

# LEO LOCATIVE

**BITO**  
LAGERTECHNIK

The automated guided vehicle  
without IT

**NEW**  
TARGET CONTROL  
VIA TABLET



[www.leo-locative.com](http://www.leo-locative.com)



MOVING  
LOADS  
CAN BE  
THAT EASY

## DYNAMIC TRANSPORT SOLUTION

### **SIMPLY BRILLIANT**

- + driverless transport system for bins and cartons
- + reliably links workstations in logistics and production
- + decentralized target control without Wi-Fi or host computer

### **EASY TO USE**

- + optical track guidance
- + drive commands via optical code markers on the floor
- + fully automatic transport of goods with drop-off and pick-up stations

### **SMOOTH OPERATING**

- + Easy set-up
- + Adjustments can be made by own staff
- + Modular system that grows with your needs
- + Cost efficient
- + Distribution of goods to over 500 destinations

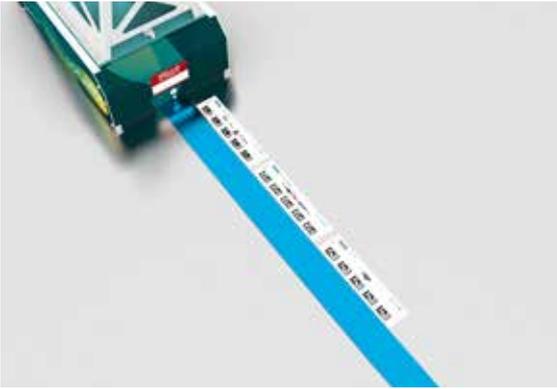
# THE SMART AGV THAT WORKS WITHOUT INTEGRATION INTO YOUR IT ENVIRONMENT

**IMMEDIATELY OPERATIVE - RUNS 24/7**

You decide on the routing - thanks to target control, LEO can flexibly approach more than 500 destinations. The schematic drawing illustrates an example of how to implement LEO: Position your LEO stations and mark the path by affixing the tape on the floor. Then place code markers to determine stops, pick-up and drop-off points.

