DISCOVERY ROOM
2024-2025

MT. ECCLES
ELEMENTARY SCHOOL

PRINCE WILLIAM SOUND
SCIENCE CENTER

DISCOVERY ROOM

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2024-2025 Yearbook

DISCOVERY ROOM

PRINCE WILLIAM SOUND SCIENCE CENTER

Letter from the Director

Since the fall of 1992, the Discovery Room has been a rewarding and exciting place where students from Mt. Eccles Elementary School learn about the world around them through natural and physical science. Throughout the year, students participate in Discovery Room for hours of fun, hands-on science instruction. During our time together, students explore and study the local environment and local organisms for a deeper understanding of how we are all connected.

We are so thrilled to spend time with Cordova's youngest learners as they discover this unique place we all call home. It is such a pleasure to nurture exploration, encourage curiosity, and inspire a love for science and the world around us. As students move through elementary school, we get to grow with them, asking deeper questions, studying more complex ideas, and going on more intense adventures alongside these young learners.

The Discovery Room is a partnership between the Prince William Sound Science Center and the Cordova School District. Discovery Room is generously supported by numerous organizations, foundations, and many local and non-local individuals.
Thank you to everyone for helping us make Discovery Room happen!

Lauren Bien
Education Director
Prince William Sound Science Center

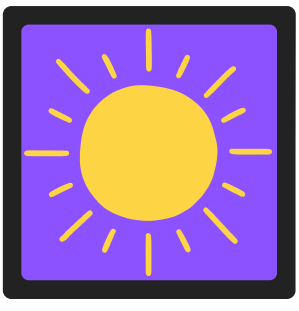
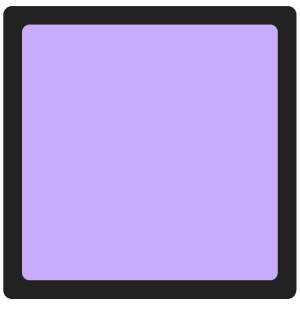
Kindergarten

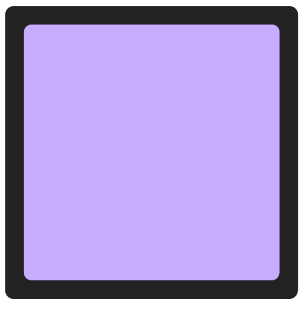
Weather

Kindergarten is full of mini meteorologists! This year, kindergarten students practiced using their five senses, along with scientific tools, to learn more about the weather.

In the fall, students learned all about the four seasons: how the rotation of the sun creates the four seasons, how seasons help us predict the weather, and how to dress to prepare for different seasons.

Next, we dove into the types of weather that students may experience in Cordova. We got creative and artistic by making clay models of clouds, windsocks, and rain sticks. Students used Next Generation Science practices - such as asking questions, making predictions, and carrying out investigations - in a wind experiment. They exercised their fine motor skills with scientific tools, such as eye droppers, in a model of the water cycle.



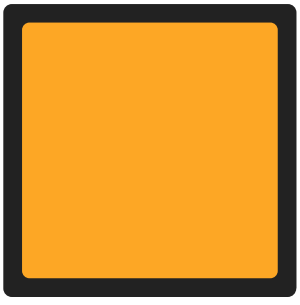

First Grade

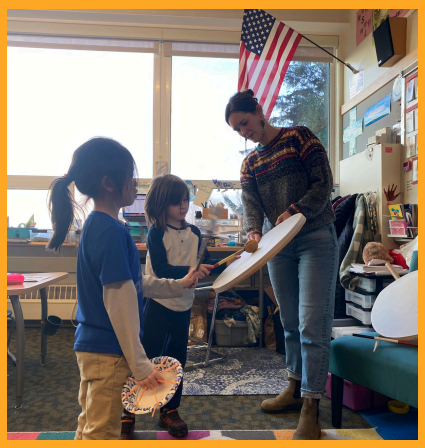
Light and Sound

You're never too young to learn physics! This year the first graders explored light and sound waves and discovered how these principles of physics relate to nature and the human body.

