Songs of the Sea, Above and Below

Laurie Bailey

Introduction

Sea shanties are a part of our musical and nautical history. Shanties provided a strong beat for sailors to work in unison. They described the adventures and trials of sailors and entertained sailors who sailed the seas for up to four years at a time. Shanties tend to be “catchy” and therefore easily learned. In addition, they were written in prose easily understood by those with little education\(^1\). To our benefit, shanties provide a type of historical record of sea life in the 18\(^{th}\) and 19\(^{th}\) centuries.

Shanties usually have many verses but almost always include a chorus when all the sailors can sing together. I think this will be a useful tool to help my students participate in singing the shanties.

Discussing whales and their communication skills will be a great way to talk to my students about how singing is a way of communication for them and for humans. This unit will provide a way to connect science through aquatic organisms and human endeavors, historically and musically.

Rationale

Castle Hills Elementary School, located on Moores Lane in New Castle, Delaware, is a school for students in Kindergarten through fifth grade. Enrollment during the school year 2014-2015 was 658. Slightly over one third of the population is African American. Slightly under one third is white and 26% of the students are Hispanic. Just over half of the student population is considered to be Low Income with about 17% who speak another language at home. Fewer than 10% of the students have special needs.\(^2\)

As I write this paper, this is to be my fourth week at the school, having been reassigned from a school with a population of students with severe physical and cognitive disabilities. I visit this school twice a week, teaching one class each of Kindergarten through fifth grade, a chorus for 3\(^{rd}\), 4\(^{th}\), and 5\(^{th}\) graders which totals approximately 130 students, and team teach double classes of Kindergarten, first, and second on one day. A few of my classes consist of students with special education needs. I plan to teach the unit to third and fourth grades, and possibly fifth grade.

Sea Shanties
Sea shanties will be a fun way to teach history and science in music class. Some of the songs tell how sailors went to sea looking for whales. We will be able to discuss how whales “sing” to each other to communicate. Because former sailors have described how sailors used shanties to entertain themselves on ship and to help them work, we will be able to discuss the “work songs” genre. We might even create our own shanty to work by!

I realized in researching shanties that the theme song to the cartoon *Sponge Bob Square Pants* has a traditional shanty melody and is performed in a traditional shanty style. The song begins with a single sailor who sings, “Who lives in a pineapple under the sea?” The other sailors respond with, “Sponge Bob Square Pants!” The song continues, alternating the lead singer with the sailors. This is exactly how many of the shanties were sung, especially the work shanties. I’m sure using the theme song to *Sponge Bob Square Pants* will not only be fun and attention grabbing, it will be a great aid in helping the students remember the vocal form called Call and Response. One shanty I will teach is “Haul Away, Joe” because that song is already in the district approved music curriculum. I will also use the sea shanty “John Kanacka,” which is a very commonly performed shanty, as a third selection.

Sea shanties cover all kinds of topics: fishing, exploration, adventure, riches, war/battles, recruitment, hardship, disaster, love/family, patriotism, storms and shipwrecks, battles, even cannibalism. Shanties talked about daily life on board the ship as well as the occasional recreation event, and included people on board. A few stories included events of women who dressed as men to gain passage on the ships and fooled all the sailors for a period of time.

While shanties were often used for entertainment purposes, they were essential during certain tasks where the singing lent itself to everyone pulling at the same time: to “heaving up the anchor, pumping ship, and hoisting the heavy topsail yards of the period [the 1860s], besides the lighter labour of trimming sail...When intervals to throw their united weight on a rope or pump-brake all together, and thus avoided wasting their strength in ineffective pulls.” Singing while working not only helped the sailors work in unison, it also provided relief from the monotony of the labor. However when the job was finished, the song would stop abruptly, whether or not it had been sung to completion! The song was not sung again unless the job needed to be done again, on the ship or on the shore. Unless the work song doubled as entertainment, the song was only sung during that one specific job.

