

iWiM company

WEIGH-IN-MOTION SYSTEM MANUFACTURER



iWiM

Via Kufstein, 1
38121 Trento (Italy)

Tel. +39 0461 1636636
E-mail: info@iwim.it

www.iwim.it

THE WEIGH IN MOTION SYSTEM.

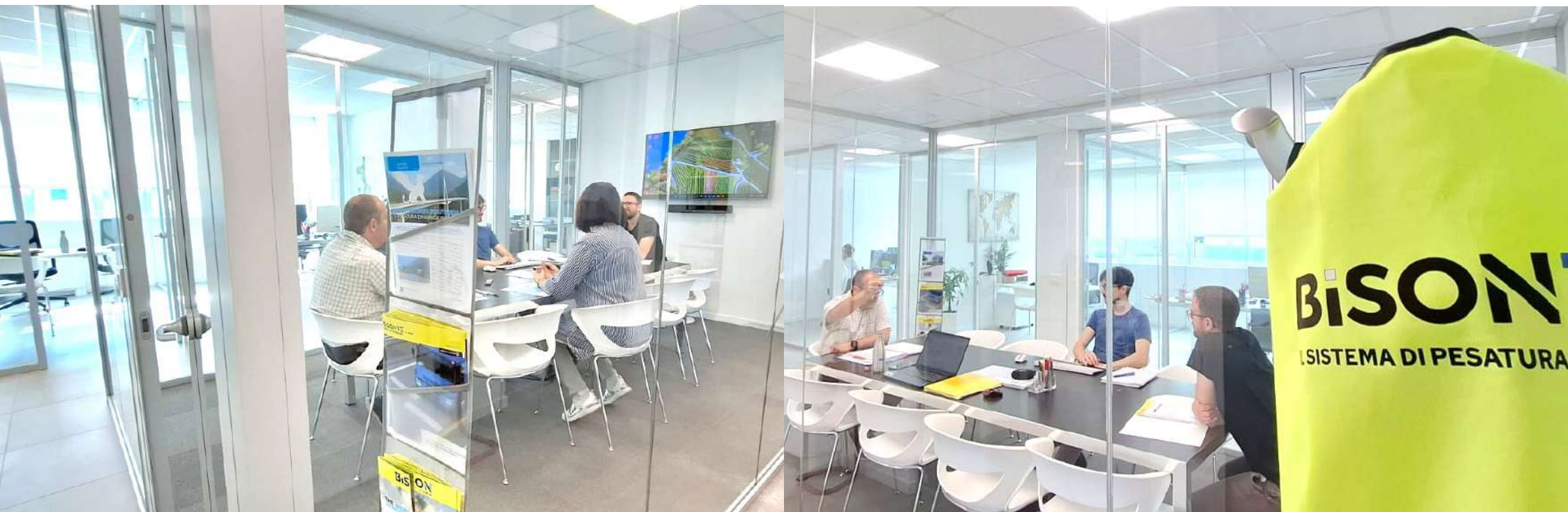
iWIM is a company with over fifteen years of experience in the production and implementation of dynamic weighing systems.

IWIM is a sole producer of weigh-in-motion equipment, handling the design, development, production, and implementation of WIM systems. We provide comprehensive maintenance for our installed systems, covering both software and hardware aspects.



A leader in the Italian market, IWIM has developed, certified, and approved the first in-motion weighing system in Italy, with over 150 installations across Italy and Europe.

The BISON System, produced by IWIM as the notified measuring instrument manufacturer, is approved for verification as a legal measuring instrument by the Decree of the Ministry of Economic Development (MISE), the authority responsible for measuring instruments in Italy.



iWIM company



iWIM has developed weigh in motion system BISON - The first in Italy to be admitted to the first verification as a measuring instrument with legal value, by the Decree of the Ministry of Economic Development MISE.

The Weigh-In-Motion BISON system is homologated in various countries, including Italy, European, Asian, African, and South American countries. IWIM has installed Weigh-In-Motion systems on key infrastructure projects around the world, such as the Genoa Bridge in Italy, major Italian highways, the Constanța Port on the Black Sea in Romania, at Schengen borders of European countries, and along the road infrastructure of Thailand, Bangkok, and others.



