

# Science Coach

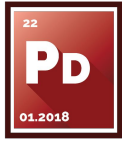
PROFESSIONAL DEVELOPMENT

A premier support and professional development ecosystem for 6th-12th grade research teachers.



**Science Coach**®

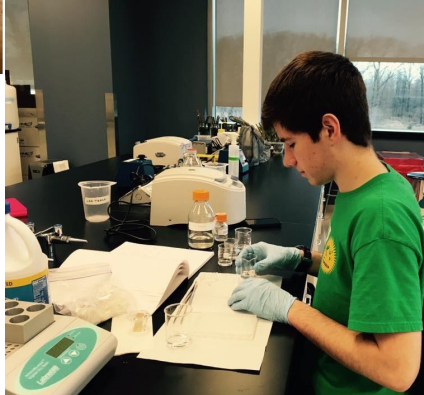
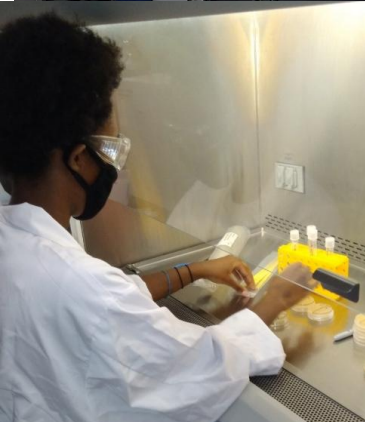
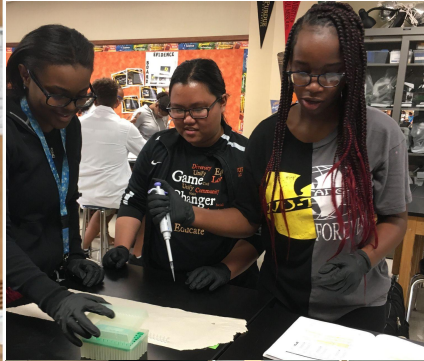
EDUCATE • INNOVATE • ACHIEVE

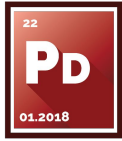


# Science Coach

PROFESSIONAL DEVELOPMENT

6th-12th grade students choose questions of person interest, create procedures to test hypotheses and arrive at answers with validity.

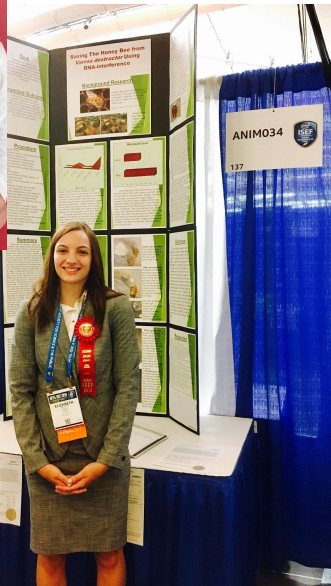
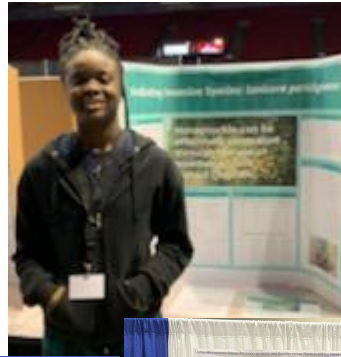
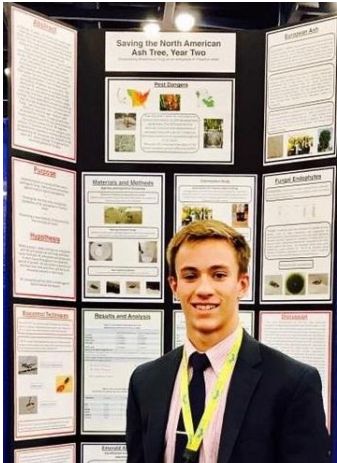




**Science Coach**  
PROFESSIONAL DEVELOPMENT

Students compete in Science Fairs and other competitions winning at National and International levels.