Entertainment was important on a ship full of men who saw land so infrequently. One type of shanty is called a “forebitter”. This is a shanty which is sung for entertainment, rather than work, the style of which was a ballad or a detailed account of some event in history. Entertainment usually happened twice a week, either in front of the forecastle (a place on deck where the ropes come out) or below deck in bad weather.
There are several types of shanties. A short-haul is a shanty that required just a few good pulls on a rope. *Haul Away, Joe,* for example, was only used for a very short, hard pull. All sailors pulled together on the last word, *Joe.* 12 Each ship had miles of rope and every hand (sailor) had to know which rope went where and where to place his hand quickly. Two handed pulls by many men pulling together made the work lighter. Every sailor had his own way of “singing out” to begin the hauling of rope and singing. 13 To pull the Halyard, or long drag shanties, time was needed to set up between pulls. The shanties often had a chorus at the end of each line to not only pull together but also to rest or reset their hands, such as when the sail needed to be raised or lowered. Capstan, Windlass, and Pump ropes required longer, more repetitive songs because they required a long, continuous effort. The whaling shanties gave men the courage to go after the whales in the face of great personal danger. 14

Even though shanties have been written down, the primary form of communication was through singing. The tunes were often repeated with different words to fit the occasion. This was a common practice on land as well. The songs were not sung the same way because each sailor/singer had his own style and would change the tunes and words to suit himself. Shanties are not necessarily sung in regular meter; the sailor will change the meter to fit the words he wants to sing. 15

From the years 1820-1860 America went to sea less for whaling and more for commerce. White sailors, especially Irish and English sailors, would work seasonally as stevedores in the South, mingling with the southern Negro “roustabouts.” The songs learned in the south combined with the songs the Irish and English knew, bringing new versions and excitement to the shanties. Traditional songs intended to entertain trended toward one nation or another. Although some shanties were enjoyed by other nations, often the songs that primarily entertained were nationalistic in nature. 16

Some songs were such favorites that in order to get a job on the ship, a sailor had to sing the song from beginning to end! And some songs were popular both on ship and in the lumberyard. “The Flying Cloud” is an example of such song. 17 Both sailors and lumbermen worked hard, even though they knew they would work long hours and not be well paid. They tended to love being on the move, rather than stay at home; and they tended to be free with money, drinking and fighting often. 18 “They were rough, rugged characters, a lot of them; but if there were much about them that was petty, they got rid of it, or stopped following the sea or lumbering. The same thing can be said of their songs. To last, both men and songs had to have vigor and the spirit of courage. A sense of humor was hardly less important.” 19 Sometimes a sailor or lumberman was hired for their voice and ability to give spirit to the other men, rather than being exceptional workers themselves. 20

**Shanghaied and Crimpers**
Sailors were not always willing to sail, however. Sometimes men were physically forced onto the whaling ships. This could be called “shanghaied” or “impressment” (during wartime).\(^{21}\) Basically a man could be kidnapped, either by beating him unconscious, helping him become senselessly drunk, or was purposefully drugged and taken aboard a ship. By the time the man woke up, he was well out to sea and there was nothing he could do about it. In a similar way during war, “pressgangs” were in force. Merriam Webster dictionary defines a pressgang as “a detachment of men under command of an officer empowered to force men into military or naval service.”\(^{22}\) These unfortunate souls who found themselves onboard a sailing ship had to learn how to survive as a sailor, leaving family and lovers at home without any word of explanation.\(^{23}\)

Another sad part of whaling history was the “crimpers.” These men often owned boarding houses for sailors and forced unsuspecting men into working on ships, sometimes by tricking them into signing a ships’ articles which essentially made the men indentured servants.\(^{24}\) Crimpers had all sorts of tricks up their sleeves to get men on board ships. If the men couldn’t be kidnapped or tricked, the crimpers would charge them so much money for their clothing and supplies that they couldn’t afford to do anything but return to the ships. Sadly, these men were able to prey on men of low income simply because they knew the police and the courts would not do much to help them.\(^{25}\)