WEIGH-IN-MOTION MANUFACTURER

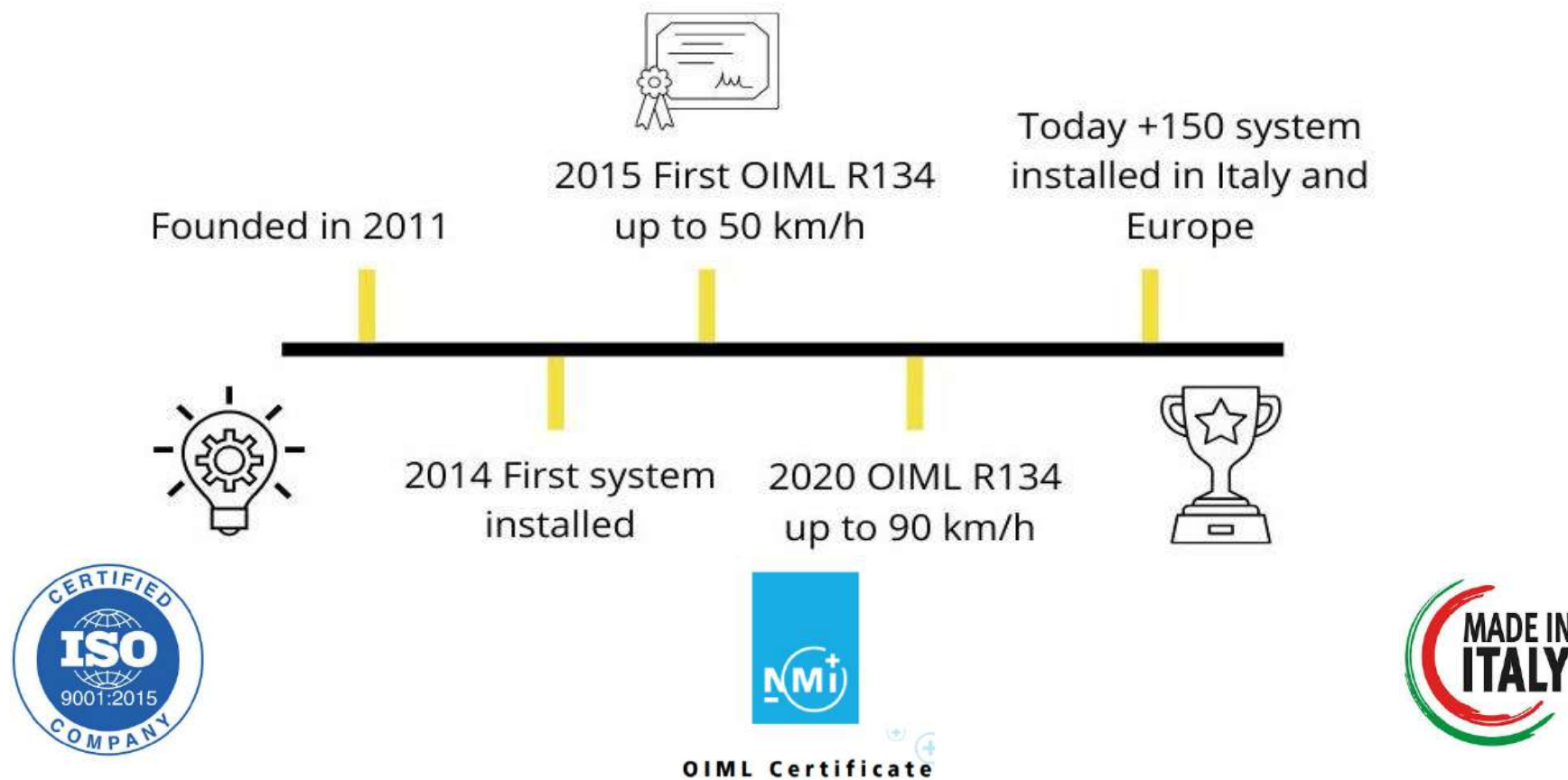
IWIM is the only manufacturer of weigh in motion systems in Italy and one of few manufacturers in the world.

