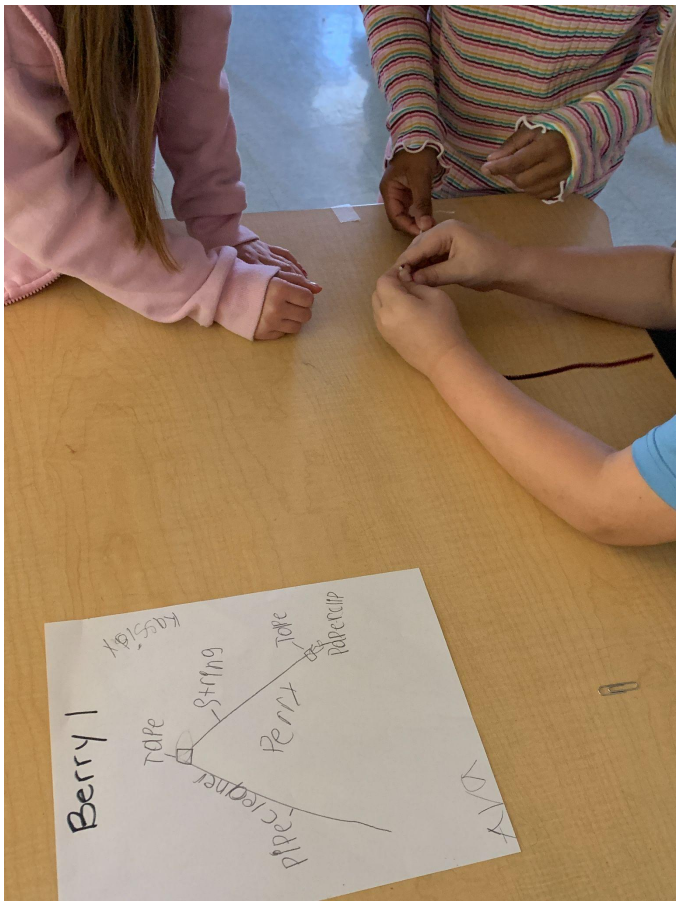
This past year I received funds to add to my STEM classroom library. This year we have done so many wonderful and exciting STEM challenges that included me reading one of the books I purchased with these funds. One of the most recent STEM challenges we did in 1st and 2nd grade was creating a device to protect Humpty Dumpty when he falls off the wall. The book that was used during this challenge was "After The Fall" by Dan Santat. In this challenge the students were given an egg, tape, and a ziplock bag. They then had to choose three other materials that they could use to put in the bag to keep the egg from cracking or breaking when it was dropped onto the table. The materials that they had to choose from included cotton balls, newspaper, yarn, pipe cleaners, and straws. The students went through the engineering design process of planning and creating before testing what they created. Some groups were successful at keeping the egg from cracking or breaking but some were not. We discussed that not being successful at one challenge is not failing. We simply work on how we could improve our design to make it better next time.

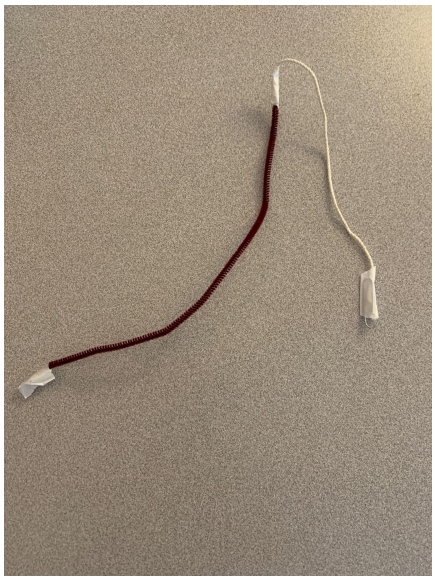
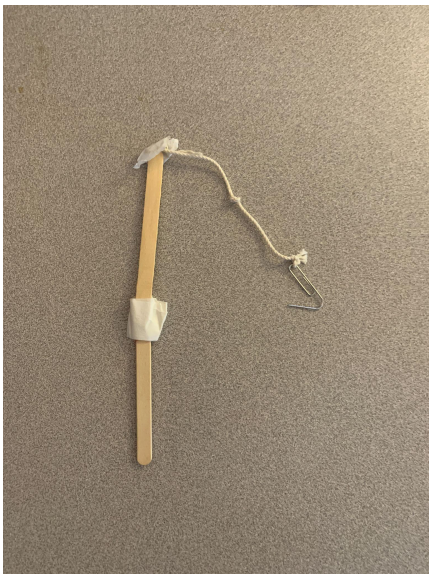
Another challenge that we have done this year included reading "Thanksgiving At The Tappletons" and planning, creating and testing a fishing pole that the family could use to get their Thanksgiving turkey out of the pond. The students had materials such as popsicle sticks, pipe cleaners, tape, string, and a paper clip that they had to choose from. They could choose to use all of the materials or just some of them. After their fishing poles were created we tested them by "catching" a paper turkey with a binder clip attached.

