

Vision Grant Summary 2020-2021

Amber Bryan Dobbs

3D Printing

With the funds I received from the Vision Grant, I was able to purchase three 3D printers for my STEM classroom. I originally planned on buying 4 printers but due to a price increase, I was only able to purchase 3. My students have been directly using these 3D printers in class. Students have been using the Engineering Design Process to design solutions to various problems. They are then able to make fully working prototypes to see their designs in real life. This helps bridge the gap between what they are learning in school and being able to solve real world problems.

I have been measuring the effectiveness of this grant by monitoring students' ability to design solutions. I have been using the SC Profile of the Graduate Competency Continuums to consistently monitor and track student progress through the design process. My students are showing tremendous improvement in the areas of building prototypes and testing and iteration due to their ability to actually test and improve on their designs. This grant has helped my students be able to take their ideas and make them a reality.

