The Log from the Sea of Cortez Study Guide

The Log from the Sea of Cortez by John Steinbeck

Contents

Plot Summary

The Log from the Sea of Cortez describes a marine biology expedition carried out by John Steinbeck and his close friend, Ed Ricketts, from March 11 to April 20, 1940. The expedition leaves Monterey Bay, California, travels down the coast of Baja California and into the Sea of Cortez, then returns along the same route. Marine species are collected and recorded, along with a log of whatever is encountered along the way, including observations of marine life, navigation and weather, indigenous people inhabiting the area, and the activities of the expedition party and crew. The Log also includes discussions of philosophy, biology, spirituality, and man's place among nature, which reflect long-standing interests of Steinbeck and Ricketts.

The expedition begins in Monterey Bay, where Steinbeck and Ricketts search out a captain and sailing vessel, a crew, and provisions for their journey. Their captain is Tony, a careful man who keeps a very clean and functional ship. Tex is hired on as ship's mechanic, and Tiny and Sparky as seamen, fishermen, and cooks. After participating in a celebration in Monterey Bay to mark the end of the fishing season, the ship sails south, running night and day and stopping only to take on provisions in San Diego. They mark a change in the sea and weather south of the border, and make good time to Cabo San Lucas, where they stop to have their papers examined and visit the small cannery town. After that, they sail on into the Sea of Cortez.

The expedition sails up the western shoreline, stopping nearly every day to row the skiff to a reef or shore and collect marine organisms. Often, they preserve and label these as they are sailing to the next stop. Heading north along the coast of Baja Peninsula, they collect at Cabo San Lucas, Pulmo reef, Point Lobos on Espiritu Santo Island, El Mogote, Amortajada Bay, Marcial Reef, Puerto Escondido, Coronado Island, Concepcion Bay, San Lucas Cove, San Carlos Bay, San Francisquito Bay, and Angeles Bay. Along the way, they stop in at the port towns of La Paz, where they go to Good Friday services; Puerto Escondido, where they are invited to go big-sheep hunting; and Loreto, where they visit a ruined mission and church.

At this point, the expedition heads south again, first down along the east coast of Guardian Angel Island, then across the Sea of Cortez to Tiburon Island. During the southward part of the voyage, they collect at Puerto Refugio on Guardian Angel Island, Red Bluff Point on Tiburon Island, and Puerto San Carlos. They stop in at Guaymas and spend a few days there, where they become reacquainted with the news and other communications. South of Guaymas they meet up with a Japanese fishing fleet, which is dredging the bottom for shrimp. They go aboard and observe the fishing methods, which dredge up and destroy every other species of marine life along with the shrimp, and take representative specimens. They continue collecting at Estero de la Luna and Agiabampo estuary. They then sail back across the Sea of Cortez to their last collecting stop at Espiritu Santo Island, then around the point and back home.

On the journey, the collecting party and crew slowly develop a different sense of time and begin living their lives to the rhythm of the sea. They take every opportunity to

interact with, learn from, and observe the local Indians and their way of life. The cares of the modern world and the war are left behind, though Steinbeck often recalls them in philosophical thought. Much of their time is spent observing the sea and its inhabitants, and engaging in scientific and philosophical discussions suggested by what they see. The discussions range from simple speculation about a species' behavior or attributes, to wide-ranging philosophical debates about man's place in the natural world, ways of thinking and methods of scientific inquiry, and observations of their own behavior and the reasons for it. They return enriched by the experience and having gained a sense of a different way of living.

Unnamed section, p. 5

Unnamed section, p. 5 Summary and Analysis

The Log from the Sea of Cortez describes a marine biology expedition carried out by John Steinbeck and his close friend, Ed Ricketts, from March 11 to April 20, 1940. The expedition leaves Monterey Bay, California, travels down the coast of Baja California and into the Sea of Cortez, then returns along the same route. Marine species are collected and recorded, along with a log of whatever is encountered along the way, including observations of marine life, navigation and weather, indigenous people inhabiting the area, and the activities of the expedition party and crew. The Log also includes discussions of philosophy, biology, spirituality, and man's place among nature, which reflect long-standing interests of Steinbeck and Ricketts.

