



# HI-PE Plus

## ENHANCED WALK-THROUGH MULTI-ZONE METAL DETECTOR

NEW CERTIFIED  
IP66 CONTROL  
UNIT

### KEY FEATURES

- Accurate Detection of all Metallic Threat Items
- High Discrimination and Throughput
- Exceptional Immunity to external interferences
- Compliant with and Certified to the Strictest Security Standards for weapons detection
- Unmatched Reliability
- Rapid Installation
- Panel Design

CERTIFIED BY GOVERNMENTAL LABORATORIES\*

\* Data available upon request



www.ceia.net

THREAT DETECTION THROUGH ELECTROMAGNETICS



The **HI-PE Plus Multi-Zone Metal Detector** provides accurate detection of all metals, high level of discrimination of non-threat items, full compliance with the latest Security Standards and exceptional immunity to external interferences.



**ACCURATE DETECTION OF ALL METALLIC THREAT ITEMS**

- Capability to detect the full range of metal weapon threats even within body cavities
- 60 localization zones: • 20 vertical • 3 lateral
- Met-Identity technology for Identification of Threat Composition



The most advanced Security Standards require detection of all ferrous and non-ferrous metal weapons and of those constructed in special non-magnetic alloys. **The HI-PE Plus detects firearms and knives of this type, even when they are hidden within body cavities**, and accurately indicate the position of the threat, its intensity and its prevalent composition. Inspection personnel thereby acquire thorough knowledge of the metal item and can act, according to procedures, with maximum effectiveness and security.

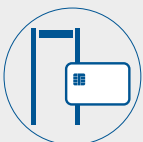


**MOST POWERFUL AND VERSATILE SECURITY FEATURES**

- Up to 50 built-in Security Programs
  - ▶ Up to 30 International Standards
  - ▶ Up to 20 Customizable Levels

**Setting the Security Levels could not be easier and more versatile than in the HI-PE Plus.**

Users can choose directly from the known International Standards or request implementation of a Standard personalized to their own requirements. Users can also create their own program and save it in internal memory for later use.



- Chip Card system for fast, simple and secure parameter changes (i.e. alarm volume and tone, counter reading, etc..and security level selection

One unique characteristic of the CEIA metal detectors is the **chip-card system**, which allows Security Management to set the Security Level quickly, reliably and without having to program the device in any way.

- Any security standard can be enhanced with selectable random alarm probability

**60 LOCALIZATION ZONES**



**CHIP CARD SYSTEM**

The system allows Security Management to **set the Security Level quickly, reliably** and without having to program the device in any way.



The **HI-PE Plus** has a **very low nuisance alarm rate even at the strictest Security Standards requested today**, and therefore allows high transit flow rates and the minimum need for intervention by inspection personnel.



### HIGH DISCRIMINATION AND THROUGHPUT

- Cutting-edge discrimination technology allows personal effects to be ignored, creating rapid transit flow
- No need to remove items such as belts, coins, keys, jewelry, watches, wallets, etc.
- Better Discrimination = Shorter Lines and Less Staffing

The transit volume magnetic scanning system, invented by CEIA and applied since production of the first zonal Metal Detectors in 1986, **allows state-of-the-art detection and discrimination results.**

The HI-PE Plus has a very low nuisance alarm rate even at the strictest Security Standards requested today, and therefore allows high transit flow rates and the minimum need for intervention by inspection personnel.



### MET-IDENTITY TECHNOLOGY

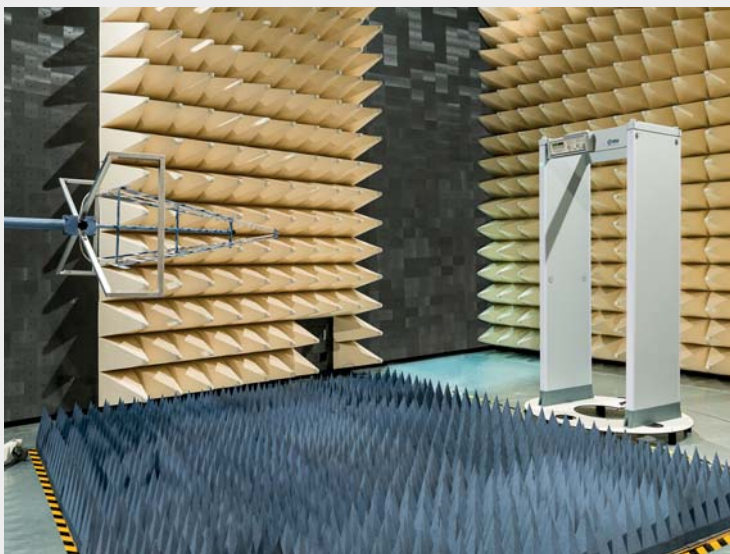
With Met-Identity technology, the HI-PE Plus allows you to know where, how much and what type of metal is being brought into the secure area.



