

https://gist.github.com/AnnaGerber/e5f897b7 45e5f96da463

code samples:

Rover Build instructions: https://t.co/x3J8m10ddU

to avoid obstacles

autonomously, using the ultrasonic sensor

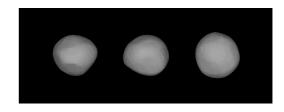
- $\begin{tabular}{ll} ultrasonic sensor \\ \bullet \begin{tabular}{ll} Program your bot to drive around an area \\ \end{tabular}$
- Beep when an obstacle is detected using the
 - Use buttons to toggle what is displayed
- Display the light reading on the digit display
- Display the temperature on the digit display

Here are some ideas for programming your bot:

Your challenge is to build a NodeRover to explore the asteroid Flora 8.

Welcome to International NodeBots day 2015!

Flora (8)



Flora's spectrum indicates that its surface composition is a mixture of silicate rock (including pyroxene and olivine) and nickel-iron metal. Flora, and the whole Flora family generally, are good candidates for being the parent bodies of the L chondrite meteorites. This meteorite type comprises about 38% of all meteorites impacting the Earth.

Flora is the parent body of the Flora family of asteroids, and by far the largest member, comprising about 80% of the total mass of this family. Nevertheless, Flora was almost certainly disrupted by the impact(s) that formed the family, and is probably a gravitational aggregate family, and is probably a gravitational aggregate of most of the pieces.

8 Flora is a large, bright main-belt asteroid. It is the innermost large asteroid. Flora may be the residual core of an intensely heated, thermally evolved, and magmatically differentiated planetesimal which was subsequently disrupted.

Physical characteristics	
Dimensions	136×136×113 km ^[3] 128 km (<u>mean</u>) 145×145×120 km ^[4]
<u>Mass</u>	8.47×10 ¹⁸ kg ^[3] 4.3×10 ¹⁸ kg ^{[5][6]}
Mean <u>density</u>	3.13±1.43 g/cm ³⁽³⁾ ~3.3 g/cm ³⁽⁷⁾
Surface gravity	~0.045 m/s ²
Escape velocity	~0.081 km/s
Rotation period	0.533 d (12.799 h) ^[1]
<u>Albedo</u>	0.243 (geometric)[1]
<u>Temperature</u>	~180 <u>K</u> max: 276 K (+3 °C)
Spectral type	S-type asteroid[1]
Apparent magnitude	7.9 ^[8] to 11.6
Absolute magnitude (H)	6.49[1]
Angular diameter	0.21" to 0.053"

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