TASK #7

horizontal line

Hassan El-seoudy

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*MPU6050*

* The MPU6050 is an accelerometer and a gyroscope sensor at the same time. This combination solves many of the problems of an accelerometer and a gyroscope sensor.
* An accelerometer sensor measures the force of the gravity. In general, the measurements have a lot of error and noise. A gyroscope sensor measures the angular velocity. Also, this sensor can return the angular velocity of a robot with deviation. All these problems are solved by combining an accelerometer with a gyroscope sensor.
* The MPU6050 has a 3-axis accelerometer and a 3-axis gyroscope in a single breakout board.
* The sensor is based on MEMS (Micro Electro Mechanical Systems) technology and uses the I2C-bus to interface with the Arduino or any other prototyping board.
* [Price: US $0.80 / piece Free Shipping to Egypt Estimated Delivery Time:30-50 days.](https://www.aliexpress.com/store/product/GY-521-MPU-6050-MPU6050-Module-3-Axis-analog-gyro-sensors-3-Axis-Accelerometer-Module/2138141_32641703712.html?spm=2114.search0104.3.1.1bbe69caP7oYPZ&ws_ab_test=searchweb0_0,searchweb201602_3_10065_10068_5017315_10059_10696_100031_10084_10083_10103_451_5017515_452_10618_10307_5017415_5017215,searchweb201603_16,ppcSwitch_5&algo_expid=65e98661-b2e6-458b-825d-c6f307ac1cec-0&algo_pvid=65e98661-b2e6-458b-825d-c6f307ac1cec&priceBeautifyAB=0)
* [Price: US $0.82 / piece Free Shipping to Egypt Estimated Delivery Time:42-55 days](https://www.aliexpress.com/store/product/GY-521-MPU-6050-MPU6050-Module-3-Axis-analog-gyro-sensors-3-Axis-Accelerometer-Module-Three/1540225_32895940698.html?spm=2114.search0104.3.8.1bbe69caP7oYPZ&ws_ab_test=searchweb0_0,searchweb201602_3_10065_10068_5017315_10059_10696_100031_10084_10083_10103_451_5017515_452_10618_10307_5017415_5017215,searchweb201603_16,ppcSwitch_5&algo_expid=65e98661-b2e6-458b-825d-c6f307ac1cec-1&algo_pvid=65e98661-b2e6-458b-825d-c6f307ac1cec&priceBeautifyAB=0).
* [Price: US $2.96 / piece Free Shipping to Egypt Estimated Delivery Time:7-10 days.](https://www.dx.com/p/gy-521-mpu6050-3-axis-acceleration-gyroscope-6dof-module-for-arduino-blue-383425#.W52_p-gzbIU)

MPU9250

The MPU9250 is even a bit more complicated than the MPU6050 sensor. The 9250 includes an accelerometer, gyroscope, and a magnetometer. This means that the sensor combines reading from the earth’s electromagnetic field as a magnetometer with readings of gravitational force and angular velocity. All these information makes it a compact navigation breakout board.

* [Price: US $2.57 / piece Free Shipping to Egypt Estimated Delivery Time:30-50 days.](https://www.aliexpress.com/store/product/MPU-9250-GY-9250-9-axis-sensor-module-I2C-SPI-Communications-Thriaxis-gyroscope-triaxial-accelerometer-triaxial/2347088_32786777345.html?spm=2114.search0104.3.2.1d885ea7DbATvs&ws_ab_test=searchweb0_0,searchweb201602_3_10065_10068_5017315_10059_10696_100031_10084_10083_10103_451_5017515_452_10618_10307_5017415_5017215,searchweb201603_16,ppcSwitch_5&algo_expid=72d09d39-283e-4770-a22a-4104fe5d8dfe-0&algo_pvid=72d09d39-283e-4770-a22a-4104fe5d8dfe&priceBeautifyAB=0)
* [Price: US $7.46 / piece Free Shipping to Egypt Estimated Delivery Time:7-10 days.](https://www.dx.com/p/produino-mpu9250-bmp280-10dof-acceleration-gyroscope-compass-nine-shaft-sensor-moudle-for-arduino-506976#.W53Ao-gzbIU)

# Temperature Sensor

A temperature sensor plays an important role in many applications. For example, maintaining a specific temperature is essential for equipment used to fabricate medical drugs, heat liquids, or clean other equipment. For applications like these, the responsiveness and accuracy of the detection circuit can be critical for quality control.

# [Price: US 0.09$ / LM35DZ LM35 Precision Centigrade Temperature Sensors wifi printer adapter](https://www.alibaba.com/product-detail/LM35DZ-LM35-Precision-Centigrade-Temperature-Sensors_60617074087.html?spm=a2700.7724838.2017115.53.4b5829c9Druzab)

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# GAS Sensor

# [Price: 1.19$ MQ-5 LPG Gas City gas sensor module MQ5 for arduino](https://www.alibaba.com/product-detail/MQ-5-LPG-Gas-City-gas_60393697980.html?spm=a2700.7724838.2017115.33.712b2103NfskR9)