▶ FERROUS METAL    ▶ NON FERROUS METAL



### EXCEPTIONAL IMMUNITY TO EXTERNAL INTERFERENCES



Exceptional immunity to environmental interferences makes the Metal Detector easy to use even when electrical noise is encountered.



UNIFIED CONSTRUCTION  
FOR INDOOR AND  
OUTDOOR USE



### NEW CERTIFIED IP66 CONTROL UNIT

- New integrated design
- Total compatibility with IP20 (plastic) and IP65 (stainless steel) control units
- Robust structure through the use of high-performance polymers for the construction of housing
- Waterproof / Dustproof: IP66 compliant (IEC 60529)
- Exceptional impact resistance at low and high temperatures and resistance to corrosion from atmospheric agents
- Display made with specific polymer to improve the visibility of the LEDs by increasing the definition and clarity



### UNIQUE ALARM SIGNALLING

- High visibility of the control unit and the zone indication independent from the operator position and the installation environment
- Flexible Acoustic Alarm Signaling System:
  - ▶ 10 Continuous and Pulsed Tones
  - ▶ 34 Special Sounds
- 10 Alarm Volume Levels
- Very High Precision Transit Counter

**Accurate signaling is essential for best operation and flow management.** The detector provides the user with fully-programmable signaling. Both entry-points can indicate with a **high level of accuracy, even simultaneously, the vertical and lateral areas of transit of the threats detected**, and can also be configured as 'traffic lights' to control transits through the detector.



SPECIFIC SHOE ALARM  
COLOR INDICATION



HIGH PRECISION  
TRANSIT COUNTER



### RAPID INSTALLATION

- One touch guided automatic installation (OTS)
  - ▶ Innovative function assisting the installation through an automatic step-by-step procedure
- Continuous self diagnostics assures monitored performance reliability



- ✓ In-Bound Transits
- ✓ Out-Bound Transits
- ✓ Alarm Rate
- ✓ Automatic Compensation for repeated transits of the same person

## HI-PE PLUS/PZ MODEL CONFIGURATION

### STANDARD CONFIGURATION

Compliant with the strictest detection and discrimination standards for EMDs [Enhanced Metal Detectors]	●
4 display bars each programmable as zone indicators and/or pacing lights	●
60 localization zones [20 vertical x 3 lateral] with left, center and right indication	●
Specific Shoe Alarm color indication	●
Antivandalic and Antitampering IP66 control unit	●
High precision transit counter [2-beam]	●
Chip Card Reader	●
BT, infrared and RS-232 communication	●
Programmable Random Alarm capability	●
3-Level Password and hardware key access protection	●
Met-Identity technology [separate Ferrous and Non-Ferrous alarm signaling]	●
One Touch Automatic Self Installation [OTS]	●
Automatic Operational Functional Verification [OFV]	●
Automatic Vibration Compensation [AVS, EVA]	●
Automatic Channel Search [CS]	●
Automatic Floor Gain Adjustment [FGA]	●
Automatic Technical Functional Verification [TFV]	●
Automatic Environmental Noise Compensation [ENA]	●
Powered by safe low voltage DC	●
Anti-tamper on/off switch	●

