

YONKERS
PUBLIC SCHOOLS

Inquiry-based teaching and learning

Yonkers Public Schools & Teachers College, Columbia University Center for
Technology and School Change


Dawn Bartz, Yonkers Public Schools Executive Director and Smart Start Grant Manager, 2021-2026

The New York State Education Department Smart Start Large Scale Grant

Smart Start


- The Smart Start Grant was co-developed by Dr. Tanya Long, Director of Grants & Fine Arts and Dawn Bartz, Executive Director of Inquiry Learning, Instructional Technology, & Social Studies in 2019 and awarded to the Yonkers Public Schools in 2021.
- This five-year, large-scale grant is focused on providing 100 teachers each year with professional development on inquiry-based learning structures in order to integrate STEM (Science, Technology, Engineering, Math) principles and skills into all content areas for grades K-8. Over 5 years, at least 500 teachers will be trained in inquiry-based learning.
- The Smart Start Grant also provides funding to realize the goal of creating a district STEM/STEAM Center in which teacher professional development will include hands-on learning. Teachers and their classes can visit the Center to use the interactive technology.

Workshop Facilitators



Jackie Pilati
jp3639@tc.columbia.edu

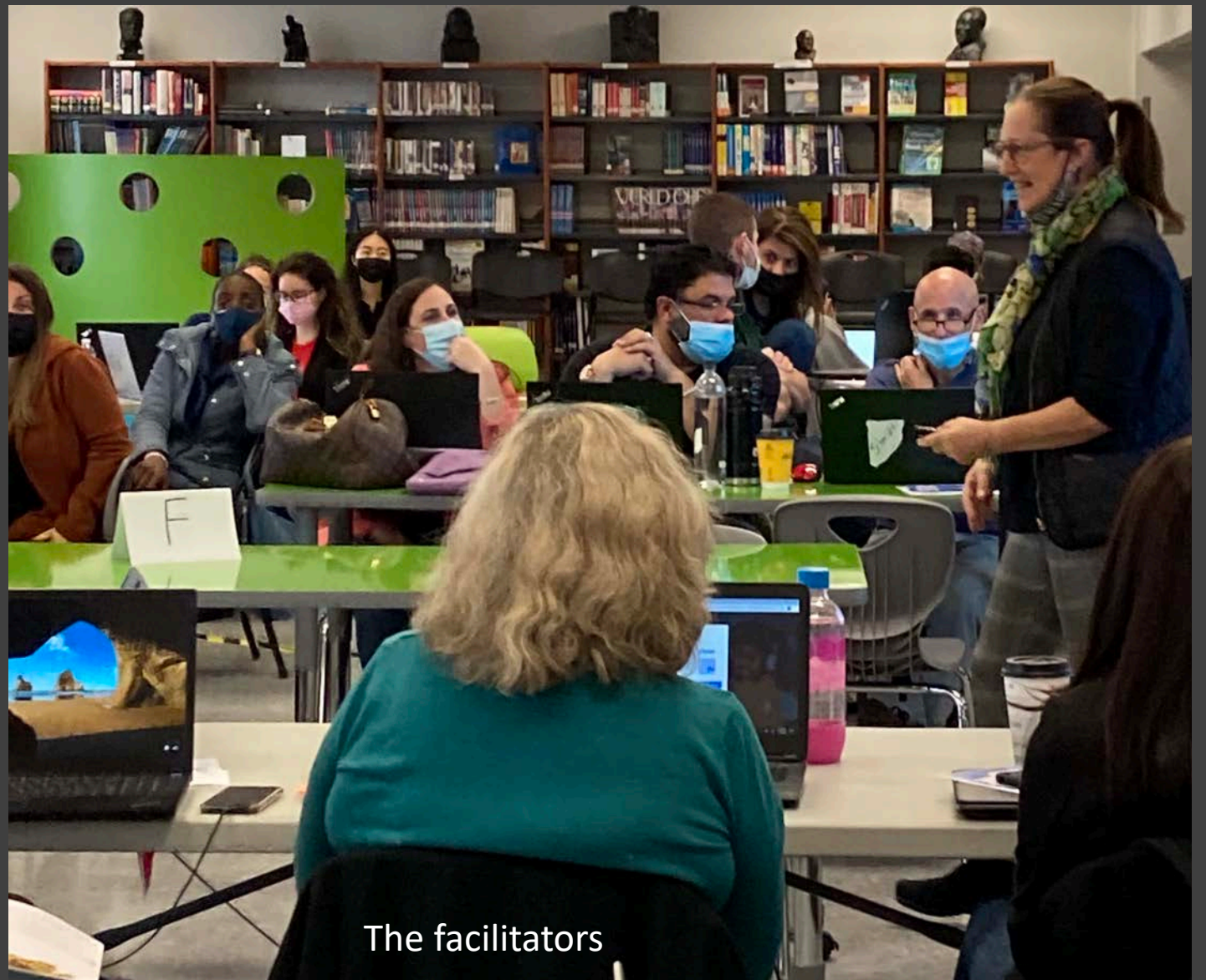
Jackie Pilati is a Professional Development Associate at CTSC. In addition to bringing over 11 years of teaching experience in general and special education settings throughout New York City and Sonora, México, Jackie is an urban agriculturalist working on seed sovereignty and plant breeding projects to build climate and community resilience. She is passionate about working at the intersection of science education, technology, food justice, and culture.



Karen 'K2' Kirch Page
kcp2108@tc.columbia.edu

Karen Kirsch Page is the Associate Director for Professional Development at CTSC. Beyond working as a K-8 technology and STEM teacher in San Francisco, Karen has provided instructional support for K-12 teachers in the U.S. and Africa where she co-founded an education technology conference for underserved communities now going into its eighth year. Karen is passionate about helping schools and organizations around the world become more receptive to implementing technology in creative teaching and learning. She has worked with schools to design and launch coding, robotics, and visual design programs.

