**IE 410 – INTRODUCTION TO ROBOTICS**

**Lab-2 report**

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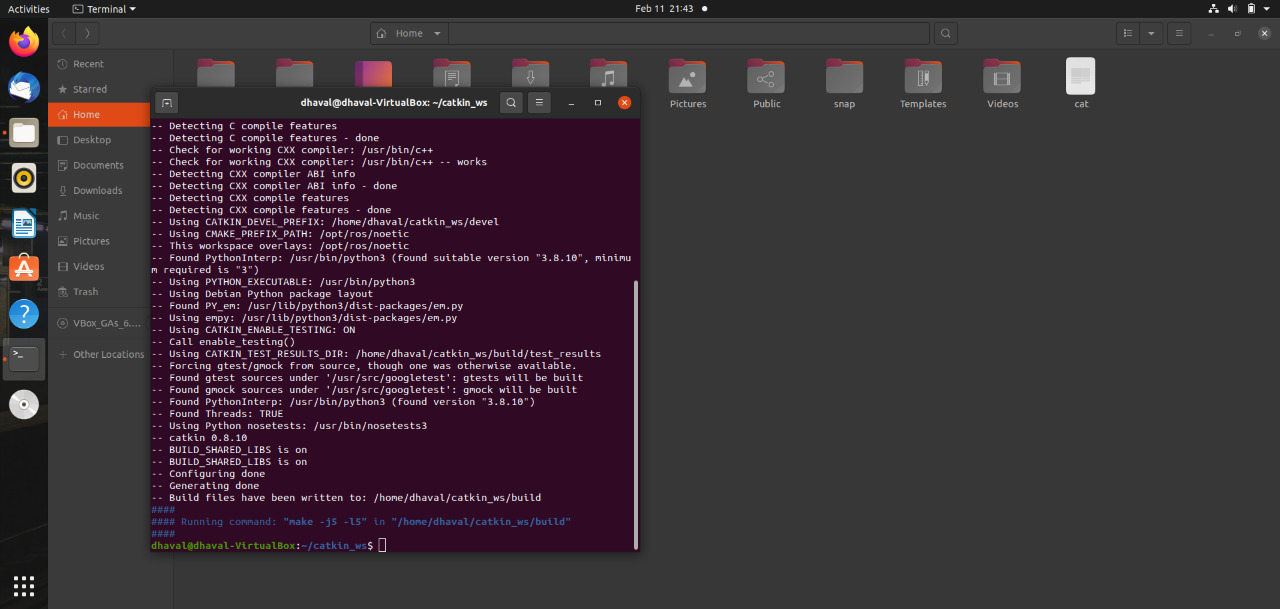
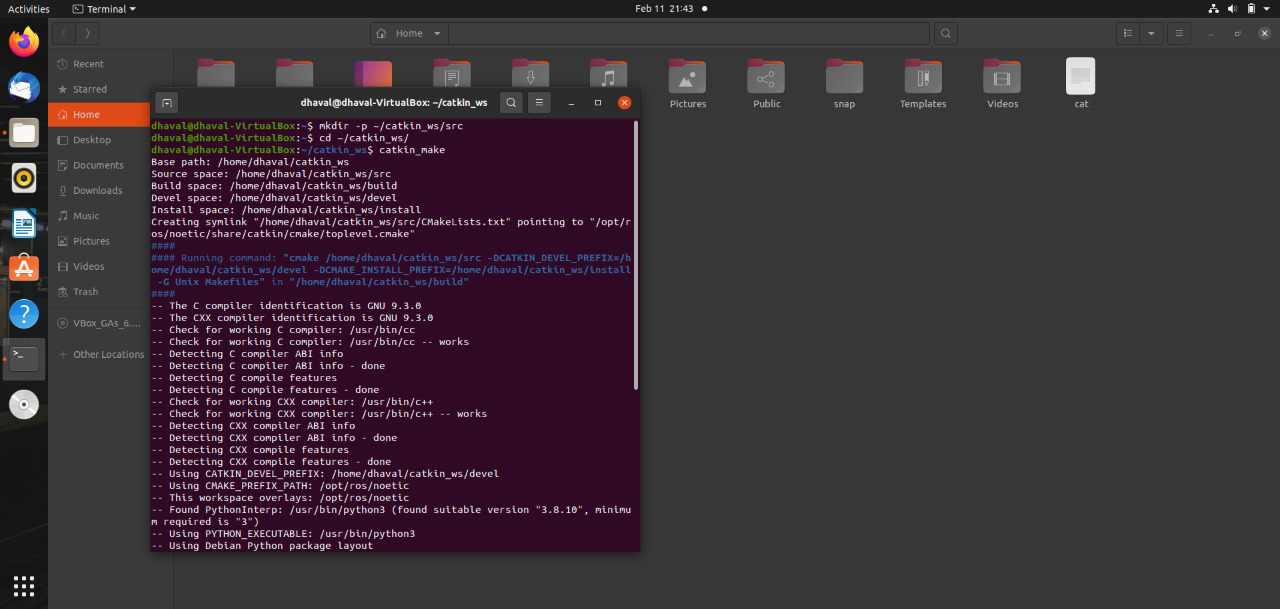
* In this lab, we will use ROS and python to use Turtlesim.
* We will use following commands for turtlesim.
* Creating ROS workspace

