

Overview:

As an introduction to the ATEP program, students watch the video "Ocean Fury: Tsunamis in Alaska" and discuss the effects of the 1964 tsunami on their locale.

Targeted Alaska Grade Level Expectations:

Science

- [3] SA 1.2 The student demonstrates an understanding of the processes of science by observing and describing the student's own world to answer simple questions.
- [4] SA 1.2 The student demonstrates an understanding of the processes of science by observing, measuring and collecting data from explorations and using this information to classify, predict, and communicate.
- [4] SD 2.2 The student demonstrates an understanding of the forces that shape Earth by identifying causes (i.e., earthquakes, tsunamis, volcanoes, floods, landslides, and avalanches) of rapid changes on the surface.
- [3] SE 1.1 The student demonstrates an understanding of how to integrate scientific knowledge and technology to address problems by identifying local problems and discussing solutions.
- [4] SE 2.2 The student demonstrates an understanding that solving problems involves different ways of thinking, perspectives, and curiosity by identifying multiple explanations (e.g., oral traditions, folklore, scientific theory) of everyday events (e.g., weather, seasonal changes).
- [3] SG 2.1 The student demonstrates an understanding of the bases of the advancement of scientific knowledge by comparing the results of multiple observations of a single local event.
- [3] SG 4.1 The student demonstrates an understanding that advancements in science depend on curiosity, creativity, imagination, and a broad knowledge base by asking questions about the natural world.

Objectives:

The student will:

- · watch and discuss the video "Ocean Fury: Tsunamis in Alaska;"
- conduct a written interview with an Elder about his/her experience during the 1964 earthquake and tsunami (grades 2-4);
- interview an Elder about his/her experience during the 1964 earthquake and tsunami and draw a picture (grades K-1);
- · share interviews and/or pictures with classmates;
- create a TSUNAMI bulletin board using pictures and written interviews; and
- answer generalized questions about tsunamis as a result of information derived from both the video and personal interviews (grades 2-4 only).

Materials:

- "Ocean Fury" DVD
- Drawing materials (grades K-1)
- INTERVIEW SHEET: "My Tsunami Memories" (grades 2-4)
- STUDENT WORKSHEET: "What I Know Now" (grades 2-4)
- Elder letter (one per student)

Activity Preparation:

On a board or chart paper, brainstorm tsunamis to determine what students already know about them (especially the 1964 tsunami). Note any misconceptions.

Activity Procedure:

- 1. Watch and discuss "Ocean Fury: Tsunamis in Alaska" video.
- 2. Pass out STUDENT WORKSHEET: "What I Know Now" and have students complete them independently. (grades 2-4 only)
- 3. Discuss interview techniques with the class. Provide interview sheets and letters to Elders.
- 4. Assign interviews as homework, allowing several days to complete.
- 5. When complete, compare and contrast student interviews and drawings.
- 6. Display older students' interviews younger students' drawings on the TSUNAMI bulletin board.

Answers:

- 1. earthquakes, volcanic eruptions, landslides, meteorites
- 2. go to high ground
- 3. round tsunami evacuation sign
- 4. circle the jet
- 5. Answers will vary, but should indicate students know they are too close for safety.
- 6. Accept all reasonable answers.

Student Worksheet



What I Know Now

Think about the "Ocean Fury: Tsunamis in Alaska" video you just watched. Then complete the worksheet.

- Check the events that might cause a tsunami.
 - ___Earthquakes
 - ___High winds
 - ___Volcanic eruptions
 - ___Landslides
 - ___Meteorites
 - ___Fires
- 2. The best thing to do if you hear tsunami warning sirens is to...
 - __go to the beach
 - ___go to high ground
 - __stay where you are
- 3. Circle the sign that tells you where to go in case of a tsunami.







4. The video explained that tsunami waves could appear in several different forms, but they all come very fast. Circle the picture of the only thing that can travel faster than a tsunami.





- 5. If you can see the wave, _____
- 6. Write at least one sentence about something you learned watching the video.

N	lame:_			

Elder Letter



My Tsunami Memories

Dear ,

We are learning about tsunamis in our class at school. We began our unit by watching a video about the earthquake and tsunami on Good Friday in 1964, and how it affected the cities of Anchorage, Valdez and Seward.

I asked our students to interview local people to see what happened here. Will you please help us complete this project by answering a few questions?

Any additional information, photos, or experiences you are willing to share would be of great help to us.

Thank you,

Name:	
Name:	

Interview Sheet



My Tsunami Memories

k	your Elder the following questions:
,	Where were you on when the earthquake hit on Good Friday in 1964?
}	Please describe what happened.
-	
-	
-	
-	
1	Did you have any warning there would be a tsunami after the earthquake?
•	If you left your home, what happened to it? How long before you were able to return home?
-	
-	
١	Have you experienced any other tsunamis in your life?

Be sure to thank the Elder who gave you this information.