

# IOTA<sup>1G+</sup>

PROBE • CAPTURE • ANALYZE

The IOTA 1G+ is a multifunctional passive network probe with integrated traffic capture and analysis capabilities. With high performance and reliability, it is a great asset to get access and visibility into industrial or enterprise level networks. Profitap IOTA can be used as a dedicated probe, or programmed for autonomous onsite analysis, eliminating the need of an onsite network expert.

The IOTA 1G+ is designed to be easy to use, meaning the device can be set up and activated without extensive knowledge. Analysis can be performed later on by experts, remotely. IOTA 1G+ is fitted with GPS and PPS ports to provide advanced timestamping features.



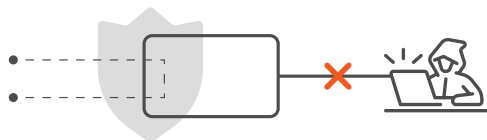
## Technical Specifications

CONNECTORS	LEDS & BUTTONS
2 x RJ45 in-line/SPAN 1 x RJ45 management 1 x USB 3.0 type A 2 x 12 VDC / 2.5 A power (12V model) 2 x 24-48 VDC power (24V model) 1 x SMA female (PPS) 1 x SMA female (GPS)	6 x RJ45 link/activity LED 1 x status LED 1 x capture LED 1 x capture button 1 x sync LED
DIMENSIONS (WxDxH)	WEIGHT
105 x 164 x 38 mm 4.13 x 6.46 x 1.5 in	600 g 1.32 lb
SPEED	COMPLIANCE
10 / 100 / 1000 Mbps	RoHS, CE, UKCA, EAC
ACCESSORIES	
1 x 12 VDC PSU (12V model) 1 x DC terminal block (24V model) 1 x 1.5 m RJ45 cable GPS/GLONASS Antenna	

## Features

- 10/100/1G line-rate traffic capture
- Dedicated probe and analysis capabilities
- Programmable autonomous capture functions
- Remote access and management
- Non-intrusive monitoring
- SPAN and In-Line modes
- 8 ns hardware timestamp
- Packet slicing
- Real time statistics
- Low level error and bandwidth monitoring
- Invisible to the network
- PoE+ powering possibility (through management port)
- PoE+ passthrough
- 1 TB or 2 TB swappable SSD
- GNSS (GPS/GLONASS) UTC timestamping
- PPS synchronization (input/output)

IOTA 1G+	PORTABLE MODEL	RACKMOUNT MODEL
1 TB SSD	CBP-1G2-1T	CBR-1G2-1T
2 TB SSD	CBP-1G2-2T	CBR-1G2-2T



IOTA's In-line circuit is isolated from the other interfaces, internal storage and analysis processing. This makes sure your network stays safe from outside attacks while still enabling full network visibility and analysis.



CBR-1G2 Rackmount model

# Real Time Traffic Analysis

Out of the box, IOTA comes with its own integrated software to help analyze the captured data in real-time. By extracting metadata from the captured files, IOTA is able to give you a real-time visual overview of what is happening on your network. IOTA dashboards help you filter large amounts of network traffic instantly, greatly optimizing your workflow and reducing time spent on troubleshooting.



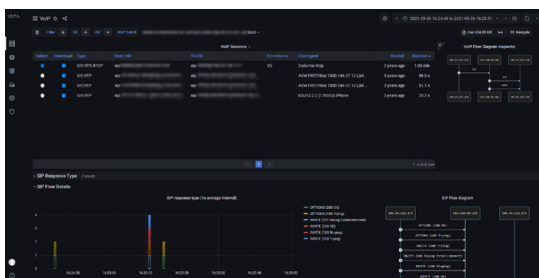
## Overview

A quick overview of top talkers and client-server data transfers.



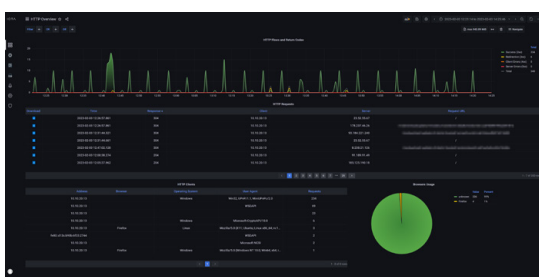
## Application Overview

Overview of applications, their latency, flow count, payload size, etc.



