Young STEAMers

2023 Annual Report

Young STEAMers - STEAM for ALL Kids

Young STEAMers - STEAM for ALL Kids

Chief Executive Officer

Dr. Orna Kretchmer PhD

Chief Operating Officer

Shalini Thammaiah

Secretary

Shalini Thammaiah

BOARD OF DIRECTORS

President Dr. Orna Kretchmer PhD

Dr. Christina Smith Melnarik PhD

Dr. Irene S. Landaw MD

Lilly Shrager

Dr. Talila Golan PhD

December 2023

Dear friends,

As we reflect on the past year, it fills us with immense pride and gratitude to share the achievements and milestones we've reached together on our Young STEAMers journey. The inaugural year has been a remarkable adventure, marked by dedication, innovation, and the unwavering commitment of our team.

From the outset, our vision was clear - to create a future where every child, regardless of their background, has the opportunity to explore the wonders of Science, Technology, Engineering, Arts, and Mathematics (STEAM), leading to a more equitable and thriving society driven by innovative young minds. As we write this letter, we are delighted to report that we have not only met but exceeded our expectations.

We were fortunate to collaborate with 7 wonderful organizations that trusted us to enrich their students. Our programs have reached 710 students across 17 locations, empowering them with the skills, knowledge, and curiosity needed to thrive in an ever-evolving world. The positive feedback we've received from the students we taught, the site leaders of the organizations we collaborated with, and educators in the classrooms underscores the transformative impact Young STEAMers has had on young minds.

Central to our success is our commitment to delivering an innovative curriculum that emphasizes hands-on experiences. During 2023, we trained 12 passionate instructors that have taught engaging lessons that spark creativity, critical thinking, and a love for learning. Our students are not just learning; they are actively participating in the future they will shape.

As we celebrate the accomplishments of our first year, we also look forward to the exciting challenges and opportunities that lie ahead. We remain dedicated to refining and expanding our programs and continuing to make a lasting impact on the lives of young learners.

None of our achievements would have been possible without the hard work, passion, and dedication of our incredible team. To our educators, staff, partners, donors, and the entire Young STEAMers community, thank you for your unwavering support and belief in our mission.

Here's to another year of inspiring curiosity, fostering creativity, and empowering the next generation of innovators and leaders. Together, we will continue to build a brighter, more STEAM-powered future.

Sincerely,

Dr. Orna Kretchmer
CEO

OUR MISSION

Education in general, and STEAM in particular, is the gateway to children's futures. Unfortunately, for some, this gateway is not accessible or inclusive, it does not meet their needs, and can have a long term negative impact on their future.

Providing equitable access to STEAM enrichment programs allows every student to receive the positive benefits and opportunities made available through STEAM.

Young STEAMers' mission is to ignite the imaginations of underserved children by providing hands-on STEAM enrichment activities that inspire, educate, and empower. Through interactive and engaging experiences, we aim to bridge the educational gap and foster a lifelong love for learning among these young minds.

OUR VISION

Creating a future where every child, regardless of their background, has the opportunity to explore the wonders of Science, Technology, Engineering, Arts, and Mathematics, leading to a more equitable and thriving society driven by innovative young minds.

OUR VALUES

Equity and Inclusion: We believe in providing equal access to quality STEAM education for all children, irrespective of their socioeconomic background, ethnicity, or gender.

Empowerment: We empower children by fostering a sense of curiosity, creativity, and critical thinking skills through engaging STEAM enrichment classes.

Community Collaboration: We value partnerships with local communities, schools, and organizations to create a supportive network that enhances the overall educational experience for underserved children.

Innovation: We encourage a culture of innovation and experimentation, inspiring both students and educators to explore new ideas and approaches within the STEAM disciplines.

Accessibility: We are committed to making STEAM education accessible by removing barriers such as financial constraints and geographical limitations, ensuring that every child has the opportunity to learn and grow.

OUR PROGRAM

Young STEAMers program is based on a unique STEAM enrichment program *The Art in Science* that was developed to instill a love of science in young kids.

Our program incorporates the **FIve E**s instructional model to help build a solid base of knowledge via active engagement:

ENGAGE - every lesson starts with an interesting introduction by our instructors that is built to pique interest and make connections between the current lesson and past knowledge, setting the foundation for the new activity.

EXPLORE - in this part of the lesson, the students are involved in the hands-on activity (or activities). They have the opportunity to collaborate, brainstorm, and explore while the instructor provides the materials and guidance.

EXPLAIN - after the activity, the instructor will lead a discussion about the activity and allow the students to verbally communicate what they did and ask questions. New vocabulary is introduced and repeated.