The book opens with Steinbeck lamenting the lack of information with which to plan such an expedition. He describes the books and charts available at that time, and the lack of detailed and specific information contained within them. Unlike adventurers in novels, on this expedition they prefer safety and getting the job done to encounters of a more colorful and dangerous nature. The time period of March through April is chosen for the expedition, as the Sea of Cortez is known to have dangerous storms that quiet down during that period. Steinbeck then describes the difficulty of finding a good vessel and captain, as most of those available in the area are fishing vessels, whose owners are none too eager to venture into parts unknown on a mission of dubious value (compared to fishing). He recounts how, during the voyage, World War II is raging in Europe, and yet the vessels they encounter are singularly focused on the size of their catches.

In time, an apparently reliable captain arrives in port named Tony Berry, who has experience with research expeditions. His vessel, the Western Flyer, is well-maintained and shipshape. Three crew members are signed on, the ship's charter is signed, and the provisioning of the expedition begins in earnest. Steinbeck notes that many errors they made in planning could have been avoided had earlier expeditions done a better job of listing their provisions and commenting on their adequacy. To provide a service to future persons planning such a journey, he sets out in detail the provisions they take with them, and which ones prove to be either inadequate or unnecessary. Lists are presented of the food, collecting equipment, library and reference materials, camera equipment, preservatives, preparing equipment, microscopes, and medical supplies that they take with them.

Unnamed section, p. 13

Unnamed section, p. 13 Summary and Analysis

While their vessel is being outfitted, Steinbeck and Ricketts spend time in Monterey Bay, observing the boats of the fishermen and commenting on how the boats reflect their owners. If a fishing vessel is rusting and disorderly, with paint peeling off, the owner is likely to be equally disheveled and careless. If the boat is well-cared for and lovingly maintained, the owner will also be organized, efficient, and in good shape. This leads Steinbeck to expand on his belief that a boat is beyond all other objects in its ability to capture man's soul and shape his mind. The relationship is reciprocal—the boat is a product of the man and visa versa. He then observes that there appear to be some ancestral memories at work in the building of a boat and how man responds to a boat.

Steinbeck explores the personification of a boat by man and the identification of men with their boats. Boats seem to respond with almost human moods and intelligence to circumstances they encounter at sea, and they are thought of as having personalities by their owners and crew. Steinbeck carries this analogy all the way to the destruction of a boat requiring an emotion akin to murder in the heart of the one harming the boat. This line of thinking may have been inspired by World War II, which was going on at the time and is referred to in several places in the book. This thought about the ability of a human to "murder" a boat leads to a comparison of the human species with marine species and how they are observed by scientists. While a scientist may comment on other species and how they eat, reproduce, and kill one another, the same types of observations are not made about humans. Rather, humans tend to experience each other as individuals. Hence, the opportunity to learn from the behavior of the human race as a whole is lost. Steinbeck closes the chapter by musing on whether the human race will ever forgo its murderous tendencies and live without war. His conclusion is that the record so far does not support this hypothesis or even allow it to be studied, as history has not shown a period of decades without war.

This chapter shows an ability to free-associate from the everyday experiences of the expedition to a wide-ranging series of thoughts on philosophy, mankind, biology, and history. Some elements of this discussion extend into the metaphysical, as Steinbeck explores the interrelationship between man and boat and the boat as an archetypal entity. As an author, he allows himself to wander through these thoughts, linking one to another, as if he were musing on a pier. This early, brief discussion is his first introduction to a larger theme related to the nature and purpose of science, which will be revisited later in the book. Although he sees value in simply observing the activities of biological creatures, Steinbeck would like to make greater use of such observations to understand and improve the human species.

Unnamed section, p. 17

Unnamed section, p. 17 Summary and Analysis

This chapter begins by introducing the reader to Tex, the mechanic of the crew, and Tony, the owner and captain of the Western Flyer. Born in Texas, Tex loves diesel engines and sees them as pure, logical, perfect mechanical entities. During the voyage, he lives and breathes by the sound of the engine, as if it is his own heart-beat. Tony, the captain, loves the rightness of all things and abhors wrongness. He is a serious person, not given to laughter, but occasionally to outbursts of anger if he perceives a wrong action or argument taking place. He takes no chances and prefers certainty to variables. It is easy to see from the descriptions of these two men the high regard in which Steinbeck and Ricketts hold them.