All BISON Weigh-In-Motion Systems are produced in our laboratory in Trento,
in the Nord of Italy by our engineers



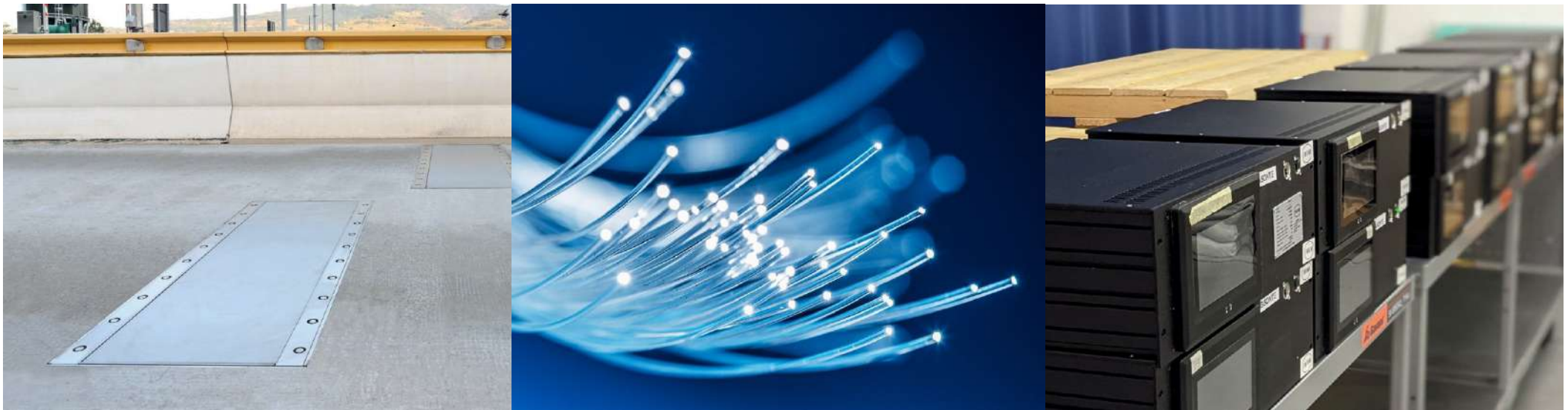
MADE IN ITALY





BISON WIM TECHNICAL FEATURES

BISON weigh in motion system is composed of n° 2 **bending plates** made in **stainless steel 316L**, sensorized with **optical fiber sensors** and connected to a **datalogger**.



The plates are **installed flush on the road surface** and can be placed on urban and suburban roads, highways, bridges and viaducts.

The **datalogger** processes all the information collected by the system and stores it in a database. These data are available to the user via a web interface **accessible from any device**.

WIM APPLICATIONS



Traffic data collection



Preselection and enforcement



Infrastructures protection



Increasing road safety



Logistic centres traffic control
(Ports, construction sites, etc)



Preventing asphalt wear



WIM COMPLETE SOLUTION

BISON system offers real-time exchange functionality of transit data (including images and plate OCR) in order to be easily integrated with monitoring or statistical processing platforms and can be easily integrated with other technologies.



