Art Integration Paper

Art Form

I have decided to add the art form of drawing to my lesson on local river ecology. I was inspired to choose drawing after learning about the Dear Data Project. In the Dear Data Project artists are challenged to collect some type of personal data over the course of a given period, represent the data visually, and then mail their postcard featuring the data illustration on the front and a key for how to interpret the drawing on the back with the stamp and address. Artists may choose to draw their data however they see fit whether it be an ink drawing, colored pencil, or use of multiple drawing tools. The constraint is that they are limited to a postcard size paper to create their data drawing.

Lesson Enhancement

Given the goal of the local river ecology lesson of construction, analysis and interpretation of graphical data, asking students to think about their data through a visual lens with the dear data postcard project will allow them to dive even more deeply into their data. In order for students to create their dear data postcards they have to have a solid understanding of what their data means and represents. Through the postcard project students will be challenged to creatively think of ways to represent their data visually in drawings. Personally, I am thrilled to be integrating the arts and drawing into my classroom. Although we are only 8 weeks into our Arts in STEM course, the application of our coursework has already shifted my practice and understanding of my students while also widening student access to STEM. This past February in preparation for the Mars landing my students and I participated in the NASA Cosmic Arts lesson from the JPL NASA site. Students learned about other bodies in space and vocabulary to describe them scientifically and artistically. The project culminated with students creating an art

piece inspired by NASA images. The results were breathtaking and left my students with an appreciation for space exploration and a desire to learn more about what's up in space. It allowed me to see my students through a new lens, it provided opportunities for rich discussions about shape and texture that ultimately led us back to science. The joy and learning from that project has me eager to incorporate arts in my classes even more. I'm excited to challenge my students with the drawing element of the dear data project as it will deepen their understanding of their scientific data. In my schools current hybrid model, drawing is an art form I can ensure all of my learners have access to which is another benefit to choosing drawing.

Interdisciplinary Context

The nature of the local river ecology lesson is that it already lends itself well to an interdisciplinary connection between science, social studies, and math. We connect to social studies in our understanding of the local geography and history of oysters in the New York harbor. The graphical data representation and analysis also connects to our math curriculum and standards. Incorporating the dear data project creates an interdisciplinary link between art, science, and math. In order for students to create their dear data postcards, they must have an understanding of the data points they've collected and analyzed prior to developing their visual representation of the data. Getting students to think creatively about their data will lead to deeper classroom conversations about what the data really means, it allows our graphs to become the beginning of the story instead of the end. By asking students to interpret the data a second time through a visual lens allows them another opportunity to explore and interpret the numbers. Additionally, students are tasked with creating a key to communicate how their visual data is represented which might even allow for a language arts connection in the project too! When we integrate arts in STEM we truly create a win-win situation for all parties involved.

Linked References

Bello, O. (2020). *Indicators of Ecosystem Invaders*.

Lupi, & Posavec. (2016). *Dear data*. New York: Princeton Architectural Press.