

The Green Girls STEM Foundation's mission is to advance females in science, technology, engineering and math through Giversity.

"Giversity" - giving back to the community while supporting diversity in the STEM fields. Encouraging girls to engage in STEM supports our community by providing more opportunity for future growth and prosperity.



Green Girls STEM Foundation Mission



We serve as a **passionate, educated and experienced** channel to:

- **Partner with the STEM community** to be the feeder program to other STEM organizations
- **Introduce and socialize** STEM programs, camps and activities to girls and diverse groups
- **Educate** others about the need for females and diverse groups in STEM fields
- **Teach** kids about the benefits of learning from failures
- **Financially** support teams and individuals through grants and scholarships



Females in STEM Fields Stats

- ✓ Although women fill close to half of all jobs in the U.S. economy, they hold less than 25 percent of STEM jobs.¹
- ✓ The number of women graduating in core STEM subjects has grown from 22,020 in 2015-2016 to 22,340 in 2016-2017. However, due to more rapid growth in the number of men graduating in these subject areas, the percentage of graduates who are women has dropped from 25% to 25%.²
- ✓ Males were 6 times more likely to have taken engineering in high school.³

¹ www.esa.doc.gov

² <https://www.stemwomen.co.uk>

³ National Science Board. (2012). Science and Engineering Indicators 2012. Arlington VA: National Science Foundation (NSB 12-01).



Females in STEM Fields Stats (continued)

- ✓ Men earn a majority of bachelor's degrees in engineering, computer science and physics ¹
- ✓ Underrepresented minority women make up 16% of the population, but only earn: 3% of bachelor's degrees in engineering, 5% of bachelor's degrees in computer sciences, 6% of bachelor's degrees in physical sciences ²
- ✓ Students from historically disadvantaged groups such as African American and Hispanic students, both female and male, are less likely to have access to advanced courses in math and science in high school, which negatively affects their ability to enter and successfully complete STEM majors in college ³

¹ National Science Board. (2012). Science and Engineering Indicators 2012. Arlington VA: National Science Foundation (NSB 12-01).

² National Science Foundation, National Center for Science and Engineering Statistics. (2013). Women, Minorities, and Persons with Disabilities in Science and Engineering: 2013. Special Report NSF 13-304. Arlington, VA.

³ www.aauw.org/research/why-so-few/



Female STEM Statistical Impacts

- ✓ 74% of middle school girls express an interest in engineering, science and math, but only .3% choose computer science as a major when they go to college leaving out a huge portion of our population.¹
- ✓ Girls' interest in STEM peaks in middle school, but drops off in high school. Without direct focus and support through this foundation and others we miss opportunities to “hook” them at an early age.¹
- ✓ STEM is important and an economic driver. Research has shown that women and men think differently. Without a more diverse workforce we lose out on broad, innovative collaboration in the workforce.
- ✓ Stereotype threat arises in situations where a negative stereotype is relevant to evaluating performance.²

¹ <https://www.idtech.com/blog/stem-education-statistics>

² www.aauw.org/research/why-so-few/



2018-2019 Financials

Distribution Targets

	Quantity	Amount	Total
Green Girls Give: FIRST Scholarships for women - Posted on FIRST national scholarship site	5	\$1,000	\$5,000
Green Girls Give: Sponsor FTC, FLL or Jr teams	20	\$500	\$10,000
Green Girls Give: Support teams going to the World Championship	4	\$500	\$2,000
Green Girls Grow: Green Girls Expenses Support			\$3,000
TOTAL			\$20,000

Fundraising Summary

Goal	\$20,000
Donations to-date	\$13,000
REMAINING	\$7,000

We have received \$13,000 this year from 2 very generous sponsors. You can join this prestigious group to support young STEM females and teams that are doing amazing things to advance our mission. We're asking for your help because we can't do it without you!