technology teachers

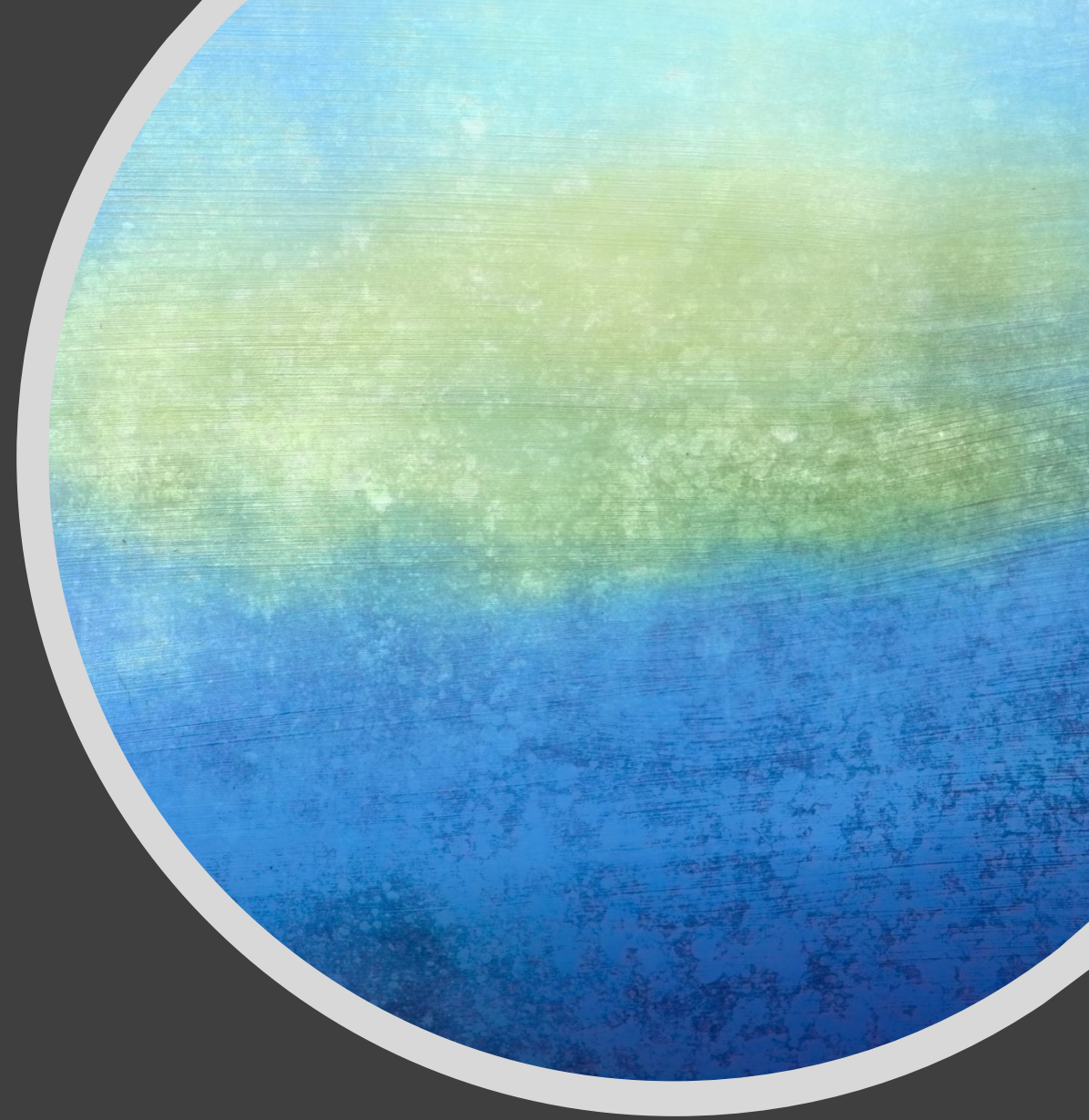


The facilitators

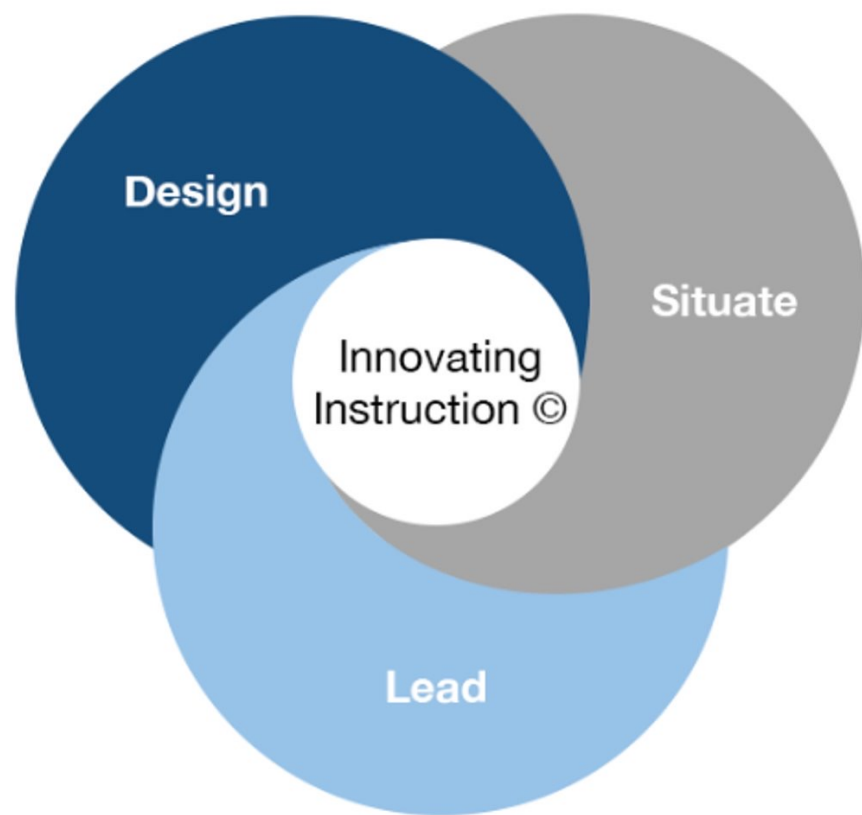
The Center for Technology and School Change

The professional development series is led by facilitators Karen Kirsch Page and Jackie Pilati of Teachers College, Columbia University's Center for Technology and School Change.

Professional development takes place at the STEM/STEAM Center, developed under the grant and through the Yonkers Public Schools.