# Educate. Innovate. Achieve.

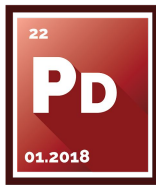


## Application of arbuscular mycorrhizal fungi to inhibit nitrogen uptake of weeds within crop fields

Grace Johnson (1) and Ryme Johnson (1)  
(1) Lebanon High School, Missouri  
Jan 30, 2022

Invasive species cost the agriculture industry billions of dollars each year in lost revenue and control costs. This research addresses the potential neutralizing effects of arbuscular mycorrhizal fungi (AMF) on the invasive species and aggressive agricultural weed, *Cirsium arvense*, by limiting its nitrogen uptake from the soil. A total of 36 *C. arvense* plants and 24 *Glycine* max soybean plants were grown in a controlled laboratory environment, with *G. max* being used to create a simulated crop field. We hypothesized that introducing AMF to *C. arvense* would reduce its ability to absorb nitrogen, therefore reducing the plant's growth. If AMF significantly reduces *C. arvense*'s capability to thrive, it is possible that AMF could be incorporated into commercial and private crop fields to serve as a natural herbicide

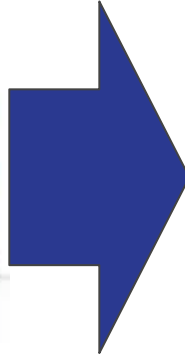




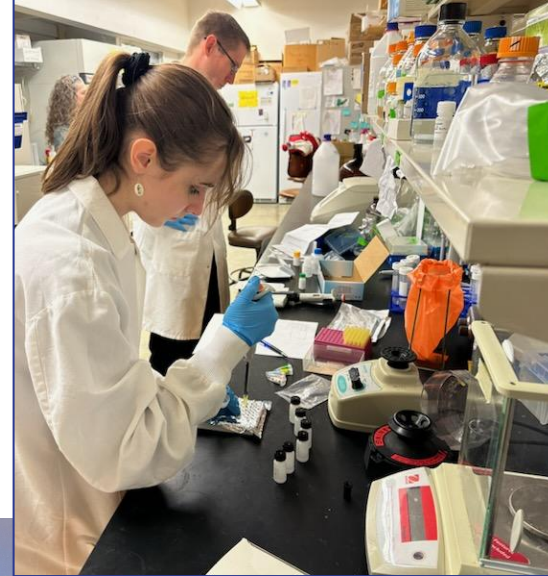
# Science Coach

PROFESSIONAL DEVELOPMENT

Has comprehensive

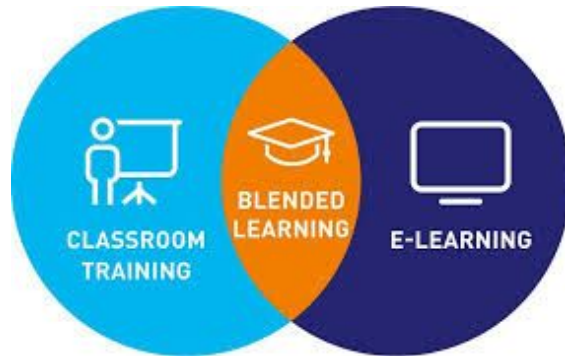


So you can  
COACH  
6th-12th grade  
students to  
learn critical  
thinking skills  
while  
addressing real  
life problems



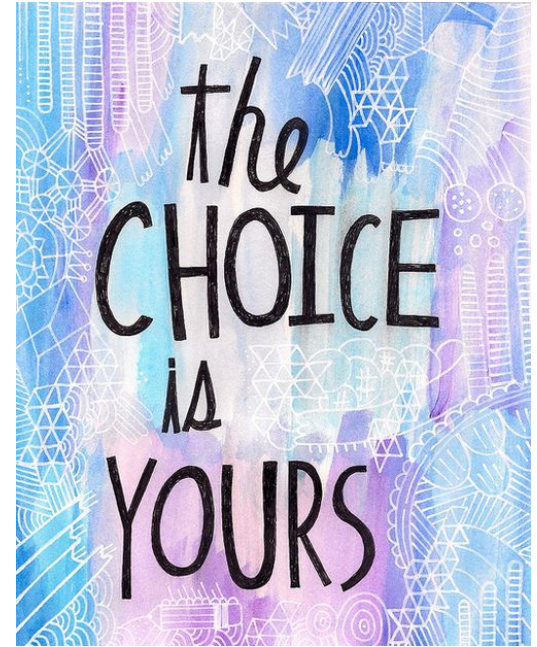
# Science Coach provides the year-long methodology curriculum for your research teacher and student.

- **Advanced Innovation Methodology (AIM)** *Detailed instruction helping 6th-12th grade teachers and students complete advanced authentic research.*
  - AIM Teacher ( **Complete Teacher Lesson plans to teach research methodology to 6th-12th graders.**)
  - AIM Student (Self-Directed) allows students to work independently on their research projects with step-by-step research methodology instruction.



