Case Study Dobson Ranch Branch, Mesa Public Library, AZ



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What follows is a case study showcasing how various aspects of the *Reimagining School Readiness Toolkit* were tested and implemented during a national pilot study in Winter 2019-2020. This pilot was cut short due to the COVID-19 pandemic which hit the United States in March 2020. At that time, libraries and in-person programming were closed and remained closed indefinitely at the time of this publication. Nevertheless, this library, like many others, moved some of their programming online. This case study outlines what type of programming existed before the pilot, how things were modified during the implementation phase, and any post-pilot reflections. The Appendices that follow includes signs, templates, and activities created and utilized by library staff. At the top of each, we highlight the relevant skills associated with the key findings (i.e., Talk & Play, Science & Math, or Body & Brain).

Before the Pilot

Before being introduced to the Reimagining School Readiness Toolkit, the Mesa Public Library system had implemented programs across branches, including the Dobson Ranch Branch, that were related to, but were not formally designated, school readiness. At Dobson Ranch, there are two staff members that develop youth programs, including Storytimes for younger children and a STEM program for 2nd through 5th graders. Additionally, there have been partnerships with local organizations, such as First Things First and Child Crisis Arizona, as well as local elementary schools and Head Start preschools. One of the staff members had also experimented with STEAM preschool programming in her previous position at the Main Branch, but had not yet introduced this type of programming at Dobson Ranch.

During Implementation

The staff at the Dobson Ranch branch used the Toolkit resources in several ways — they set up a display nook for family resources, created a "Math without the Math" book list, introduced a preschoolaged STEAM program, and experimented with virtual programming.







Toolkit Nook

The staff wanted to make the resources, tips, and suggestions from the Toolkit available for families to explore themselves. They set up a small table ("nook") in a space often used by caregivers and children ages 0 to 5 that includes puzzles, a puppet theater and a LEGO table. They hung "Conversation Starter" posters on the wall and put out bookmarks for caregivers to take home. The "Time to Try" math activity signs were put into plastic table displays, both in English and Spanish, and were rotated weekly. After experimenting with the signs by themselves, staff began to supplement with activities and materials to prompt engagement. For example, one of the "Time to Try" tips suggests counting objects found in your surroundings, such as windows or chairs. The staff member provided a bucket with acorns, pinecones, and other natural materials for children and their caregivers to count together.

"Some parents would read to their children, but a lot would just sit there watching the child(ren) read/ play alone. I thought creating a display was a quick, easy way to get caregivers to engage with their kids."

— A staff member

Staff would point out the nook to families and encourage them to check it out.

In addition to this dedicated space, the staff also made these materials available across the branch, "anywhere I can get the parents," such as placing bookmarks for older kids in the juvenile section. They also placed the posters and other relevant information in a glass case that could be seen from the outside of the library, which is surrounded by a popular park.

"Math without the Math" Book List

In response to the research on the importance of early math learning, one of the staff members developed a math book list (a twopage brochure listing picture books that teach mathematical concepts) that was also made available in their "Toolkit Nook" space. The brochure organized these titles into the different mathematical concepts that they address, which includes measurement and size, patterns and sorting, shapes, addition and subtraction, and counting. There is also an explanation about the link between early literacy and numeracy skills, as well as tips and suggestions for discussion. In addition to sharing the book list in the Dobson Ranch branch, the staff member shared the list with colleagues in other Arizona libraries. This brochure can be found in Appendix A.

Preschool Labs

By using the research components of the Toolkit, staff were able to illustrate to their supervisor the importance of introducing a preschool-aged STEAM program that had been tried at the main branch, but not yet introduced at the Dobson Ranch branch. They also linked this program to a coding class for older children, arguing that Preschool Labs would help build skills that could later be utilized in coding classes. They then used the tips and activities from the Toolkit to help guide the program structure and content of the Labs.

Preschool Labs focused on exposing preschool-aged children to number and science concepts. They would do this through reading a picture book together, followed by related activity stations, while explaining to caregivers what they were doing, suggesting other relevant books to read with their children, and sharing tips about how to integrate these concepts into their everyday lives. For example, one session consisted of reading and discussing a picture book about cakes. The staff member would ask questions like "What makes cakes rise?" which led to discussions about chemical reactions. They would then go to stations that had experiments, such as trying out measurements or combining baking soda and vinegar. The staff member suggested to caregivers that they ask children to help them measure out ingredients while making dinner as a way to practice these skills at home. A sample Preschool Lab lesson plan can be found in Appendix B.

Virtual Programming

Dobson Ranch library staff found, and are continuing to find, ways to experiment with virtual programming that uses the Toolkit's resources. One of the staff members has put together and filmed "mini-lessons," that were adapted from the Preschool Labs program. (Visit Mesa Public Library's <u>At-Home Activities for Kids</u> for examples.) They follow a similar format: a thematic Storytime, related science activity or experiment, and tips and activity suggestions for caregivers to try at home. The staff member continues to use the Toolkit's tips to help guide the creation of these lessons. These mini-lessons were also incorporated into this year's summer reading program. Despite some setbacks with access to film equipment and library space, the library staff are finding more autonomy, and hope to create more virtual school readiness related programming. They are planning to create short videos sharing more tips from the Toolkit or "Time to Try" Math Activities paired with suggested relevant picture books to go along with these activities.





Post Pilot Reflection

The Dobson Ranch staff found the Toolkit to be very helpful for program planning purposes, incorporating the research into new and existing programs, and sharing important educational concepts with their visitors. One of the staff members has been working in the education field for 32 years and appreciated having materials that explain important school readiness and education-related concepts. The staff members also talked about the Reimagining School Readiness Toolkit with visitors during programs and directed them to the Toolkit resources on BADM's website for many of their summer reading program activities.

