

Task Manager

ToDo

- Setup ROS2 for L515 data processing
- Read from reading list
- Setup work cell
- Order parts
- Write paper

Important

- RealSense Tools
- Realsense docs
- depth post-processing for intel rs d400 series

Hardware

- D455 x2
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Project Setup

- Ubuntu 20.04
- ROS2 Foxy Fitzroy
- LibRealSense v2.50.0
- ROS2-legacy wrapper

Reading List

- ☒ L515 datasheet
- ☒ L515 User Guide
- ☒ RealSense docs
- ☐ Realsense examples -> in git/rs sandbox repo
- ☐ Depth post-processing for intel rs d400 series
- ☐ ROS2 docs

Code and Dev

- Intel Realsense (v2.5) Repo
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Test Goals

- Clamped end low, DLO on table and flat, change gripper pose, no twist on DLO: @ omega shape, s shape, u shape, circle shape, ellipse shape, spiral.
- Clamped end low, DLO on table and 3D, with twist: same shapes.

- Clamped end low, DLO angles at 30 degrees and 3D, without twist.
- Clamped end low, DLO angles at 45 degrees and 3D, without twist.
- Clamped end low, DLO angles at 60 degrees and 3D, without twist.
- Clamped end low, DLO angles at 75 degrees and 3D, without twist.
- Clamped end low, DLO angles at 90 degrees and 3D, without twist.
- Clamped end low, DLO angles at 30 degrees and 3D, with twist.
- Clamped end low, DLO angles at 45 degrees and 3D, with twist.
- Clamped end low, DLO angles at 60 degrees and 3D, with twist.
- Clamped end low, DLO angles at 75 degrees and 3D, with twist.
- Clamped end low, DLO angles at 90 degrees and 3D, with twist.

DLOs and Cables

- Thick hose
- AWG 10 red and black and CAT-6 bundle
- CSA LL90485 Water resistant with three AWG 16 conductors
- Yellow Southwire E51583(UL) AWG 14 wire