3-06M actuator



### ○ MAGYAR STATE OPERA

Budapest, Hungary

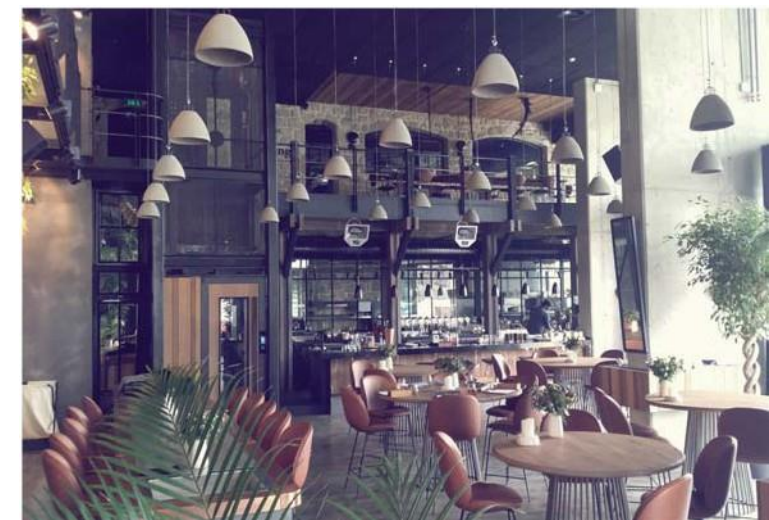
- every additional lighting source is also controlled by iNELS system.
- The devices here are controlled by RF Touch. for switching the RFSA-11B and RFSA-66M is used.



### ○ ALANCHA BESIKTAS

Istanbul, Turkey

- complex lighting control audio system
- HVAC and heating pump
- 



### ○ MIDDLE EAST ELECTRICITY

Dubai (UAE)



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