

## Module 4:

### Safety Hazards and Risks on Adak.



#### Content to be covered: Important Facts about UXO.

- What is UXO?
- Where can UXO be found?
- What does UXO look like?
- How dangerous is UXO?

#### Objective:

- To educate residents and visitors to Adak of the dangers associated with UXO.

#### Teacher's Guide:

In the last unit, students learned of the military history on Adak. They learned that Adak was used as a staging area for the Aleutian Campaign and they learned, as a result of

that campaign, that many war supplies were brought to Adak and stored. In this unit they will learn of the possible dangers of encountering remnants of those munitions. This unit will educate students about UXO: What it is, what it looks like and what to do if they find it. This will be done through lectures from UXO experts, UXO reference books, textbooks, and videos.

## **Important facts about UXO:**

### **What is UXO?**

Unexploded Ordnance (UXO) results from the military's use of munitions in times of war and during training. A list of UXO items might include bullets, bombs, rockets, grenades, shells, blasting caps, fuzes and other explosive items. These items, when they have malfunctioned and have not been exploded, are extremely dangerous and can still explode and cause injury or death.

### **What does UXO look like?**

UXO comes in many shapes and sizes. Some look new and some look old and rusty. Some are small like bullets and some are large mortars or bombs. They can be easily spotted or can become completely hidden or buried. This is especially true in an area like Adak which is covered with the beach grasses of the tundra.

### **In what type of area on Adak would I most likely encounter UXO?**

Areas where the military used weapons for training or testing are most likely to contain UXO. On Adak, signs and fences usually mark these areas. But, you should remember that UXO can be found anywhere on the island.

### **What should you do if you see UXO?**

If you think that you see UXO it is most important to remember DO NOT PICK IT UP! Remember to leave the area the same way that you entered it. Try to remember where you saw it and tell a parent, teacher, policeman or any authority as soon as possible.

### **What will happen if you touch UXO?**

You can either be hurt or killed. Never pick up an item that looks like UXO. It may look harmless but it may turn out to be very dangerous. Even men and women trained for many years to pick up UXO will NOT touch it until then know for certain that it is not dangerous. It often takes years of training to know if a particular UXO item is dangerous or not.

### **If a UXO item does blow up, how far can the pieces travel?**

The range that pieces of an exploded UXO can travel depends on the size and type of the munition. Some items will have a very large danger area. For instance, when a shell explodes, metal pieces can break into many different sized fragments. These fragments can be very hot and sharp. Generally, the larger the UXO the farther it will throw fragments.

### **How hard would I have to hit a UXO item to make it blow up?**

You should consider all UXO to be extremely dangerous and unstable. Any movement or even a change of temperature can cause UXO to explode. This is the reason that signs and fences have been put up on Adak and why "Blue Card" training are held for residents and visitors to Adak. These "institutional controls" are warnings never to enter areas known or suspected to contain UXO and never to touch, move or pick up UXO.

### **Enrichments and Extensions:**

**Icons:**

Currently, here are many useful enrichment activities already in place on Adak which assist in the education of UXO. Boomer and Admiral Pin Feather videos, coloring books, pins and posters all assist in helping the children to understand the dangers of UXO. OF course, these icons can and are currently used throughout all areas of the curriculum. Children can use them in literature, math, creative writing and oral presentations.

### **History and Safety Timeline:**

This curriculum's emphasis on the anthropological and military history of Adak and on the continuing concern for safety throughout the years can be realized through "Timeline of Safety" which can be developed by the students. The timeline may begin in ancient times and continue through to the present, highlighting uses of the land and the safety issues which were (and still are) of concern through the generations.

### **Resources:**

DVD (captioned & uncaptioned) for adult and children, Navy 2003

UXO Information Brochure - Navy 2003

UXO-related laminated safety cards which can be clipped to clothing using a carabineer - Navy 2003

Adult and Children's posters - Navy 2003

Children's coloring book - Navy 2003

Hiking trail map - Navy/USFWS 2003

UXO Sample Training Materials:<http://safety.army.mil/pages/training/unexplodedordnance.htm>

Adak Ordnance and Safety Awareness Video: Foster Wheeler 2001

Boomer and Admiral Pin Feather Video