



CAFA self-driving-robot experiments in Smart Highway CityLab and GPU Lab

CAFA-RAM-Robot

9th Fed4FIRE+ Competitive Call Experiments (Stage 2 SME)

Category "Medium Experiments"

www.fed4fire.eu

ABOUT CAFA TECH



Computer Vision and Robotics Company (Estonia)

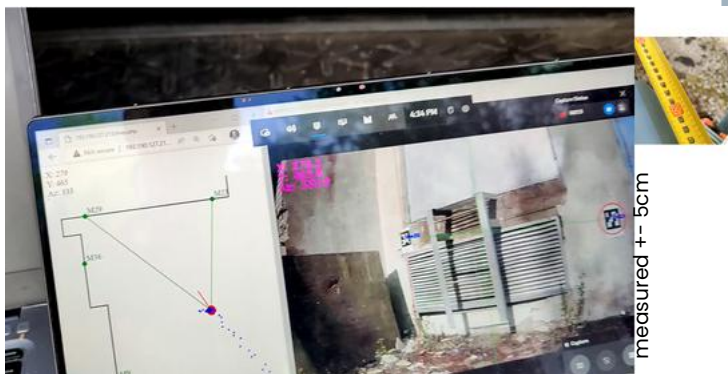
1. Autonomous Multi-robot systems with ground robots and drones
2. Computer Vision Systems for analysing sensors and cameras data feeds in near real time

Conclusions of Smart Highway experiments

For the first time in Europe, CAFA Tech team tested the mobile robot's location sharing with other vehicles over the ITS-G5 protocol!



Positioning in the field

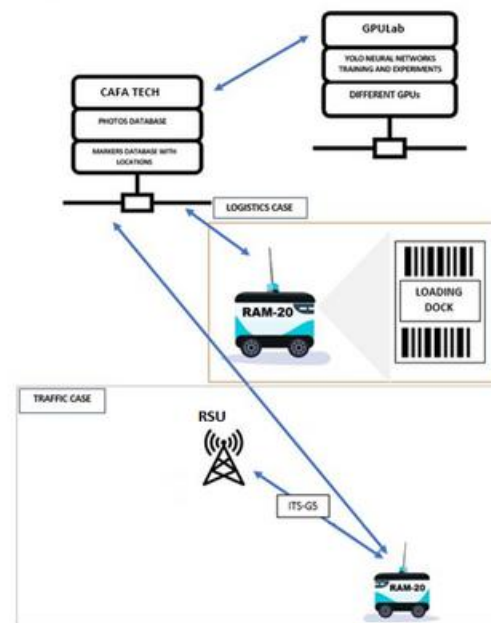


CAFA-RAM-ROBOT MEDIUM EXPERIMENTS: 2021-2022

ITS-G5 (Cohda Wireless MK5 OBU) experiments in Smart Highway V2X tested to transfer information from the CAFA RAM-20 robot to other vehicles (experiments in CityLab).

Computer Vision solution experiments to identify outdoor markers for location and detection of people and vehicles close to the robot in near real time (experiments in GPU Lab).

CAFA RAM ROBOT EXPERIMENTS INITIAL ARCHITECTURE



Person and vehicle detection by CAFA RAM robot from a distance of more than 20m



Quotas for Fed4Fire

The Smart Highway testbed offers unique opportunities in Europe to test how to share real-time information between robots and vehicles using both the ITS-G5 and C-V2X protocols!

GPU Lab enables experiments with state-of-the-art GPU technologies and has world-class documentation and support team to help you prepare and run tests!