Commands to create and build a catkin workspace:

$ mkdir -p ~/catkin\_ws/src

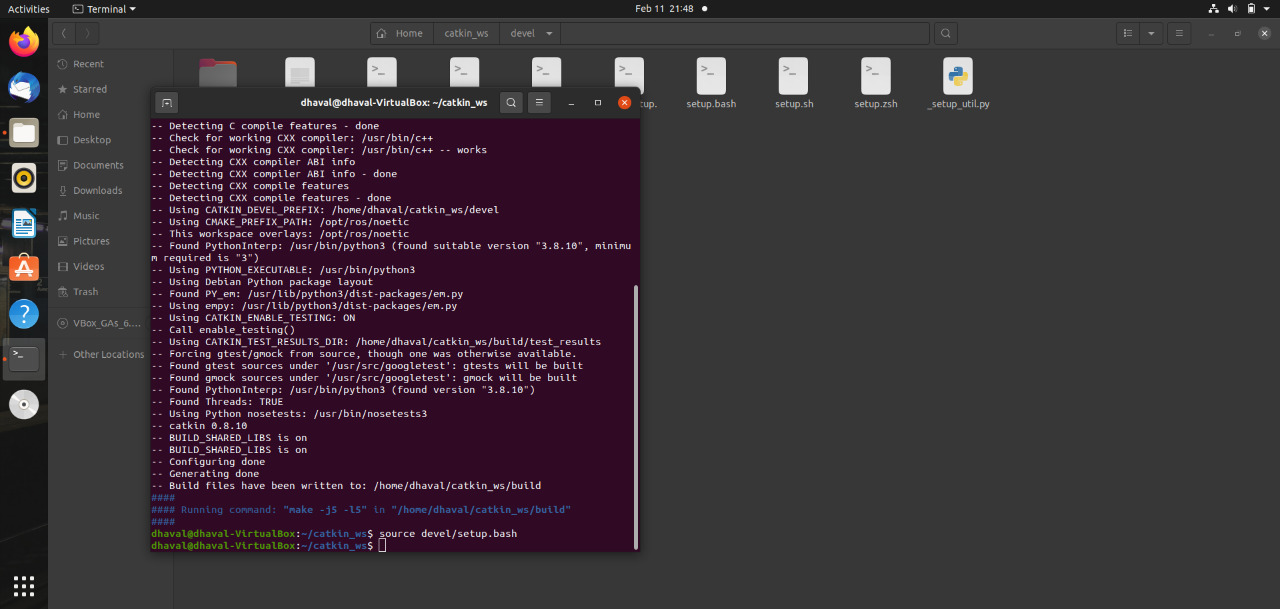
$ cd ~/catkin\_ws/

$ catkin\_make



We need to setup new.\*sh file and command is given below.