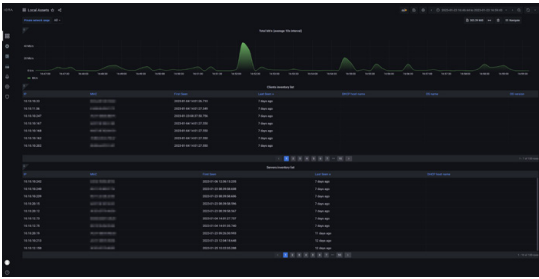
## VoIP

Complete view of detected VoIP sessions with cross-correlation between control and data traffic.



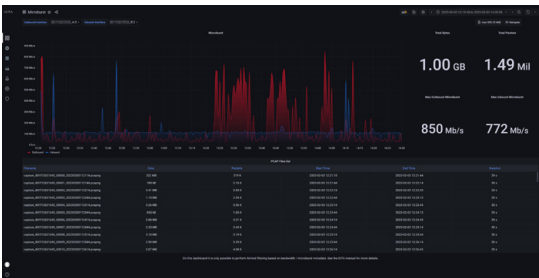
## HTTP Overview

Overview of HTTP traffic to help monitor HTTP application traffic.



## ***Local Assets***

Speaking interfaces present in the local network based on the canonical private IP address ranges.



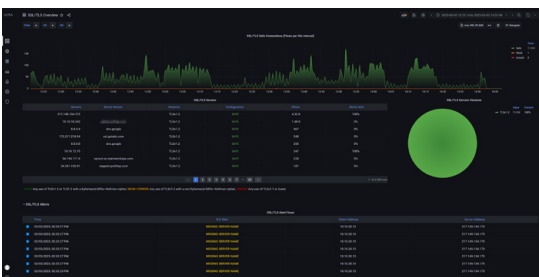
## ***Microburst***

Overview of traffic microbursts measured on the IOTA interfaces.



## ***Modbus***

Modbus protocol message distribution over time, for troubleshooting industrial networks which contain Modbus traffic.



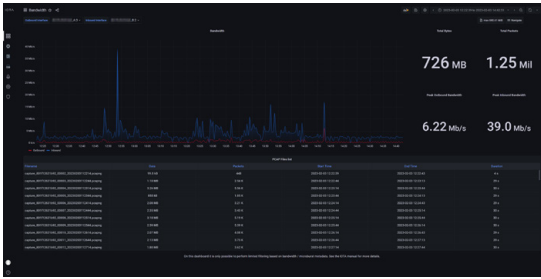
## ***SSL/TLS Overview***

Overview of TLS-encrypted connections and whether they are considered safe, weak, or unsafe, based on the TLS version and cipher used.



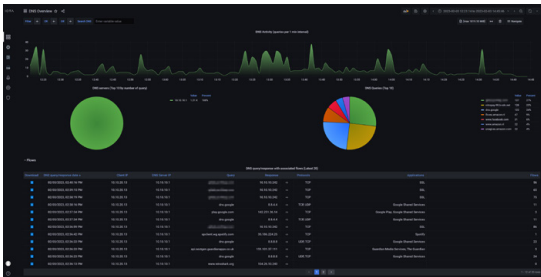
## ***TCP Analysis***

Overview of TCP-related statistics, such as client IP, server IP, host names, iRTT, and more, such as an analysis of TCP connection completeness.



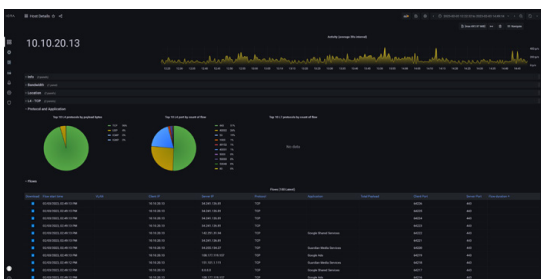
## ***Bandwidth***

Overview of the traffic bandwidth measured on the IOTA interfaces.



## ***DNS Overview***

Overview of DNS queries over time, top servers, and top queries by type.



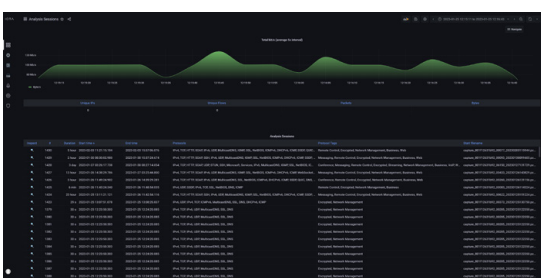
## ***Host Details***

Deep-dive into network activity specific to a filtered IP, and all the metrics you can use to analyze network issues based on geolocation, TCP data, protocol and application information, and flows.



## ***Flow Details***

Displays in-depth details about a specific communication flow.



## ***Analysis Sessions***

When a capture & analysis session is started, it will appear in this dashboard. A "session" represents a self-standing correlation domain.