

## Chat Transcript Making STEM Meaningful for Girls Webinar on May 6, 2020

Event Website: https://ngcproject.org/making-stem-meaningful-for-girls

Karen Peterson: Welcome to the webinar! Please introduce yourself in the chat, let us know where

you are located and your organization. Niki Becker: Hello! This is Niki from SciGirls.

Marisa Garcia: Hi, everyone! This is Marisa from NGCP joining from Seattle

Melanie Kamm: Melanie Kamm, STARBASE Oklahoma

Patty Sumner: Patty from New Jersey Lori DeNee: Lori DeNee from New Mexico

Gayle Wagner: Hi there! This is Gayle from DC Public Library.

Cyra Sadowl: Cyra, Education Director of Airway Science for Kids in Portland, Oregon Debra Chapman: Deb Chapman Wilkes University Women Empowered by Science program

Jessica Neely: Jessica Neely from YWCA Greater Pittsburgh as a STEM Specialist

Linda Kekelis: Hi everyone-- looking forward to sharing and learning with all! Linda with STEM Next

Opportunity Fund, Oakland CA

Cori Roton: Cori Roton, Golden Valley, MN Robbinsdale Area Schools, Computer Science Teacher

Kathy Thomas: Hi Everyone! Kathy from The Connectory calling in from Seattle.

David Olli: LIve Science Catalyst/Gallery Educator, Science Museum of Virginia, Richmond, VA Dale McCreedy: from TN - Discovery Center at Murfree Spring, MTSU, and TN Girls Collaborative. Natasha Vitale: Hi! This is Natasha from Montreal. I'm a program coordinator for CRC Robotics - a multidiscipinary competition that bridges engineering with arts, computers, media, etc. I also organize the Aim Together Conference under the CRC Robotics umbrella that promotes women in STEM.

Katherine Weber : Hi everyone! This is Katherine Weber from Kitchener, ON Canada

Angel Thomas: Angel Thomas, Science Museum of Virginia, Workshops Corrdinator (Girls in Science, Girls in Medicine, Wonderplace, Night

Wanda Brandon: Wanda Brandon: Northwest Louisiana Community Development Corporation Jill Williams: Hi All! This is Jill Williams from the Women in Science and Engineering Program at the University of Arizona!

Rink Somerday: Hey! I'm Rink Somerday, STEM Director for the Girl Scouts of the Desert Southwest Southern NM and West TX.

Timothy Fowler: Hi! Timothy Fowler, Professional Development Director with the New York State Network for Youth Success and the NY STEAM Girls Collaborative

Emily: Hello! I'm Emily Belle from the Sciencenter in Ithaca, NY, working with the National Informal STEM Education Network

Rita Karl: Hi! Rita Karl from Twin Cities PBS and SciGirls.

Dianna Dibble: Dianna Dibble, National Marine Mammal Foundation, assistant coordinator/ graphic designer, San Diego CA

Shane Woods: Hi All. Shane Woods, Director of STEM Center of Excellence, Girl Scouts of Northeast Texas (Dalllas)

Ellie Marois: Ellie Marois, K-12 outreach coordinator from Society of Women Engineers Boston, Lauren Zuckerberg: Hi All! I'm Lauren Zuckerberg, Observatory Coordinator at the Rancho Mirage Library & Observatory near Palm Spings, CA

Shannon Jones: Hello All! Shannon Jones, Girls in STEM Program Director, with the Museum of Discovery in Little Rock, Arkansas.

Marta Larson: Michigan After-School Partnership, MI Collaborative Lead

Devona McPhatter-Graham: Devona McPhatter-Graham STEM Project Director Hoke County Schools Khadija Ally: Hello! I'm Khadija from Girls Inc. of Western CT. My role is a Program Facilitator Katie Callahan: Hello everyone. Katie Callahan, Gallery Experiences Supervisor at The Tech Interactive in San Jose, CA.

Christina Wright: Hi! Christina Wright fro New York, 4-H STEM Educator

Claudia Poglitsch: Hello, Claudia Poglitsch, Scientist & Volunteer Coordinator for AAUW Tech Trek New Mexico - week-long, immersive, overnight STEM camp for rising 8th grade girls from all over New Mexico.