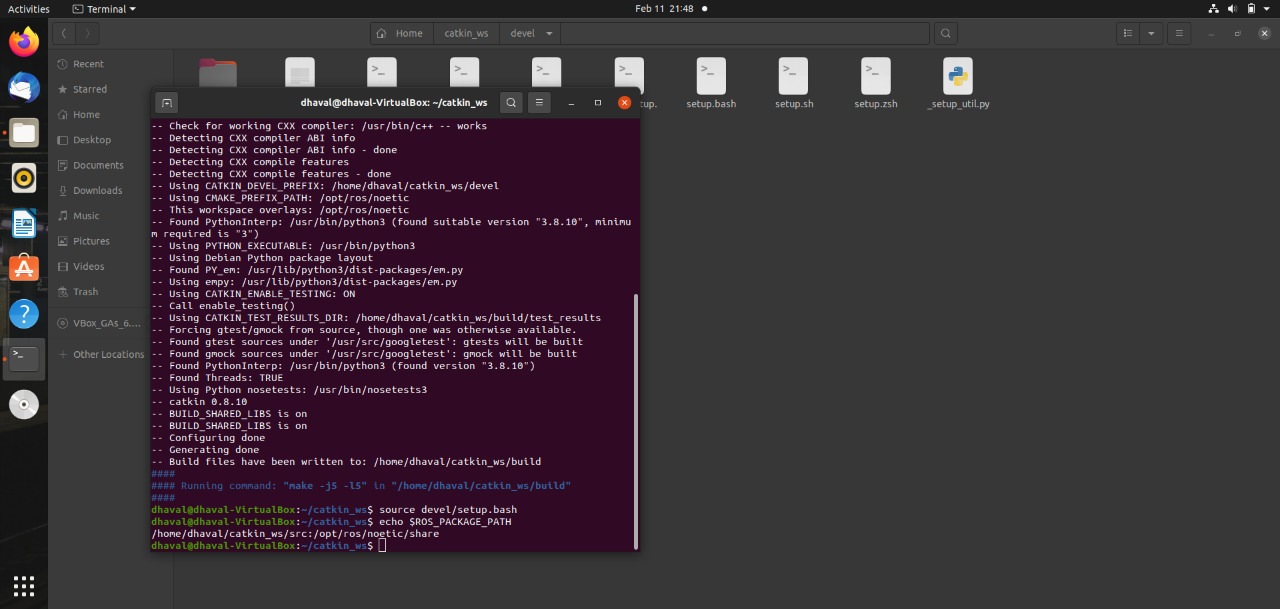
$ source devel/setup.bash



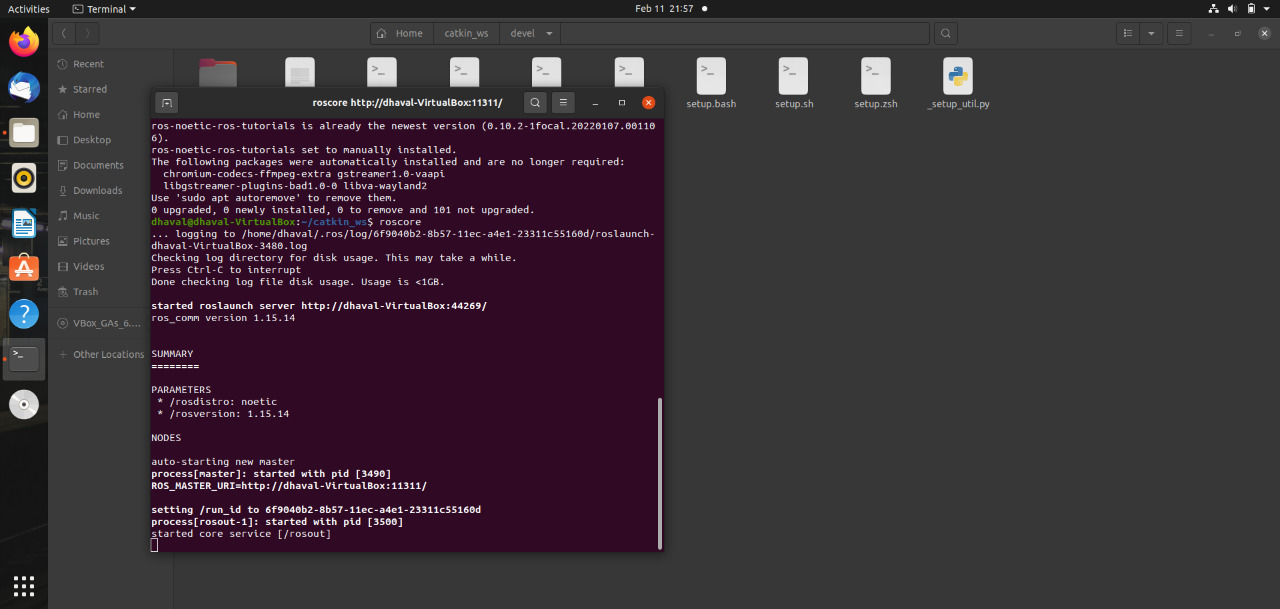
To make sure your workspace is properly overlayed by the setup script, make sure ROS\_PACKAGE\_PATH environment variable includes the directory you are in.