In contrast, what follows is a lengthy, emotional, and amusing outburst against the outboard motor they bring on the expedition to use with the skiff. Both in regard to the diesel engine, described positively, and the outboard motor, described negatively, there is a personification of these mechanical objects as having human personalities. In the case of Tex and his diesel engine, it is debatable whether the engine becomes more human or Tex becomes more a part of his engine. With respect to the outboard motor, however, Steinbeck ascribes numerous unpleasant, fully conscious qualities to it, which he claims are repeatedly observable—such as laziness, mind-reading, hatred of Tex, self-preservation, operating only when convenient, and untrustworthiness. He gives to the outboard motor, which he calls the Sea-Cow, both a soul and a malignant consciousness. This section is an amusing, tongue-in-cheek diatribe no doubt meant to compensate the authors for the suffering they apparently endured at the hands of this unreliable piece of equipment.

Unnamed section, p. 21

Unnamed section, p. 21 Summary and Analysis

Preparations for getting underway continue in the last few days before setting off. Larger equipment is brought aboard and last-minute provisions stowed. The vessel, expedition party, and crew take part in an annual parade of fishing vessels and a celebration marking the end of the sardine fishing season, which happens to be taking place in Monterey Bay the day before their departure. Steinbeck digresses into a discussion of their attempts to obtain permits for their collection expedition in Mexico. Because of the war, he is concerned that any soldiers they meet might not understand the nature of their equipment and the purpose of their travels. After they fail to gain any assistance from the US State Department, they find a Mexican ambassador who is unexpectedly helpful and provides them with all the documents they need.

With the boat all loaded and ready, the crew takes part in the celebration games, and everyone joins in the feast and spends their last night ashore. The next day, a stream of well-wishers stops by to take their leave, and all are toasted until the medicinal alcohol runs out. Finally, in the late afternoon, their visitors are ushered back to shore and the vessel gets underway. Steinbeck and Ricketts muse about two types of biologists—those who study dead, preserved animals (the "dry-balls") and those who study life in all its complexity. Steinbeck clearly prefers the latter type.

As the Western Flyer sails around the breakwater and south along the coast, Steinbeck makes observations about the sea life they come across. In these passages, as in many other places in the book, Steinbeck personifies the marine life he sees, and visa versa. A sea lion is a "tawny crusty old fellow" with an appointment to keep, while a biologist is likened to a starfish. All of these organisms, humans and marine life alike, are discussed as being part of a single vast system of life, with purpose and intelligence behind it. This is a recurring theme that reflects Steinbeck's view of nature and man's place in it. A long passage follows in which Steinbeck discusses sea monsters as metaphors for ancient, mysterious archetypes of the unconscious. The collective consciousness or archetypal memory is likened to the sea, and Steinbeck suggests that the sea and the moon are most likely man's strongest ancestral memories. He attributes this to the effect that tidal and marine influences may have had on the marine organisms from which all life arose.

Unnamed section, p. 31

Unnamed section, p. 31 Summary and Analysis

On the first night, the expedition party is reluctant to go below, and they stay out to look at the stars and take their turns at the helm. While the Western Flyer is traveling south to its destination, the boat sails night and day. Tony comments on the behavior of the waves, and corrects course effortlessly, anticipating all the factors that may effect their movement. The others feel some pressure when it is their turn at the wheel, especially when Tony is watching. Although he seldom corrects anyone, his deep appreciation for truth in all things requires that the course be maintained as perfectly as possible.

Steinbeck discusses all the factors that may affect one's course and ability to navigate, including waves, currents, wind, the vessel itself, and the abilities of those who sail it. Trying to keep to a true course is likened to attempting to achieve an ideal. One can attempt it, and even steer directly toward it, but there will be many course corrections along the way and the perfect trajectory is impossible to maintain. Man's search for the unchangeable ideal is presented in light of navigation, music, literature, and mathematics.

March 12

March 12 Summary and Analysis

The Western Flyer sails past Santa Barbara, where porpoises surround the vessel. Steinbeck describes their personalities and speculates on why the crew don't like to catch and eat them when they are willing to catch any other fish. He determines that it may be because they seem too human-like. The boat sails on, past Los Angeles and San Pedro. The next morning, they enter San Diego Bay, where preparations for war are being made all around them. Steinbeck relates a conversation with a military officer about whether he knows anything about the effect of his shells on the communities where they land. The officer's response reflects the unthinking, organism-like mind of the military structure, in which individual members do not make decisions or become concerned with the effects of their actions.

