Obstacle Avoiding robot

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Abstract:

The project is design to build an obstacle avoidance robotic vehicle using ultrasonic sensors for its movement. A micro-controller is used to achieve the desired operation. The project proposes robotic vehicle that has an intelligence built in it such that it directs itself whenever an obstacle comes in its path. This robotic vehicle is built, using a micro-controller. An ultrasonic sensor is used to detect any obstacle ahead of it and sends a command to the microcontroller. Depending on the input signal received, the micro-controller redirects the robot to move in an alternate direction by actuating the motors which are interfaced to it through a motor shield.

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| Screenshots: |

Conclusion:

We build a robotic vehicle which moves in different directions like Forward, Backward and right when input is given to it.

The goal of our project is to create an autonomous robot which intelligently detects the obstacle in his path and navigate according to the actions that we set for it.

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| Software Specifications:  Arduino Uno  Script (code)  libraries: AFMotor, new ping  Hardware Specifications:  Arduino Uno  Motor shield  Geared motor  Ultrasonic sensor  Power supply  Chassis |

Project Team:

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