

Clodbuster™-III Factsheet

Mobile Robot Base

Model type	Radio controlled (R/C) 1/10 scale 4x4x4 monster truck kit (4-wheel drive, 4-wheel steering and independent suspensions). Current model is TXT-1 Tamiya Extreme Truck .
Manufacturer	Tamiya Inc. (www.tamiya.com)
Dealer	Tower Hobbies online, hobby stores. Price \$369.99.

Sensor Suite

Vision	Folded Omnidirectional camera mirror assembly made with a Point Grey Research Firefly camera.
Infrared	12 Sharp GP2D02 IR sensors with 3 situated in each corner of the robot. Approximate price \$21.00 each.
Accelerometer	Dual Axis Accelerometer integrated into SPack Board
SPack Board	Custom built FPGA based sensor package board. The SPack board includes an integrated accelerometer, inputs for power, IR sensors and servos and a serial output connection. For detailed information about the SPack refer to the SPack Factsheet.
Power	Sanyo 2400 8 Cell 9.6V Nickel Cadmium battery pack supplies power to camera and the sensor board. Price \$56.95. Charger sold separately.

Modular Onboard Computer

Current Computer	Sony Viao® SR87
Processor/Memory	Pentium III 850 MHz with 256 MB memory
Communications	Integrated 802.11b Wireless LAN connectivity
Camera Interface	Integrated IEEE 1394 Firewire connection
OS	Windows XP
Low level software	Developed in-house using C++ and .Net

Clodbuster Accessories

Motor Battery	Duratrax <i>Piranha</i> 1500 SCX 6-cell flat 7.2 V racing battery pack, other options available for longer life. Price \$15.
Speed Control	Rooster reversible speed control replaces basic mechanical servo based speed controller that comes with the Clodbuster kit. Many other options possible.