### Background of Whaling

Americans began whaling in the early 1600s, most of the ships coming from the New England states.\(^{26}\) The sailors were looking for whales with sperm oil in the heads and blubber. Sperm oil, actually a liquid wax, was used in lamps and to lubricate machinery. Another type of oil also found in these whales was spermaceti oil. This oil becomes hard and waxy when exposed to air. People used spermaceti oil to make candles which were able to burn for a long time and gave off very little smoke.\(^{27}\)

Another thing coveted by the whalers was ambergris. This substance is found in the intestine of some sperm whales. It was secreted by the whale through the bile duct to coat something the whale ate (like the beak of a giant squid) but couldn’t digest. When first removed from the intestine it was very smelly, but after being exposed to air it hardened to a pleasant smell. People discovered that it helped the scent of expensive perfumes last longer. Ambergris sold for large amounts of money.\(^{28}\) Fortunately for whales, this has now been replaced with a synthetic product.

### Whaling ships

Whales were plentiful off the shores of America in its early years. The Native Americans captured whales from open canoes and used the meat as food.\(^{29}\) Early in the whaling industry the whale rendering was done on shore. Later, as ships became bigger, rendering was done on board. During the American Revolution British ships would capture the
American whalers and force the crews to either fight on the British man o’ war ships or whale for the British.\textsuperscript{30}

For most of the 1700s people in New England, Nantucket especially, hunted the whales near New England to near extinction. Soon the whalers went farther and farther from home. By the American Revolution the Nantucket Whalers had 150 ships and the harvest was bringing in $50,000,000 per year.\textsuperscript{31}

In 1784 England began to impose restrictions on whaling which most captains ignored. However when England imposed a heavy tax on whale oil taken to England, it almost destroyed the American whaling business. Many Americans found steady work on British ships in order to keep working, bringing the American whaling business into further decline. However, since everyone wanted to light their homes and businesses with whale oil, profit was made by the oil sales, and that helped America rebuild their business.\textsuperscript{32}

Whales became scarce and the ships had to go farther, and stay out at sea longer, to find some. The Atlantic Ocean was the main hunting grounds for years but in March of 1789 the first whale was killed in the Pacific Ocean.\textsuperscript{33}

In 1820 whale boats became larger, carrying six or seven whaleboats as opposed to one or two. Up to 40 men crewed the ships. Sometimes the ship would stay on the ocean for up to four years, not returning home until they were filled with whale oil. The captains never headed the ship to land in order to keep their men from deserting the ship while ashore. The water and food usually went bad long before they made for home. The ships were not comfortable and the crews were paid about 20 cents a day. By comparison, on land an unskilled worker could often earn $1.00 a day. Clearly the sailors either loved sailing and whaling and willingly worked for such a small amount of money or they were shanghaied or pressganged and had no choice.\textsuperscript{34}

\textbf{Finding the whales}

A crewman would climb the ropes to the “crow’s nest,” a platform on top of a mast, to look for whales. When he saw the whale blow water into the air as it exhaled through the blow hole, he would cry, “Thar she blows!” The whaleboats were then lowered into the water, each holding six men. The harpooner sat in the front of the boat, using a paddle until the boat got close to the whale. An officer sat in the back giving directions. When the officer commanded, he would drop the paddle and pick up the harpoon, aiming to hit the whale near the eye. Once hit, the whale could choose to do a number of things. Usually the whale swam away very fast or dove into the water. The harpoon was tied to a very long rope. If the whale chose to dive, the sailors had to be ready to cut the rope, lest they be dragged into the depths of the sea with the whale. If the whale chose to swim near
the surface, the boat was pulled behind until the whale got tired. While this was happening, the harpooner and the officer would switch places on the wildly tossing boat so the officer could deliver the killing blow to the head with a very sharp, 5-foot spear. Usually the harpoon and killing blow to the head was enough to take the fight out of the whale but sometimes the whale would slap its tale and capsize the boat or even try to bite the boat. When blood spurt from the blowhole the sailors knew the whale was dying. They would shout, “Flurry! Flurry!” which meant the battle was almost over.35