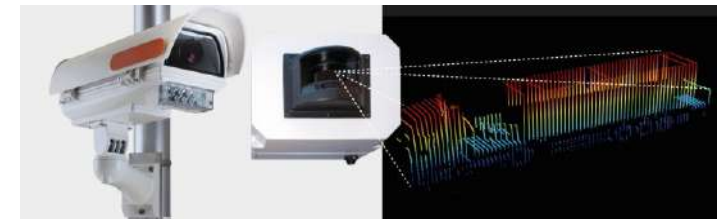
User Interface with data transmitted

Portal with ANPR camera for licence plate reading and LIDAR

Weigh in Motion System with fiber optic sensors

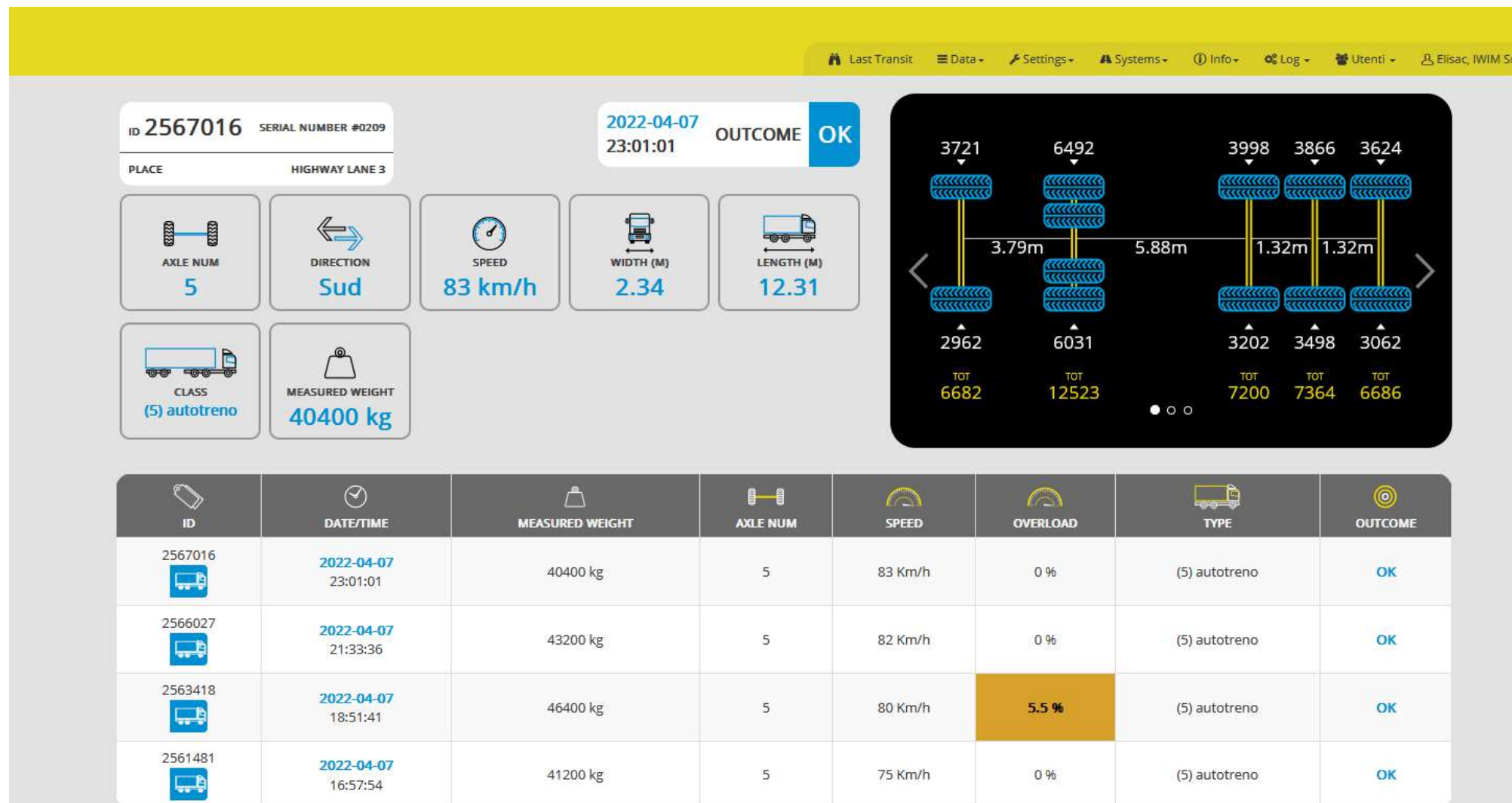
Street cabinet with Datalogger

Vehicle in movement



BISON SOFTWARE BY IWIM

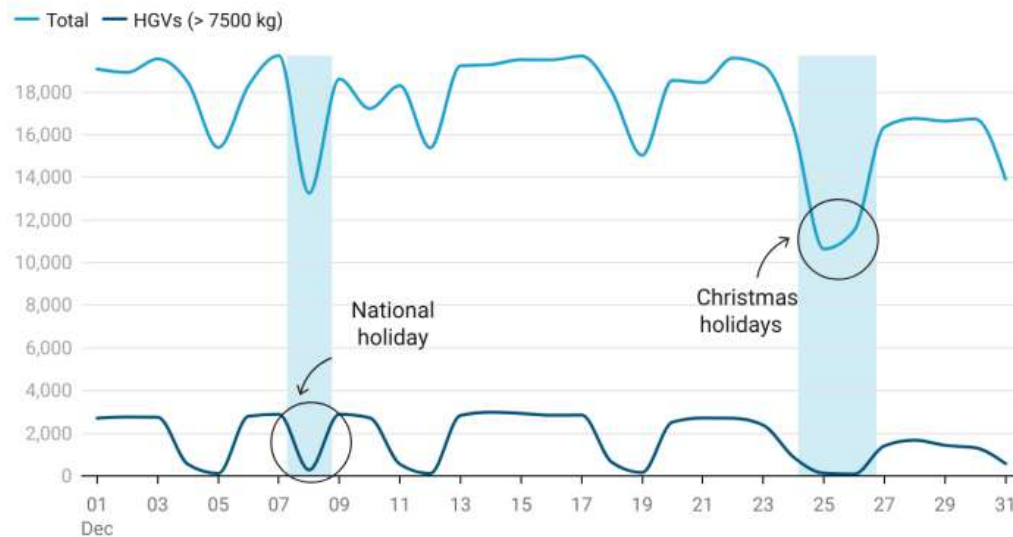
The software has a simple and intuitive interface and it is able to provide, immediately all the