The expedition members refuel and fill the water tanks, take on perishable provisions, and spend the rest of the day and evening ashore. Various people stop by to find out what they are doing, wanting to participate vicariously in their adventures. The Western Flyer casts off and continues south to Mexico, where the water turns a blue color. As they sail to Point Baja, Tiny and Sparky begin fishing in earnest. Tiny and Sparky are presented almost as two halves of one person, having grown up together, gotten in trouble together, and seeming to always do the same things at the same time. When Tiny and Sparky are on watch, they pay more attention to fishing than to the sailing of the ship. As a result, the vessel often goes off-course during their watch, but they never seem to get in any serious trouble.

March 16

March 16 Summary and Analysis

The expedition reaches Magdalena Bay, where marine life is abundant. Porpoises are everywhere and sea-turtles appear. Tiny harpoons a sea-turtle, which does not die immediately, but appears to be in pain. He chops off its head, but it moves as though it is still alive. Steinbeck and Ricketts decide to dissect it to learn what they can. They find sea anemones and barnacles living on its shell, and small crabs under its tail. They open its intestinal tract and find it filled with small rock lobsters. The gullet, heart, and muscle tissue are studied. The heart and turtle meat continue to respond to stimuli long after the death of the turtle, much to Tiny's dismay. Here, Steinbeck draws a distinct contrast between Tiny's human reaction to the death of the turtle and the scientists' approach to the experience as an opportunity to learn more about the species.

The group tries to cook the turtle, but it doesn't taste good and they throw it away. Tiny refuses to catch any more turtles, but later they find a school of bonito and catch and eat those. Steinbeck and Ricketts make some attempts to photograph the bonito and other fish, as their colors are different while alive than when dead and preserved. However, they are not expert photographers and the pictures don't turn out very well. They catch a few flying fish, and notice that the porpoises have changed from the northern species to a grey, slender, long-nosed species. The water is full of life, from tiny plankton to fish to marine mammals. North of Point Lazaro, they find vast numbers of the type of rock lobsters that were eaten by the turtle, and catch some to study their swimming behavior.

March 17

March 17 Summary and Analysis

The expedition sails on toward Cabo San Lucas, at the southern tip of the Baja Peninsula, stopping only to catch specimens and fish for meals. Upon reaching the harbor in the dark of night, the Western Flyer anchors just offshore and awaits morning. In the morning, a cannery is visible along with a few houses on shore, and offshore, a rocky ridge extends from the mountains into the ocean. Steinbeck discusses a number of theories on the origin of the name "California", and in the end rejects all of them as too logical. His thesis is that names arise organically from the places themselves as much as they do from any purposeful naming of them. Steinbeck describes a little beach at Cabo San Lucas that seems perfect for pirates, and once again reveals his preoccupation with the war by mentioning modern-day pirates that use explosive projectiles to interfere with shipping.

Eventually, various Mexican officials arrive for a welcoming ceremony involving coffee, smoking, and a bit of paperwork. The expedition is impatient for the officials to leave so they can go ashore and begin collecting, as the tide is dropping. Once cleared, they take the skiff to shore and begin working. There is an abundance of interesting and beautiful marine life at the cape. Because they are interested in all the species rather than just a subset, they have to race the tide to collect as many organisms as they can. Many of the species cling to the rock and are very hard to dislodge because the currents and tides are so strong here.

Steinbeck muses on the difference between this expedition and the more leisurely collecting, observing and tabulating that was done by Darwin and other historic naturalists. Steinbeck and Ricketts only have six weeks in which to complete their entire voyage, and are also constrained by the tides. So, they must rush around collecting specimens without much time to observe them. They may have a few hours at a location in which Darwin would have spent weeks. Steinbeck is nostalgic for the idea of such an expedition, while also believing it to be too romantic and impractical for the modern world, as all things move at a faster pace now.

Steinbeck describes rather humorously their attempts to collect Sally Lightfoot crabs, a particularly agile, small crab which seems to elude their every attempt at capture. Tiny makes it his particular mission to find some means of collecting them, and largely fails, though eventually they do manage to collect a few. The expedition party returns to the boat very tired and begins sorting and preserving their specimens.