# Science Coach has flexible implementation options

- **Science Coach has worked successfully in many kinds of school:**
  - *Public, private, charter and homeschools*
- **Many different communities**
  - *Rural, urban, and suburban areas.*
- **Many different socio-economic environments**
  - *Well-resourced schools*
  - *Low-resourced schools*
  - *No-external resource schools (Home schools)*
- **Many implementation settings**
  - *Within an Existing Class*
  - *Independent Research Class*
  - *After School /Club*



# Science Coach provides BSL1 & 2 lab access and insurance.

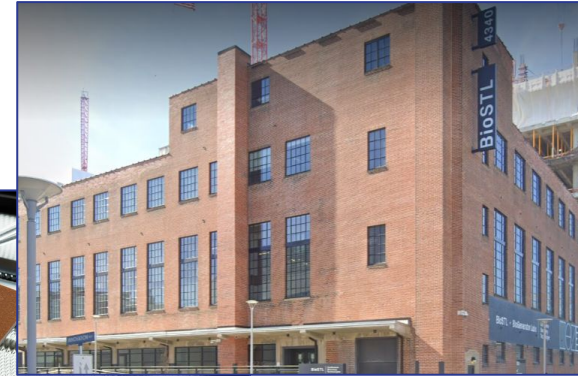
- **Lab Access for Students & Teachers**

- If close to St. Louis, use our lab space at the BioSTL Labs
- Other locations often have cooperative agreements with businesses/local labs/ colleges/universities.

- **Insurance coverage** for ANY lab usage + Professional Liability insurance



**BIOSTL**  
DRIVING ST. LOUIS INNOVATION



**ACORD** **CERTIFICATE OF LIABILITY INSURANCE** SITESP1 OP ID: PB  
DATE (MM/DD/YYYY) 04/09/12

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

**IMPORTANT:** If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsements.

PRODUCER Jones Insurance Agency, Inc. P O Box 487 Garner, NC 27529 Hal Averetta, CIC, CWCA	919-772-0233 919-779-4025	CONTACT NAME PHONE NO. (INC. OR EXT.) FAX E-MAIL ADDRESS
--	------------------------------	---

INSURER A: Cincinnati  
INSURER B: Build  
INSURER C:  
INSURER D:  
INSURER E:  
INSURER F:

INSURED Site Specific Contracting, Inc.  
4237 Landsburg Dr  
Raleigh, NC 27603-8507

**COVERAGES** **CERTIFICATE NUMBER:**

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED AS INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT, THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN. THE INSURANCE AFFORDED BY THE POLICIES LISTED BELOW IS SUBJECT TO THE EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY ENDORSEMENTS.

LINE	TYPE OF INSURANCE	DESCRIPTION	POLICY NUMBER	POLICY EFF. DATE
1				
2				
3				
4				
5				
6				
7				
8				
9				
10				
11				
12				
13				
14				
15				
16				
17				
18				
19				
20				
21				
22				
23				
24				
25				
26				
27				
28				
29				
30				
31				
32				
33				
34				
35				
36				
37				
38				
39				
40				
41				
42				
43				
44				
45				
46				
47				
48				
49				
50				



# Science Coach provides free consumables, loaned equipment and purchases supplies in a timely manner.

**Supplies** for doing research are always a challenge. Science Coach will make research teacher's jobs easier by:

- Providing FREE Loaned of equipment
- Choosing from an inventory list of FREE donated equipment & consumable supplies
- Ordering the supplies you request with the \$800 of teacher-directed supply budget





# Science Coach Teachers get PAID for their after-school work!

- Teachers Are Paid a \$2,000 - \$3,000 Stipend for After-School Work

## Milestone-based stipend payments:

Coach Onboarding	\$100
Project Onboarding	\$300
Research Plans Uploaded	\$300
Competition Registration	\$300
Competition Participation and Awards Added	\$300
Top Award Recipient	\$100
Coach Cohort Virtual PD Monthly Meetings attended - 10/year (August-May)	\$400
Student Quarterly Feedback Surveys - 4/year	\$100
Teacher Coach Quarterly Feedback Surveys - 4/year	\$100