necessary information of specific interest to the user. The system can be interfaced with other ITS systems such as ANPR cameras for license plate recognition.



STATISTICS & REPORTING

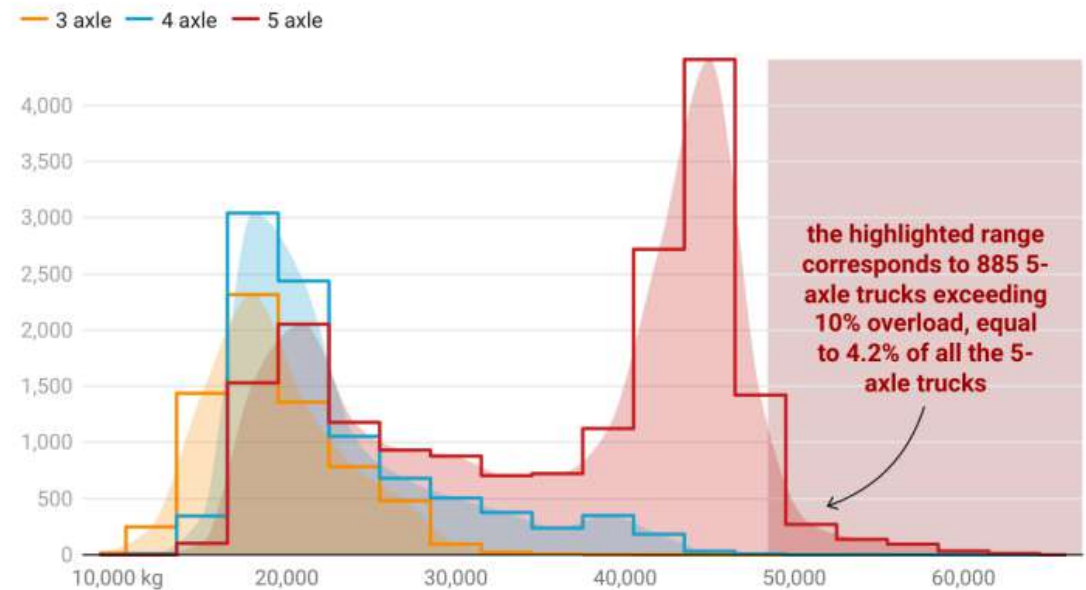
The software of BISON weigh-in-motion system developed by iWiM includes, among its functions, the automated generation of statistical reports on a periodic basis, which can be modified according to the needs of the end user.