The whale was towed back to the ship, which was sometimes miles away, depending on how far the whale towed the smaller boat in the fight. The whale was towed tail first to the starboard side of the ship. Men would stand on the whale while cutting off the blubber in a spiral, turning the whale over and over. This was very dangerous work and often took at least five hours. Sharks would show up and take bites out the whale carcass as well. Blubber was kept in cooking pots and the smell was terrible.36

Not only was the smell bad, the deck became very slippery from the oil and sometimes the deck would light on fire. Rats and roaches were also a problem to the sailors because the oil and blood attracted them. They brought cats onboard to eat the rats but not much killed the roaches.37

The greatest days of American whaling were between 1830 and 1860, coinciding with the outbreak of the Civil War. At that time there were 750 ships at sea and nearly all of them called New England home. San Francisco became the whaling port on the Pacific coast.38

In 1859 oil was discovered in western PA which ultimately replaced whale oil. Also contributing to the demise of the whaling ships was the Civil War. Confederate ships would sink and destroy the whalers. Almost half of the whaling ships were destroyed this way. Whaling continued to the end of the 1800s but would never be important to America again.

Whales

To incorporate the science part of the seminar on organisms, I would like to give my students some very basic facts about whales. Scientists have discovered that whales communicate using sounds like clicks and “singing.” I plan to use their example to stress to the students that whales communicate in a unique way, comparing that to how each student has his or her own unique way to communicate. I may even bring in the Lonely Whale Project, describing how the Lonely Whale keeps trying to find someone to communicate with him/her and that my students should follow its example by never giving up. I would like to find audio of whales singing, maybe even clicking, to play for the students.
Whales are mammals, which mean they breathe air. They don’t have hair; they have blubber to keep them warm. They are also very large. Since larger animals do not lose heat as quickly as smaller animals do, their size is important to their good health in the cold waters of the ocean. Whales have a blow hole which closes when they dive or “sound”, but opens when they surface. The water that blows from the spout is moved by the old air the whale releases. Then the whale takes a big breath and dives again.

The whale has flukes, which are the flipper like things at the end of his tail. There are no bones in the tail, only really long muscles which pulls the tail up and down while swimming. The flippers have bones similar to the ones in our arms, but they are proportionately thicker to deal with moving through the relatively dense medium, water, in which they live. The flippers help the whale steer. The dorsal fin on the back helps keep the body steady while swimming. The dorsal fins are different sizes on different whales. Some whales have teeth, such as sperm whales, while others, such as humpback whales, and others have baleen. Baleen hangs from the upper jaw and resemble large, flat fingernails. The baleen strain the water so the whale can get the right food.

Most whales carry their young from 10-12 months and the baby is born live. Twin whales are a rarity. A baby sperm whale can weigh a ton at birth and be 12-14 feet long, but a baby blue whale can weigh 7.5 tons at birth and be 20-25 feet long! Babies can only nurse for a few seconds at a time because they need to be taught how to surface to breathe. But during that small amount of time gallons of milk flow into their stomachs, rich milk that is around 50% fat. Baby whales have very little blubber so the families migrate to warmer waters to protect them. The blue whale baby gains 8.5 pounds an HOUR from birth to around 7 months old! Some whales birth every two or three years and some reproduce only every 7 years.

Some whales seem to have a very strong family group. Whales are born into the pod and only leave when they die. “Some scientists think that whales help one another in caring for the young. Sperm whales dive very deep to feed. The young whale can’t go along with its mother. Scientists have seen one adult sperm whale at the surface with two calves. They think the adult was “baby-sitting” for a mother that had gone to feed. They also saw a sperm whale being born. Very quickly, several whales came over to the baby. They nudged it and rubbed up against it. They even lifted it out of the water. They seemed to want to get as close to the new whale as possible.”

Whales are big and require a lot of food. A blue whale can eat up to 4 tons of food a day! Sometimes they kill in packs, like killer whales. Killer whales will hunt and cooperate to take down sea lions, seals, and fish. Sperm whales dive very deep so it’s
difficult to observe what they eat. However when examining the stomachs of dead whales, scientists have found squid. How do they eat the squid when their teeth are only on their lower jaws? Scientists think a sperm whale will aim a sound beam at the squid to knock it out and then swallow it whole.\textsuperscript{45}

One interesting thing whales do is called “breaching.” Breaching is when whales pop most or all of their bodies out of the water. Scientists think could be a form of communication, part of courtship, or part of scaring the fish they want to eat.\textsuperscript{46} Whales also do something called “spy hopping” where they will stick their heads out of the water, as if to spy on their surroundings.