CTSC Professional Development Model: *Innovating Instruction* ©



Design

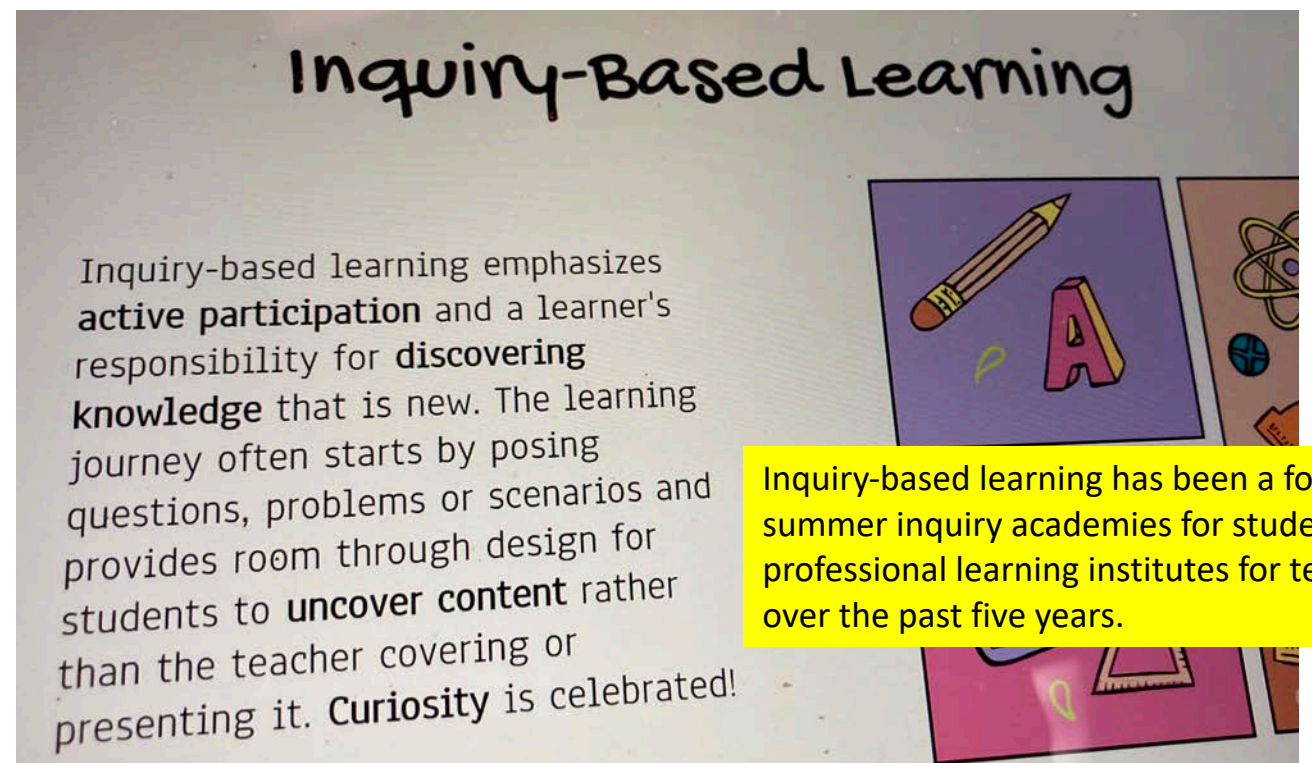
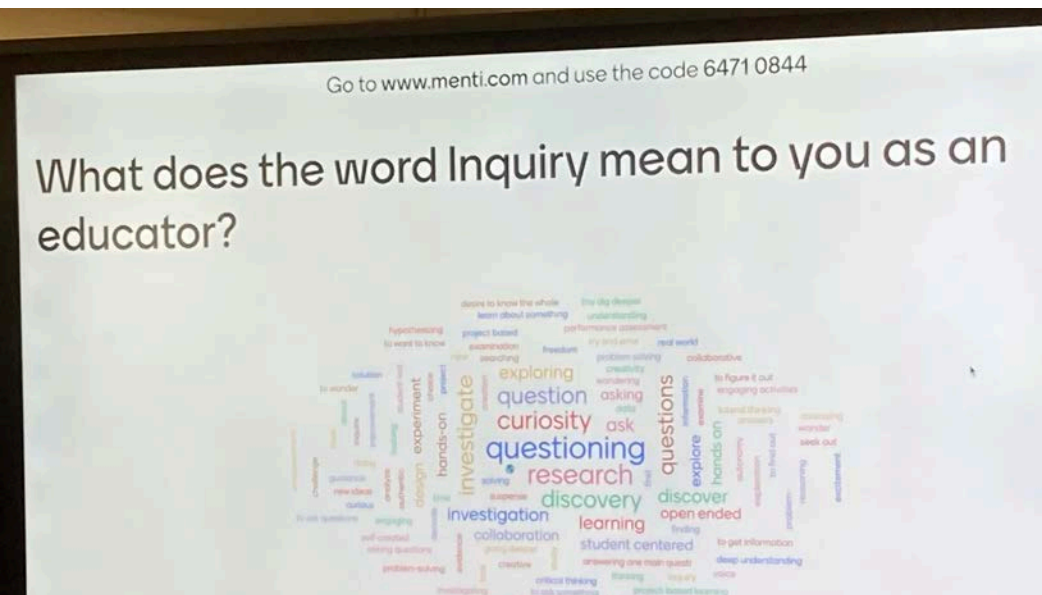
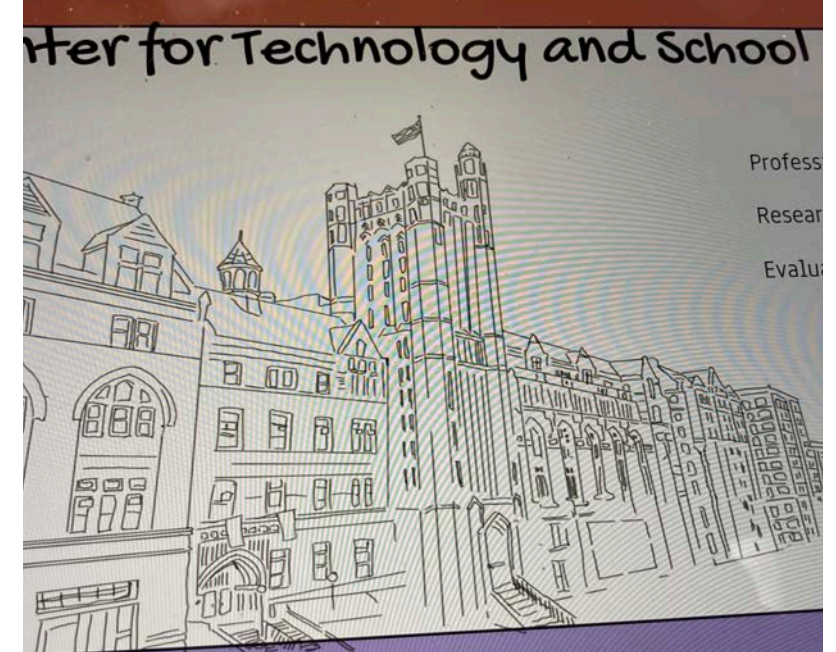
Engage teachers as designers of student-centered, authentic learning experiences

Situate

Create learning experiences for teachers that foster professional respect while adapting the learning for their particular school and situation

Lead

Support leaders in guiding and sustaining change initiatives, while positioning teachers as agents of change