ELABORATE - allow the students to use their newly acquired knowledge and make connections to past knowledge to achieve deeper understanding.

EVALUATE - this is an informal assessment done by the instructor throughout the lesson and as a recap at its end. Students are excited to show what they created and explain the science behind their creation (an artwork , a toy, a game etc.).

We offer classes in Astronomy, Biology, Chemistry, Earth Science, Engineering, and Physics.

In every lesson we learn one scientific concept immediately followed by a hands-on activity that turns out to be a toy, a game, or an artwork.

2023 at a Glance

JANUARY

PILOT PROGRAM BEGINS

First classes in two Boys and Girls Club Peninsula (BGCP) locations – Belle Haven Community School and Taft Community School. Chemistry, Biology and Physics. K–5 grade

MARCH

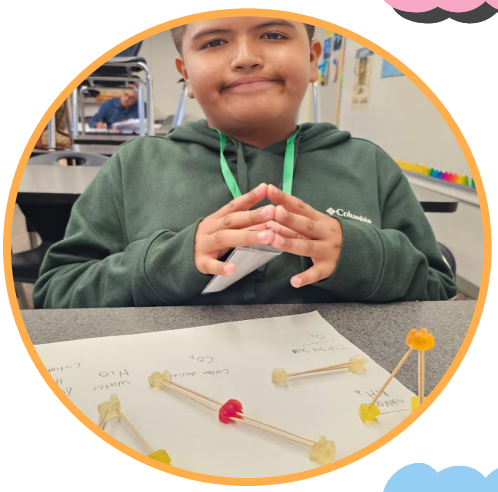
NEW LOCATIONS

Introduction to Chemistry and Biology to Jr High kids in McNeil Family Club house (BGCP). 6–8 grade. New collaboration with 100% college Prep Institute

JUNE

EXPANSION

New collaborations for the summer program – The SMART SF and Family Support Service – Kinship Youth Program, Chowchilla School District schools, as well as new BGCP locations



AUGUST

A NEW SCHOOL YEAR

New collaboration with The Peninsula Bridge organization, and new BGCP locations. Classes offered to kids k–8 grade –chemistry, and physics

OCTOBER

Q2 PROGRAMS

Multiple classes are being taught in various locations – Astronomy, Chemistry, Physics and Engineering. The draw-bot was a big hit!

Impact Snapshot

710
STUDENTS

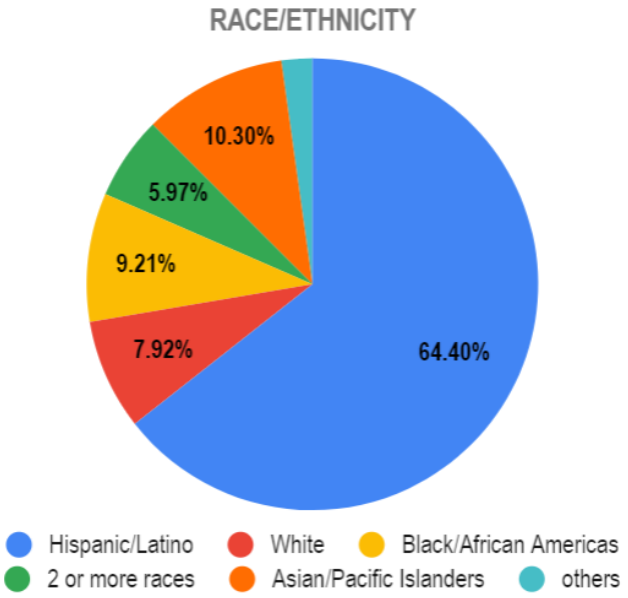
183
LESSONS TAUGHT

17
LOCATIONS

12
INSTRUCTORS TRAINED

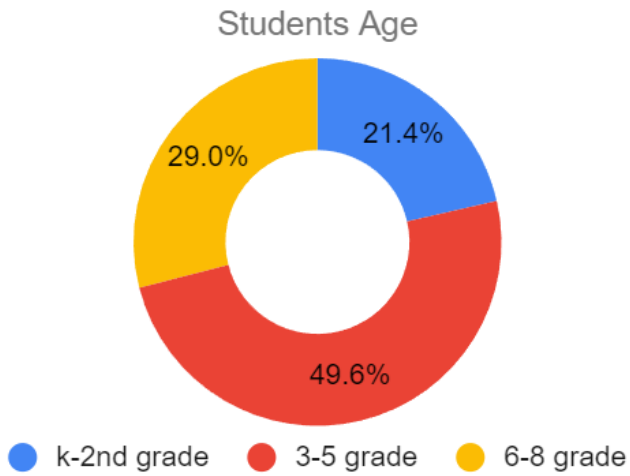
Students Reached

710



"I love Young STEAMers lessons because I can hangout with friends and do cool experiments"
(M. 11 year old)