Natasha Vitale: You have at least one person from Canada also :)

elizabeth golnick: Elizabeth Golnick From turlte Bay exploration park Redding CA

Wanda Staggers: Wanda Staggers SciGirls Connect

Rink Somerday: @Claudia Poglitsch - where in NM are you? Katherine Weber: Hi Natasha!! I am also from Canada:-)

Sandra Lang: Sandy Lang from Geneva Public Library, Geneva, IL

Paula Garcia Todd: Hi there! Paula Garcia todd, AAAS IF/THEN ambassador, global strategic

manager for DuPont, based in Atlanta

Pamela Grohman: Pam Grohman, Girl Scouts of Central Indiana

Nancy Coddington: Hi, Nancy Coddington WSKG Public Media Binghamton NY

Eva from NCWIT: Eva Bradshaw from the National Center for Women and Information Technology aspirations.org

Rowan Halliday: Rowan Halliday, Program Coordinator for the Texas Alliance for Minorities in

Engineering in Austin, TX.

Laurinda Willard: Hello from Turtle Bay Exploration Park

Katherine Weber: It is wonderful to be a part of these webinars:-)

Tricia Berry (she/hers) - Texas Girls Collaborative Project: Hi everyone from Austin, TX!

Lindsey Carmichael (she/her): Hi, I'm a Program Coordinator for the Texas Alliance for Minorities in

Engineering in Austin, TX

Cheri: Curriculum Coordinator for AAUW Tech Trek New Mexico

Claudia Poglitsch: Hi Rink: We hold our camp at New Mexico Tech in Socorro. Our non-profit

organization is based on AAUW members from across the state. I'm in Abq.

Tonja Leonard: YWCA Northest Tennessee and Southwest Virginia TechGYRLS Katherine Weber: Natasha, would love to connect with you - where are you from?

Lauren Zuckerberg: yay Socorro! I moved away about a year ago and miss it

Jessica Taylor: This is Jessica from NASA Langley in Hampton, VA.

Allison Bender: from Madison WI - Informal STEM educator for the Wisconsin Energy Institute at UW-Madison.

Dana: Hello from the Wasatch County Library in Heber City, Utah!

Rink Somerday: Claudia - I have heard of you guys! Jennie Mathur: Hi everyone! Jennie Mathur from Girls Inc. Alicia Santiago: Hola! Alicia from SciGirls and NGCP!:)

Melissa Martin: Hello, this is Melissa Martin from the Perot Museum of Nature and Science in Dallas!

Lindsey Carmichael (she/her): The Perot Museum is wonderful!!

Claudia Poglitsch: Rink: It would be nice to speak about our programs sometime!

Arri D.: Hi! I'm Arri (she/her) and do programming for Girl Scouts of Northern California!

Raul Hinojosa (UT Dallas): Hello. This is Raul Hinojosa from University of Texas at Dallas

Melissa Goforth: Hello! This is Melissa Goforth with Girl Scouts of Eastern Oklahoma.

Rink Somerday: Claudia - YES! I am in Las Cruces. <a href="mailto:rsomerday@gsdsw.org">rsomerday@gsdsw.org</a> - email me!

Marisa Garcia: The Connectory: http://www.theconnectory.org/

Marisa Garcia: FabFems: http://www.fabfems.org/

Adrienne Provenzano: Hello! NASA Solar System Ambassador Joanna Young: Hello! Joanna Young from Inspiring Girls Expeditions

Marcie Benne: Hi there. I am at the Oregon Museum of Science and Industry in Portland, Oregon Brian Wuertz: Brian Wuertz he him North Carolina Museum of Natural Sciences at Whiteville

Marisa Garcia: SciGirls website: https://pbskids.org/scigirls/

Shelly Hollis: Hello! Shelly Hollis from Center for Cyber Education at Mississippi State University Marisa Garcia: http://www.scigirlsconnect.org

Jeff McConaughy: Jeff McConaughy, New Mexico Out-of-School Time Network (NMOST)

Joanna Young: Inspiring Girls Expeditions website: http://www.inspiringgirls.org

Marisa Garcia: SciGirls strategies: <a href="http://www.scigirlsconnect.org/scigirls-strategies-engage-girls-stem/">http://www.scigirlsconnect.org/scigirls-strategies-engage-girls-stem/</a>

Kintasha Jackson: Hello! Kintasha with Girls Inc. in Seattle

Karen Peterson: If you are just joining us, please introduce yourself here in the chat.

