Goal: High dynamic path-following close to stability threshold with high repetition accuracy

High Reproducibility in Dynamic Drive Tests

- Precise guidance of test vehicles around dummy obstacles
- Lateral acceleration up to 0.8g
- Conduction of false-positive avoidance tests

Test Result

The steering angle can be set by the system with a very small delay. As shown in the graph below, the difference during the evasion manoeuvre with 0.8g is as low as ±4 cm.

The actuator determines the control input from the difference between the actual and the targeted position. The steering wheel is automatically turned to the right direction via a map-based control system.

Technical Details

- Max. lateral acceleration: 0.8g
- Setup time: 2h
- Accuracy: ±2 cm at low dynamics
  ± 10 cm at max. dynamics

- Positioning system: RTK D-GPS
- Track design: PC based
- Applicable to any vehicle