"The flyer, the bookmarks, and Time to Try [math activities], I used a lot. Because they...were easy to incorporate into whatever I was doing. I would use them in Storytime, STEAM programs, and even outreach."

— A staff member

In addition, staff received some positive feedback from the new programs and resources. They first noticed that the bookmarks placed in the "Toolkit Nook" area were disappearing, and took that as a good sign that visitors were looking at and taking home those materials. The library staff only got to do Preschool Labs twice before the shutdown, but they found that those who attended seemed to enjoy it. "I started building a little following. The people who came … love the concept. And … they came the next week too."

Other than the obvious setbacks of the COVID-19 shutdowns, staff mentioned two other challenges with programming. The first had to do with scheduling. Because they are a small branch, they only have one room to reserve for programming that is shared across all library programs and the public. They also sometimes find it challenging to facilitate a program that was planned for a particular age group but need to serve families that often bring younger or older siblings to the program. As they learn more about how to navigate library programs virtually and address these in-person challenges, they plan to continue to utilize the Toolkit resources to push their programming further.

Appendix A | Math Book List





Adding and Subtracting

Quack and Count by Keith Baker 513.2110

Rooster's Off to See the World *by Eric Carle* E CARLE

Two of Everything by Lily Toy Hong E HONG

Albert Adds Up by Eleanor May E MAY

One is a Snail, Ten is a Crab by April Pulley Sayre F SAYRF

Counting

1-2-3 Peas by Keith Baker E BAKER

Night Light by Nicholas Blechman E BLECHMAN

10 Black Dots by Donald Crews E CREWS

Dog's Colorful Day: A Messy Story about Colors and Counting by Emma Dodd E DODD

Chicka, Chicka, 1,2,3 by Bill Martin Jr E MARTIN



Measurement and Size

Who Sank the Boat by Pamela Allen E ALLEN

Counting on Frank by Rod Clement E CLEMENT

Is it larger? Is it smaller? By Tana Hoban E HOBAN

Goldilocks and the Three Dinosaurs by Mo Willems

E WILLEMS

Seven Blind Mice by Ed Young E YOUNG









Early literacy and numeracy are two important skills your child needs to succeed in school. You can help develop these skills by reading books with your child. There are several ways to highlight important literacy and math concepts while sharing a story.

Read the book through and talk about the literacy aspects.

- Discuss what's happening in the story.
 Ask your child what they think will happen next.
- Pick out interesting words and define/discuss them.

Reread the story and discuss the mathematical

- aspects.Were there shapes or patterns?
- Did you have to count, add, or subtract anything?
- Was there ordering or size?

You might want to use objects around you to show the concept. For example, after reading any Goldilocks and the Three Bears book you can put objects in order from small, medium, large, or biggest to smallest, etc.

Patterns and Sorting

Very Hungry Caterpillar by Eric Carle

E CARLE

Sort it Out by Barbara Mariconda E MARICONDA

A Pair of Socks by Stuart Murphy E MURPHY

I Went Walking by Sue Williams E WILLIAMS

Shapes

Circle, Square, Moose *by Kelly Bingham* E BINGHAM

Color Farm by Lois Ehlert E EHLERT

Apples and Robins by Lucie Felix E FELIX

Perfect Square by Michael Hall E HALL

Round is a Mooncake: A Book of Shapes By Roseanne Thong E THONG





Sink or Float

Welcome/Action Song: "Clap Your Hands" from Wiggleworms Love You

Fingerplay: Dance Your Fingers Up

Dance your fingers up, dance your fingers down Dance your fingers to the side, dance them all around Dance them on your shoulders, dance them on you head Dance them on your tummy, and put them all to bed

Books: Who Sank the Boat? by Pamela Allen and Will it float or sink? By Melissa Stewart

Stations: Introduce each station by connecting activities to ideas from the books.





Station 1: Sink or Float

Set out a variety of objects for children to test their buoyancy and explore on their own.

Materials:

- Large tub/bucket (Clear, if possible, so children can easily see what's happening)
- Wood/plastic items that will float
- Metal items/coins that will sink
- Surprising items like various fruits and vegetables
- Log sheet with pencil or crayons

Station 2: Build a Boat

Have parents/caregivers help guide children to use the materials provided to build a boat that will float.

Materials:

- Large tub/container of water
- Aluminum foil (for the body of the boat)
- Craft sticks, straws, pieces of Styrofoam, etc. (anything that might help the boat float)
- Tape
- Scissors
- Pennies, washers, etc. (to add weight to the boat)

Process:

- Brainstorm ideas. (Encourage children to draw a diagram or picture.)
- Build the boat. (Ask questions about why children chose various materials.)
- Test the boat in water. (Ask: Did it float? Why or why not? Can the boat hold weight (pennies, washers, etc.)? How much can it hold?)
- Tweak the design and test again. (Challenge children to redesign so it can hold even more weight.)

Station 3: Origami Boat

Experiment with different types of paper to see how long your boat can float in the water. Have a book out to demonstrate how to build a paper boat or refer to <u>this video</u> from YouTube.

Materials:

- Various types of paper: origami, construction, wax paper, etc.
- Large tub/container of water



Sink or Float

	Draw the object.	Make a prediction. Will it sink or float?		What happened?
1		Sink	Float	
2		Sink	Float	
3		Sink	Float	
4		Sink	Float	
5		Sink	Float	
6		Sink	Float	
7		Sink	Float	
8		Sink	Float	
9		Sink	Float	
10		Sink	Float	