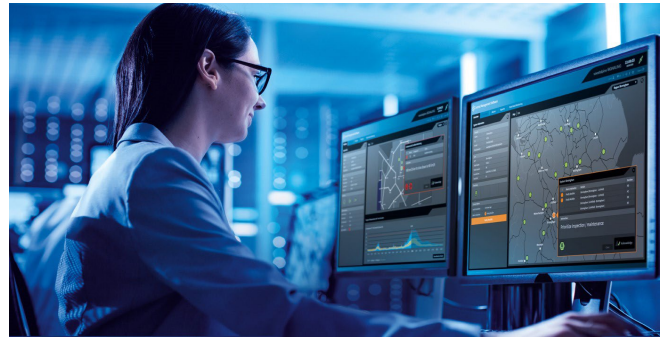# RAILWAY SYSTEMS
by voestalpine

# zentrak FLEET CONDITION MONITORING

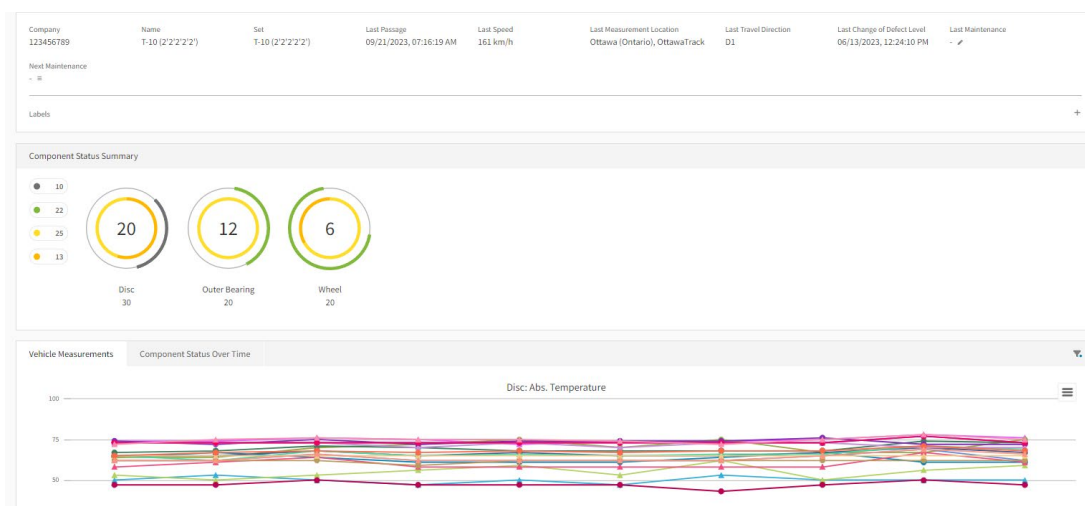## Application for fleet managers and maintenance technicians

### Description

Fleet Condition Monitoring provides users with a comprehensive overview of their entire fleet. Intuitive navigation and customer-friendly displays ensure in-depth insight into all relevant quality data. The monitoring function monitors all incoming measurement data and alerts users to critical events in near real time. Based on machine learning algorithms, the system also detects trends that may indicate a (looming) technical defect and thus enables the user to act proactively to avoid critical situations and technical failures and ensure optimal maintenance planning.



**Fleet Condition Monitoring**

### System advantages

» Intuitive dashboard provides overview of critical events

» Set and vehicle explorer for optimal display of the entire fleet

» Monitoring function for monitoring and alerting in case of critical events

» Machine learning algorithms for proactive avoidance of failures

» Automatic Vehicle Registration for the automated detection of vehicles

» Ring Fencing and Groups for assigning access restrictions to individual groups of people

# voestalpine
ONE STEP AHEAD.

# MAIN FUNCTIONALITIES

## Intuitive Dashboard

The dashboard provides a comprehensive overview of the entire fleet. An extended traffic light system informs the user about current urgencies and helps him to set priorities sensibly.

## Set and Vehicle Explorer

The use of the Explorer offers maximum convenience and provides a comprehensive overview of the entire fleet. The intuitive display and the possibility of meaningful grouping enable the user to keep an eye on conspicuous features at all times.

## Monitoring Function

With the help of customer-specific algorithms, critical events can be identified in a timely manner. A variety of rules and different calculation methods can be optimally adapted to the customer's needs, which optimizes monitoring reliability. In this way, irregularities can be quickly detected and further action can be optimally planned.

## Machine Learning Algorithms

The use of machine learning algorithms enables the user to analyze patterns and identify possible irregularities at an early stage with the help of the analysis of past and current data. The combination of different variables and calculation methods guarantees a high level of customer-specific adaptability, which means that anomalies can be identified at an early stage.

## Automatic Vehicle Registration

On the basis of individually created rules, even unknown wagons and sets can be automatically detected, created, grouped and assigned to monitoring. Time-consuming manual configuration of the system is no longer necessary.

## Ring Fencing and Groups

Ring fencing and the possibility of group formation regulate the assignment of access restrictions for individual groups of people. Operators can thus see and edit only the information that is relevant to them. Other data is not visible to them, which not only contributes to data protection and integrity, but also allows the user to focus on what is important.