**Portrait Car Repair 4.0 (long version)**

**AI-supported vehicle diagnosis in the Car Repair 4.0 project**

In the Car Repair 4.0 (CR 4.0) funded project, a consortium of partner companies and research institutes is developing a nationwide German platform for the trustworthy data exchange of industry-specific AI models and vehicle data. With the help of the data platform, car repair shops can use intelligent fault diagnosis systems. Through the support of automotive oscilloscopes and AI-based methods, targeted troubleshooting is being made easier and more concise. The project is funded by the German Federal Ministry for Economic Affairs and Climate Action (BMWK) as part of the European Gaia-X data ecosystem, and is overseen by the German Federal Network Agency (BNetzA).

The goal is to advance digitalisation in the automotive industry, especially among small and medium-sized companies (SMEs). Car repair shops, measurement system providers and AI startups are interconnected to form an innovation and value creation network. The CR 4.0 project helps SMEs to adapt to the demands of the digital age and facilitates the automotive industry’s shift towards greater electrification.

**Rising demands for car repair shops due to electromobility**

Especially in light of the increasing technical complexity of electric vehicles, CR 4.0 helps car repair shops to respond better to the new demands. Currently, car repair shops face a dual challenge: they must be able to handle the different combustion technologies and repair electric vehicles at the same time.

**Consortium partners to develop platform in three years**

To this end, measurement system providers, AI startups, automotive companies and research institutes have joined forces in a consortium. This consortium was successfully awarded from the BMWK funding competition, entitled the “Innovative and practical applications and data spaces in the Gaia-X digital ecosystem”. LMIS AG is now managing the project as the consortium leader. The seven other consortium partners are: Auto-Intern GmbH, DEKRA DIGITAL, German Research Centre for Artificial Intelligence GmbH, Osnabrück University of Applied Sciences, Georg Agricola University of Applied Sciences, Vergölst GmbH, and eco – Association of the Internet Industry.

**Benefits**

• Modern and detailed automotive fault diagnosis

• No exchange of spare parts on spec

• Conservation of resources through sustainable maintenance

• Access to the nationwide German data platform for independent car repair shops and SMEs

• Opportunity to present yourself in the industry as a renowned AI provider

• Get in touch with independent car repair shops and network with them

• Expand range of services in the automotive sector

**Further information and contact:**   
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