Whales seem to need to touch, and use touch as a means to communicate. Belugas can turn their heads and move their mouths. Belugas are sometimes called “sea canaries” because they make so many different sounds. “…trills, whistles, squeaks, and grunts….They can sound like a screaming woman or a rusty hinge. They may whinny like a horse or cry like a baby.”\textsuperscript{47} Humpbacks sing very complex songs with a beginning and end, with themes that repeat. Their songs can last up to 30 minutes. The whales in one area will sing the same song but with slight differences. And then the song can change from one year to the next. Scientists think they may sing to attract females or keep males away.\textsuperscript{48} The sperm whale has clicks and “codas” which are Morse code-like clicks in patterns. 5 click codas seem to be “hello.”\textsuperscript{49} The loud, intense clicks of the sperm whales may cause the fish (marine organisms and plankton) to “light up’ or bioluminescence, making them easy for the whales to see and eat. Sometimes female sperm whales do a duet of synchronized clicking which experts believe may be a way females bond and mothers/children bond.\textsuperscript{50}

**Music Strategies**

**Singing**

Singing the theme song to *Sponge Bob Square Pants*\textsuperscript{51}, and the shanties *Haul Away, Joe* and *John Kanacka* will be the backbone of the lessons in the unit.

**Compare and Contrast**

Students will compare the shanties for musical similarities and differences. Students will also compare the words of the shanties to determine what might be the purpose of the shanty.

**Listening**
Students will listen to a shanty sung by Judy Collins called *Farewell to Tarwathie*. This song includes audio of humpback whales singing in the sea. The song was written by a young man in 1850 who was leaving his farm to hunt for whales on a whaler. The students will make observations based on their listening experience and what they know about shanties. The students will listen to an informational video about whales made expressly for children. The students will also listen to the teacher read a book called *Symphony of Whales* and will write informational or creative paragraphs about whales and their songs.

**Science and ELA activities**

Students will use information given about whales and whaling to write an informational or fictional paragraph about the reason the whales are singing. As a class we will choose a job that needs to be done but is very boring and write a shanty for doing that job.

**Physical Action**

Students will use a rope to experience working together like the sailors. I will ask about six students to stand on one side of the rope and about three on the other side. Initially the students will try to move the six students independently. Then the students will sing the song and pull together on certain words, just like the sailors did. Hopefully this will demonstrate that working together is more powerful than working independently.

**Assessments**

Student assessments will include demonstrating understanding of the purpose of shanties, being able to sing portions of selected shanties, writing a paragraph about whales and their singing, and helping to write new shanty words to an old shanty tune.

**Standards**

The State of Delaware has not yet adopted the New National Standards for Music Education at the writing of this paper. This unit of study would cover the following standards in the old National Music Standards: #1 Singing, alone and with others, a varied repertoire of music. #4 Composing and arranging music within specified guidelines. #6 Listening to, analyzing, and describing music. #8 Understanding relationships between music, the other arts, and disciplines outside the arts. #9 Understanding music in relation to history and culture.

In the new national music standards, this unit would cover Respond: MU:Re7.1.4a Demonstrate and explain how selected music connects to and is influenced by specific interests, experiences, purposes, or contexts. MU:Re7.2.4a Demonstrate and explain how
responses to music are informed by the structure, the use of the elements of music, and context (such as social and cultural). MU:Re9.1.4a Evaluate musical works and performances, applying established criteria, and explain appropriateness to the context. Perform: MU:Pr6.1.4a Perform music, alone or with others, with expression and technical accuracy, and appropriate interpretation. MU:Pr4.2.4a Demonstrate understanding of the structure and the elements of music (such as rhythm, pitch, and form) in music selected for performance. MU:Pr4.2.4c Explain how context (such as social and cultural) informs a performance. Create: MU:Cr1.1.4a Improvise rhythmic, melodic, and harmonic ideas, and explain connection to specific purpose and context (such as social and cultural)