We started the year using our senses to make a sound map of the schoolyard. Kids then explored how sound travels as waves in a tactile experiment with tuning forks. We extrapolated on our knowledge of sound as vibration with a visit from the Native Village of Eyak (NVE). NVE showed the first graders how people have been utilizing vibration to create sound through drums for centuries. NVE also taught the kids how to make drums. To find out how we hear sound, students crawled through and explored an extra-large model of the ear, complete with moving parts!

After mastering sound, we moved on to light with an experiment that revealed how light interacts with different types of materials. The kids were able to explain the properties of transparent, translucent, reflective, and opaque materials by the end. With the knowledge of reflection and absorption, first graders were able to figure out how we see color. To build upon this we went on a color scavenger hunt in the woods.

Second Grade

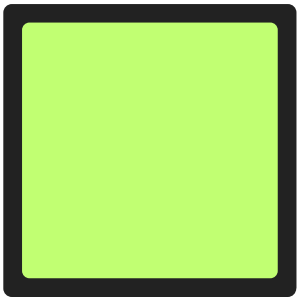
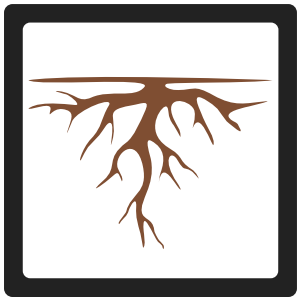
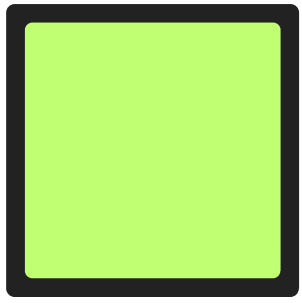
Hydroponics

Second grade sprouted into hydroponics this year and grew as a group of more adventurous eaters.

Throughout the year, the second grade explored plants by growing their own.
We followed the life cycle of plants from seeds to sprouts to food!

Second graders were responsible for checking the well-being of their plants by monitoring water levels and pH. To understand what they were monitoring, the students did an experiment testing the pH of familiar substances.
When the plants started to grow, the kids learned about different parts of a plant by dissecting (and tasting) leaves, roots, shoots, and fruits. To explore flowers, we visited the Kicker Room Blooms flower shop.
Second graders can also define the word “adaptation” and explain different adaptations that help plants survive.

After growing the plants, the kids harvested their hard work. In the fall, we enjoyed a salad party with fresh lettuce. In the winter, we grew bok choy and learned about Filipino cooking with Ms. Alison, who made pancit for the kids. The spring crop of mint gave us tasty (and healthy) smoothies.


Third Grade

Birds

Third grade got a little bird-brained in 2024-25. This year, the third grade followed the life cycle of a bird.

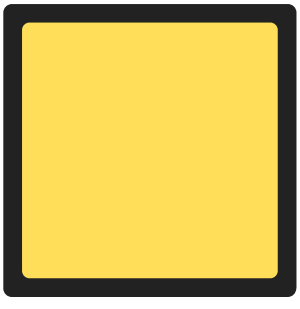
Students learned about the characteristics of birds. Through active games, they discovered factors that birds consider when making a nest. A creative experiment that involved balancing books on eggshells taught the third graders just how much weight an eggshell can support.

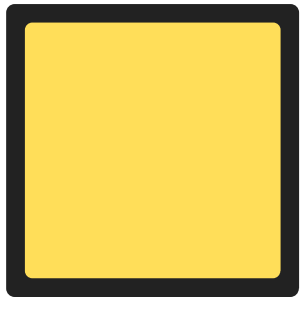
We spent a lot of time exploring the bird adaptations that help birds find and eat food. This involved experiments, games, and an owl pellet dissection.