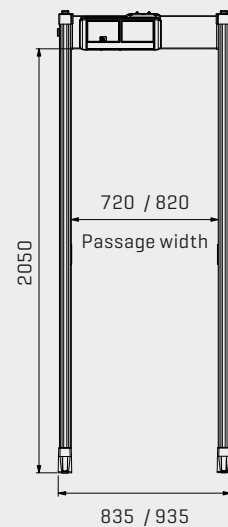
### COMMUNICATION CAPABILITIES

TYPE OF OPERATION	ETHERNET	USB	INFRARED	BT	RS-232
MAINTENANCE	○	○		●	●
REMOTE CONTROL	○		●	●	●
REMOTE DATA COLLECTION	○				

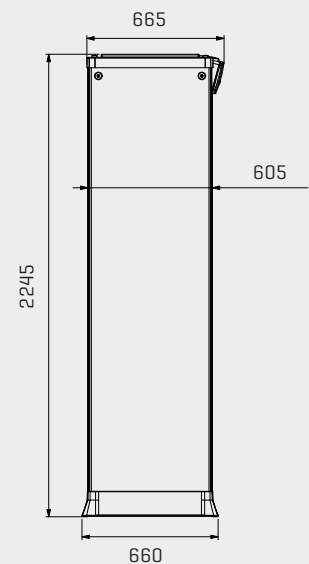
STANDARD ● OPTION ○

### DIMENSIONS (mm)

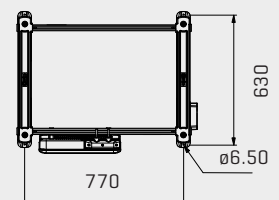
#### FRONT



#### LATERAL



#### TOP

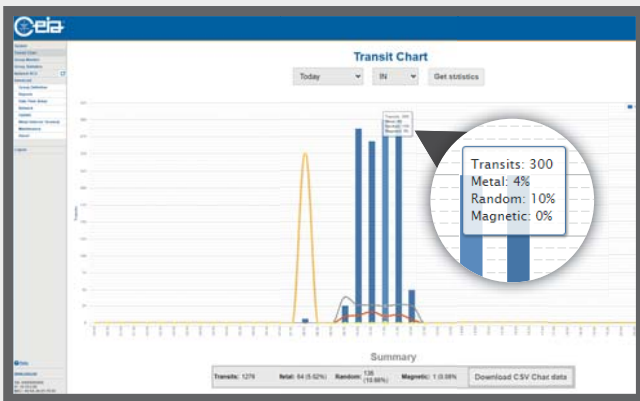
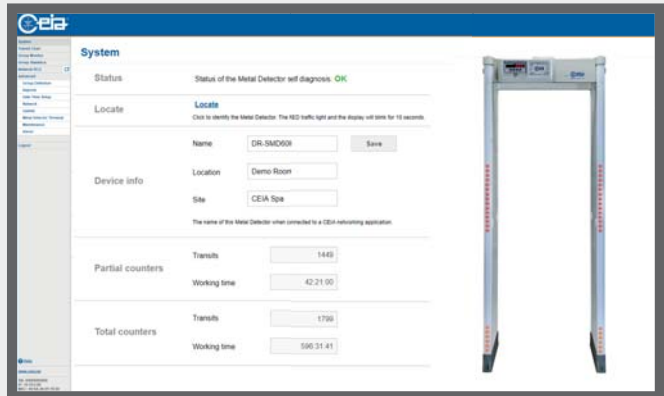


INTEGRATED WEB-SERVER & LOGGER



MONITOR

- Monitor the status of Metal Detector network in real time
- Centralized Setting of the Metal Detectors' working parameters
- Transits flow monitoring



REPORT

- Report on number of people screened and alarm rates automatically
- Detailed reporting of the transits data and the Security Device configuration data



CONTROL





- Remotely control and verify the security level
- No server or specific client software required, only a web browser
- Zero configuration network for simple setup
- 2 x Ethernet 100base-TX



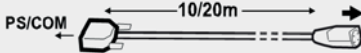
**APSiM2 Plus, APSiM3 Plus**

The APSiM2 Plus, APSiM3 Plus modules allow you to protect and manage your checkpoint better while saving labor hours in the process.

OPTIONS







OPTION	DESCRIPTION		CODE
<p><b>IP65 CONFIGURATION</b></p>	<p>Outdoor sheltered permanent or non-sheltered short-term installations (single event entrance)</p>		<ul style="list-style-type: none"> <li>• 720 mm passage width [102710]</li> <li>• 820 mm passage width [102712]</li> </ul>
<p><b>EMBEDDED BATTERY BACK-UP AND CHARGER</b></p>	<p>Lower Connection Module with anti-tamper on/off switch, RS-232 interface and internal battery back-up. The module provides an audible 'flat battery' signal activated when the battery charge goes below the operational limit of the device (signal endurance: about 12 hours).</p>		<p>APSM2Plus/P</p>
<p><b>APSiM2 PLUS Integrated Web-server &amp; Logger, Battery Back-up and Charger</b></p>	<p>Lower Connection Module with anti-tamper on/off switch, RS-232 interface, internal battery back-up and the following functions:</p> <ul style="list-style-type: none"> <li>▸ Built-in 10/100 base T Ethernet LAN interface</li> <li>▸ Web server for set-up and remote data log</li> <li>▸ Real/Time clock with battery backup</li> <li>▸ Non-volatile Memory for Metal Detector events storage</li> </ul>		<p>APSiM2Plus/P</p>
<p><b>APSiM3 PLUS Wireless Network Module</b></p>	<p>Includes all features and characteristics of the APSiM2 Plus with additional:</p> <ul style="list-style-type: none"> <li>▸ Wi-Fi communication capability</li> <li>▸ Compatibility with NetID Management software [NetID software license not included]</li> </ul>		<p>APSiM3Plus/P</p>
<p><b>820 mm USEFUL PASSAGE WIDTH</b></p>			<p>55635</p>