This unit would cover the following standards in the Common Core English Language Arts Standards for fourth grade: Knowledge of Language: CCSS.ELA-LITERACY.L.4.3 Use knowledge of language and its conventions when writing, speaking, reading, or listening. CCSS.ELA-LITERACY.L.4.6 Acquire and use accurately grade-appropriate general academic and domain-specific words and phrases, including those that signal precise actions, emotions, or states of being (e.g., quizzed, whined, stammered) and that are basic to a particular topic (e.g., wildlife, conservation, and endangered when discussing animal preservation).

**Enduring Understandings**

Students will understand the following concepts once completing the unit: People can learn about history and culture by studying various forms of music; and musical elements and structure can be found in nature.

**Essential Questions**

What is a sea shanty and why was it important on a ship? How do shanties inform about historical or cultural events? What is the musical form of a sea shanty? What are whales like? Why did sailors want to kill them? What do scientists know about whales singing and what do they hypothesize? Do we know any songs that make a job go faster? What are some things that influenced the words to the shanties?

**Activities**

Lesson One – What is a sea shanty and why was it important on a ship? What is the musical form of a sea shanty? How do sea shanties inform about historical or cultural events?

**Anticipatory Set:** The first lesson will begin with the students listening to the theme song to *Sponge Bob Square Pants*. After the students sing along, I will describe the form
of a sea shanty and help the students understand how the theme song fits the shanty form. **Direct Instruction:** We will discuss how shanties fit the description of “work songs” and demonstrate how sailors might have worked together to haul a sail while singing *Haul Away, Joe.* I will play a recording of *Haul Away, Joe* for the students to hear, follow along, and then learn to sing the sailors’ part of the shanty. Using a tug-of-war rope borrowed from the PE department I will have about six students volunteer to be the “sail,” holding the rope firmly but not pulling backwards as in tug-of-war. Then I will ask three students to pull against the six without the shanty. Then I will have them try again while singing the shanty and pulling together on the word “Joe.” Ideally, all three students pulling together should pull the six students who are the “sail,” demonstrating the power of the song to make all sailors pull together. As an additional activity, the students could guess how many students it would take to pull the “sail,” thus adding a math component to the lesson. **Assessment:** Short quiz that students can answer by using one or two fingers to show the correct answer.

Lesson Two – What are whales like? Why did sailors want to kill them? What do scientists know about whales singing and what do they hypothesize? This lesson may take two or three class periods to cover all the information.

**Anticipatory Set:** This lesson will begin with information about whales from a child-centered video I found, followed by a discussion of what the students observed about whales and why sailors killed them. **Direct Instruction:** I will then read the book, *Symphony of Whales,* which is based on a true story of approximately 3,000 Beluga whales being trapped by rapidly forming ice. The ice kept the whales from swimming into the open sea and local villagers worked round the clock to break up ice until a Russian ice-breaking ship arrived. **Assessment:** I would like to have students listen to whale sounds and either write informational paragraphs about whales or imagine what the whales might be singing about.

Lesson Three – Do we know any songs that make a job go faster? What are some things that influenced the words to the shanties? This lesson will also take at least two class periods.

**Anticipatory Set:** Play the songs *John Kanaka* and *Farewell to Tarwathie.* Students should compare and contrast the two songs. I will explain that *John Kanaka* is the name some sailors called themselves, meaning “man.” **Direct Instruction:** I will begin with a review that sailors sang shanties for work and for entertainment. Students should decide which song above belongs in which category. Then I will explain that sailors sometimes found work on land and intermingled with sailors from other countries. They shared songs, events on land and sea, and borrowed freely from each other. Then when the sailors went back to their ships, there were new songs to sing and new stories to listen to. The students will learn to sing *John Kanaka,* taking note of the rhythm and rhyme of the
two lines that tell the story. We will discuss the story so every student understands the story line. The melody and rhythm is essentially the same so we will try to play it on a xylophone or other melody instrument. The students will choose a rhythm instrument to imitate a job a sailor might have, create a rhythm to imitate the job, and use the instrument and rhythm to accompany the song. **Assessment:** Using the song *John Kanaka* we will change the words to make up a song about something we do every day, like brushing our teeth, or memorizing spelling words, or cleaning up in the cafeteria. The students will offer suggestions.