Unnamed section, p. 55

Unnamed section, p. 55 Summary and Analysis

After the specimens are sorted, the expedition members go ashore and visit a local cantina in the town of San Lucas. The town has recently suffered a great flood and is in disrepair. The young men who hang about the cantina seem languid and depressed, and are not even enlivened when Steinbeck and Ricketts order drinks all around. A local liquor is offered that is reputed to be an aphrodisiac. Steinbeck and Ricketts buy some, only to have it taken away later by US Customs.

Steinbeck declares their intention of conducting "scientific" testing to determine if the liquor works, as he does not believe there is really any true aphrodisiac. He notes how many people are really interested in this subject, but pretend not to be. He also mentions that he and Ricketts were a bit concerned about how certain subjects like this might be taken if they wrote about them in this book. Historically, there was a habit among biologists to make somewhat vulgar jokes in the naming of species, using Latin to obscure their meaning. In recent years, there has been a movement to "clean up" these scientific names, which Steinbeck hopes will prove to be entirely unsuccessful. After all, he points out that species in a tidepool have pretty much two interests—staying alive and reproducing. Steinbeck suggests that humans are no better than these marine species, and therefore, the book should stand as it is.

Steinbeck and Ricketts go for a walk in the dark and come upon a little cross with a candle lighting it. This marks a place where a fisherman came home exhausted and sick, and collapsed and died not far from his home. His family has commemorated the location with this cross until a more permanent marker can be raised. This simple cross and candle seems like a memory of the soul of the man, flickering in the darkness. They return to the pier and row back to the boat, as the same sad young men watch them from the end of the pier. The chapter closes with a description of the struggle between wild pigs, vultures, and dogs on the beach for scraps and morsels of food. Once again, Steinbeck places it in the context of the war, likening the pigs to the Germans and the vultures to other powers with which they have treaties. However, it is the wild dogs that get the best of the food amidst the fighting.

March 18

March 18 Summary and Analysis

The expedition is eager to begin collecting inside the Sea of Cortez and sets sail from Cabo San Lucas. Steinbeck reflects on the various descriptions they have read of Cabo San Lucas, and how no two are alike. Each reflects the world-view and personality of the one who writes the description, even among scientists. The captain pulls into a rocky cove, where a small ranch house is visible on the shoreline, typical of several lonely houses they encounter on their voyage. Two men and a woman paddle their canoe out to the boat and do a little trading and a little talking, but mostly they just watch as the expedition goes about its business. Steinbeck notices how the indigenous people's sense of time seems different from their own, and how they seem to be much more a part of the place in which they live.

The collecting party gets into the skiff and rows out to a reef to gather specimens. Collecting is made hazardous by the poisonous spines of the worms, sharp barnacles and coral, and other creatures that bite and sting. There is a profuse array of life living on and among the coral, some of which is only found when the coral pieces are left to sit in water and broken apart. The organisms here are more delicate, being relatively protected from waves and weather. The skiff's outboard motor, nick-named the Sea-Cow, continues to act up. Tex tries to fix it, and finds that it runs perfectly when placed in water on board, but not in the actual ocean. This fuels the suspicions of the men that the motor is intentionally not running. With the number of specimens that have been collected, the men find that they have not packed nearly enough small containers.

As the ship sails on, Steinbeck notes a peculiar mirage of the coastline, which makes it difficult to tell whether islands are connected to land, and which changes as they sail past. This visual distortion particularly bothers the captain, Tony, who likes things to be precise and orderly. The Western Flyer prepares to anchor, but a wind rises and Tony decides to take advantage of it and sail to Pescadero Point. After cooking a skipjack for dinner, everyone else confronts Tex about how he has been managing to avoid ever doing the dishes by claiming that he is needed in the engine room. When he continues to claim innocence, all the dirty dishes are taken and piled in his bunk, after which he reluctantly does his share.

Steinbeck describes how, when collecting specimens from a tide-pool, at first everything is exciting and filled with color and life. After several hours of collecting, one's focus narrows to the immediate area, or one animal at a time, and the whole experience becomes more mechanical. He wonders whether this is what happens to scientists over time, and if this is why some seem to dry up and lack enthusiasm over time. He suggests that this may be why these elder scientists attack seemingly minor errors or details, rather than experiencing the joy of the whole effort. This continues one of Steinbeck's themes throughout the book on the "right" kind of science and scientists.

