Autonomous Asphalt Paving

Road Construction 4.0 with Digital Leveling Systems

DYNAPAC
FAYAT GROUP

Perfect Interaction

With Dynapac pavers, you rely on cutting-edge technology for autonomous paving. Our machines are already prepared today for the construction projects of tomorrow – experience technology on a whole new level.

Plug & Play

– One connector for all systems

– 3D control systems from manufacturers such as Leica, Trimble, and Topcon can be seamlessly integrated.

Seamless Interaction

– The latest systems from renowned manufacturers interact seamlessly with Pave OS Pro, the new gold standard of Dynapac machine software.

1:1 Communication

– Presets for 3D systems can be made directly on the machine. The constant switching between third-party and machine software is no longer necessary.

DynapacPave OS Pro

LEVEL CONTROL
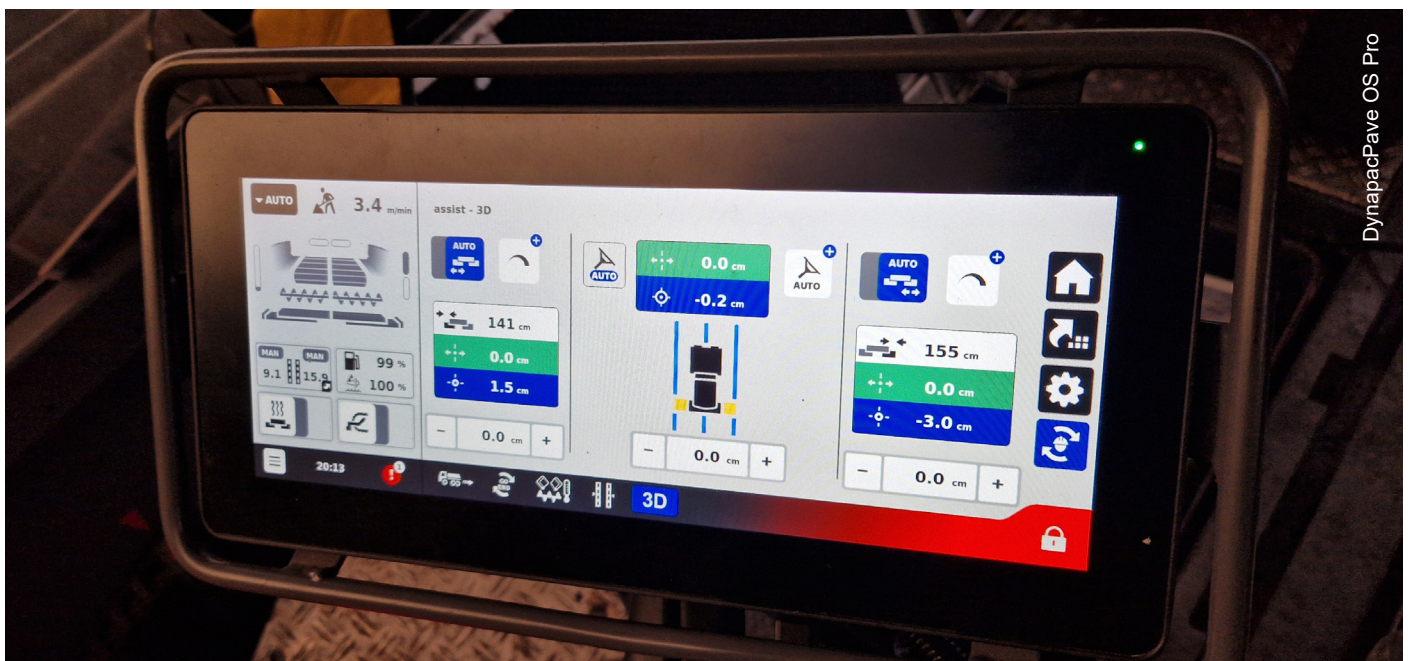
Designing Space

3D navigation as you need it. Whether it's height, slope, width, or direction: precise sensors and intelligent software process all data in real time, guiding your machine safely across the construction site.

GOOD TO KNOW

Through our cooperation with Leica Geosystems, we can now offer GPS/RTK-based horizontal control for the paver. The machine manages the direction and, if desired, also the paving width, while the paving height is leveled traditionally using 2D components. This greatly reduces complexity and eases the operator's workload.

ESPECIALLY HELPFUL

During paving, it is possible to seamlessly switch between different system components, allowing on-site conditions to be utilized in the best possible way.

Perfect in Every Direction

Height Control

Whether through classic 2D height measurement, 2D leveling systems like our Level Control Ski or the MOBA Super Ski, or via external references and fully digital models – there is certainly the right solution for your application.

Slope Control

The classic Level Control slope sensor can do more than just detect a position: it is also possible to compare actual values with digital target values, making it easy to implement complex slope profiles via the 3D interface. No digital models available? No problem: the distance-dependent functions integrated into Pave OS Pro support the operator and enable semi-autonomous paving.

Direction Control

Once the data is available, the machine moves as if by magic. With Level Control 3D Pro, the machine can follow guide lines based on the 3D interface without any manual steering input required.

Width Control

The screed width can also be controlled based on 3D data. This means that even the final piece is automated, and the machine operates fully autonomously. If no data is available for width guidance, a solution is still provided: the Dynapac MatTracker follows reference edges such as curbs or already paved layers and adjusts the screed width accordingly.

On the Road

Together with our customer BUDIMEX, we have fully equipped a new Dynapac highway paver with digital leveling systems from our partner Trimble.

This allowed the Dynapac SD25 70 C to operate on the construction site almost completely autonomously – precise, efficient, and forward-looking.

Compelling Reasons for the Future

Designed for real-world applications

– Fully proven technology – not an experiment, but practical reality.

– The driver remains in full control at all times – the machine handles the precision work.

Meet all requirements

– Already required in many tenders today.

– Reduction of sources of errors and rework.

– Greater efficiency through precise, automated installation

Our partners

Trimble.

TOPCON

Leica *Geosystems*

Dynapac is a leading supplier of high-tech soil and asphalt rollers, light equipment, and pavers committed to strengthening customer performance by being a partner on the road ahead. Dynapac is represented worldwide via its regional sales- and service offices and cooperates with an extensive and professional distribution network. Headquartered in Wardenburg, Germany, Dynapac has production facilities in Europe, South America and Asia.

Dynapac is part of the FAYAT Group.