$ echo $ROS\_PACKAGE\_PATH

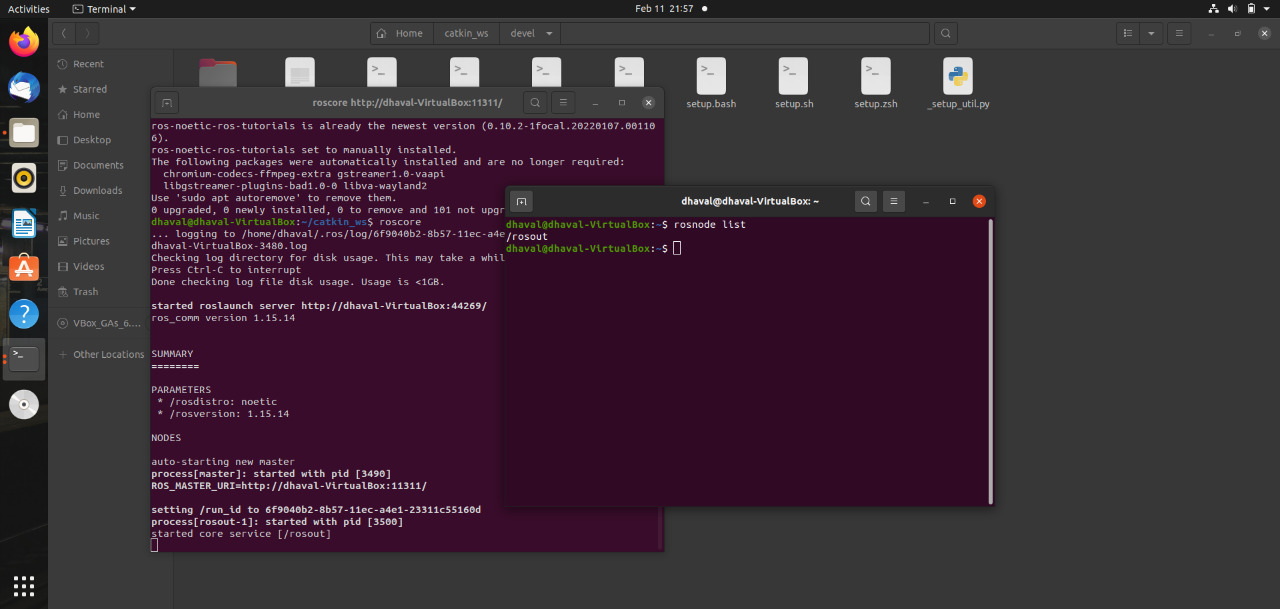
/home/youruser/catkin\_ws/src:/opt/ros/kinetic/share



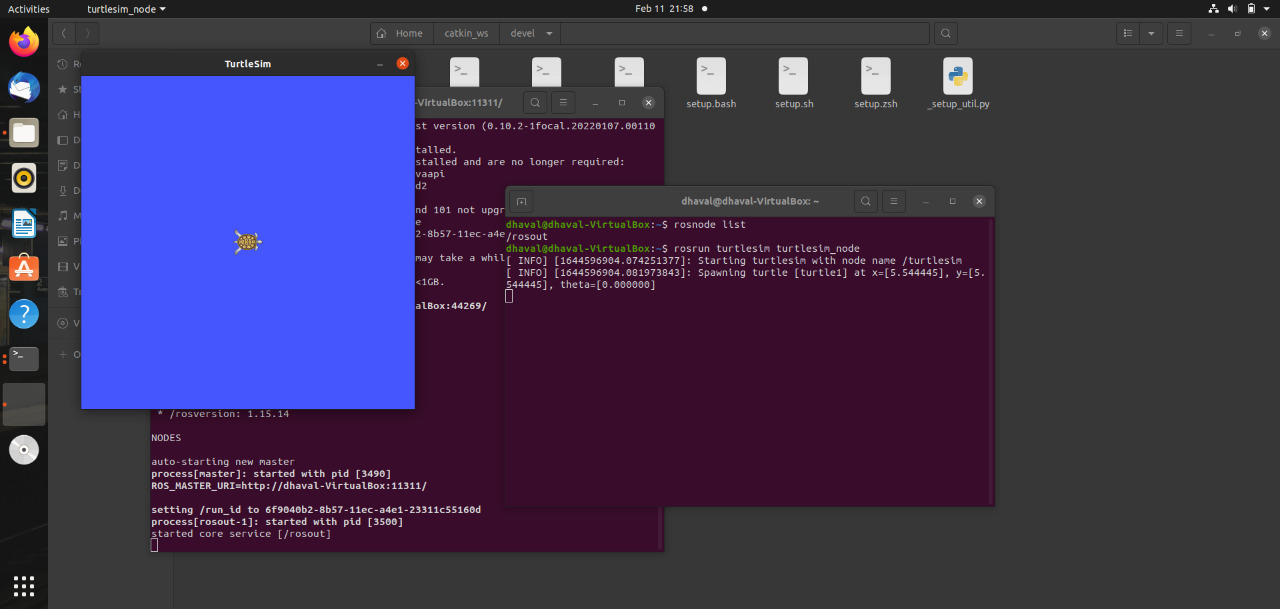
* roscore is the first thing you should run when using ROS. To run this type run $ roscore command.



* rosnode displays information about the ROS nodes that are currently running. The $ rosnode list command lists these active nodes:



* To run the turtlesim\_node in the turtlesim package by using rosrun type $ rosrun turtlesim turtlesim\_node command.



* In new terminal, type command $ rosnode list .

