Week 3 Assignment downloads

You will need some new files for the practical assignments of this week. So please head to the Weekly contents and follow the download instructions for Week 3 if you haven't done so.

Important Note:

This assignment contains expert-feedback provided only for verified learners.

As an audit learner, you are free to follow the instructions on your own, but you won't be able to submit your work and get feedback from the course team

Navigating in the factory world

Now, we've done our fair share of moving the TurtleBot around in the demo world. But that world is fairly boring! Our factory world is way more interesting of course. So, in the practical assignments for week 3, we will start navigating in the factory world.



Of course, the factory floor itself has a lot of open space. In order to make navigating a bit more interesting, we have changed the factory to be cluttered with additional boxes and pallets. These extra obstacles don't just make navigating more interesting, they actually help with the localization process too! This is similar to how we can quickly localize ourselves in a city when we have a lot of buildings around us, as compared to getting lost in an open sea!

Just so we can immediately start with navigation, the course instructors have provided you with a map of the factory in the Week 3 downloads. Because it can be a bit tricky to 'read' this map if you're unfamiliar with them, you can find an annotated version of it below. It is basically a topdown view of the factory floor, with the conveyor belt running from top to bottom. You will see that any unknown space is marked grey, the boundaries of objects with a firm black line, and areas we know are free of obstacles are marked white.