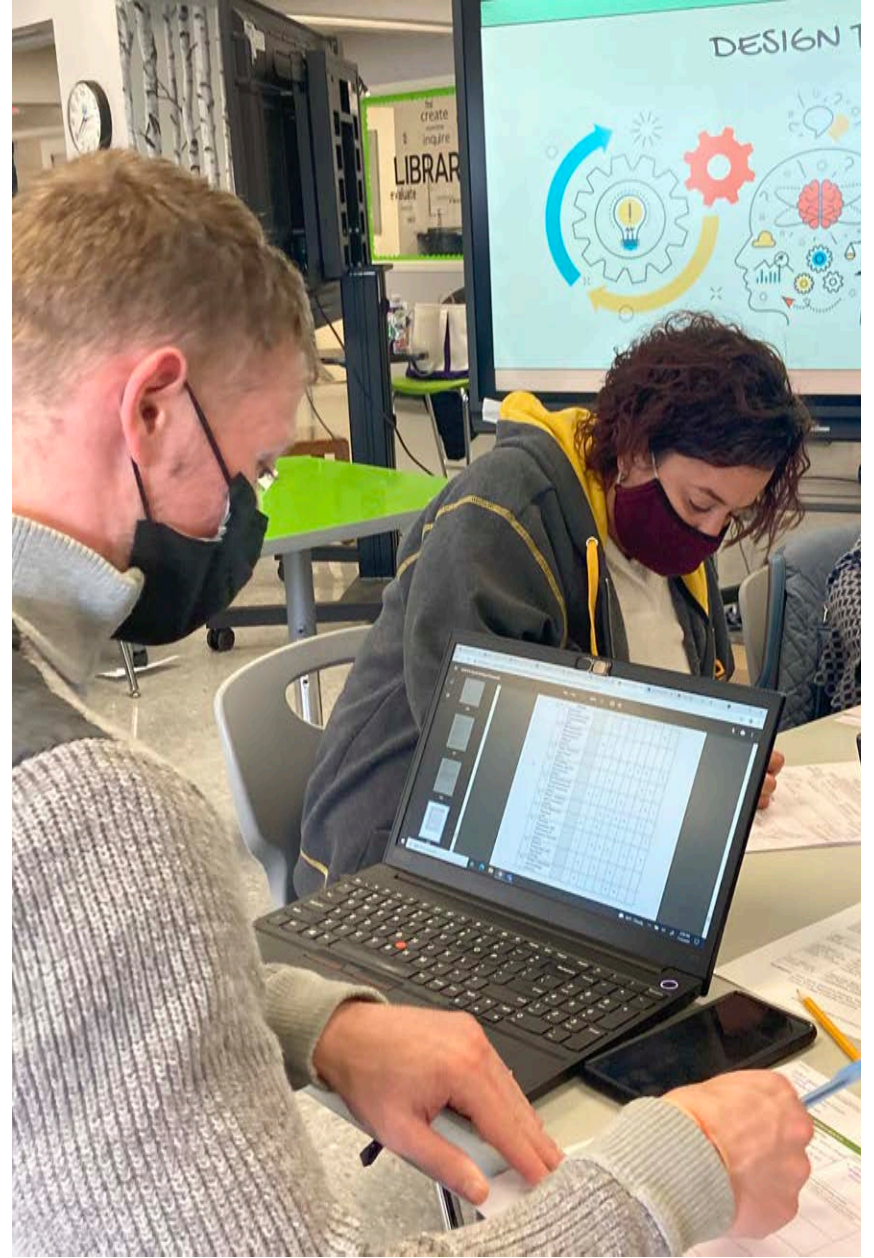


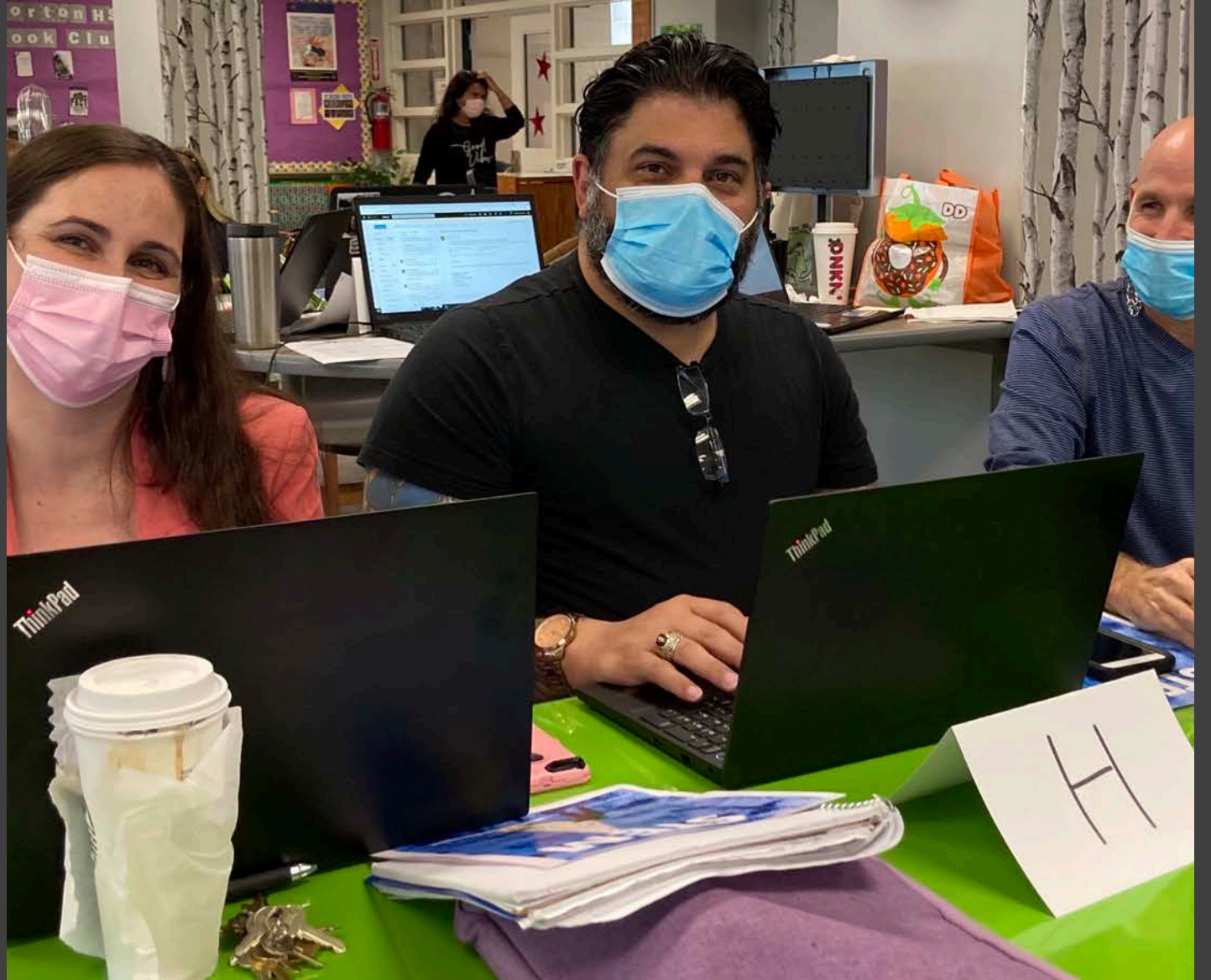
Inquiry-based learning has been a focus of our summer inquiry academies for students and professional learning institutes for teachers over the past five years.



The Professional Development Series

- Professional development is delivered by our partners from Teachers College, Columbia University Center for Technology and School Change. The PD is designed to increase teacher proficiency in inquiry-based learning design and to integrate NYSED computer science, digital fluency and STEM principles into all classrooms at the K-8 level.
- Professional development will take place outside of the school day, during Saturdays and after school.
- Teachers will engage in learning about inquiry design through hands-on experiences. The culmination of the series will be the development and delivery of **transdisciplinary**, standards-based units of instruction that they will integrate into their classes.
- Coaching sessions and visitations will occur throughout the year.
- A leadership component will result in turnkey trainers from within the teacher and administrator groups.
- The type of inquiry that will be used is Project-Based Learning.



