

Letters to a Pre-Scientist

be a friend and an inspiration

Our Mission

To demystify science careers by creating personal connections between students from high-poverty schools and real scientists.

Our Approach

We pair 5-10th grade students from low-income communities with scientists as pen pals.

Our year-long program is a cross-curricular experience where student "pre-scientists" correspond with scientists through eight letters, to expand STEM career knowledge, improve literacy skills in science class, foster curiosity, and increase excitement about science.









Our History

Our program was founded in 2010 by Macon Lowman, a sixth grade teacher in rural North Carolina who wanted to change her students' perspectives on who can become a scientist.

Our Reach

In 2017-18, we matched over 650 pre-scientists in 9 classrooms with scientists from 46 states and 18 countries.

Our Students

Our students come from low-income schools, where greater than 60% of students are eligible for free or reduced-price lunch.

- Students attending high poverty middle schools perform on average 90 points worse on standardized assessments of math and science than their highest income peers. (1)
- Students from low-income backgrounds are less likely to graduate from college with a degree in STEM. Of those who enter, about 30% will leave college without a degree, and another 30% will switch to a non-STEM major. (2)
- The availability of STEM jobs is projected to increase by 13% this decade. (3)
- Research shows that at-risk youth with a mentor are more likely to attend college than those without a mentor. (4)



Our Program

81%

820



increase in the number of teachers who applied to host our program from 2016 to 2017.

number of scientists
who volunteered to participate as
pen pals in the program in 2017



13



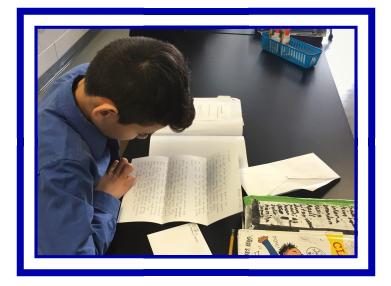
number of pre-scientists we have worked with in the 8-year history of the program

number of part-time
volunteers working remotely to
ensure the program runs smoothly

⁽¹⁾ Trends in International Mathematics and Science Study (TIMSS) - Science for Grades 4 and 8: Student Race/Ethnicity and School Poverty. (2017). Retrieved November 02, 2017, from https://nces.ed.gov/timss2015_table42.asp

⁽²⁾ Chen, X. (2013). STEM Attrition: College Students' Paths Into and Out of STEM Fields (NCES 2014-001). National Center for Education Statistics, Institute of Education Sciences, U.S. Department of Education. Washington, DC.

⁽³⁾ Randall, D. (2014, May 16). Increasing Diversity in the STEM Pipeline. Retrieved November 02, 2017, from https://www.huffingtonpost.com/donna-randall/increasing-diversity-in-t_b_5333264.html (4) http://www.mentoring.org/images/uploads/Report_TheMentoringEffect.pdf



"I am seeing everything differently now; even just looking at the things around me, I have so many more things I need to know!"

A 6th grade pre-scientist from Chicago after a Letters to a Pre-Scientist-sponsored field trip to Northwestern University

"I liked that I had someone who was older and could give me advice and taught me the science that I never really liked. My pen pal made me excited for science every time I had science class."

A 6th grade pre-scientist from California

"This experience instilled that beyond undergraduate or even high school, education is something very important."

Emma, a former pre-scientist, now a college student at the University of North Carolina and LPS pen pal

Our Impact

"This is my second year in the program, and one of the most important things that LPS has done for my students is letting students see the people behind the curtain, letting them understand that scientists are people just like them."

Bridget, LPS Teacher

"An incredible opportunity to communicate with young students interested in science!"

Christian, 4-time scientist pen pal

"My scientist encouraged me to be the CEO of Google!"

A 6th grade pre-scientist from California

"I like getting a letter from my scientist because it is nice to hear from someone from a different state."

A 5th grade pre-scientist from Ohio

"I could learn about what different scientists do and how they feel about what they do and if they like what they do."

A 5th grade pre-scientist from New York

Executive Team

CHIEF EXECUTIVE OFFICER

LUCY MADDEN

Experience:
Teacher: 5 years
2011 TFA ENC Alum
Lives in:
Massachusetts



CHIEF BRAND OFFICER

CHIEF TECHNICAL OFFICER

ANNA GOLDSTEIN



Experience:
Research Associate
Harvard Kennedy School
PhD in Chemistry
(UC Berkeley)
Lives in:

Massachusetts

CHIEF OPERATIONS OFFICER

ALIYAH WEINSTEIN

Experience:
Research Associate
University of Virginia
PhD in Immunology
(U of Pittsburgh)
Lives in: Virginia



MACON LOWMAN



Experience:
Public Health Nurse
Teacher: 2 years
2010 TFA ENC Alum
Lives in: California

Reach Us

at our website, www.prescientist.org via email, info@prescientist.org, and











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