ACCESSORIES

ACCESSORY	DESCRIPTION	CODE
CHIP CARDS	Chip cards for simple and secure selection of Security Levels and parameter setting. List of chip-cards available on request.	
MD-WHK	Wireless repeater of acoustic indications for WTMDs. Bluetooth audio function to be requested at WTMD ordering time.	MD-WHK
CROSSBAR BATTERY BACK-UP	<ol style="list-style-type: none"> <li>1 Crossbar battery back-up in stainless steel case. Up to 10 h of autonomous working time.</li> <li>2 Protection cover</li> </ol>	55681  Protection cover: • 720 mm passage width: 88858 • 820 mm passage width: 88861
RCU2	Control unit for full remote access, including alarm signalling and programming of CEIA Metal Detectors. The connection is performed via serial cable connection or via BT (option).	RCU2
MD-SCOPE	Powerful, PC based installation and service Software. Includes oscilloscope and terminal functionality. The connection is performed via BT (standard) or via cable connection.	MD-SCOPE2
SUPPLY UNIT SERIES	<ol style="list-style-type: none"> <li>1 MBSU LWSC (Light Weight Soft Case Version)</li> <li>2 MBSU-2</li> <li>3 TSU (Tactical supply unit)</li> </ol> <p>Portable and compact battery back-up units and charger designed to supply DC voltage to CEIA equipment where mains is not available or as Uninterruptable Power Supply unit (UPS) in installations requiring continuous operations. The devices are extremely easy to use, and provide indication of the battery level and charging status.</p> <p>TYPICAL CONTINUOUS OPERATION</p> <ul style="list-style-type: none"> <li>• MBSU LWSC: 14h</li> <li>• MBSU-2: 14h</li> <li>• TSU: 4 battery pack: 12h / 6 battery pack: 17h / 8 battery pack: 23h</li> </ul>	<ol style="list-style-type: none"> <li>1 MBSU LWSC</li> <li>2 MBSU-2</li> <li>3 TSU</li> </ol>
RRU	Remote relay unit (RRU) to repeat the detection alarms of the gate through a relay contact. The RRU module can be used for integration of the Metal Detector in interlocked door systems. An additional relay is available for a customer-specified application.	RRU-2
IRC-1	Infrared Remote Controller for wireless remote programming of the control unit.	47180
UPPER CONNECTION MODULE	This module along with an extension cable allows the connection of power supply and serial communication to personal computers or CEIA accessories, such as RCU-2.	• 46650 • 180 mm: 89040 • 5 m: 95352
TOP POWER CABLE	This cable allows the AC/DC adapter to be connected to PS/COM port located on top of the TX antenna to supply the Metal Detector Gate	 <ul style="list-style-type: none"> <li>• 10 m: 64228</li> <li>• 20 m: 68346</li> </ul>



