

Acrobatic Spider Robot

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Abstract: *In a world that is increasingly experiencing the adverse effects of natural calamities, innovative solutions are imperative to mitigate their impact and save lives. The "Acrobatic Spider Robot" represents a cutting-edge, multifunctional response to the challenges posed by natural disasters, with a primary focus on surveying and assessing the aftermath of events such as landslides. This project introduces a 3D-printed robot equipped with advanced technology, including the ESP8266 controller, GPS module, and ESP32 Cam, all seamlessly controlled through the Blynk application.*

The core objective of this project is to develop a versatile and agile robotic system capable of navigating treacherous terrains, such as landslide-stricken areas, where human access can be dangerous or impossible. The "Acrobatic Spider Robot" derives its name from its remarkable ability to move like a spider, utilizing eight articulated legs with a high degree of mobility. As the global community grapples with the increasing frequency and severity of natural calamities, the "Acrobatic Spider Robot" stands as a symbol of human ingenuity and resilience, offering a beacon of hope for more effective disaster management and recovery in the face of adversity.

Keywords: Acrobatic, Blynk, ESP8266 controller, GPS Module

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