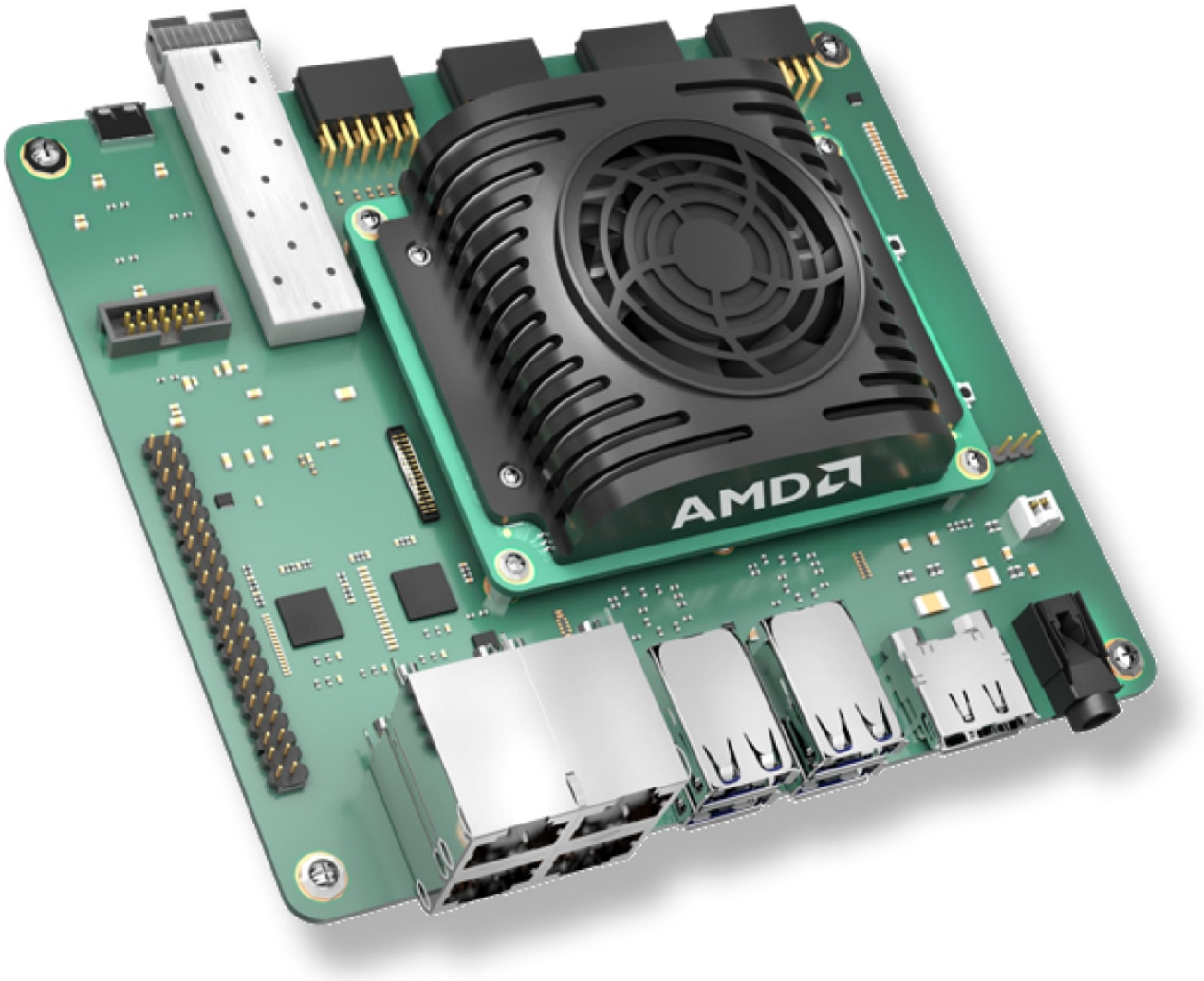
UMD Driverless Pipeline

- Camera based
- Rough Overview:
  - Detect cones and distances
  - fuse cones and car position with slam into a map
  - calculate a path
  - calculate hardware commands to follow path
- Will run on Kria Development board
  - Heterogenous System by Xilinx (AMD)
  - With Zynq UltraScale+ chip
  - Contains CPU (ARM Cortex A53), GPU (Arm® Mali™-400 MP2), RTP (Cortex®-R5F), FPGA (16nm FinFET+ PL)
  - Very power efficient (max 30W)



General

- Boards in UMD lab can be accessed with SSH from the uni-network (in wifi or vpn)
    - information on that during the week in mattermost
    - Problems? -> text Moritz
- Can also work in UMD lab
    - Text Moritz on mattermost
    - Will find date and time (during the week between 15 and 18 or on weekends)
- Work on UMD GitHub
- Maintain a good documentation about the steps you took and decisions you made