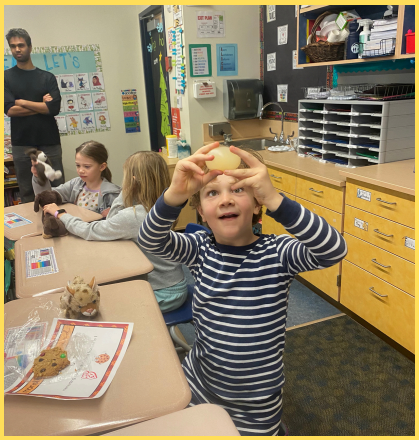
Once the students had background knowledge of birds, we started to study birds like scientists do. A field trip to the Science Center included a mock-stomach dissection with jello "stomachs".

Representatives from the Native Village of Eyak joined us to share ecological knowledge behind sustainable seagull egg harvest and the importance of birds in Native culture and art.

We capped off the year with a field trip to Hartney Bay to see the shorebird migration!



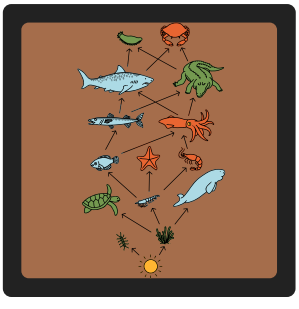



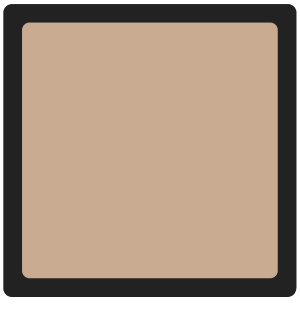
Fourth Grade

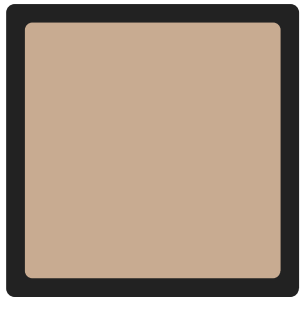
Ecosystems and Energy

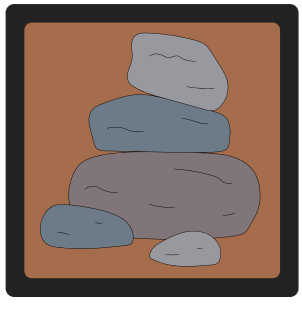
The year started by following the food chain from plankton to otters while learning concepts such as *food web, energy pyramid, trophic levels, and keystone species*. After learning about the importance of plankton, we created our own "plankton" out of recycled materials and tested them to see if they could float in the water column. We explored kelp in the classroom as well as intertidal invertebrates. To understand how all these creatures are connected, students surveyed mock habitats and determined that otters are keystone species.

In the winter, students got energized with renewable energy. After discovering how electricity is generated with magnets spinning in wires, they used their knowledge of turbines to create hydropower and wind power. They also became sustainable engineers when they constructed houses out of recycled materials and competed to design a structure to maintain the most heat.







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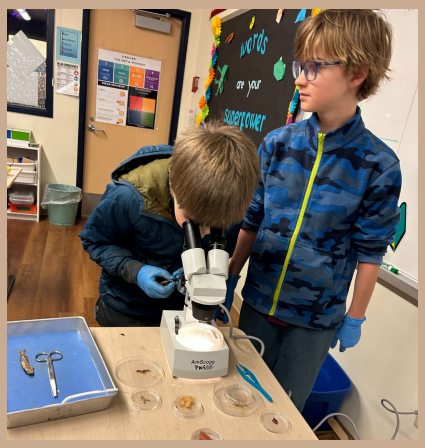