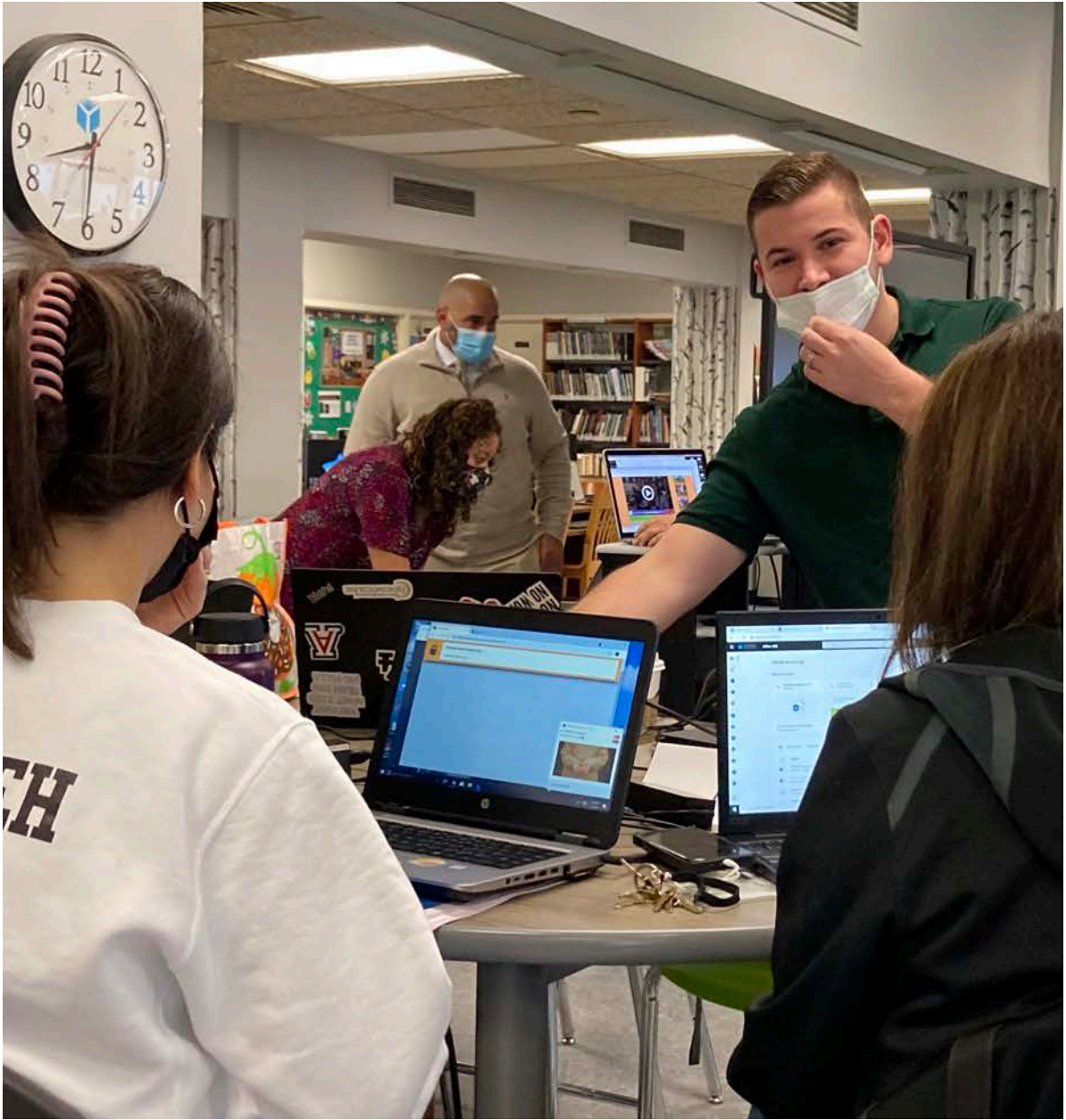
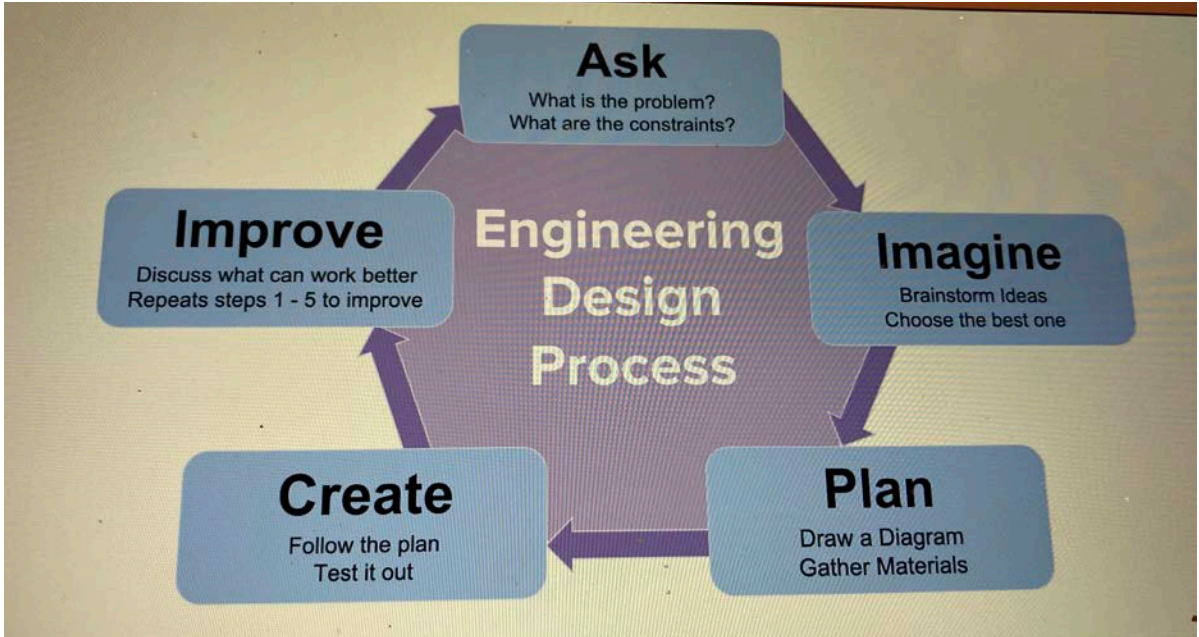


