Gift ideas that engage girls and boys in engineering thinking and design

TOYS

1. Standard Unit Blocks. Ages 3+; melissaanddoug.com $69.99
3. Wooden Railway Set. Ages 3+; melissaanddoug.com $129.99
4. Magformers. Age 3+; target.com $40.99
6. My First Circus. Ages 2-5; shop.lego.com $34.99

Look for toys that:
☑ Can be played with in a variety of ways
☑ Encourage thinking and doing while being creative
☑ Offer no solutions or are not limited by the solution(s) provided
☑ Allow opportunities to solve a problem for or meet the needs of people, animals, the community, the environment, etc.
☑ Inspire learning and questioning especially around topics related to science, technology, mathematics, and engineering
☑ Show the relationship between components; movements that make up a system

View the complete list of engineering gift ideas and other parent resources at: engineering.purdue.edu/INSPIRE/EngineeringGiftGuide
BOOKS

1. Rosie Revere, Engineer by Andrea Beaty. Ages 5+; [amazon.com](http://amazon.com) $10.70
2. Leo Cockroach...Toy Tester by Kevin O’Malley. Ages 5+; [sta.org/store](http://sta.org/store) $21.95
3. If I Were an Engineer by American Society for Engineering Education. Ages 5-8; [shop.egfi-k12.org](http://shop.egfi-k12.org) $7.95
4. Designing Dandelions by Emily Hunt and Michelle Pantoya. Ages 7-11; [amazon.com](http://amazon.com) $10.21
5. Engineering Elephants by Emily Hunt. Ages 4-8; [amazon.com](http://amazon.com) $15.29
7. Yes I Can! I’m Clover Anne! By Cheryl A. Cunningham, PE & Judith E. Cunningham. Ages 5-10; [amazon.com](http://amazon.com) $8.03

Look for books/movies that:

- Have characters who solve a problem or meet a need (using an engineering design process)
- Introduce engineering in general or a specific field of engineering
- Show how the characters learn from their failures and use the information to make improvements to their design or process
- Contain characters with different genders, racial, and economic backgrounds
- Show characters working together as a team
- Have the characters apply mathematics and science knowledge and skills to create and evaluate their solutions
- Solve a problem for or meet the needs of people, animals, the community, the environment, etc.
- Introduce trade-offs and socio-technical issues

GAMES

2. Laser Maze. Ages 8+; [thinkfun.com](http://thinkfun.com) $29.99
3. Robot Turtle. Ages 4+; [thinkfun.com](http://thinkfun.com) $25.00
4. Deluxe Wooden Chess Set. Ages 8+; [target.com](http://target.com) $13.79

Look for games/apps that:

- Permit many ways to win or multiple solutions
- Engage players in problem solving
- Elicit the application of mathematics and science knowledge and skills
- Inspire creative solutions
- Encourage players to learn from failures and make improvements to win

APPS

1. Tinkerbox HD by Autodesk Inc. Ages 10+; [itunes.apple.com](http://itunes.apple.com) FREE

MOVIES


Look for apps that:

- Engage players in problem solving
- Elicit the application of mathematics and science knowledge and skills
- Inspire creative solutions
- Encourage players to learn from failures and make improvements to win