words
or your
superpower


PARKING
ONLY

Fifth Grade

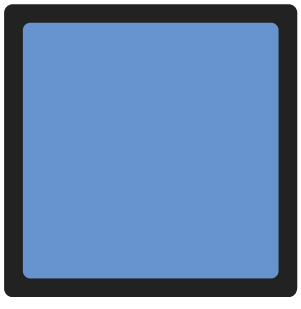
Salmon and Systems Thinking

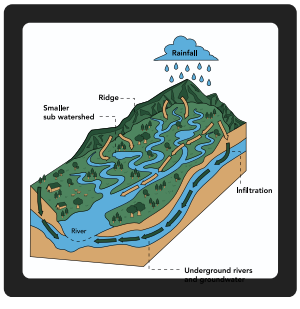
Fifth grade explored systems thinking this year as a lens for understanding Earth's spheres. We started by dissecting a bicycle, mapping its parts, and detailing how they come together to accomplish a specific function. To understand feedback loops, students followed the carbon cycle through the geo-, bio-, hydro-, and atmo- spheres. Various units examined interactions between the spheres. For example, students made music with data to discover the relationships between melting glaciers (cryosphere) and freshwater influx in the ocean (hydrosphere). They created mock towns and landscapes to visualize erosion as an interaction between the hydrosphere and geosphere. Students diagramed the impact of carbon (atmosphere) on the ocean (hydrosphere) as well as society.

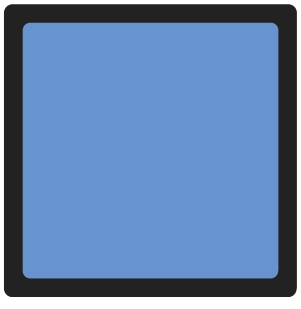
Fifth grade is also the year of the salmon! In partnership with the Copper River Watershed Project, *Discovery Room* focused on salmon and the Salmon Tank.

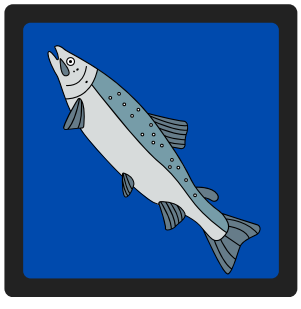
In October, the fifth graders hatched salmon eggs in a tank at the school. Throughout the year, the students monitored the tank and recorded the water temperature to track the life cycle.

The salmon developed into fry just in time for a springtime salmon release - a great end to a year of discovery!

