TU/e EINDHOVEN UNIVERSITY OF TECHNOLOGY

Embedded Motion Control

Escape Room Challenge

Group 8

Overview

- Requirements
- Components and Functions
- Measurement plan
- Questions

Requirements

- Autonomously find the exit
- No wall bumping
- Not tipping over
- Progress each 30 seconds
- Easy to setup software
- Robust functionality

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Specification

- Autonomously find the exit
  - Rear wheel cross the finish line
  - Finish within 5 minutes
  - Finish within 2 trials

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Specification

- No wall bumping
  - Wall robot distance 5 centimeter

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Specification

- Progress each 30 seconds
  - Report status
  - Maintain and switch states to advance strategy plan

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Specification
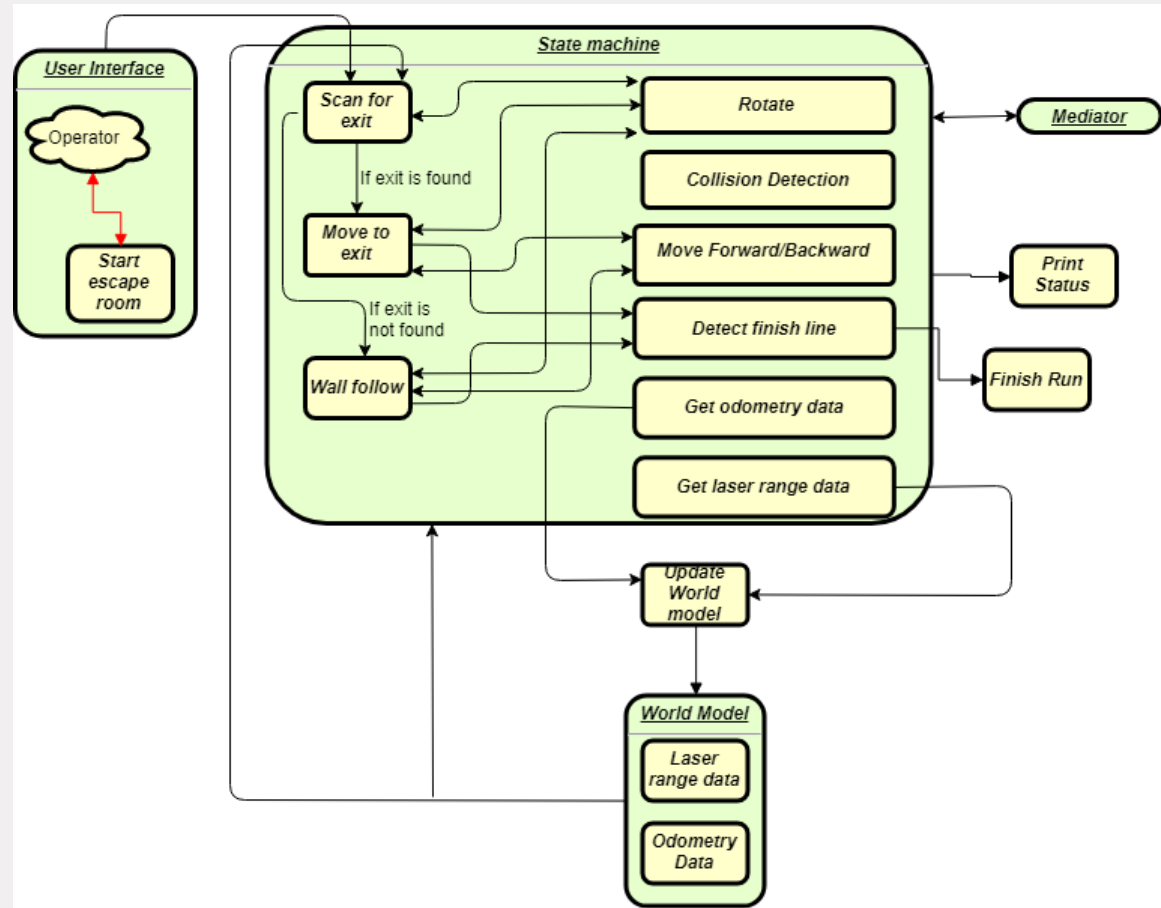
- Robust functionality
  - Scalable functions
  - Definition of data ownership

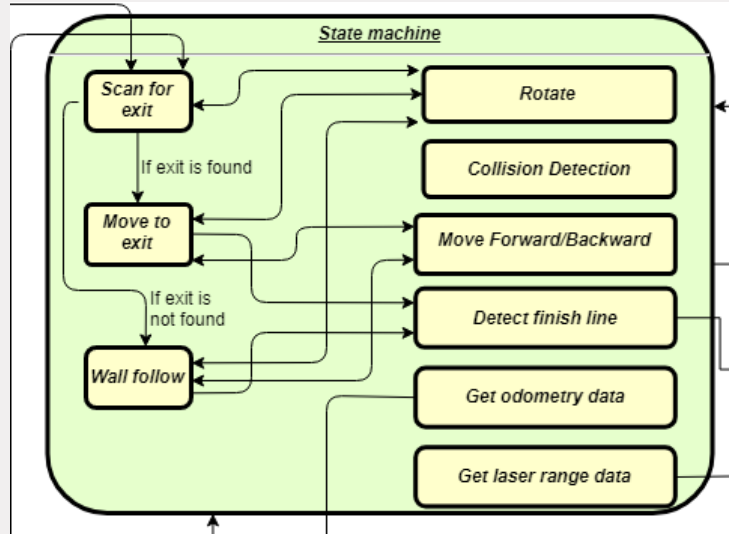
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Components and Functions

- User interface
- State machine
- World Model
- Mediator

Components and Functions

Summary

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