"One way we can make this class better is making it longer"
(A. 7 years old)



"As a result of my time in the Young STEAMers class, I feel more confident and interested in science"
(R. 13 years old)

Lessons taught

183

SUBJECT	CLASSES	LESSONS
Astronomy	• To Infinity and Beyond • Our Solar System	14
Biology	• Intro to Dinosaurs (K-5) • The secret life of plants (6-8 grade) • A day on the Farm (3-5 grade) • Zoom into Biology (K-2 grade)	51
Chemistry	• Intro to Chemistry for Jr High • Chemistry Fun (K-5) grade	44
Earth Science	• Meteorology	1
Engineering	• Intro to Engineering for Jr High • Young Engineers (K-5) grade	49
Physics	• Intro to Physics for Jr. High • Physics Time (K-5 grade)	24

Total - 183

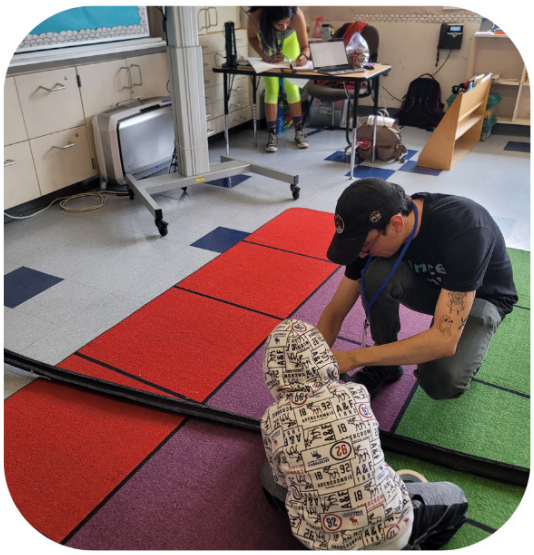
Locations

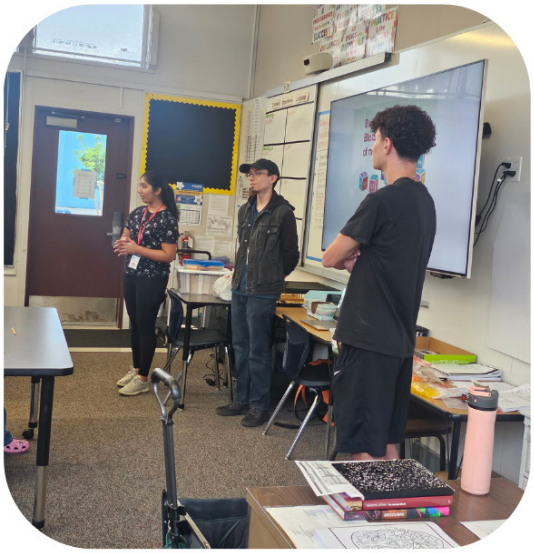
17

ORGANIZATION	LOCATION
Boys and Girls Club of the Peninsula (BGCP)	• Belle Haven Community School (Menlo Park) • CCRMD (East Palo Alto) • Garfield Elementary School (Menlo Park) • Hoover Community School (Redwood City) • Kennedy Middle School (Redwood City) • Mckenley Institute of Technology (Redwood City) • Taft Community School (Redwood City) • McNeil Family Club House(Menlo Park)
SMART SF	• SMART (San Francisco)
Peninsula Bridge	• Crittenden Middle School (Mountain View)
Family Support Services	• Kinship Youth Program (Oakland)
100% College Prep Institute	• Alice Griffith Housing Development (San Francisco)
Compass Family Services	• Compass Urgent Accommodation (San Francisco)
Chowchilla Elementary School District	• Stephens Elementary School (Chowchilla) • Merle L. Fuller Elementary (Chowchilla) • Ronald Reagan Elementary (Chowchilla) • Fairmead Elementary School (Chowchilla)