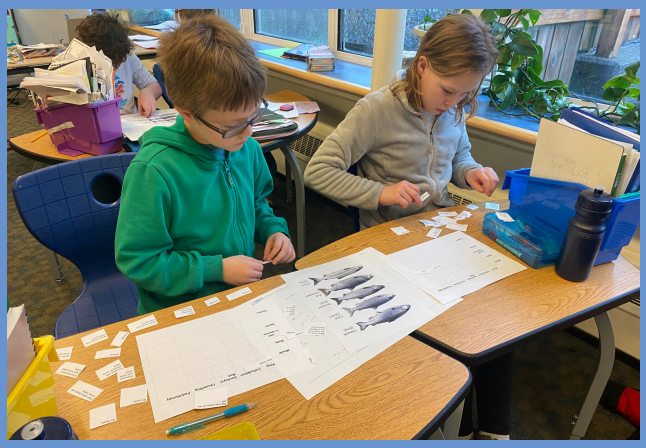


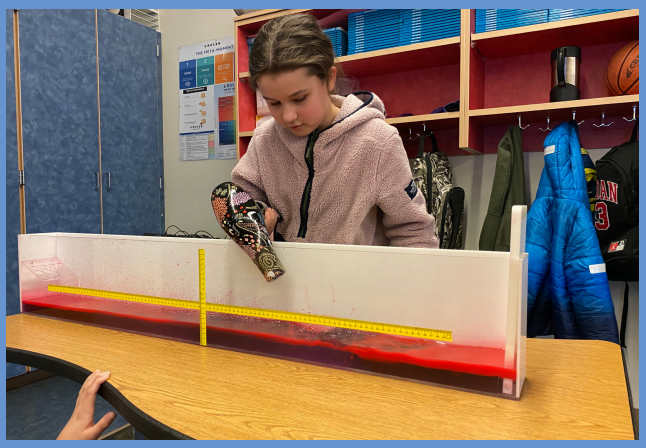


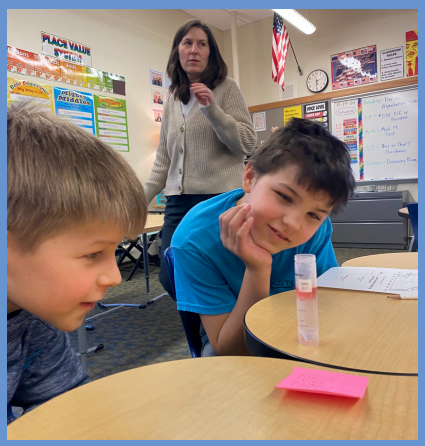





MontagueMarineResearch.com






PLACE VALUE
SYSTEM


Brave
Comfortable

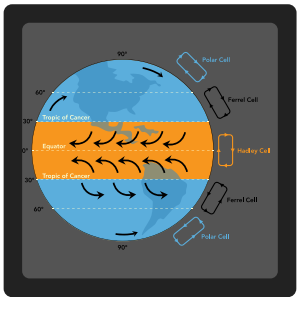
Sixth Grade

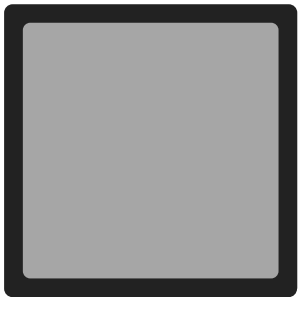
Ocean Properties and Technology

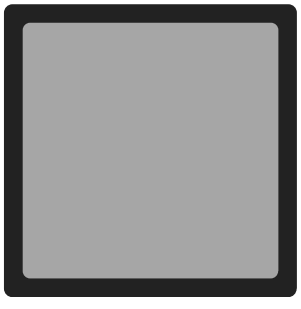
Sixth grade put the Technology in STEM during the 2024-25 school year. Students started the year learning about the temperature and density of water and the paths of ocean currents. Next, they investigated how the properties affect the movement of marine debris and oil spills. After learning more about the *Exxon Valdez* Oil Spill, they participated in an oil spill in a pan experiment where they had to figure out the effectiveness of different clean-up methods. They got a taste for oil spill response with a mock oil spill response drill in which they had to orchestrate a fleet of vessels responding to a spill.

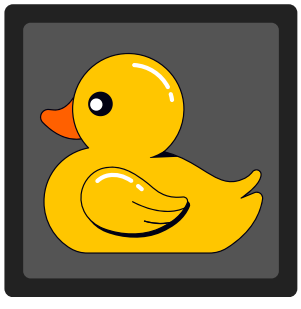
The class then designed and built Remotely Operated Vehicles (ROVs). This project culminated a year of exploring the physical properties of the ocean and some of the technology used to study it. After construction, the ROVs were put to the test, completing a series of underwater challenges.

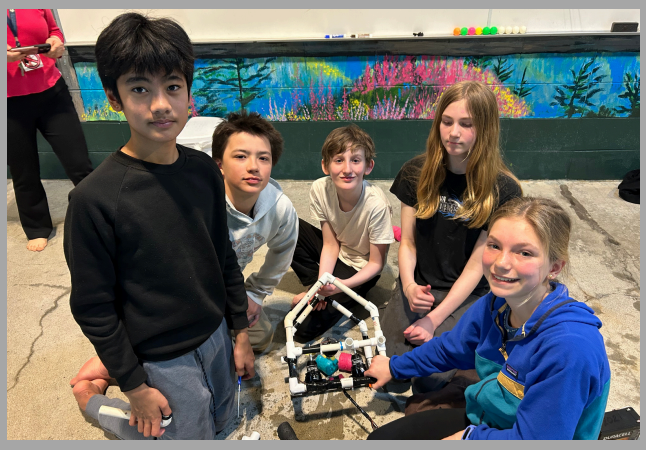
The 6th-grade overnight was the ultimate finale to a year of fun. The class spent two days exploring the Copper River Delta, learning about distinct ecosystems, wildlife, and the cultural history of the place we call home. Students were encouraged to get out of their comfort zones, learn new skills, and explore parts of Cordova they had never seen before.









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