



< Bus Design & Interiors

## Masats

Supplying Accessibility Systems to the Transport Sector



Masats is an international referent in public transport accessibility systems, including passenger doors and accessibility systems for people with special needs.

With more than 50 years of experience supplying electric and pneumatic door systems to the bus and coach industry in addition to access ramps and lifts for PRM, Masats began supplying products

for the railway sector in 2008. In 2016, Masats launched a new division with products for station infrastructure: platform screen doors and gap fillers for stations. In 2021 Masats developed its first platform door project on TMB's L4/ L11 in Barcelona.

Masats creates products that enhance people's quality of life through better mobility, always giving priority to reliability, safety and maintainability. Therefore, all products are designed with the latest generation technology and Masats is always investing in innovation and adding value to strategic projects, such as the latest predictive maintenance solutions for transport accessibility systems (bus and train doors and also ramps). The aim is to predict anomalies before they occur, thus increasing vehicle availability.

Sustainability is also a key issue for Masats, so the new systems aim to reduce their weight, which also helps to reduce vehicle fuel consumption, generating less waste at the end of the life-cycle.



KS7 lift

Masats supplies products worldwide from its headquarters near Barcelona and to the North American market from its US-based plant. Its product range includes pneumatic and electric doors and accessibility systems.

The electric **sliding door 028c** with a worldwide presence, stands out for its smooth movement. perfect sealing, noise reduction and enhanced performance. Following this concept, the sliding door range is completed by the sliding door **028a for minibuses** and also the single-leaf sliding door 028b. And the new electric sliding door **028d SLIM** completes the next-generation Masats urban product range. It's a very compact low-height (153mm) mechanism which is ideal for vehicles with little clearance at the top for easy access to the engine and maintenance.

Regarding the Masats inwardswinging doors, the **029g** door is valued for the softness of its movement, its integration in the vehicle and speed of assembly. And the last product launch was the **029i** which is the revolution of the inward-swinging doors. Our fastest, smoothest and safest door with a new Masats electronic control EVOLUTION developed to offer maximum reliability and added value to the operator and high level of auto diagnosis. The system is prepared for predictive maintenance.

Another product for the coach segment is the **Swyncro** and **014-015** outward-swinging doors. Swyncro is an important evolution in door opening systems. The smooth movement, completely horizontal without wedges or stabiliser bars, enables a perfect seal and the elimination of rolling noises, increasing the comfort of passengers and drivers.

Masats develops access devices

for buses and coaches, such as its well-known electric telescopic ramp RT1, the manual ramp RM2 and the electric ramp RE1.

The range of lifts for coaches includes the KS7 lift range, with different configurations that can be installed in stairs or a dedicated door, and the KV5 vertical lift. We offer a complete ramp and door solution which provides a comfortable and safe entry system for passengers with special needs.

The company designs its own electronics ECU, according to the latest ISO 26262.

The products have evolved towards more digitised systems, with a high level of maintainability and safety, and which provide greater vehicle availability, thanks to their new Evolution electronics, prepared for predictive maintenance.

Years ago Masats took the

strategic decision to develop a specific product range for the railway sector. More recently, we have incorporated platform door systems, which are installed in the fixed infrastructure of the station, such as the PSD platform doors or the gap filler. An important milestone for the company was the first installation of PSD platform doors for Line 11 of the Barcelona Metro in September 2021. The platform doors improve station safety, improve service, optimise air quality and air conditioning in the station. Its lighting portal provides passengers with information on the position and operational status of the doors and minimises delays. A high-tech project with a lot of prospects for the future of the company.

Regarding the accessibility systems for railway vehicles, **Sliding Plug** 

doors for EMUs or light rail vehicles are a robust and reliable system. The door has been designed to reduce the product life-cycle costs and for a safer and better passenger experience.

The new RF3+ contactless step ramp is a multi-use access device: ramp, step or gap filler for safe and functional passenger transit. It features a contactless platform detection system and automatically detects the platform position with respect to the train and deploys as a ramp or step as needed. It also adapts to the necessary length.

ThyraLink Communication
System: Thyralink establishes
direct communication between
train doors and platform doors
for open on-demand operation.
This improves the sustainability
of climate control at the station

and on the train. The system can replicate the door status among each of them.

Masats is an international benchmark in accessibility systems for public transport, including access doors and ramps or lifts for people with reduced mobility for both buses and trains. It is also active in the infrastructure sector, improving passenger safety and mobility with platform systems, such as platform screen doors. From its plant in S. Salvador de Guardiola (Barcelona), where more than 300 people work, and with a production subsidiary in Kennesaw (USA), it exports to more than 45 countries.