Daily vehicle flow



Source: iWiM s.r.l. • Created with Datawrapper

HGV weight distribution



Source: iWiM s.r.l. • Created with Datawrapper

SOLUTIONS

A Complete Range of Weigh-In-Motion Solutions

We offer a **full range of Weigh-In-Motion (WIM)** systems designed to suit every type of road and traffic condition.

IWIM has develop the solutions for **high-speed** application to install on highways and motorways

We offer **medium speed** solutions for control for heavy vehicle on highways entrance and exit gates, smart cities and urban roads.

For logistical centers, hubs and industrial areas we offer our LS CONTROL for weight detection on **low speeds**.

Whether vehicles are moving at high, medium, or low speed, our systems are tailored to deliver **accurate, certified results**, meeting both legal and operational needs across different applications.

BiSON[®] BY iWiM
THE WEIGH IN MOTION SYSTEM.

Ministero dello Sviluppo Economico
AOO Politiche industriali e Tutela
Struttura: MISE2020_DGMCTCNT_Div08
Provvedimenti interni
Prot. n. 0000161 - 25/05/2021 - REGISTRAZIONE



Ministero dello Sviluppo Economico

DIREZIONE GENERALE PER IL MERCATO, LA CONCORRENZA, LA TUTELA DEL CONSUMATORE E LA NORMATIVA TECNICA
Divisione VIII - Strumenti di misura e metalli preziosi

Decreto ministeriale 25 maggio 2021 n. 161 con il quale sono ammessi alla verifica metrica ed alla legalizzazione strumenti per pesare a funzionamento automatico, destinati alla pesatura di veicoli stradali in movimento, che presentano varianti rispetto alla versione già approvata con decreto ministeriale 25 maggio 2017, n. 196330.

IL DIRIGENTE

VISTO il R.D. 12
fabbricazione metrica,
riferimento al D.P.R. 1
622;

VISTA la C.M. 17
misura elettronici, e su

VISTA la Raccomand
strumenti automatici p
dei carichi assiali;

VISTO l'OIML Certifi
uno strumento automa

VISTO il D.M. 25
verificazione metrica
funzionamento automa
denominato "IWIM50_10

VISTA l'istanza della
atti con prot. n. 3476
rivolta ad ottenere l'
funzionamento automa

