

# **TRASSIR Bag Counter**

Module for counting objects on a conveyor Neural network video analytics for retail





# **BASE FUNCTIONALITY**

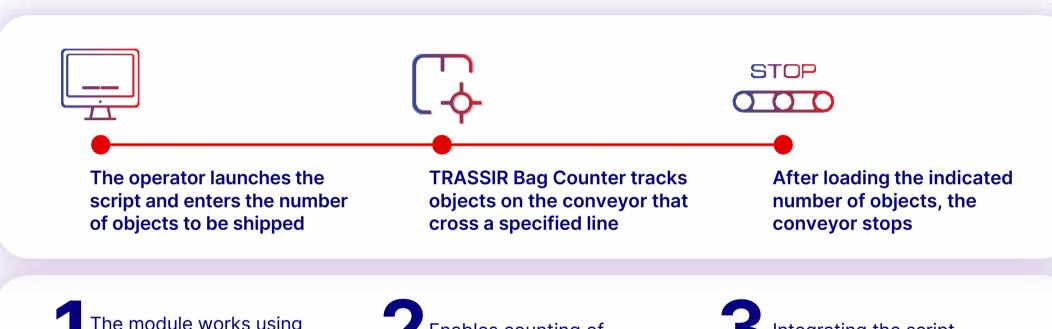
TRASSIR Bag Counter a neural network
intelligent module,
designed to count bags,
boxes or any objects of the
same type on the conveyor.

# **TRASSIR Bag Counter Features:**

- Shipment counter the module eliminates errors associated with manual shipment and helps to reduce financial losses due to errors or fraud by personnel.
- Loading automation the module controls the process of loading the conveyor and signals to the operator when to stop loading goods.
- Automatic control of the loader-conveyor is implemented by closing dry contacts using GPIO connected devices.

Base functionality can be expanded by installing additional scripts

# **HOW DOES IT WORK?**



- The module works using neural network technology, and false positives are virtually nonexistant. It uses an object tracking mechanism for counting unique objects
- Enables counting of objects which cross a predetermined line

Integrating the script with the conveyor allows you to control when the conveyor stops (this is implemented by closing dry contacts using GPIO connected devices)

## **AREAS OF APPLICATION**

Any enterprise where it is necessary to automate the process of conveyor counting and loading objects of the same type.

The module minimizes the operators functions and prevents errors resulting manual counts of loaded goods, as well as fraud by personnel.

The result is a reduction in financial losses caused by the "human factor" and payroll expenses.



Manufacturing plants



**Transport and logistics companies** 



Warehouse complexes



**Sorting centers** 

# TRASSIR BAG COUNTER: SCENARIOS OF USE

The client is a sugar factory, the products are packaged in the same type of bags.

### Task:

- To ship the specified number of bags to the contractor (transport company) for delivery to the warehouse.
- The bags are loaded into a truck using a mobile forklift conveyor, which is docked to a stationary conveyor belt

## **Solution:**

- The operator launches the script, enters the number of bags, and activates the conveyor.
- When TRASSIR Bag Counter has counted the number indicated, the script signals the conveyor using a device with GPIO, and the conveyor stops.
- A forklift loads the counted bags and the sugar is sent to the contractor's warehouse.

# TRASSIR BAG COUNTER I TECHNICAL FEATURES



TRASSIR Bag Counter has a built-in false detection filter that allows to automate the process and minimize the operator's involvement.

# TRASSIR BAG COUNTER | LICENSES AND SCRIPTS

- Works only on NeuroStation series recorders
- Offload analytics possible



# Licensing on a per-channel basis:

- → DEEP\_BAGS\_COUNTING Enables detection and tracking of bags on the conveyor
- → Universal script gives the ability to enter the amount of bags to be loaded and stop the conveyor once they've been counted

# TRASSIR BAG COUNTER: POTENTIAL INTEGRATION FOR HIGH-PERFORMANCE SECURITY

### You may also be interested in these additional TRASSIR modules:



**Face Recognition** - identifies and searches for people according to a preconfigured database of faces, identifies potentially dangerous or wanted criminals



**Pose Detector** - analyzes a person's poses, identifying those that are dangerous



**Face Mask Detector** - detects the use of protective masks in public places during a pandemic



**Social Distance Detector** - detects and gives alerts upon violation of social distancing during a pandemic



Fire & Smoke - detects fires and smoke



**AutoTRASSIR** - captures and recognizes vehicles which enter the frame: their type, license plates and any symbols on them, tracks movement, detects vehicles that are stolen or violate parking rules



**Parking** - monitors vehicles in the parking area



**Sabotage Detector** - monitors the quality of the video signal and status of cameras, informs security services and operators of problems with the image

# TRASSIR BAG COUNTER I SOLUTION ADVANTAGES



### **Cost-effectiveness and efficiency**

Automatically counts objects on the conveyor and allows to reduce errors resulting from the "human factor" to zero: avoid errors from manual counting, prevent staff fraud, minimize the staff of operators, reduce payroll costs



#### Independence

The module easily integrates with already existing equipment and is compatible with 99% of equipment from other vendors



#### **TRASSIR CMS Management System**

Manage multiple servers and cameras in a unified system



#### Offload analytics

Supports calculation on a remote server. The license is used on a remote server, not a local one



System health monitoring



Basic features can be expanded using additional scripts.



