

Press release

"Zero emissions, full power": Liebherr LTM 1150-5.4E mobile crane with electric drive

- LTM 1150-5.4 – Liebherr 150-tonner converted to LICCON3
- LTM 1150-5.4E is the version with the electric drive
- Battery allows autonomous drive as well as full power with low connected load

At Bauma 2025, Liebherr is presenting the LTM 1150-5.4, which has been converted to the new LICCON3 control system generation. A particular highlight is the LTM 1150-5.4E variant with electric drive, which allows the crane movements to be performed emissions-free and with reduced noise pollution. With an integrated battery, the crane can work autonomously for up to four hours without a power connection, and a low connected load on the construction site is sufficient to utilise the crane's full power, as the battery acts as an efficient buffer. The LTM 1150-5.4E meets the requirements of "Zero Emissions Construction Sites" and combines sustainability with maximum efficiency.

Ehingen (Donau) (Germany), 7 April 2025 - With the LTM 1150-5.4E, Liebherr is setting new standards at Bauma 2025 in terms of sustainability and efficiency. On and off-road, a 400 kW (544 HP) combustion engine with exhaust emission stage 5 provides for powerful drive. The motor is fully compatible with hydrogenated vegetable oil (HVO) and, compared to diesel fuel, reduces operational CO₂ emissions by up to 90 %.

In crane operation, the choice between combustion engine or electric motor allows flexible use. The latter reduces both air and noise emissions to a minimum and is ideal for "zero emissions areas", as well as noise-sensitive areas. With this combination of state-of-the-art technology and sustainability, the LTM 1150-5.4E is one of the trade fair's undisputed highlights.

Electric drive offers flexible use

The newly developed drive with electric motor impresses with a 111 kW electric motor, which guarantees unlimited crane operation, offering virtually the same performance as the 6-cylinder combustion engine. For the transfer of power to the consumers in the crane superstructure, the electric drive uses the existing gear shafts from the transfer gearbox in the chassis to the pump transfer gearbox in the superstructure.

The electric version complements the conventional model of the LTM 1150-5.4 with a water-cooled high-speed electric motor, a distributor gear, a battery and the necessary control technology. The electric motor's distributor gear is integrated cleverly between the chassis transfer gearbox and the gear shafts to the superstructure. This clever yet simple solution enables the operator to switch flexibly between diesel-hydraulic power and electro-hydraulic power.

Mobile crane with battery pack

The drive concept of the LTM 1150-5.4E builds on the proven technology of the Liebherr LTC 1050-3.1E compact crane, albeit with an important upgrade: an integrated battery pack. This concept brings two key advantages. Firstly, the crane can be operated autonomously for around four hours without a power connection thanks to its battery. Secondly, even a low connected load, around 16 or 32 Amps, is enough to unleash the crane's full power since the battery acts as an efficient buffer. The crane draws high current strengths for peaks in performance from the battery, which is constantly recharged via the site's power source. Charging takes place via the CEE high-current plug with 16, 32 or 64 Amps and up to 44 kW of power or via a modern CCS plug for fast charging at up to 80 kW.

The 99 kWh battery is securely installed in a box weighing around 1.5 tonnes at the rear of the crane. To enable driving on public roads, the ballast plates have been adapted accordingly - a carefully thought-out concept for maximum flexibility and efficiency on the construction site.

LTM 1150-5.4 - the jewel in your fleet

Under the slogan "The jewel in your fleet", Liebherr showcased the LTM 1150-5.3 in 2020 - a real all-rounder that shines in every fleet. With its 66-metre-long telescopic boom, the 150-tonne crane ranks in the league of the 200-tonne class and impresses with exceptional lifting capacities, both with the boom fully raised and at a large radius. With the telescopic boom extended to its maximum length, the workhorse can lift 9.1 tonnes. That makes it perfect for erecting tower cranes and radio masts.

On the construction site, the economical 5-axle mobile crane is immediately ready for use, since it already carries nine tonnes of ballast with it, with a total weight of 60 tonnes. This means it can carry out many jobs without requiring additional vehicles for the transport of ballast. All this saves time and money, and makes the crane even more valuable to crane contractors – hence the slogan: "The jewel in your fleet".

About Liebherr-Werk Ehingen GmbH

Liebherr-Werk Ehingen GmbH is a leading manufacturer of mobile and crawler cranes. Its range of mobile cranes extends from 2-axle 35 tonne cranes to heavy duty cranes with a lifting capacity of 1200 tonnes and a 9-axle chassis. Its lattice boom cranes on mobile or crawler travel gear deliver lifting capacities of up to 3000 tonnes. With universal boom systems and extensive additional equipment, they can be seen in action on construction sites throughout the world. The Ehingen site has a workforce of 5,000. An extensive, global service network guarantees the high availability of Liebherr mobile and crawler cranes. In 2024, the Liebherr plant in Ehingen recorded a turnover of 3.19 billion euros.

About the Liebherr Group

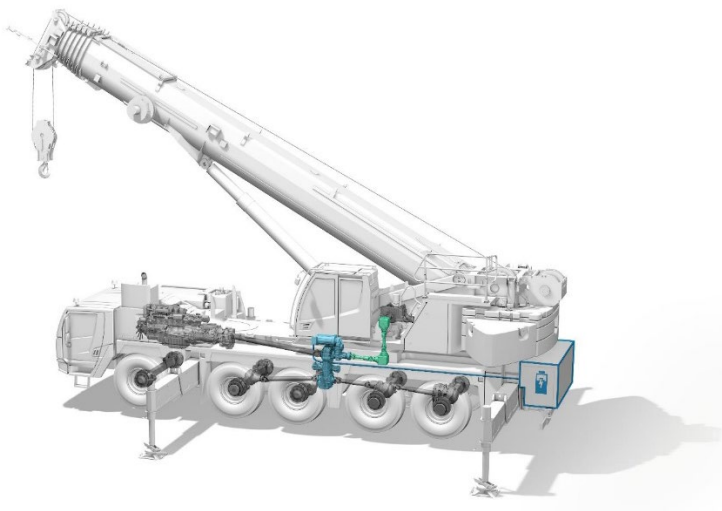
The Liebherr Group is a family-run technology company with a highly diversified product programme. The company is one of the largest construction equipment manufacturers in the world. It also provides high-quality, user-oriented products and services in a wide range of other areas. The Liebherr Group includes over 150 companies across all continents. In 2024, it employed more than 50,000 staff and achieved combined revenues of over 14 billion euros. Liebherr was founded by Hans Liebherr in 1949 in the southern German town of Kirchdorf an der Iller. Since then, the employees have been pursuing the goal of achieving continuous technological innovation, and bringing industry-leading solutions to its customers.

Captions



liebherr-ltm1150-5.4E.jpg

At Bauma, Liebherr is showcasing the LTM 1150-5.4E, its first electrically driven mobile crane with battery.



liebherr-ltm1150-5.4E-electric-concept.jpg

The electric motor powers the gear shaft to the pump transfer gearbox in the superstructure via a distributor gear. The battery pack is attached to the rear of the vehicle.

Contact person

Wolfgang Beringer
Marketing and Communication
Phone: +49 7391/502 - 3663
E-mail: wolfgang.beringer@liebherr.com

Published by

Liebherr-Werk Ehingen GmbH
Ehingen (Donau) / Germany
www.liebherr.com