1. Lo strumento per pes
veicoli stradali in m
decreto ministeriale
essere ammesso alla
versioni.

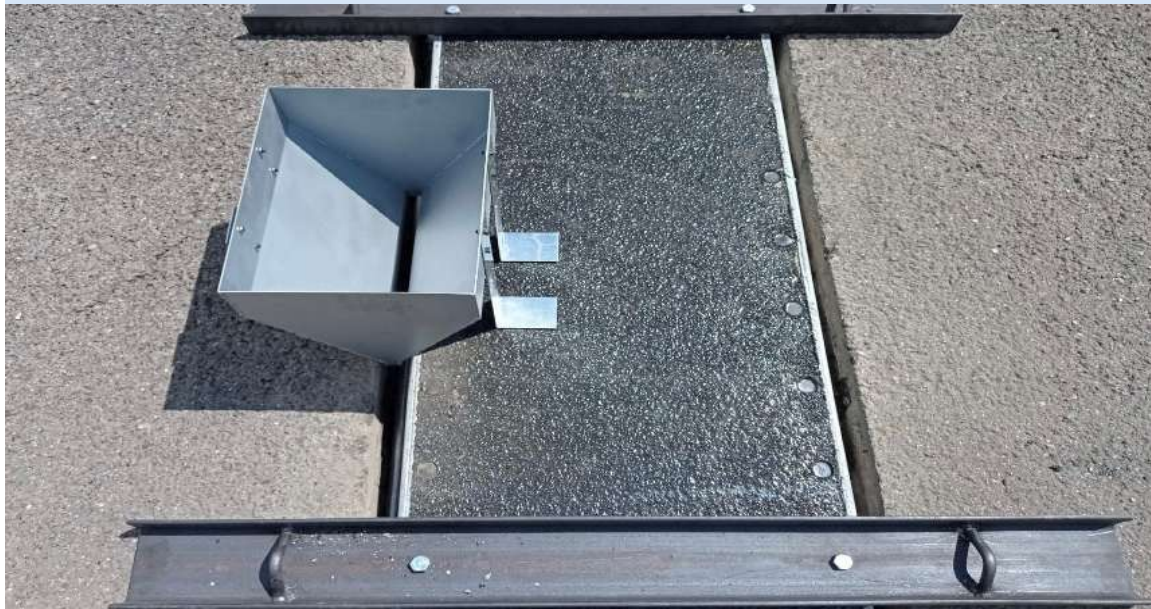
PRV



INSTALLATION DETAILS



Slim prefabricated in reinforced concrete



Levelling and sealing with polyurethane resin



Video of installation



Night installation/maintenance

REUSABLE SYSTEM

BiSON[®] BY iWiM
THE WEIGH IN MOTION SYSTEM.



Video of road resurfacing procedure

- System is REUSABLE in case of renovation of the road surface;
- Easy movement of the system to a new installation site;
- Installation completed within 8 hours;

OPERATIVE IN ANY CLIMATE CONDITIONS



Enego: Installation at 1600m asl on the Alps

- **Insensitivity to temperature changes**
- (operative range -30°C - +75°C);
- System works in adverse climatic conditions (humidity, snow or mud), on sandy or dirty roads;
- High durability and low maintenance;

ONLY FIBER OPTIC TECHNOLOGY



- No electricity needed under the plates, nor into the asphalt
- Immunity to electromagnetic field
- The datalogger can be installed at high distances (up to 10 km) without influence on data accuracy
- Third virtual system – **cross lane**

LOW MAINTENANCE



- Calibration every 2-4 years;
- 24/7 assistance to functioning by our technical team;
- Customizable software and interface developed by our engineers to meet specific user needs and preferences.



