

# The STEAM Connection Media Fact Sheet

Winter 2021

The STEAM Connection

Building the Future, One Robot at a Time

[www.steamconnection.org](http://www.steamconnection.org)

## Contents

About.....	1
Why? .....	1
Quick Organizational Facts.....	2
Awards .....	2
Product Offerings .....	3
Founder Biography.....	3
Why The STEAM Connection? .....	3
Quick Description: Robots .....	4
Every Kid Gets a Robot (EKGAR) .....	4
SkoBots.....	5
EKGAR BioBotz .....	5

## About

The STEAM Connection is a youth and minority led 501(c)3 tax-exempt charity that is on a mission to make technical education accessible for youth through the power of robotics.

The STEAM Connection designs, manufactures, and distributes leading robots and gives them all away for free. They are community built and led by youth who are minorities and represent their students, paving the way for Indigenous youths to pursue Science and Technology Careers.

## Why?

Technical education is not accessible. This matters because education in technology enables economic development, connectivity, and innovation. Technical skills are becoming increasingly more important in all areas, but underserved youth are getting left behind. This makes it harder to pursue technology careers or to pursue technology skills needed in many careers. To understand the disparities, look at the statistics.

# The STEAM Connection Media Fact Sheet

Winter 2021

Because of reasons like these,

- Indigenous students have the highest dropout rate in the U.S. (U.S. Department of Education's Indian Nations at Risk Task Force)
- “STEM is not available to all learners” – The White House
- 18% of tribal reservation residents have no internet access at home, wireless or land-based (American Indian Policy Institute at Arizona State University)

We have results like these,

- Only 6.1% of bachelor’s degrees in engineering are awarded to women of color (Society of Women Engineers)
- Indigenous peoples make up only 0.4% of the engineering workforce (Northern Arizona University)
- The STEM workforce is 72% male (Society of Women Engineers)
- Only 33% of workers in STEM careers are non-white (Pew Research Center)

## Quick Organizational Facts

- Headquarters is based in Troy, MI USA
- Founded in 2019
- 501(c)3 tax-exempt public charity
- Indigenous and woman founded and run (founded by Danielle Boyer – Ojibwe, an enrolled member of the Sault Ste Marie Tribe)
- 6,900+ free Every Kid Gets a Robot Kits sent
- 400,000+ youths reached with our representative educational resources
- 20,000+ users making robots on our Make-A-Robot Platform
- 100% designed by youth for youth for free

## Awards

- 2021 **MIT Solve** Indigenous Communities Fellow, receiving \$135,000 in funding from MIT Solve and their partners
- 2021 **Verizon** Forward for Good Winner, presenting a winning pitch to Chelsea Clinton
- 2021 American Indian Science and Engineering Society Winds of Change Cover Story
- 2020 **PEOPLE Magazine**’s Girls Changing the World
- 2020 **L’Oreal Paris** Woman of Worth

# The STEAM Connection Media Fact Sheet

Winter 2021

- 2020 L’Oreal Paris Women of Worth **NBC Special** feature, found on Hulu
- 2020 Brower Youth Award Winner by **Earth Island Institute**
- 2019 Governor’s Service Awards, Youth Volunteer of the Year by Governor Gretchen Whitmer

## Product Offerings

- Robots (products, research and development, and open source)
- Classes, industry events, and educational programs
- Representative STEAM illustrations, created by our founder
- Campaigns to feature cultural representation in technology
- Virtual learning platform, award-winning podcast, children’s books, curriculum, flashcards, and applications
- Activism through keynoting, public speaking, and sharing our story

## Founder Biography

Danielle Boyer, Founder and Youth Robotics Inventor

Danielle Boyer is a young Indigenous (Ojibwe - Sault Ste Marie Tribe) robotics inventor, author, activist, and advocate for youth who has been teaching kids since she was ten years old. Danielle creates equitable and innovative learning solutions for minority youths with robots that she designs, manufacturers, and gives away for free. In 2019, she created The STEAM Connection, a minority and youth-led charity that has reached hundreds of thousands of children worldwide with technical education. She has been named one of PEOPLE Magazine's Girls Changing the World, a L'oreal Paris Woman of Worth, a MIT Solve Indigenous Communities Fellow, and a Verizon Forward for Good Winner for her invention of biodegradable robotics components. She is currently developing a wearable language learning robot for Indigenous youths named SkoBots and resides in Troy, MI.

## Why The STEAM Connection?

“My name is Danielle Boyer and I'm a girl who makes robots and gives them all away! I created The STEAM Connection when I was 18-years-old and tired of how inaccessible technical education was and still is. Growing up, I firsthand saw how a lack of technical educational opportunities set youths back in my own family. Sadly, it is an all too common experience for many youths. I saw the power that robots had to change our world for the better, but also saw how expensive and inaccessible they were. I want all youths to have access to quality technical

# The STEAM Connection Media Fact Sheet

Winter 2021

educational resources. Education in technology enables economic development, connectivity, and innovation. It is more than that, though, it is making sure that every youth has an equal opportunity to engage in our modern and tech-driven world.

When I joined a robotics team in high school, I did not fit in. I felt like I had to fight for respect that I'd never receive as a girl who loves robots. I created my organization because every child deserves to have a safe place to learn and grow and because STEAM (Science, Technology, Engineering, Art, and Math) education should be accessible to all youths.

Here at The STEAM Connection, we tackle these issues by developing, manufacturing, and distributing accessible high-quality, unique, and culturally competent technical educational resources with an emphasis on robotics. We are youth and minority run and focus on serving Indigenous youths like myself. Our goal is to reduce inequities that prevent many minorities and girls from pursuing science and technology careers and to enable every young mind to be empowered through STEAM to create the change that they want to see in our world.”

## Quick Description: Robots

Bridging the gap with accessible, sustainable, and representative robots that we give away for free. We offer five robots, designed by youths for youths.

Our robots

- Work without WiFi
- Are given away for free, 100% of the time
- Are taught with our culturally competent and representative curriculum
- Are manufactured with recycled plastic by us
- Serve as language revitalization tools

## Every Kid Gets a Robot (EKGAR)

An innovative educational robotics kit that costs less than \$20 dollars to make and is sent to youth for free, increasing their technical competency and understanding with a culturally competent curriculum. Designed by Danielle Boyer and created for Indigenous youths.

Launched January 2019.

# The STEAM Connection Media Fact Sheet

## Winter 2021

- 6,900+ free robots sent as of December 1<sup>st</sup>, 2021
- 81% of kits go to Indigenous communities
- 20,000+ users making robots on our Make-A-Robot Platform
- Every robot manufactured by The STEAM Connection is made from recycled plastic
- Winning project of the 2021 MIT Solve Indigenous Communities Fellowship, the 2021 American Student Assistance Prize for Equitable Education, the 2021 Robert Wood Johnson Foundation Prize, and the 2020 Brower Youth Awards by Earth Island Institute

### SkoBots

A wearable, customizable, and interactive language learning robot for Indigenous youths that senses motion and speaks. It was created as a language revitalization and STEAM educational tool for Indigenous youths to make their own that costs less than \$100 dollars to make. SkoBots was designed entirely by Indigenous leaders.

Launched September 2021.

### EKGAR BioBotz

A biodegradable and plant-based cardboard material to replace the plastic in the EKGAR robot kits, created so that students can manufacture robots themselves. EKGAR BioBotz will be rolled out in 2022 to rural Indigenous communities and is the recipient of the 2021 Verizon Forward for Good award and the VentureWell E-Team Grant Program.

Learn more about our other robots at [www.steamconnection.org/robotics](http://www.steamconnection.org/robotics).