Laura Thor: Laura Thor with Shared Science in Long Beach, Ca

Cynthia Brez: Hi! I'm Cyndi Brez, teacher, from an elementary afterschool STEM program in PA

Mary Fuller: Mary Fuller, Girl Scouts of Eastern Missouri in St. Louis

Amy Hiet: Amy Hiet Girls Inc. of Washington County

Jennifer Stancil: Hello from North Carolina - Jen Stancil, proud Board Chair of NGCP and Sci Girls advisor here.

Carmen Stanton: Carmen Stanton St Louis MO Unleashing Potential Afterschool Program Jill Johnson: I'm Jill Johnson with MN STEM summer camps and the MN state manufacturing advisory

Katherine Weber: I actually had met with the female students in our female science, technology and engineering pre-service teacher students during lunch for almost a month before we hosted our STEM Girl nights. It was a great way to prep them for how to be an effective mentor.

Katherine Weber: Is there a formal mentor training program developed for the EngineerGirl Ambassadors?

Natasha Vitale: Any tips on attracting more girls to events that will promote women in STEM? The conference I organize is fairly new (we are organizing the 3rd edition this year), but I sem to have trouble attracting a large amount of girls. Any tips can be helpful (from anyone, not necessarily only the speaker).

Alicia Santiago: Linda, Since motivation matters a lot, how do you support mentors and volunteers to effectively motivate girls? Is there any kind of training involved to do this effectively?

Rita Karl: SCiGirls does have a role model training guide developed in concert with Linda K. when she was at Techbridge! We are actually starting to put our training of role models online.

Katherine Weber: Natasha, reach out to STEM teachers, they will be helpful to promote to the girls. Rita Karl: http://www.scigirlsconnect.org/groups/role-models/

Jennifer Stancil: Natasha: I'm happy to help talk through recruitment - <u>jen.stancil@gmail.com</u> Devona McPhatter-Graham: Any ideas on how to recruit teachers to become STEM teachers not just science teachers?

Natasha Vitale: Thanks, Katherine. That's my main communication channel right now, and hoping to branch out further.

Katherine Weber: Rita, thank you for sharing the role model resource!

Marisa Garcia: http://jyd.pitt.edu/ojs/jyd/article/view/18-13-04-FA-03

Natasha Vitale: Thanks, Jennifer! I will definitely reach out when we start organizing the next conference (we're a bit on-hold right now due to the COVID-19 situation).

Marisa Garcia:

https://www.academia.edu/36034305/Making and Mentors What it Takes to Make Them Better Together

Marisa Garcia: https://www.youtube.com/watch?v=ku6ml8K0yMU&feature=youtu.be Katherine Weber: Natasha, would love to chat, my email is <a href="mailto:ccEquityinSTEM@gmail.com">ccEquityinSTEM@gmail.com</a> Marisa Garcia:

http://www.dl.begellhouse.com/journals/00551c876cc2f027,4b98a4a67e73f6be,61cc670d024f49e3.html

Angel Thomas: Natasha, i can provide tips also. athomas@smv.org

Natasha Vitale: Thanks, Katherine and Angel! I will definitely reach out to both of you! Adrienne Provenzano: Will the resources be available in another way than the chat box?

Katherine Weber: Natasha, look forward to connecting with you!

Marisa Garcia:

https://www.etr.org/default/assets/File/projects/Pair%20Programming%20Toolkit\_FINAL%207\_30\_1\_9.pdf

Katherine Weber: A STEM teacher would have more of an integrated approach

Marisa Garcia: Yes, we will share the slides after and the links are live in the document

Devona McPhatter-Graham: We have a lot of teachers who love teaching the science curriculum,

but they do not feel very comfortable with STEM materaials , resources, etc.

Devona McPhatter-Graham: Great! Adrienne Provenzano: Thanks! Great! Katherine Weber: Devona - totally agree!

Karen Peterson: Devona - great question! That could be an entire webinar of resources. Jennifer Stancil: Devona: I would seek out teachers who do CS and Engineering Robotics or possibly look at design thinking as a way to integrate diverse teachers to your programs Adrienne Provenzano: Another part of professional development is adding in the arts/arts integration. More rigorous than STEAM, though that is important, too.

Katherine Weber: I taught an elementary STEM course to education students. When they are shown how to teach STEM effectively they have "ahha" moments and feel more comfortable. However, they after not often taught how STEM fits together they are taught science, math and technology as silo subjects.