**Just like sports coaches are paid for their afterschool time, we believe Science Coach teachers should ALSO be paid.**



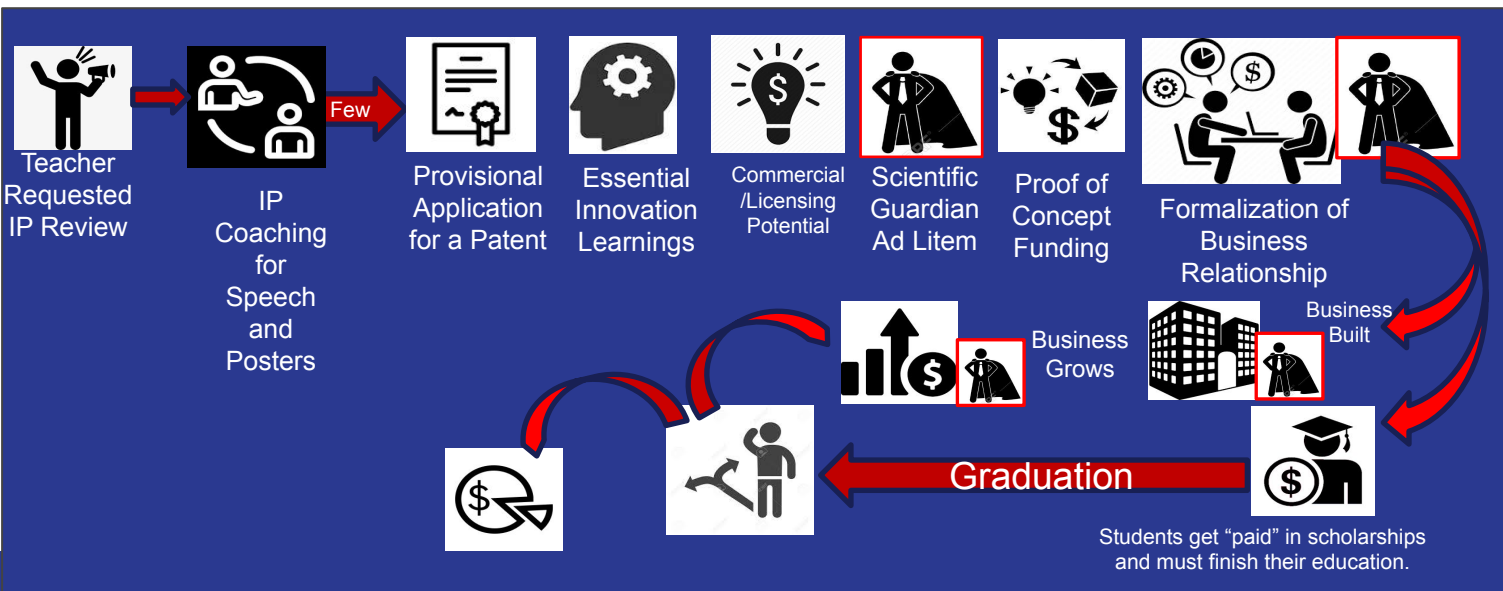
# Science Coach meets research teachers where they are and helps raise their skill level so they can effectively coach students to complete advanced authentic research.

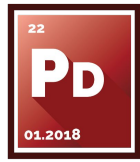
- **Year-long Professional Development**
  - Summer virtual training
  - Speciality hands-on skills training opportunities
  - Monthly virtual PD sessions
  - Team cohort so you have a group of like-minded research teachers for support
  - Dedicated Head Coach for one-to-one direct support when you need it - how you need it.
  - Drop-In Coaching is an expert science teacher who is available during the school day to help you or your students.
  - Field Coach is a retired research teacher who will work with your student to complete their experiments in the field when the student needs it.



# Science Coach reviews projects for Intellectual property potential and offers an innovation to entrepreneurship pathway.

When you have the “amazing” student who invents something that has the potential to change the world, we can help move that innovation forward.





# Science Coach Full Program Funding

PROFESSIONAL DEVELOPMENT

## Total Cost

- \$6,000 per Coach/Year

Milestone Based Stipend - \$2,000 (Or Extra Duty/Extra Pay)

Professional Development Fee - \$2,750

*(Teacher receives \$500 stipend)*

Student Supplies - \$800

Recruit/Retain Students - \$450



# If you are a research teacher who wants to go to the next level...

Apply today to see if you qualify to become a Science Coach!  
*(No obligation to accept the opportunity, but it does let you know if your eligible to participate.)*



Visit our website!



Read the Science Coach PD literature!



Call us! 314-501-1940 Email us: [Teams@ScienceCoach.org](mailto:Teams@ScienceCoach.org)

