

**Department of Engineering Cybernetics,   
Automation Technology Programme**

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| **Course: TELE3001 Bachelor Thesis** | | | | | | **Date:** 28.01.2019 |
| **Project:** Instrumentation of bipedal robotprototype | | | | | | |
| **Activity:** IMU Implementation | | | | | | **Activity nr:07** |
| **Starting date:** 04.02.2019 | | | **End date:** 08.03.2019 | | | |
| **Dependency:**  Finish project description | **Past Activities:** | | Finish project description | | | |
| **Following**  **Activities:** | | IMU Calculation | | | |
| **Goal:** Create a reliable source for position measurement from a point on the robots body frame | | | | | | |
| **Description:** Decide placement for IMU on the robot frame. Measure gyro/accelerator inaccuracy using dSpace or microcontroller. Choose I2C or SPI communication protocol and implement wiring required to run measurements on microcontroller. | | | | | | |
| **Total Workload:** 220 hours | | | **Work distribution:**  Henrik  Endre | 110 hours  110 hours | | |
| **Expenses:** | | | | | | |
| **Resources:** Sparkfun LSM9DS1, wiring | | | | | | |
| **Hazards:**  Motor torque, Voltage | | | | | | |
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