ACCESSORIES

ACCESSORY	DESCRIPTION		CODE
<p><b>INTEGRATED CAMERA SYSTEM</b></p>	<p>Video camera with support arm and connecting cables. Installation of the APSiM3 Plus module is required.</p>		<p>54253</p>
<p><b>TDU Thermal Detection Unit</b></p>	<p>The TDU (Thermal Detection Unit) is an upgrade sensing kit for COVID screening compliance:</p> <ul style="list-style-type: none"> <li>1 Thermal Camera Arm</li> <li>2 Dual Reference Calibration Unit</li> </ul>		<p>TDU/P</p>
<p><b>WHEEL KIT - LONG RANGE</b></p>	<p>For heavy duty, longer range movement of the walk-through metal detector.</p>		<p>70796</p>
<p><b>WHEEL KIT - SHORT RANGE</b></p>	<p>For short range movement of the walk-through metal detectors.</p>		<p>75459</p>
<p><b>METAL DETECTOR DIVESTING TABLE</b></p>	<p>In combination with CEIA Walk-Through Metal Detectors, it is a temporary location of personal metal effects for people to be screened:</p> <ul style="list-style-type: none"> <li>1 Standard length: 610 mm</li> <li>2 Extended length: 1200 mm</li> <li>3 Outdoor version: 1300 mm</li> </ul>		<p>STANDARD: 18074 EXTENDED: 39491 OUTDOOR: 67021</p>
<p><b>TEST SAMPLES KIT</b></p>	<p>Reference Samples for accurate verification of the Security Level. Includes guided procedures and certificate of calibration</p>		<p>EMD-SK-GAL EMD-SK-GDML</p>
<p><b>OFV</b></p>	<p>Operator Functionality Verification test-kit</p>		<p>OFV</p>

SAMPLE INSTALLATIONS



**SPECIAL EVENTS**



**BUILDING SECURITY**



**AIRPORT SECURITY**



**AMUSEMENT PARKS**



## SPECIFICATIONS

<b>GATE STRUCTURE</b>	State-of-the-art, robust and washable panels Protected against aging, weather and wear
<b>OPERATIONAL FEATURES</b>	High discrimination and transit flow rates five or more times greater than other metal detection systems Quick reset time as short as 0.2 seconds for high throughput rate Very high detection speed (up to 15 m/sec.) Built-in operational functional verification One-touch key reading of inbound, outbound and Security Level Data
<b>QUALITY</b>	Continuous self diagnostic system Proven reliability No periodic re-calibration and preventive maintenance required No scheduled maintenance Fully digital design
<b>ALARM SIGNALLING</b>	Multi-zone display bar for "height on person" localization 4 light bars with selectable entry/exit and pacing indication Green and red metering signals proportional to the mass of the detected target 10 selectable continuous and pulsed tone plus 34 special tones 10 selectable sound intensities ranging from 0 to 90 dbA at 1m
<b>TYPE OF SIGNALLING</b>	Fixed or proportional to the mass in transit - visible from 6m under lighting of 4000lux 60 distinct zones (20 vertical x 3 lateral) entry and exit side
<b>PROGRAMMING</b>	Up to 50 built-in Security Programs Remote via Infrared Remote Control Unit, BT or Ethernet 10/100 base T (option) interface Security level: International Standard (IS) command / Chip card Local by Control Unit alphanumeric display and keyboard Programming and chip card access protected by user and super-user passwords
<b>ENVIRONMENTAL DATA</b>	Power Supply : 100...277V~ ±10%, 47...63Hz, 40 VA typical consumption Operating temperature: -20°C to +65°C [-37°C to +70°C upon request] Storage temperature: -37°C to +70°C Relative humidity: 0 to 95% (without condensation)
<b>INSTALLATION DATA</b>	Automatic synchronisation between two or more metal detectors with distance of down to 5 cm without the use of external cables Automatic Installation function (OTS)

### CERTIFICATION AND COMPLIANCE

- Compliant with and certified to the applicable Standards for Enhanced Metal Detectors (EMD)
- Compliant with the applicable electromagnetic Standards on Human Exposure and Pacemaker Safety
- Compliant with all Airport Security Standards worldwide
- Compliant with applicable International Standards for electrical safety and EMC

### APPLICATIONS

- GOVERNMENT BUILDINGS
- AIRPORTS
- INDUSTRIES (SECURITY)
- NUCLEAR FACILITIES (SECURITY)
- PRISONS (VISITORS)
- PUBLIC EVENTS
- AMUSEMENT PARKS
- COURTS
- DATA PROCESSING CENTERS (EDP)
- HOTELS
- SCHOOLS SECURITY

### COMPREHENSIVE SUPPORT

CEIA PROVIDES FULL OPERATIONAL AND TECHNICAL TRAINING SUPPORT BY CERTIFIED PERSONNEL EITHER AT CEIA FACILITY OR AT CUSTOMER SITE.



**HI-PE PLUS** - ENHANCED WALK-THROUGH MULTI-ZONE METAL DETECTOR



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*CEIA reserves the right to make changes, at any moment and without notice, to the models (including programming), their accessories and options, to the prices and conditions of sale. DP060K0092v1010hUK - 105707 (2021)*