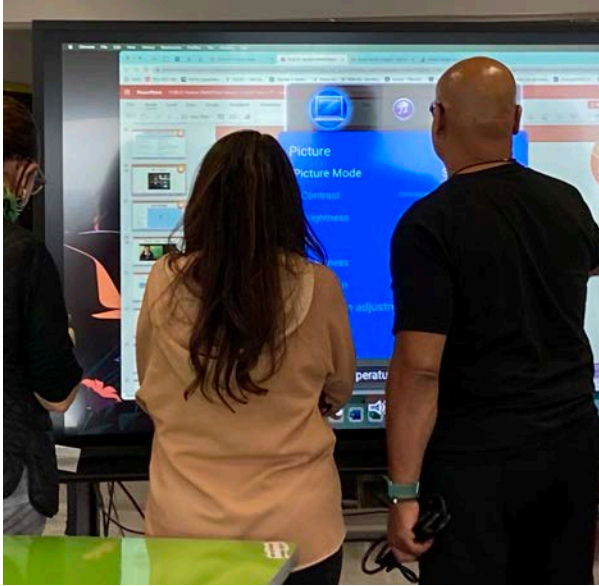
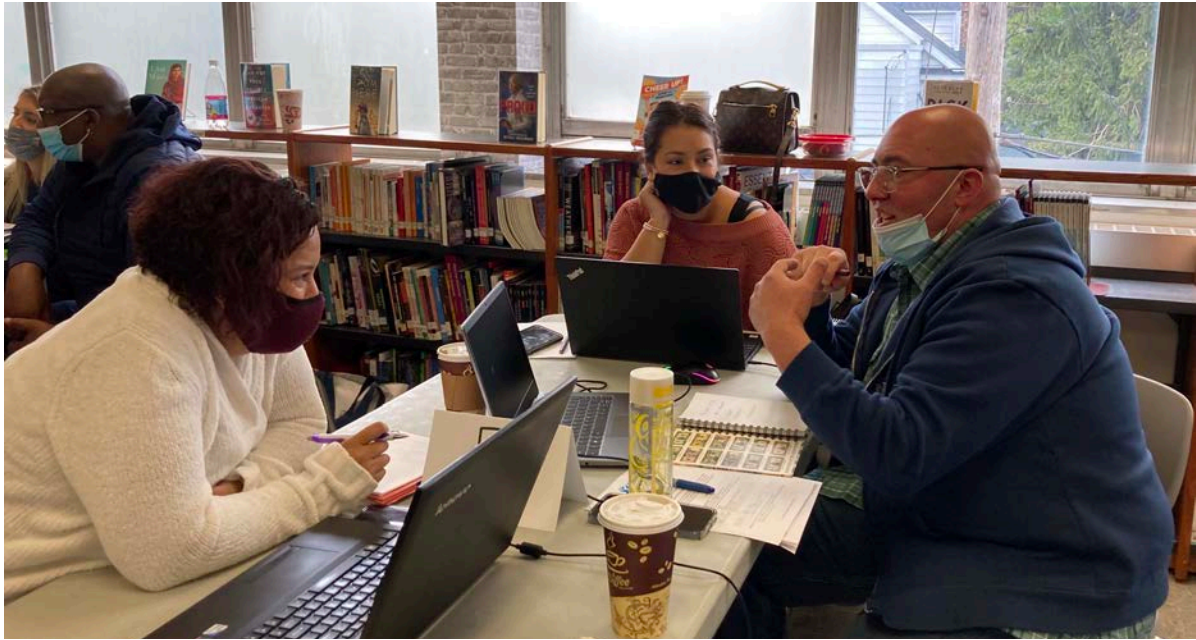
Collaborative Learning

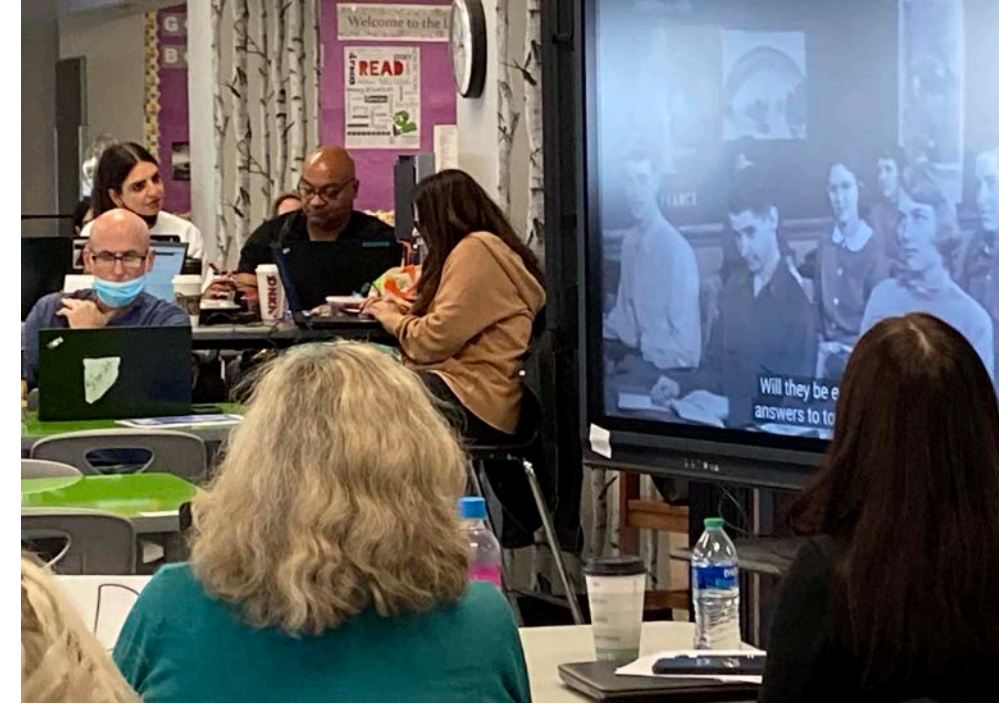
Teachers work in teams to develop transdisciplinary units of instruction. Teams are school-based and cross-district resulting in rich collaborations.