**Bibliography**


Church, Albert Cook. *Whale Ships and Whaling.* New York: W.W. Norton &, 1938. This source is good for background information on whaling and the ships used.

Doerflinger, William Main. *Songs of the Sailor and Lumberman.* 2nd ed. New York: Macmillan, 1972. This resource included a vast number of sea shanties and information about how similar the songs of sailors and lumberman were and why.

Jennings, Teresa. "Song: John Kanaka." *Music K-8,* September 1, 2015, 51. This is a song the unit relies on to further demonstrate shanties and also to create new words to an old shanty.

"Judy Collins - "Farewell to Tarwathie"" YouTube. Accessed November 17, 2015. https://youtu.be/qV29xK2xyZ4. This YouTube video provides another way to listen to a shanty. In this case, the shanty is used as entertainment. The additional attraction of this video is the use of whale song in the background.


---

4 Ibid, xvii.
5 Ibid, xvii-xviii
6 Ibid, xv.
7 Ibid, xvi.
8 Ibid, xxiv.
9 Ibid, xxv.
11 Ibid, xxvii.
12 William Main Doerflinger, Songs of the Sailor and Lumberman, 4.
13 Ibid, 3.
15 Ibid, xiii.
16 Ibid, xiv.
17 Ibid, xv.
18 Ibid, xv.
19 Ibid, xv.)
20 Ibid, xvi.
21 Ibid, xiv.
25 Ibid.
26 Tim McNeese, Clippers and Whaling Ships, p. 28.
28 Ibid, p. 31.
29 Albert Cook Church, Whale Ships and Whaling, p. 14.
31 Ibid, p. 32.
32 Ibid, p. 34.
33 Ibid, p. 35.
34 Ibid, p. 37.
36 Ibid, p. 41.
37 Ibid, p. 42.
38 Ibid, p. 42.
40 Ibid, p. 5.
41 Ibid, pp. 7-9.
43 Ibid, p. 28.
44 Ibid, p. 29.
46 Ibid, p. 44.
48 Ibid, p. 43.
49 Hal Whitehead, Whales, Dolphins and Porpoises, p. 49.
50 Ibid, p. 76.
People can learn about history and culture by studying various forms of music; 
Musical elements and structure can be found in nature.

**ESSENTIAL QUESTION(S) for the UNIT**
What is a sea shanty and why was it important on a ship? How do shanties inform about historical or cultural events? What is the musical form of a sea shanty? What are whales like? Why did sailors want to kill them? What do scientists know about whales singing and what do they hypothesize? Do we know any songs that make a job go faster? What are some things that influenced the words to the shanties?

**CONCEPT A**
Sea Shanties, Form, History

**ESSENTIAL QUESTIONS A**
What is a sea shanty and why was it important on a ship? What is the musical form of a sea shanty? How do sea shanties inform about historical or cultural events?

**CONCEPT B**
Whales, Whaling, Whale song

**ESSENTIAL QUESTIONS B**
What are whales like? Why did sailors want to kill them? What do scientists know about whales’ singing and what do they hypothesize?

**CONCEPT C**
Create a modern sea shanty

**ESSENTIAL QUESTIONS C**
Do we know any songs that make a job go faster? What are some things that influenced the words to the shanties?

**VOCABULARY A**
Shanty, Form: Call and Response, work song

**VOCABULARY A**
Humpback whales, Beluga whales, sounding, hypothesize

**VOCABULARY A**
John Kanaka, Tarwathie,

**ADDITIONAL INFORMATION/MATERIAL/TEXT/FILM/RESOURCES**