

Company Profile



# Complete Mobility Provider.



## Who are we?

Founded in 2009, ISSD provides solutions to create added value in the field of intelligent transport. Its areas of expertise include traffic management, electronic applications and consulting services. With the slogan 'Complete Mobility Provider', ISSD contributes to mobility from A to Z by working for a greener, more efficient and accessible transport future in more than 5000 locations in 15 countries.

ISSD is located in METU Teknokent, Turkey's most prestigious technology development zone. The company stands out from its competitors with its product portfolio, technical expertise, R&D capabilities and long-term customer relationships. ISSD's young and talented team is committed to creating value and aims to become a global leader by delivering this value to the world.



## What “Complete Mobility Provider” Means to Us.

The “Complete Mobility Provider” motto emphasizes a sustainable, accessible and efficient transport ecosystem that addresses all mobility components from A to Z by bringing together different modes of transport.

It refers to integrated smart mobility solutions using real-time transport data and smart transport technologies, covering various modes

of transport such as public transport, car sharing, micromobility as well as private vehicles. It is an approach that ensures inclusiveness for all individuals by prioritizing sustainability and accessibility, adopts environmentally friendly solutions with the principle of zero emission, aims to disseminate data-based decision-making mechanisms and reach all stakeholders by reaching the end user.

We pursue jobs you never thought were possible

## Vision Mission.

We offer technology-oriented and innovative solutions in the "Intelligent Transport" sector with the motivation to create added value and the eagerness to be the locomotive of the sector. We focus on improving and facilitating the travels of road users, reducing traffic congestion and minimizing environmental impacts; we deliver our mobility solutions using smart transportation technologies to the end user. We aim to be a global leader in the sector with the mission of creating value and presenting this value to the world, which we have adopted since day one.

## Our Values.

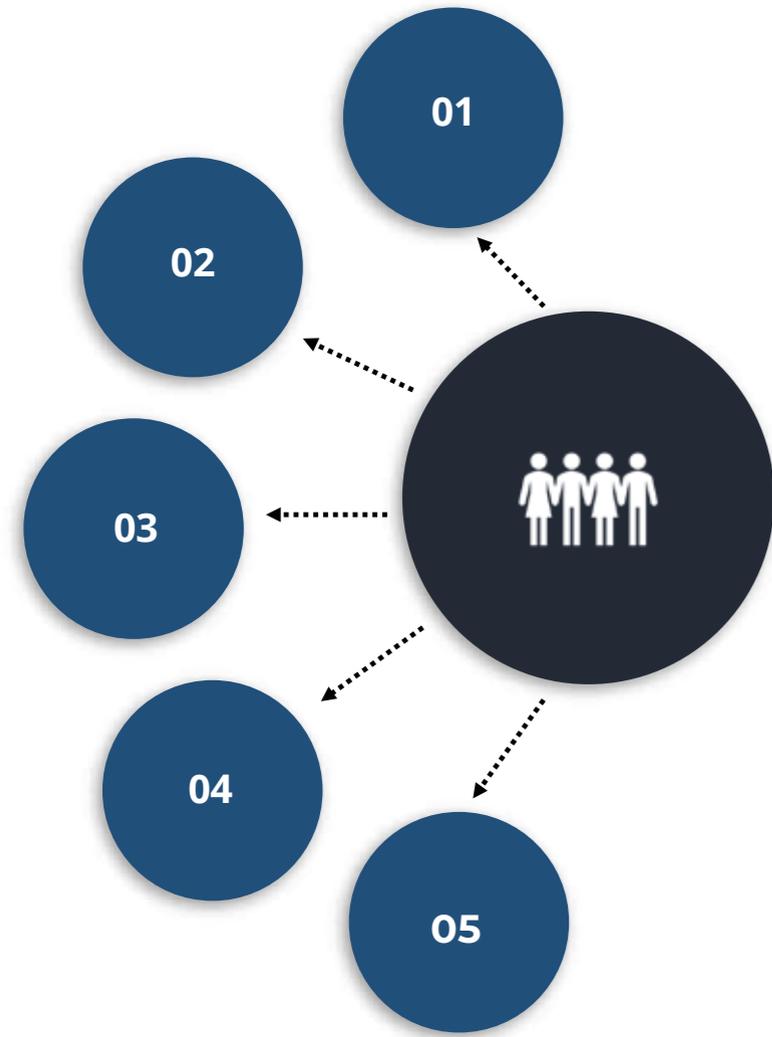
*Producing added value*  
*Friendliness*  
*Team orientated*  
*Transparency*  
*Technology orientated*  
*Sustainability*  
*Action orientated*  
*Continuous learning culture*