EIN: 47-4552876



How the Funds are Used

- ✓ **Awarding FIRST scholarships to highly involved, STEM driven females**
 - ❖ Market scholarships on FIRST website: <https://www.firstinspires.org/scholarships>.
 - ❖ Provide \$1,000 scholarships to FIRST females that have actively engaged in FIRST robotics learning about STEM to further their interest and knowledge while giving back to the community by teaching other girls about STEM and robotics. Scholarships will be applied towards a post-secondary STEM education.

- ✓ **Granting diverse teams financial season assistance to recognize their STEM focus and community outreach impact**
 - ❖ Award FIRST or VEX robotics teams and Destination Imagination teams with more than 50% diversity financial assistance of \$500 to cover new kits, parts or registration.
 - ❖ Encourage students to continue their interest in STEM fields by pursuing high school STEM courses and eventually a STEM degree.

- ✓ **Giving World Championship-bound teams financial assistance**
 - ❖ Award \$500 to teams to help with travel and lodging expenses.
 - ❖ Share other ways to raise money and offer guidance to reduce financial impact while at the championship.

- ✓ **Donating funds to the Green Girls team to cover season expenses (2018-2019 season only)**
 - ❖ Grant \$3,000 to the team to help with parts, 3D fabrication and materials purchases.
 - ❖ Assist with tournament registration costs.



Non-Financial Support from the Foundation

- ✓ **Helping more elementary, middle school and high school females and diverse students choose STEM careers**
 - ❖ Organize tours and presentations with STEM professionals.
 - ❖ Provide kits and education materials (online and handouts) for teachers and schools and examples of successful females and diverse professionals as role models.
 - ❖ Create, lead and volunteer at camps and events focused on STEM for girls and diversity teaching attendees how to learn from failing.

- ✓ **Building a network of STEM funders & supporters**
 - ❖ Focus on K-12 education specifically females and diversity.
 - ❖ Increase employee volunteer engagement in FIRST robotics tournaments and teams.
 - ❖ Partner with other STEM-supporting organizations to prepare young girls and diverse kids to feed into their programs.

- ✓ **Establishing robotics rush events to increase females in robotics**
 - ❖ Reach out to the entire MN community to expose females and diverse students to robotics.
 - ❖ Increase the number of girls in robotics every year.



Yes, I want to help!

Sponsorship Level	Sponsorship Amount	FIRST Scholarships (\$1,000 each)	Robotics and DI Team Season Expenses (\$500 each)	World Championship Team Expenses (\$500 each)	Green Girls Team Expenses (\$3,000)
Diamond	\$20,000	5	20	4	1
Platinum	\$10,000	4	10	2	
Gold	\$5,000	3	2		
Silver	\$2,500	1	3		
Bronze	\$1,000	1			
Giver	\$1-\$999				

Other combinations are possible if you want your funds to be used differently.



What is FIRST Robotics?

Founded in 1989 FIRST is a 501©(3) not-for-profit public charity designed to inspire young people's interest and participation in science and technology, and to motivate them to pursue education and career opportunities in STEM fields. It consists of 4 programs: FTC, FRC, FLL and Jr. FLL.

- ✓ Global reach: 530,000+ students and 61,000+ teams
 - ❖ 6,000 FTC teams with 60,000 participants (grades 9-12)
 - ❖ 3,660 FRC teams with 91,000 participants (grades 7-12)
 - ❖ 35,200 teams with 280,000 participants (grades 4-8)
 - ❖ 16,500 teams with 99,000 participants (grades K-4)



What is Destination Imagination (DI)?

Incorporated in 1982, DI is a volunteer-led, educational non-profit organization that teaches “21st century” skills and STEM principles to kindergarten through university level students through collaboration problem solving challenges.

- ✓ 150,000 participants annually
- ✓ 2,000,000 program reach

GG STEM Foundation Female and Diversity Education Development– Make a Difference in a Life

Engage

- FIRST Robotics
- Destination Imagination
- Green Girls STEM Club



Experience

- Robotics Rush
- Robotics Competitions
- Destination Imagination



Connect

- Camps, clubs and events
- GG STEM Foundation Scholarships
- STEM-based education