

EXPO CENTER

SECURITY CHECK

ALARM
39595
READY

miniEXPLONIX

miniEXPLONIX Pro

Handheld Explosive Trace Detector

Rapid and reliable detection
of explosive traces

Technical



15 seconds start-up time

Simple use - one button operation

Battery for 4h of continuous run

1.6" colorful OLED display

USB 2.0, Wi-Fi optional

Featured

- **Sensitivity** The unique, patented technology IRSSIL brings the desired performance. The miniEXPLONIX Pro detects traces of all-known explosives at nanogram level.
- **Dimensions** The compact case with small dimensions is essential in harsh condition. With the size close to a half-liter bottle you can carry the device whole day on your belt.
- **Speed** Sudden situations demand maximum operational speed – miniEXPLONIX Pro starts up in just 15 seconds and then detects threats within seconds.
- **Field use** The heavy duty case is specially designed for the use with broad band of security forces where you can meet the wide spectra of different tasks. Be prepared!
- **Simple control** It is so simple - press the button for the first time to turn the device on, press it second time to launch the scan and press the button longer to turn the device off.
- **Robustness** The miniEXPLONIX Pro can be built for the worst conditions - dust, humidity, dirt, cold or hot weather. The device is extremely resistant to odors and interferences.



miniEXPLONIX Pro – Powerful Detection in the Palm of Your Hand

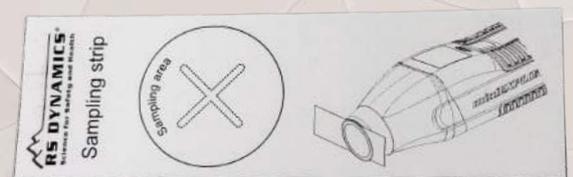
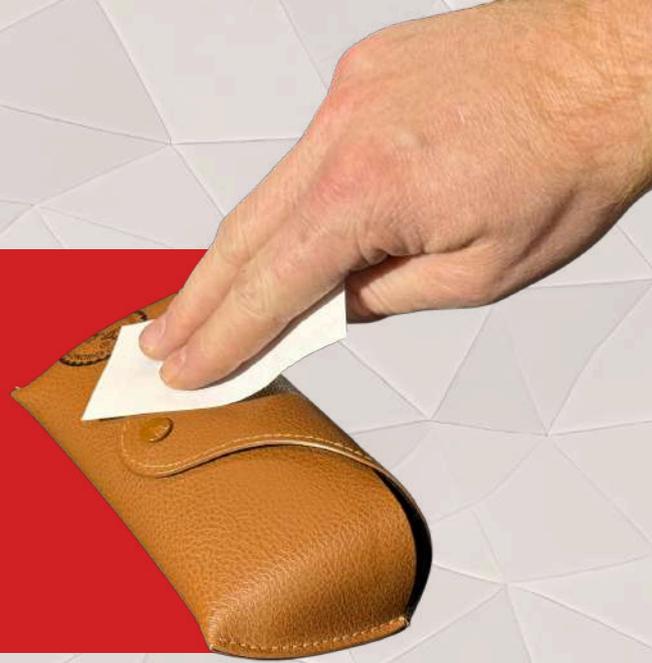
The miniEXPLONIX Pro is a next-generation explosive trace detector engineered for professionals who demand uncompromising performance in a compact form. Thanks to its exceptionally small size and low weight, it offers unmatched mobility without sacrificing detection capability.

Designed for speed and reliability, miniEXPLONIX Pro delivers rapid results and unbeatable performance even in challenging operational environments. Its intuitive operation and robust construction make it a trusted tool for security forces, border control, law enforcement, and critical infrastructure protection. The miniEXPLONIX Pro is a device you can rely on when every second counts and speed is essential.

Practical

Step 1 Swab the Surface

Use this Sampling strip to collect traces of explosives from the surface of a highly exposed object that may be contaminated with residual traces.



Single use standard
Sampling strip



Step 2 Analyse the Sample

The miniEXPLONIX Pro is equipped with integrated slot dedicated for standard Sampling strips protecting your fingers of burning.

Step 3 Get the Result

The miniEXPLONIX Pro provides instant response to the analysed sample. After the current scan, you are immediately ready for another one - scan again without delays!



What's inside



- miniEXPLONIX Pro
- Detection cartridges
- Li-ion battery
- Belt holster
- USB cable
- Car charger
- Wall adapter
- External charger
- Sampling strip packs
- Functionality verification kit

Sampling Method: What Really Matters

Detecting trace amounts of explosives is a complex task due to the physical and chemical properties of most energetic materials. One of the main challenges arises from the extremely low vapor pressure of explosives such as RDX, PETN, TNT or nitrocellulose. This property limits the effectiveness of direct air sampling, often referred to as vapor sampling.

In contrast, surface sampling targets microscopic solid residues that are transferred to objects through handling, packaging, or proximity to explosives. These residues adhere to surfaces such as luggage, clothing, tools, or skin and are far more concentrated than airborne vapors. Surface sampling typically involves swabbing an object with Sampling strip to physically collect explosive particles. Afterwards, the sample must be converted into a detectable form. This is achieved through thermal desorption, where the collected particles are rapidly heated up using a desorption heater. By decoupling sample from vapor generation, thermal desorption dramatically improves sensitivity, selectivity, and reliability.

Surface sampling combined with thermal desorption overcomes these challenges by collecting concentrated residues and converting them into a detectable vapor under controlled conditions. For this reason, modern explosive trace detection systems rely primarily on surface sampling rather than direct air sniffing.



**Reusable Advanced
Sampling strip**

APPLICATIONS:



Defense

Explore the miniEXPLONIX Pro - highly reliable, robust and compact instrument to increase security for those on the frontlines counteracting the threat of enemy attacks.

Ports & Border Control

We offer the miniEXPLONIX Pro - real field solution with instant detection of explosive traces found on baggage and packages. The detection of potential terrorist threats has never been easier before.



Customs

The miniEXPLONIX Pro offers an unbeatable solution for customs applications for quick and reliable detection of invisible threat hidden in packages or another cargo.

Urban Security

Threats from terrorist attacks are present nowadays in public facilities or in public events. This implies the need for tools that cover field applications, ideally with very portable and handheld device.



Governmental

With the miniEXPLONIX Pro you can protect the critical infrastructure - either the governmental institutions, infrastructure or logistic facilities. Anywhere fast and reliable security needed.

RS DYNAMICS LLC is a trusted Swiss developer and manufacturer of highly advanced and exceptionally mobile handheld explosive and narcotic detectors and identifiers. With a global presence, our instruments are trusted and utilized by security agencies and organizations across the world. As proud pioneers in the field, our flagship product, the miniEXPLONIX Pro, stands as the fastest, smallest, and most accurate mobile trace detector available today.



Headquarters:

RS DYNAMICS LLC
Bleichstrasse 8
6300 Zug
Switzerland

Office:

RS DYNAMICS LLC
Technoparkstrasse 1
8005 Zürich
Switzerland

Technical Support:

RS DYNAMICS Ltd. Europe
Starochodovská 1359/76
14900 Prague
Czech Republic, EU

info@rsdynamics.com

www.rsdynamics.com