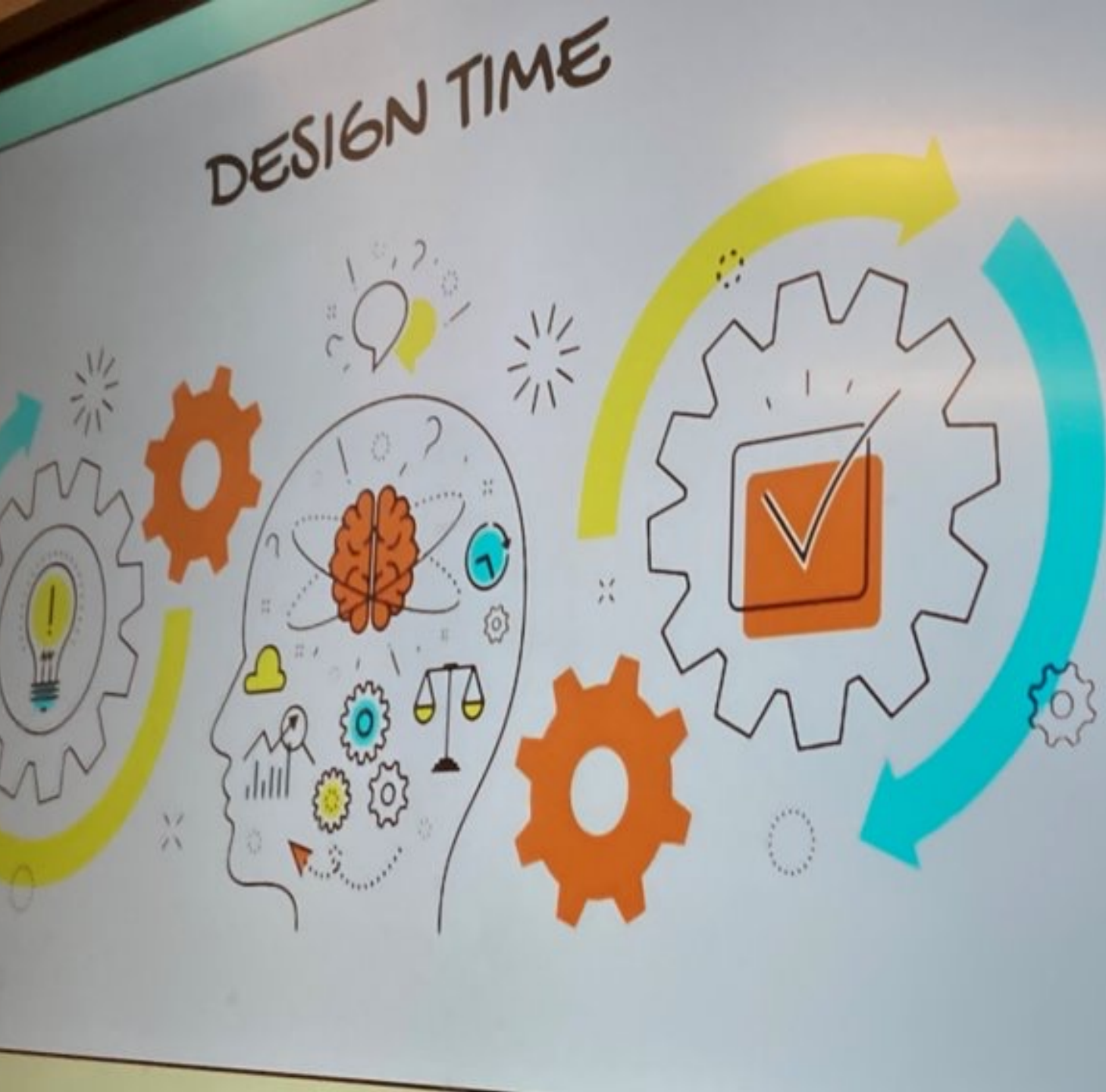
What does inquiry learning look like
for adult learners?

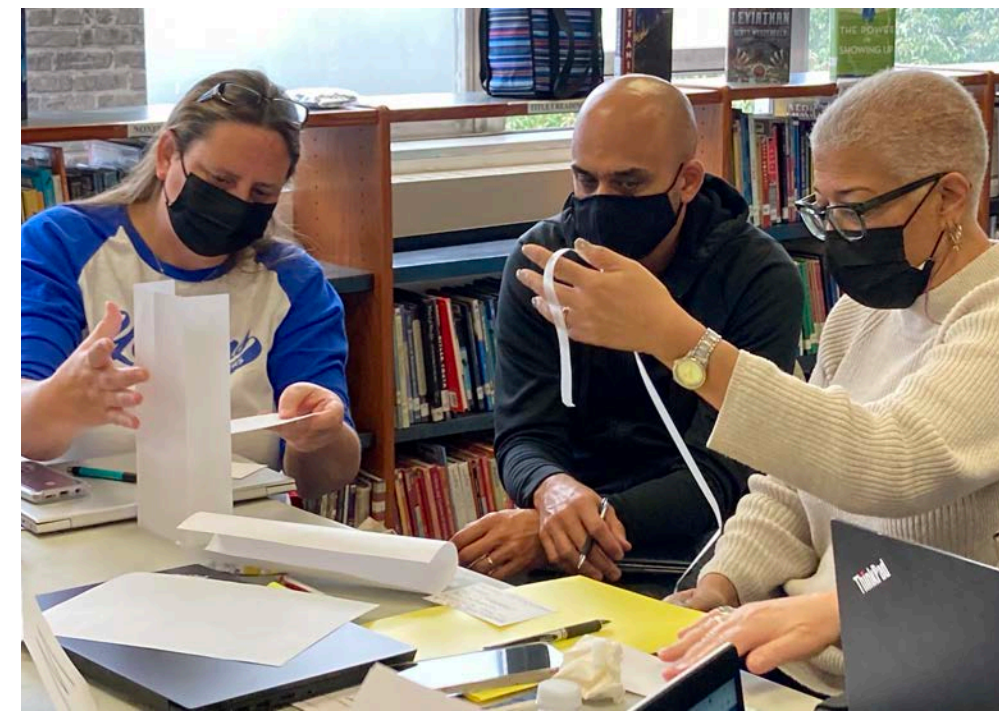
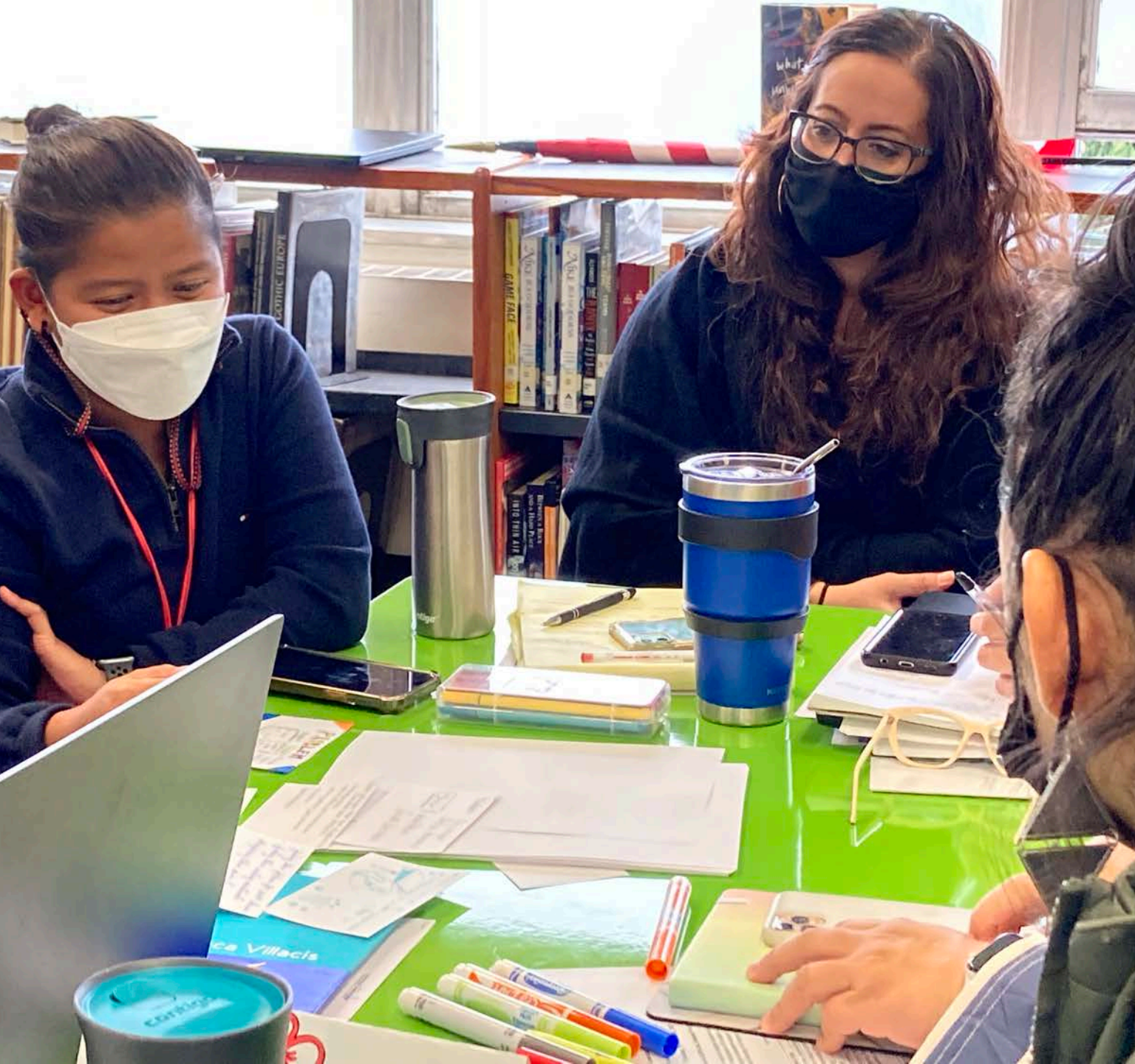


