LEGO MindStorms

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Lego Mindstorms is a platform to support the development of programmable robots based on Lego building blocks. It contains an intelligent brick computer that controls the system, a set of modular sensors and motors, and Lego parts from the Technic line to create the mechanical systems.

Everything you need comes in one box. You begin by building your robot, following the step-by-step visual instructions. Then, after downloading the free EV3 Programmer App to your computer (PC or Mac) or tablet, you can program the robot to move and carry out actions.

Recommended Ages	Year 4+ (ages 10+)
Product Cost	Core Set $650-$750 Expansion Set $150-$200 A rechargeable battery kit is available as an optional extra ($200-$250) or included in the Starter kit
Where to Purchase	Can be purchased from larger toy/educational stores or Modern Teaching Aids

Product Requirements

- A Computer or Tablet with Bluetooth capabilities is required
- Each Intelligent Brick uses 6AA batteries or the optional rechargeable battery.

Use In Libraries

Moreton Bay Library

Moreton Bay is one of 19 Successful FIRST® LEGO® League Robotics Grant recipients and the first to organise a community competition through this grant program. Moreton Bay provided weekly workshops for 6 weeks with a small group of young people using the LEGO® Mindstorms® kit. Their key learnings are as follows:

- Incorporate a mentoring structure during the program
- Develop partnerships where possible. For example, a partnership with Robotics@QUT ambassadors was very useful as it created a better ratio of mentors to participants
- Build a strong foundation with secondary teachers from the local schools
- Share all aspects of FIRST® LEGO® Australia training with your LEGO® Robotics team, including the tournaments (set up table), goals and team spirit, even if not specific to local program.

Activities

- *Coding a LEGO Puppy* - Coming Soon
- *LEGO Sumo Wrestling* - Coming Soon

Resources

Models

Basic	Core Set	Core + Expansion Set
Building a Basic Vehicle	Puppy Model	Spinner Factory
	Colour Sorter	(1)
		(2)
	Educator	(3)
	Gyroboy	Elephant
	Robot Arm	Remote Control
		Stair Climber
		Tank Bot
		Znap

Video Tutorials

SLQ MindStorms Basics Workshop Video