WRT Rally1 Spain unveils its innovative lighting system

The development of the headlights has involved more than 700 hours of engineering work, reflecting the technical complexity and high standards of a project that continues to make steady progress towards WRC 2027.

The partnership between RMC Motorsport and the Royal Spanish Motorsports Federation (RFEDA) continues to bear fruit. The team is preparing to unveil the first images of the car's exterior design, along with its official name.

The WRT Rally1 Spain project is making strong progress on the development of the new car. Working with the RFEDA, RMC Motorsport aims to compete in the top category of the FIA World Rally Championship under the new WRC27 regulations.

After months of intensive technical work, the project is taking shape through the design, engineering and development of the car's components. This is a highly complex process: every element, however small, requires meticulous research, design and optimisation to meet the performance, safety, efficiency and reliability standards demanded by international competition at the highest level.

The innovative lighting system developed specifically for the new car is a good example of this approach. Its design offers a glimpse of some of the technical and aesthetic principles shaping the character of Spain's future rally car.

Far more than a simple lighting feature, the WRT Rally1 Spain headlights bring together aerodynamics, structural design, technology and visual identity. Their development involves more than 700 hours of engineering work, covering the design of the housings, aerodynamic studies, integration of the optical systems and preparation for FIA homologation.

One of the main challenges has been to create an extremely lightweight structure without compromising rigidity. The team has opted for housings made entirely from fibreglass, designed to minimise weight while meeting the demands of a car built to compete in the most extreme conditions.

Aerodynamics have also played a decisive role. The shape of the headlights is the result of an extensive study of airflow across the front of the car. Their contours are therefore about more than appearance: they form part of the car's overall aerodynamic concept, helping to channel airflow and optimise the design as a whole.

Alongside the technical requirements, the development team has focused on giving the new car a distinctive visual identity. The system uses continuous LED lighting, a lightweight solution that creates a modern, aggressive signature with a strong character.

The indicator takes the form of a slim, continuous line integrated into the bodywork, while the daytime running light (DRL) traces a distinctive "R", subtly incorporating RMC Motorsport's identity into the design.

The result is a system in which technology and design work together, hinting at some of the future car's styling features without yet revealing its final appearance.

The development of this lighting system is just one example of the work underway across the car as a whole. Every component must fit within an overall technical concept in which structural architecture, aerodynamics, weight distribution, safety and the integration of different systems are closely connected. This approach requires close coordination across the engineering and development teams and highlights the scale of the challenge undertaken by RMC Motorsport and the RFEDA.

Engineering work on the project's various technical aspects is progressing steadily, and WRT Rally1 Spain is preparing for one of the most eagerly anticipated moments since the project was announced. The first images of the car's exterior design are expected to be released in the coming weeks, along with the name it will carry.