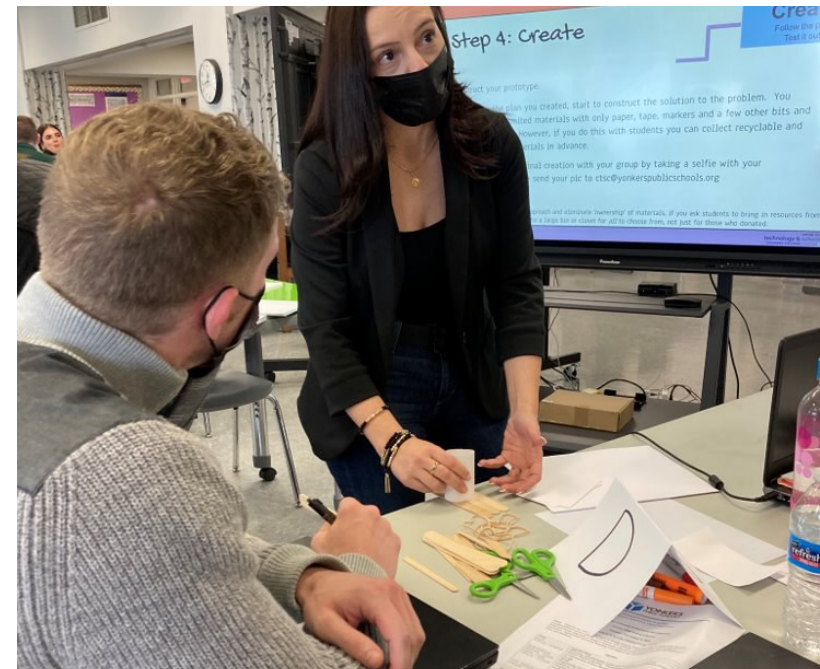




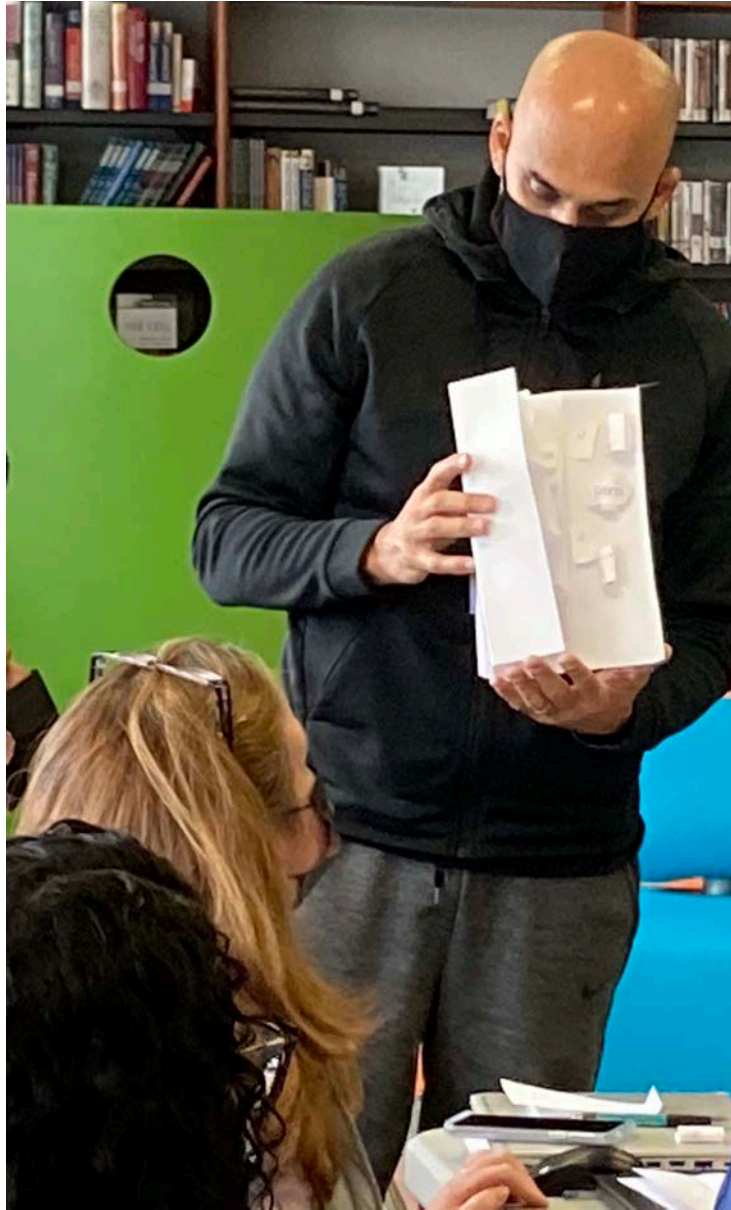












Who is receiving professional development during Year 1 of the grant?

- The focus of the first year of the grant are 7th and 8th grade teachers across the district. These include content area teachers and specialists.
- Teachers from 19 of our schools have been participating.
- Teacher teams worked in both school and interschool teams to engage in the Engineering Process of inquiry.
- Teachers have been able to continue to collaborate between sessions to refine their units.
- Initial units are being implemented into classrooms across the district.