## Awards.

2023 Deloitte Technology Fast 50  
2022 Productivity Award - R&D 2nd  
2019 Deloitte Technology Fast 500™ EMEA – 351th  
2019 Deloitte Technology Fast 50 – 10th  
2019 Intertraffic Traffic Management Award  
2017 Intertraffic Municipality Solution Award  
2015 TÜBİTAK ELOTEG Group, Most Successful Project  
2012 Project Market Promising Business Award  
2012 Innovative Entrepreneur Award KOSGEB  
2010 Yeni Fikirler Yeni İşler General Category 1 st Place  
2010 Yeni Fikirler Yeni İşler Defense Category 1 st Place



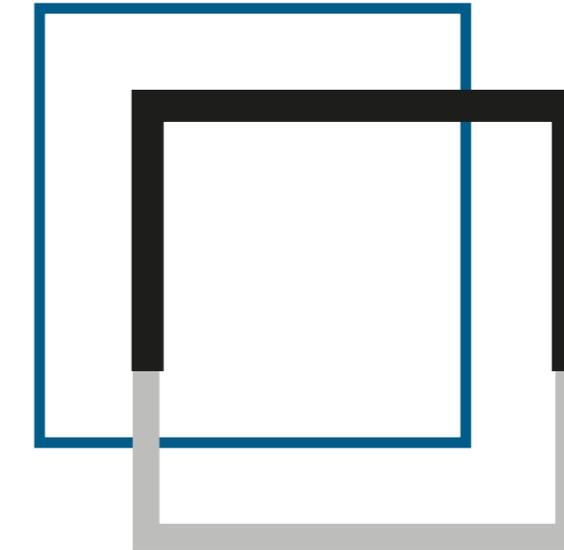
120+  
R&D Teams.



Mobility Team  
Software Design Team  
Big Data Analytics Team  
Embedded Systems Team  
Systems Engineering Team

15 Years of experience.

Milestones.







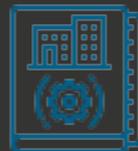
Traffic Management Systems



Electronic Enforcement Systems



Traffic Consultancy



Industry Specific Solutions

# Solutions.

## Traffic Management

CHAOS Dynamic Junction Control System  
VIERO-AI Vehicle Counting System  
VIERO-360 Junction Analysis System  
CENTRIS Dynamic Junction Control Unit  
MANGO Next Generation City Traffic Management Platform  
BLUESIS Bluetooth Based Traffic Analysis System

## Electronic Enforcement

POINTR K3000 Red Light Enforcement  
POINTR P3000 Speed Corridor Enforcement  
POINTR P2000 Parking Enforcement  
POINTR-2M Mobile Enforcement  
POINTR E3000 Emergency Lane Enforcement  
OVER-H Overheight Vehicle Detection

## Number Plate Recognition

POINTR P3000 Automated Number Plate Recognition System  
POINTR MALL Mall-ANPR  
POINTR B3000 Bullet-ANPR

## Connected Driving

MANGO CAR New Generation Electric Vehicle  
MANGO Traffic Management Center Software

## Traffic Data and Analytics

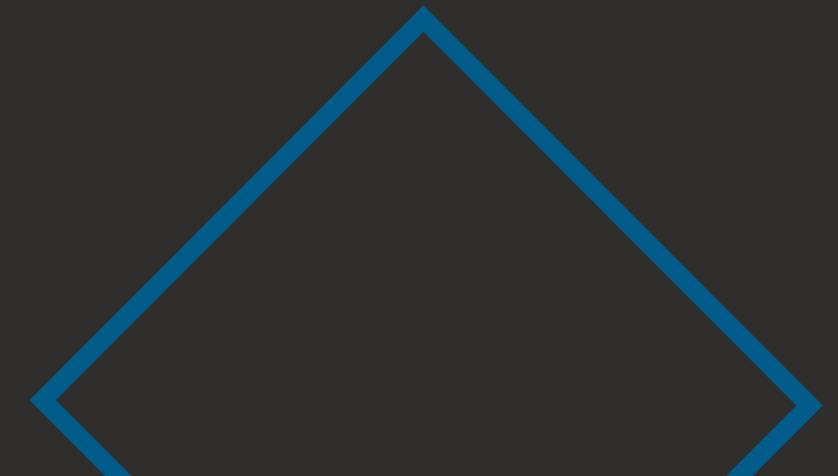
Floating Car Data (FCD) Analytics  
Bluetooth Based Analytics  
Accident Analysis