LOCATION

N° OF INSTALLED
SYSTEMS

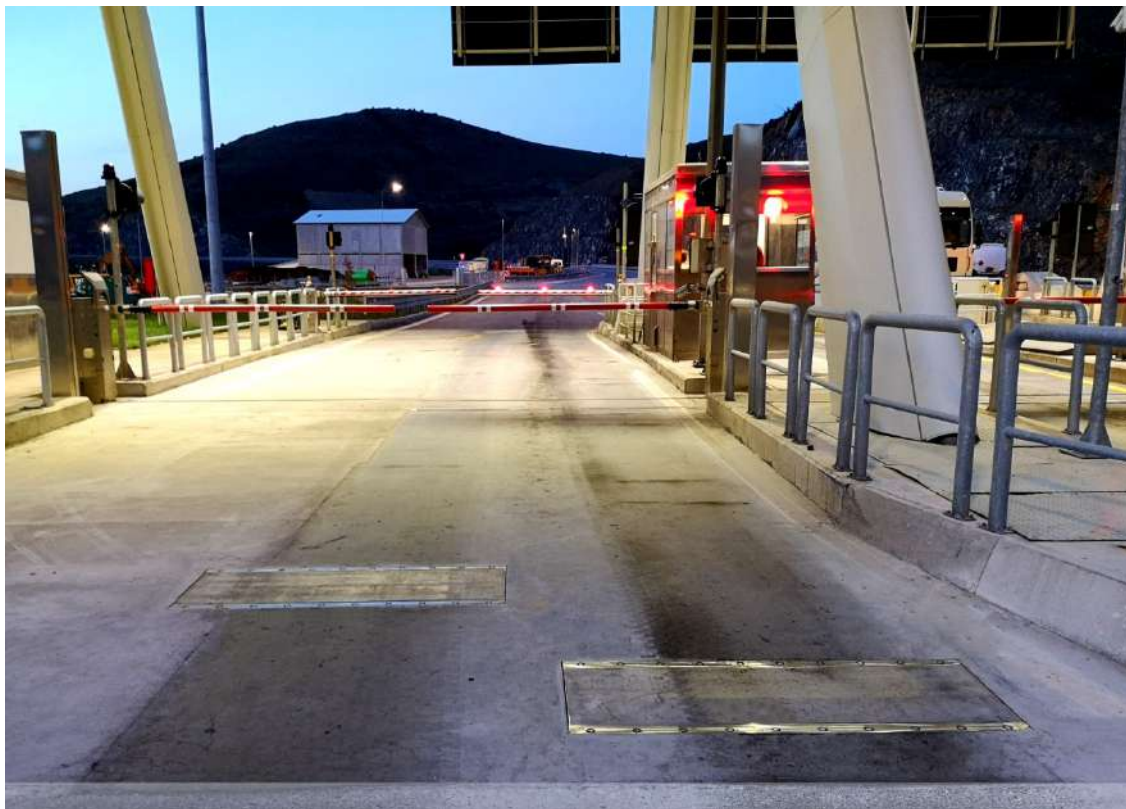
+150 in Italy and worldwide

APPLICATION SITE

All road types: highways, industrial
zones, ports, logistic areas

TYPE OF USE

We provide a full range of Weigh-In-Motion (WIM) systems developed for different traffic conditions, vehicle speeds and infrastructure needs.



CLIENT



LOCATION

ALBANIA / Kukës

**YEAR OF
INSTALLATION**

2019

N° SYSTEMS

2 single systems

INSTALLATION SITE

Highway exit

TYPE OF USE

MONITORING / SANCTIONS

BISON was requested by the client both for monitoring vehicles in transit and in order to identify any overloaded vehicle, and to be able to initiate subsequent procedures for sanctioning purposes.



CLIENT

RUTA DEL CACAO SAS



LOCATION

Colombia/

Ruta del Cacao highway

YEAR OF INSTALLATION

2019

N° SYSTEMS

2 single systems

INSTALLATION SITE

Heavy transport border control point

TYPE OF USE

Monitoring and control:

The systems are installed at the control points to monitor heavy transport passing through the highway. The traffic is diverted into the necessary lane based on the weight and license plates for further controls.



CLIENT

NATIONAL COMPANY
FOR ROAD
INFRASTRUCTURE
ADMINISTRATION



LOCATION

Romania /
Border control in Nadlac

YEAR OF INSTALLATION

2024

N° SYSTEMS

1 single system

INSTALLATION SITE

Heavy transport border control point

TYPE OF USE

Monitoring and control:

The system installed at the gates of the cross-border control point is designed to monitor international heavy transport passing through the country. The traffic is diverted into the necessary lane based on the weight and license plates for further controls.



CLIENT



LOCATION

Romania / Costanza sea port

**YEAR OF
INSTALLATION**

2023 - 2025

N° SYSTEMS

8 double systems

INSTALLATION SITE

Port gates

TYPE OF USE

Monitoring:

The systems installed on the gates of the port will be a part of the infrastructure for monitoring and controlling heavy vehicles entering and exiting the port area, permitting fluent movement of traffic and avoiding traffic accumulation.



CLIENT	RURAL ROAD DEPARTMENT
LOCATION	Thailand / Rural roads
YEAR OF INSTALLATION	2024
N° SYSTEMS	4 double systems 2 single systems Triple system
INSTALLATION SITE	Rural roads of Thailand provinces
TYPE OF USE	Monitoring and control: The systems are installed at the control points to monitor heavy transport passing on the rural roads. All the traffic is monitored for overload control.



CLIENT

MINISTRY OF TRANSPORT



LOCATION

Uruguay /

Extra urban road

**YEAR OF
INSTALLATION**

2025

N° SYSTEMS

1 single system

INSTALLATION SITE

Minas extra urban road

TYPE OF USE

Monitoring and control:

The systems are installed at the control points to monitor heavy transport passing on the roads, to make preselection and stop for more control in a case of overload.

OUR CLIENTS



Autostrada del Brennero SpA
Brennerautobahn AG