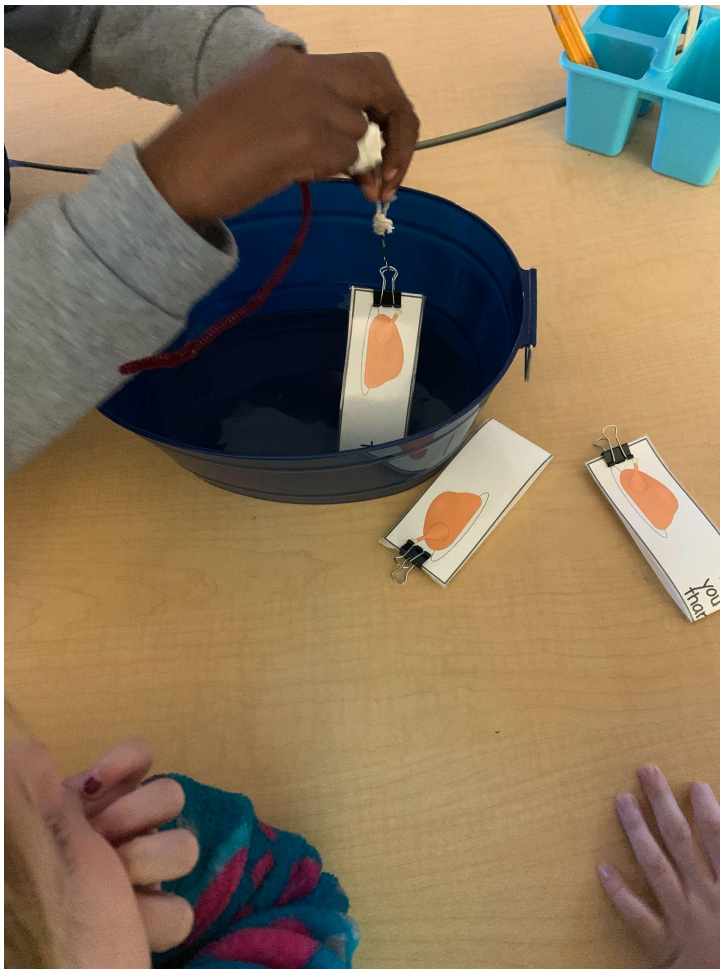
It is my observation that beginning STEM challenges with a piece of literature quickly engages the students and helps them connect literature to all of the real world aspects of STEM. The students love the stories and they allow me to incorporate reading into my STEM classroom.



This picture shows a plan that was created and the students using their plan and materials to create a fishing pole.

These pictures show a few examples of the fishing poles that were created.

This picture shows the students testing their devices. This device was not as successful as others so they were not able to use it as intended. The students had to tell me what they would do differently if they could make it again.

When the students “caught a turkey” they would read the question on the back and answer. The questions were related to “Thanksgiving At The Tappletons”, but invited the students to share about their own Thanksgiving traditions and favorites.