## Industry Specific Solutions

CONSCAN Konteyner ID Recognition System  
Customs Number Plate Recognition System

## Simulation

PTV Group Traffic Simulation  
Transoft Intersection Simulation



# Our Systems around the World.

Our traffic management and electronic enforcement systems are in active use in 15 countries around the world.

**10000+**  
**Sensors & Systems**

More than 10,000 of our traffic management and electronic enforcement sensors are in use around the world.

**5000+**  
**Locations**

Our traffic management and electronic enforcement systems are actively used in more than 5000 locations.

**500+**  
**Projects**



**Asia:**  
Kazakhstan – Shymkent  
India – Chandigarh  
Georgia - Poti

TRNC - Lefkoşa  
Turkmenistan – Ahal City  
Indonesia - Jakarta  
Uzbekistan

**Middle East:**  
UAE – Ras Al Khaimah  
Bahrain  
Palestine - Hebron  
Iraq  
Syria

**Africa:**  
Nigeria - Lagos

**America**  
California

**Europe:**  
Croatia  
Ukraine - Vinnytsia

# Our Systems in Türkiye.



## 5000+

### Sensors & Systems

More than 5000 sensors of our traffic management and electronic enforcement systems are available on the Turkish market.

## 70+

### Cities

Our traffic management and electronic enforcement systems are in active use in more than 70 locations.



#### Marmara Region:

Bursa  
Bolu  
Çanakkale  
Edirne  
İstanbul  
Kocaeli  
Sakarya  
Tekirdağ  
Yalova  
Kırklareli

#### Aegean Region:

Afyonkarahisar  
Aydın  
Denizli  
İzmir  
Kütahya  
Muğla  
Uşak

#### Southeastern Anatolia Region:

Adıyaman  
Batman  
Diyarbakır  
Gaziantep  
Mardin  
Kahramanmaraş  
Şanlıurfa  
Siirt  
Kilis

#### Central Anatolia Region:

Aksaray  
Ankara  
Eskişehir  
Karaman  
Kayseri  
Kırıkkale  
Kırşehir  
Konya  
Nevşehir  
Niğde  
Sivas  
Yozgat

#### Mediterranean Region:

Adana  
Antalya  
Burdur  
Hatay  
Isparta  
Mersin  
Osmaniye

#### Eastern Anatolia Region:

Ağrı  
Ardahan  
Elazığ  
Erzincan  
Erzurum  
Hakkari  
İğdir  
Malatya  
Şırnak  
Van

#### Black Sea Region:

Amasya  
Artvin  
Bartın  
Bolu  
Çorum  
Düzce  
Giresun  
Gümüşhane  
Karabük

Kastamonu  
Ordu  
Rize  
Samsun  
Tokat  
Trabzon  
Zonguldak

# Capabilities Competencies.

## Traffic Scene Analysis

Deep Learning model development and optimization  
Edge computing  
Computer Vision  
Machine Learning

## Sensor Development and Integration

Mechanical design and manufacturing  
Electronic design and manufacturing  
Software design and development  
Embedded system design

## Traffic Engineering Services Solutions

Intersection, Corridor and Signal Design  
Traffic Simulation  
Traffic Impact Analysis  
Traffic Safety Projects  
Parking Studies  
Public Transportation Studies  
Micro-mobility and Accessibility Analysis  
Trainings with Certification

# Capabilities Competencies.

## Central Management and Control Software

Cross platform web / mobile technologies  
Server and client side applications development  
UI/UX Design  
Database Management  
Frontend / Backend design and development  
API using and development

## System Architect and Applier

ITS integration & product development  
C-ITS integration  
IoT Platforms  
ITS Product Innovation  
ITS Project Applications & Management

## City Traffic Network Monitor and Sensor Fusion

Data Analytics  
Anomaly Detection  
Cloud Computing  
Distributed Processing



## City Traffic Network Monitor and Sensor Fusion.

ISSD has successfully developed algorithms that process data incoming from Bluetooth sensors and collect Floating Car Data (FCD). These algorithms are capable of processing incoming data both offline and in real-time by utilizing cloud computing. The developed algorithms are utilized to calculate speed profiles, analyze traffic occupancy and congestion, detect incidents and anomalies and distill the normal behavior of the areas that the systems supervise.