**OPERATIONAL IN  
30 MINUTES -  
QUICK & EASY  
SET-UP**

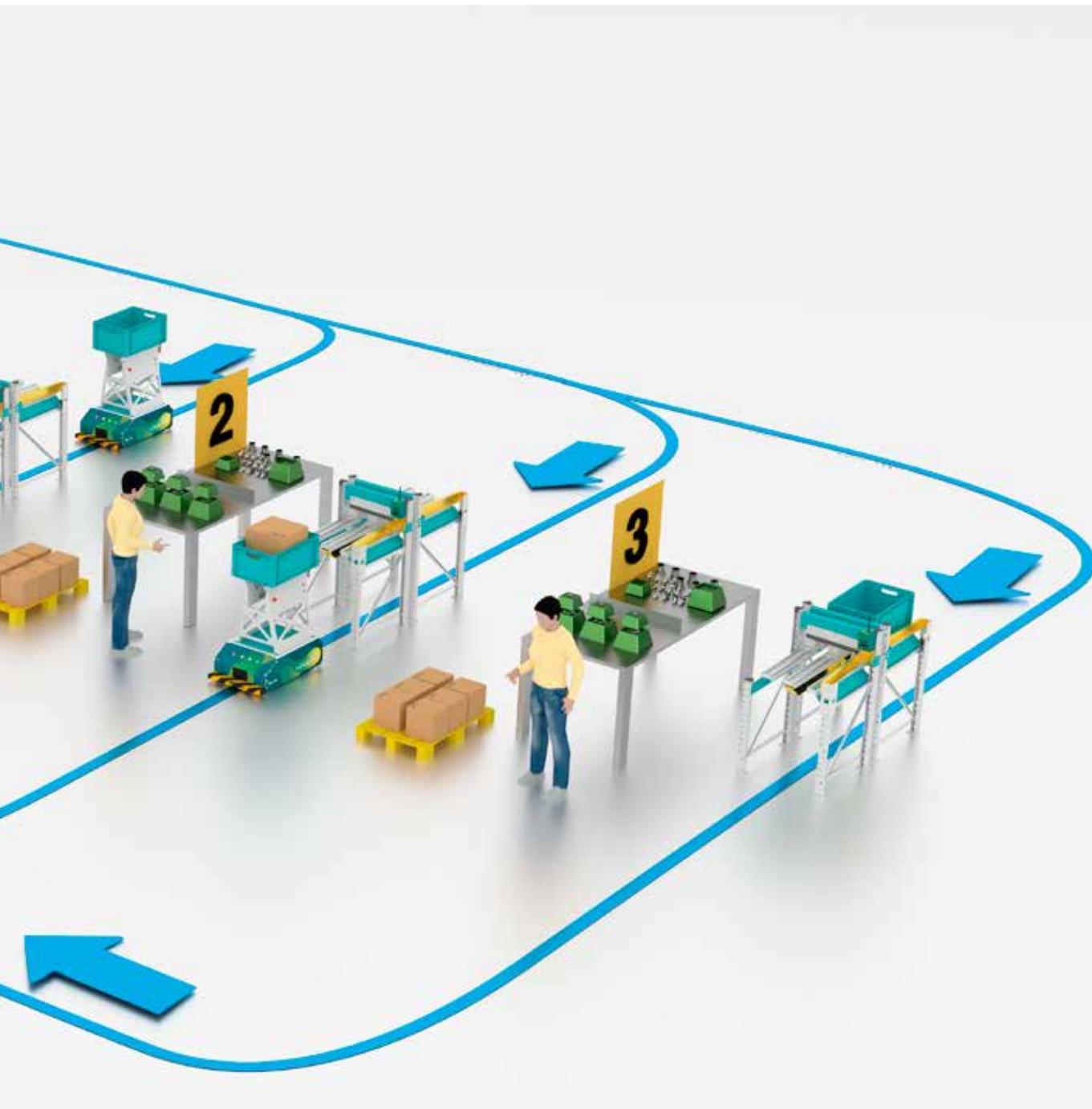




LEO Locative follows an optical track and receives commands via code markers.



Enter destination info via tablet - smart stations will transmit this info to LEO.



## LEO KIT # 1 »STARTER PACKAGE«

### LEO KIT # 1 INCLUDES

- + 1 LEO Locative vehicle including battery
- + 1 LEO accessory box complete with:
  - 1 charger
  - Track set # 1:
    - lane marking tape "flex" in red, green and blue (130 m of each colour) and 1 lane marking tape "robust" (25 m) in blue
  - 65 code markers for operations without transfer station
  - 1 software update cable
  - 1 converter package for international use
  - 1 track planning template for easier tape laying



## LEO KIT 2 »PICK-UP & DROP-OFF STATIONS«

### LEO KIT # 2 INCLUDES

- + 1 LEO Locative vehicle including battery
- + 1 drop-off station
- + 1 pick-up station
- + 1 LEO accessory box complete with:
  - 1 charger
  - Track set # 2:
    - 1 lane marking tape "flex" in red, green and blue (260 m of each colour) and 1 lane marking tape "robust" (25 m) in blue
  - 112 code markers for operations with transfer station
  - 1 software update cable
  - 1 converter package for international use
  - 1 track planning template for easier tape laying