Katherine Weber: What does STEM identity mean to you Barb?

Adrienne Provenzano: Project based learning seems to be a way to connect those silos,, but not a one-size -fits all.

Katherine Weber: Adrienne - very true.

Lauren Zuckerberg: Will there be more webinars to cover the other 4 strategies?

Lauren Zuckerberg: This is great!

Jennifer Stancil: How do introverted girls do in collaborative environments? Is there literature on this?

Devona McPhatter-Graham: I am in a very rural county in North Carolina which brings a whole set of issues in that we have limited resources for STEM, but knowing how very important STEM/STEAM is to the development of sound students. Many of our students are limited in their definition and views of STEM/STEAM.

Karen Peterson: @Lauren, we had a webinar last week and have another one at the end of the month. I'll send you the links.

Marisa Garcia: <a href="https://www.accenture.com/">https://www.accenture.com/</a> acnmedia/accenture/next-gen-3/girls-who-code/accenture-cracking-the-gender-code-report.pdfla=en

Marisa Garcia: <a href="https://www.intel.com/content/www/us/en/technology-in-education/making-her-future-exec-summary.html">https://www.intel.com/content/www/us/en/technology-in-education/making-her-future-exec-summary.html</a>

Marisa Garcia:

https://techbridgegirls.org/Changing%20the%20Game%20for%20Girls%20in%20STEM%20White%20Paper%20FINAL%204.8.16.pdf

Lauren Zuckerberg: Thanks Karen!

Devona McPhatter-Graham: Great, thank you.

Jennifer Stancil: Devona: you might find the rural school district, Elizabeth Forward, outside of Pittsburgh, a really interesting model for you.

Rita Karl: This is the definition from the SciGirls guide: STEM identity refers to a person's sense of who they are, want to be, andwhat they believe they are capable of in relation to STEM. Girls' STEM identity development is dependent upon factorslike interest, knowledge, self-confidence, performance, and recognition.

Devona McPhatter-Graham: Thank you so much Jennifer.

Katherine Weber: Wow that is a great definition!

Adrienne Provenzano: So, beyond STEM, the social-emo learning component is key.

Alicia Santiago: Here is a resource from edutopia about introvert-friendly cooperative learning

https://www.edutopia.org/article/introvert-friendly-cooperative-learning

Arri D.: YES! Susan Cain!

Marisa Garcia: Susan Cain's TedTalk:

https://www.ted.com/talks/susan\_cain\_the\_power\_of\_introverts/transcript?language=en

Rita Karl: What a great idea Barb. Fascinating!

Nancy Coddington: I like that idea Barb, and I can see that working well

Katherine Weber: What a cool idea!

Jennifer Stancil: I also have seen that introverts don't like group changes during the week of the program and they also might choose to work independently, almost like parallel play in very young kids. Thanks for this great ideas adn places to learn more.

Adrienne Provenzano: So much focus is on having introverts-extroverts learn to work together. Like this validation!

Barbara Billington: Agreed, girls can also choose to work independently. And choose to join a group when the feel ready. Good point Jennifer.

Adrienne Provenzano: Working with dif types of people, is, of course, an important skill to develop.

Katherine Weber: Wow that was an awesome exercise!

Timothy Fowler: :D

Natasha Vitale: That was amazing!

Cynthia Brez: everyone getting a chance to be the leader in groups/small groups

Jennie Mathur: Really great way to have a conversation virtually!

Jennifer Stancil: thanks for that opportunity to leverage adobe connect in such a cool and

interACTIVE way! awesome job! Angel Thomas: Thank you!

Rita Karl: Really terrific way of sharing, thanks Karen.

Katherine Weber: This was an AWESOME webinar! Thank you for all that you have shared! Adrienne Provenzano: Thank you. These webinars are always well organized, great info through the

chat, too!

Joanna Young: Thank you!

Rita Karl: SciGirls has been working with NASA making short films of girls who flew their experiments to space, https://vimeopro.com/user10550772/scigirls-in-space

Linda Kekelis: Good luck everyone supporting the girls and families in your communities. Please share your bright spots and lessons learned so we can learn together during this challenging time.

Marisa Garcia: Thank you, everyone for your participation and great discussion!

Rita Karl: Thank you Linda and Barb!