Press release

June 19, 2022

Interschutz 2022: Rosenbauer accompanies fire departments into the electromobile future

Alternative drive concepts, above all electric mobility, are the technology of the future - especially for fire-fighting vehicles. As a market and innovation leader, Rosenbauer sees it as its responsibility to accompany fire departments into this future. Work on this topic was started more than ten years ago in order to garner extensive expertise. At Interschutz, the world's leading trade fair, Rosenbauer is now presenting a complete range of electric emergency vehicles, from municipal fire trucks including fully electric aerial ladders to ARFF vehicles.

New framework conditions

Fire-fighting vehicles are procured on average every 20 to 30 years, and it was already apparent ten years ago that by 2030, the drive solution would have to be different, more environmentally friendly, and that fire services would need more sustainable technologies. Societal developments in recent years have clearly confirmed this trend: more and more municipalities worldwide are committing to ambitious sustainability and climate goals, such as the reduction of CO_2 and greenhouse gas emissions. Fire services are also reflecting the political will and want to make a contribution with their vehicle fleets, especially in large cities and metropolitan areas. The same applies to industrial and airport fire departments, as companies and airport operators sometimes have even more ambitious goals. As their vehicle fleets are manageable in size, relatively homogeneous and at the same time highly specialized, they are particularly well suited for electrification.

In addition, there is an industry-specific aspect that lends the topic additional urgency: all truck producers are now vigorously converting to electric mobility or alternative drive systems. In the future, there will be fewer and fewer chassis with conventional drivelines available, so fire truck manufacturers will have to ensure the operational readiness of fire services with other technological concepts and vehicles. Rosenbauer assumes that the electric transformation in the industry will gain considerable momentum, especially as rechargeable batteries and their storage capacities are constantly being further developed and the ranges and operating times of electric vehicles are clearly improving. By 2030, therefore, half of all vehicles that Rosenbauer delivers to fire departments should already be electrified.

The fire-fighting vehicle of the future

Two years ago, Rosenbauer launched the RT (Revolutionary Technology), the first fully electric tank fire-fighting vehicle. A vehicle whose development was not only aimed at an alternative, environmentally friendly drive concept, but also a comprehensively functional answer to the requirements of everyday firefighting in the future: sustainable operation, digital operational support and broad networking, ergonomic and intuitive operability (more and more women and older people in the fire service), better protection of the emergency crews due to increasing health and safety awareness, to name the most important ones.

The RT technology makes it possible to meet all these requirements and to support people in the firefighting operations of the future even more efficiently and even more reliably: they are safer on the road in the RT than in a conventional emergency vehicle, for one because it drives almost like a passenger car, they protect their health because the RT is completely ergonomically designed from the entrance to the operating height due to the completely new vehicle architecture, and they are exposed to significantly fewer pollutants and noise over long distances of the operation because they can deploy without local emissions and can carry out the majority of their operations - up to 90 % - purely electrically, without a running vehicle engine.

Fail-safe technology

Rosenbauer develops all products in a comprehensive context of sustainability and only brings tested, robust and fail-safe technology to the market. Therefore, ensuring continuous duty and unrestricted operational capability in the event of a disaster was at the top of the agenda when developing the RT and subsequently the entire electric vehicle program. The Rosenbauer Range Extender REX, which is used in every vehicle with an electrified driveline, reliably achieves this aim. While still diesel-powered for the foreseeable future, the REX will in future also be operated via a fuel cell with hydrogen or with other, climate-friendly fuels, keyword e-fuels. The concept is wide open and the technology can be adapted quickly. With the right equipment, an electric emergency vehicle can even provide emergency power, for example to supply energy-intensive consumers or parts of critical infrastructure with emission-free energy.

In addition, the following applies to electric motors in general: they are more sustainable than conventional motors because they are incomparably more efficient as well as simpler and more compact in design (one third fewer moving parts) and are thus significantly more maintenance-friendly in comparison (longer service intervals). In addition, the economical electric motor opens up the possibility of converting kinetic braking energy, which is lost in conventional systems, into electrical energy. Currently and in the foreseeable future, the e-drive is the most efficient drive concept available.

Fully electric fleet

At Interschutz, Rosenbauer is showing what the fire departments' vehicle fleet could look like in the future: In addition to the RT, the electric vehicle range includes

- the first AT electric, in which the proven AT technology is implemented on a fully electric series chassis,
- the first L32A-XS electric, which combines all the functionalities of the standard aerial ladder with the advantages of a fully electric series chassis,
- the GW-L electric, a logistics vehicle with a highly flexible body on a similarly fully electric series chassis, and
- the first PANTHER electric, the concept for the ARFF vehicle of the future on an electrified Rosenbauer chassis.

Technology and expertise leader

Rosenbauer will cover all the needs of fire departments on their way to electromobility. This not only means that in future there will be an electric vehicle for every operational scenario in the product range, but also that the fire departments in particular will be provided with comprehensive expertise in this field. After all, electromobility also necessarily includes solutions on how the charging infrastructure for the firefighting vehicles of the future will look like, how the fire services can make themselves energy self-sufficient and how they can ultimately realize a fully electric, digitalized and networked firefighting operation.

The Rosenbauer Group

Rosenbauer is an international group and a reliable partner to fire services around the world. The company develops and produces vehicles, fire extinguishing systems, fire and safety equipment and digital solutions for professional, industrial, plant and volunteer fire services and systems for preventive firefighting. Rosenbauer is represented in approximately 120 countries by a sales and service network. With revenues of € 975.1 million and around 4,100 employees (as of December 31, 2021), the Group is the world's largest firefighting technology provider.

For further information, please contact:

Rosenbauer International AG
Tiemon Kiesenhofer,
Head of Communications, Company Spokesperson
Paschinger Strasse 90
4060 Leonding, Austria
Tel.: +43 732 67 94-568
Fax: +43 732 67 94-94568

E-Mail: **press@rosenbauer.com**
www.rosenbauer.com