## LEO KIT # 3 »TWIN STATIONS«

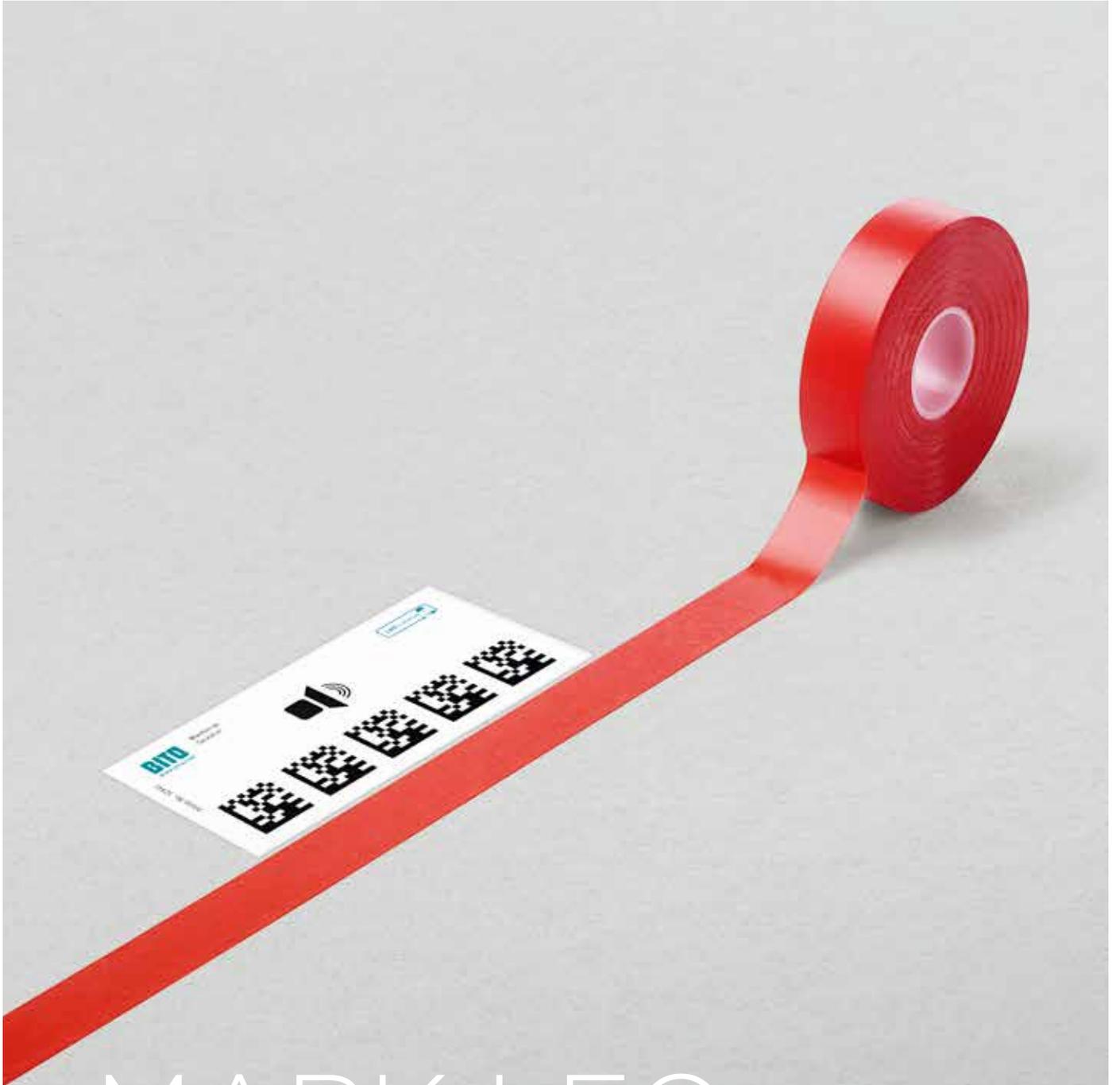
### LEO KIT # 3 INCLUDES

- + 1 LEO Locative vehicle including battery
- + 2 twin stations
- + 1 LEO accessory box complete with:
  - 1 charger
  - Track set # 2:
    - 1 lane marking tape "flex" in red, green and blue (260 m of each colour)
    - and 1 lane marking tape "robust" (25 m) in blue
  - 112 code markers for operations with transfer station
  - 1 software update cable
  - 1 converter package for international use
  - 1 track planning template for easier tape laying

**PUT  
LEO TO  
THE TEST**

**LEO KIT 3:  
FOR 4 WEEKS**





MARK LEO  
ROUTE AND  
PLACE CODE  
MARKERS - **GO!**

# YOUR LEO LOCATIVE – YOUR LOOK

## THE AGV THAT FITS YOUR BUSINESS

Choose from hundreds of design options for your LEO vehicle or create your own design. Add a company logo, choose a picture and a text message with background colour - there are no limits to your imagination.



## FACT SHEET LEO LOCATIVE

### LEO VEHICLE

Dimensions (W × L × H)	500 × 830 × 921 mm
Weight including charger	42 kg
Maximum speed	0,7 m/s
Minimum speed	0,4 m/s
Tension	24 V
DC power	40 W
IP code	21IP
Sound volume	< 60 db

### LEO CHARGER

Dimensions (W × L × H)	120 × 190 × 70 mm
Primary voltage	230 V / AC 50 Hz
Electric charge	4 A
Protection class	III

### LEO BATTERY

Dimensions (W × L × H)	370 × 80 × 225 mm
Weight	14 kg
Capacity	20 Ah
Service hours (battery fully charged)	8 - 12 h
Charging time	6 - 8 h

### LOADS

Maximum dimensions (W × L × H)	600 × 400 × 400 mm
Minimum dimensions (W × L × H)	250 × 150 × 50 mm
Max. load capacity:	20 kg
Plastic load carriers	Yes
Carton load carriers	Good quality cartons

### ROUTE PLANNING DATA

Track width (straight track)	550 mm
Minimum width of travel way	1000 – 1100 mm
Curve radius of track	700 mm
Envelope (outer/inner radius)	1150 / 400 mm

### SYSTEM CAPACITY

Max. number of LEO vehicles	0,2 vehicles/m route
Max. throughput	350 load carriers/h

### TRANSFER STATIONS

Dimensions of a single station (W × L × H)	710 × 740 × 850 mm
Dimensions of a twin station (W × L × H)	710 × 1,540 × 850 mm
Weight of a single station	60 kg
Weight of a twin station	120 kg
Tension	24 V
Power	5 W

### STATION ACCESSORIES

Dimensions pick and sort table (W × L × H)	750 × 400 × 620 mm lower edge
Drop-off buffer lane, 1200 mm long (W x L x H)	650 × 1,200 × 920 mm
Pick-up buffer lane, 1200 mm long (W x L x H)	650 × 1,200 × 780 mm
Drop-off buffer lane, 2400 mm long (W x L x H)	650 × 2400 × 1000 mm
Pick-up buffer lane, 2400 mm long (W x L x H)	650 × 2400 × 710 mm

### OPERATING REQUIREMENTS

Floor flatness (gradient)	2%
Floor colour	no requirement
Temperature	+5° to +45° C
Maximum air moisture	not condensing

Refer to [www.leo-locative.com](http://www.leo-locative.com) for more information

\*Smaller radius possible without loads and at low speed

LEO LOCATIVE -  
THE MOST USER FRIENDLY  
AUTOMATED GUIDED VEHICLE (AGV)  
ON THE MARKET

**BITO-LAGERTECHNIK  
BITTMANN GMBH**

Obertor 29  
D-55590 Meisenheim  
Tel.: +49 6753 122-0  
Fax: +49 6753 122-399  
leo@bito.com  
www.leo-locative.com