## Robots on the Space Station Grades 4-5

August 15 – 19 9 am to 3 pm

Astronauts on the International Space Station (ISS) use robot assistants called ROBONAUTS to help them install and repair machines. In this exciting camp, students will learn to build and program robots using LEGO® WeDo and littleBits®

modules, then work in teams to create a ROBONAUT which has a special skill that could someday help astronauts in space. This week of engineering includes training in radio transmission and reception, and how to track and map satellites - including the ISS. Students will speak live, by Ham Radio, with an astronaut on the



ISS, earning a card from NASA indicating they talked to an astronaut

Monday LEARN THE BASICS OF MOTORS AND GEARS

**CREATE LEGO WEDO ROBOT** 

LEARN ABOUT RADIO COMMUNICATION

Tuesday LEARN ABOUT LIFE ON THE INTERNATIONAL SPACE STATION

LEARN ABOUT LOCAL ASTRONAUTS

CREATE LEGO WEDO PROJECTS THAT WORK TOGETHER

Wednesday TOUR KOPERNIK RADIO STATION

LEARN RADIO LANGUAGE AND PROTOCOL

**EXPERIMENT WITH ROBOSAPIAN ROBOTS** 

Thursday START TO CREATE A LEGO WEDO SPACE ROBOT

LEARN ABOUT TRACKING THE SPACE STATION

PRACTICE SPEAKING ON THE RADIO

Friday COMPLETE LEGO WEDO SPACE ROBOT

CONTACT ASTRONAUT ON SPACE STATION