Furthermore, these algorithms can utilize distributed processing tools for whole city-based real-time analysis and can utilize data collected from Bluetooth sensors to extract Origin-Destination (OD) matrices and determine travel time between two consecutive sensors, in real-time. Data from the analyzed traffic systems are visualized and displayed on the web interface to aid with the decision-making process.

## Traffic Scene Analysis.

Using its experience and capabilities in the field of traffic engineering, ISSD has been able to design, develop and optimize robust deep learning models.

ISSD has also been capable of producing efficient, real-time algorithms that rely on machine learning for tracking, counting, license plate recognition, incident detection and object detection using both edge and center processing and utilizing CPUs, GPUs, VPUs, and NPUs in their operation.

These algorithms help creating image-based traffic monitoring and enforcement, incident detection, traffic data collection and adaptive junction management systems that can work throughout different weather, lighting, and indoor/outdoor conditions. Today those systems collect and process data from more than 200.000 cameras to ensure a safer and smoother traffic, worldwide.



## Sensor Development and Integration

ISSD has been able to develop a multitude of traffic sensors that are capable of operation in outdoor and indoor environments. These sensors provide a wide range of data regarding traffic flow. The provided data can help contribute to traffic management and anomaly detection significantly as the deployment of such sensors across an area can significantly increase both the accuracy of detection and the reliability and efficiency of the decision-making algorithms and the traffic management systems.

This is done in parallel to the storage of historical data for later forecasting and redundancy analysis. The developed sensors are also integrable with any traffic management system in use, to be utilized as additional data resources.

## System Architect and Applier

ISSD has the sufficient knowledge and experience to define required traffic needs and determine the required architecture and subsequently design and then develop and integrate the systems accordingly and manage the life cycles of the multitude of intelligent transportation systems it offers.

## Central Management and Control Software

ISSD has designed and developed the central software that is needed for traffic control of city-wide traffic network. The designed software has all the features and functionalities needed to manage a city sized traffic network.

This is coupled with the ability to manage results coming from different algorithms and display them in a comprehensible visual manner through its web-based interface, providing valuable information to the user and reducing the service, maintenance, and labor costs.





# Analysis

- Traffic Modelling & Simulation
- Traffic Impact Assessment
- Swept Path Analysis
- Signal Warrant Analysis
- Accessibility Analysis
- Dynamic Traffic Assignment
- Trip Generation & Distribution

# Operation

- Multimodal Operations
- Freeway Operations
- Intersection Operations
- Special Event Traffic Management
- Performance Measurement
- Transit Signal Priority



# Macro Transport Modelling

- Traffic Circulation / Regional Traffic Planning
- Macro Traffic Analysis
- Public Transport Modelling
- Sustainable Urban Mobility Plan
- Travel Demand Modelling
- Network Modelling

- Wayfinding Design
- Traffic Safety Superstructure Design
- Intersection Design
- Corridor Design & Planning
- Preliminary Design
- Final Roadway Design
- Traffic Signal Design
- ITS Design & Planning
- Complete Street Design
- Roundabout Design & Planning
- Parking Studies & Management Plans
- Signing & Striping
- Bicycle & Pedestrian Studies
- Transit Facilities Design



# Design&Planings

ISSD A.Ş.  
Complete Mobility Provider

Address:  
Üniversiteler Mahallesi  
İhsan Doğramacı Bulvarı  
Halıcı Binası No:33 ODTÜ Teknokent  
Çankaya Ankara Türkiye

Contact  
Phone +90 312 210 00 15  
Fax +90 312 210 10 75  
E-mail info@issd.com.tr

[www.issd.com.tr](http://www.issd.com.tr)