Table of Contents

• power node

• WillyWRT

Table of Contents	
1. ROS master	2
1.1. Repository	2
1.2. How to run?	
Welcome	
Project Willy	
History of Willy	
• Project Willy	
• Publicity	
• Sponsors	
Getting started	
Development Guide	
Driving Willy	
• Documentation	
Build of Willy	
Design history	
• Requirements	
Design reference	
Physical build	
• Hardware	
Robotic Operating System	
• Introduction to ROS	
• ROS Tutorials	
Multi master	
Architecture	
Software Architecture	
Hardware Architecture	
• ROS topic design	
Hardware nodes	
• sensor node	
• si node	

Components

- ROS master
- New ROS master on Lubuntu
- Brain
- Sonar
- Lidar
- Localization and navigation
- Motor controller
- Joystick
- Social interaction
- Speech
- Speech recognition

Radeffect App

• Radeffect App

Lessons learned

- · Todo & Advice
- Lessons Learned

Archive

- Previous Groups
- Research Archive
- Skylab Architecture
- Skylab

1. ROS master

The ROS master will be used as servicebus between the different nodes. The ROS master node provides naming and registration services to the rest of the nodes in Willy. It tracks publishers and subscribers to topics. The role of the ROS Master is to let the nodes interact with each other without a direct connection.

1.1. Repository

Windesheim-Willy/ROS-master

1.2. How to run?

To run only the ROS master the Docker can be used. The Dockerfile of ROS master is automatically built on Dockerhub.

windesheimwinny/ros-master

Run the build docker image:

docker-compose up

For development purposes it can be usefull to build the Dockerfile locally and to use this image. The docker-compose.build.yml file builds first the image and after the build start the container.

docker-compose -f docker-compose.yml -f docker-compose.build.yml up