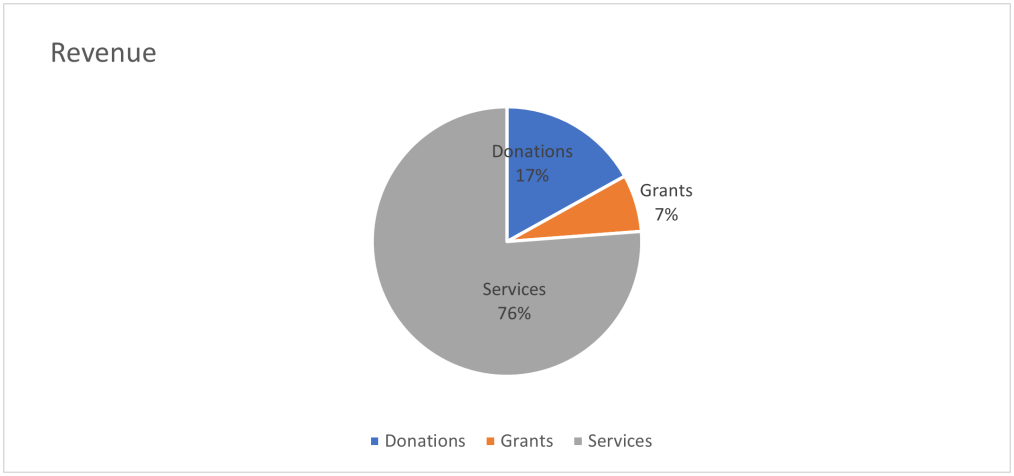
Instructors trained

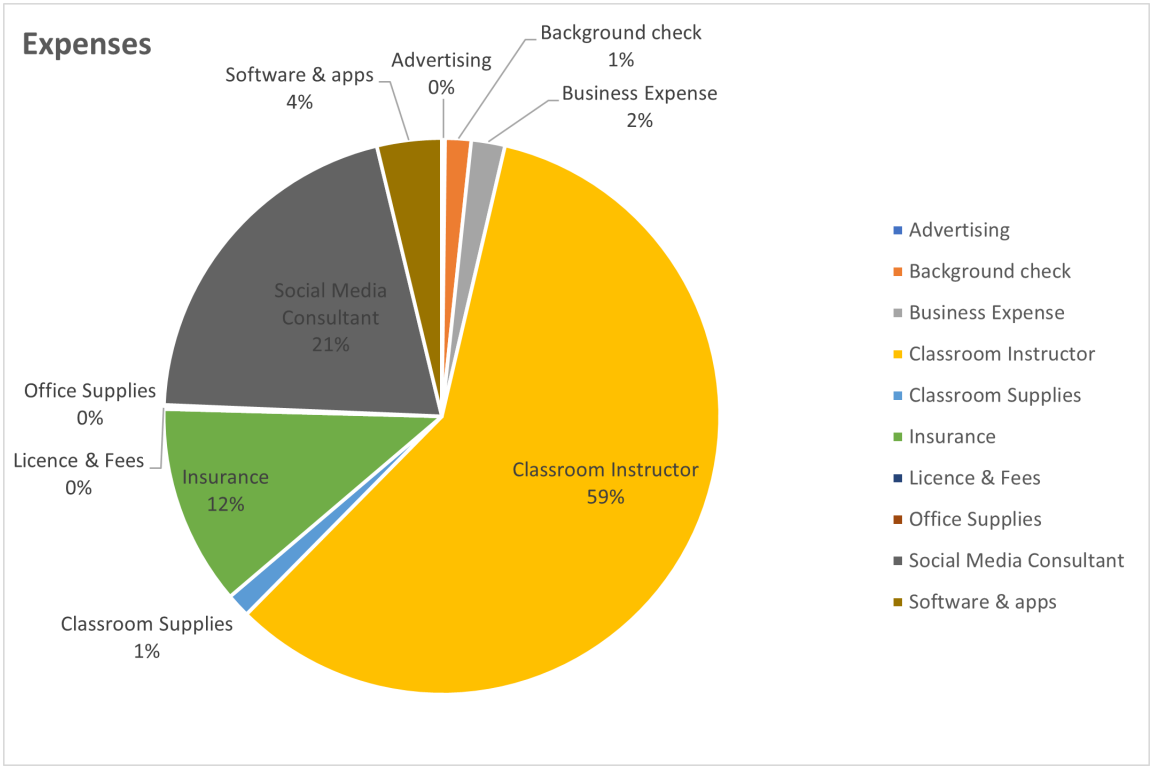
12





Financials


Revenue
Donations 17%
Grants 7%
Services 76%
Donations
Grants
Services


Expenses
Software & apps 4%
Advertising 0%
Background check 1%
Business Expense 2%
Social Media Consultant 21%
Office Supplies 0%
Licence & Fees 0%
Insurance 12%
Classroom Instructor 59%
Classroom Supplies 1%
Advertising
Background check
Business Expense
Classroom Instructor
Classroom Supplies
Insurance
Licence & Fees
Office Supplies
Social Media Consultant
Software & apps

We couldn't have done it without your generous support

DUPONT

Gilroy gardens FAMILY THEME PARK

STANFORD MEN'S BASKETBALL

COSTCO WHOLESALE

Thank you to all our donors and volunteers