Although he does admit that the big-picture and detail-oriented scientists may create a better product between them, it is clear where his sympathies lie.

Continuing on in a philosophical vein, Steinbeck wonders whether the defining trait of man is hope—hope that the future will be better than today. Mankind is also the only species that changes his surroundings so intensely, simply because he can. He is the only species that values abstract concepts such as power, wealth, and influence. Steinbeck suggests that these could be considered mutations when compared to other species, which may very well be the downfall of the human race in the long run. Once again, he brings up the war as an example of how money is being spent on destruction rather than on the basic needs of food, clothing, and shelter. Mankind seems to see itself as progressing inexorably to a place among the gods or, as Steinbeck suggests, into extinction. Steinbeck closes this chapter with a reflection on how strange it is to be in a place where there is not a single sound or sign of man, only the sounds of the waves and fish jumping around them as they prepare for sleep.

March 20

March 20 Summary and Analysis

The vessel travels to Espiritu Santo Island as their next collecting stop. This is an area with sandy beaches and large rocks resting on the sand, under which there may be interesting creatures. Everyone except Tony goes ashore to help with the collecting, and they find many interesting sea cucumbers and brittle-stars. At this point, their specimen bottles are starting to fill up, so if they have seen a species before, they begin just noting it in the log rather than continuing to collect it. Steinbeck spends some time wondering why some species seem to dominate certain areas and whether it is some inherent characteristic of the area or the species, or whether it is by chance—such as which species got there first this year.

He then likens this struggle for dominance to that of humans trying to claim a certain area for themselves. He notes how, once a family or group becomes wealthy, secure, and powerful, it tends to decline in strength and becomes weak and complacent. It is those who are cast out, who have to struggle to live, who eventually become strong and able to overthrow the rich. In this manner, one group never stays in power for very long and there is a natural cycle of dominance. Steinbeck points out that it is our good qualities that do not necessarily lend themselves to prospering, while our bad qualities, such as greed, ruthlessness, and cruelty, enable an individual's survival. He feels that the human race suffers under this paradox due to our consciousness of good and evil. In a lower organism, self-interest and a survival instinct would be considered a strong trait.

Some Indians come to visit in a dugout canoe, and stay long into the night to drink, tell stories, and discuss politics. Steinbeck notes how their lives seem relatively simple, timeless, and happy. He feels that northern cultures are driven by needless complexity, always wanting or needing more, and not having clear aims. This leads to apparently useless pastimes such as sports and games, whose real purpose is to relieve the complicated nature of one's life and, for a time, enjoy the simplicity of the game. Steinbeck gives the example of a straight-forward Mexican bribe, which produces immediate satisfaction all around, compared with the western system of influences and favors, which is complicated, subtle, and cumbersome. The group tries to decide how to explain their mission to the Mexicans, and eventually settle on telling everyone that they are collecting curios which will fetch a good price back home, as no one will believe they are just looking at useless animals out of general scientific interest.

The expedition next sets out for La Paz, which is only a short sail away. They have heard much about this city and are eager to see it. The channel is full of shifting shoals of sand, and they must wait at the entrance of the harbor for a pilot boat. Everyone has done their laundry and is arrayed in their very best, and the ship has been cleaned and tidied for their entrance into the port. Upon arrival, the harbormaster finds their papers so impressive that he assigns them a bodyguard, which proves to be useful, as throngs

of small boys follow their every move. Tiny, Sparky, and Tex disappear into town, and an agent gives them recommendations on shops and restaurants.

Steinbeck and Ricketts head to the beach at low tide, hoping to find some new specimens. Small boys soon gather, curious about what they are doing. Soon, the boys are enlisted in helping to gather specimens for a payment of a few centavos. After word spreads, the party is deluged by live specimens of all types from boys all over town. Steinbeck comments on a couple of the boys, including one who seems to know how to make himself indispensable and will surely become rich someday, and another who has been forced to beg by his father but resents it greatly.

March 22

March 22 Summary and Analysis

On Good Friday, the members of the expedition put on their good clothes and go to services in an old church in La Paz. The church is dark, and filled with old women and small children. A choir of young boys sing, followed by a fiery sermon by a young priest. Leaving the church, the town is unusually quiet. The services produce a reverie about the poverty and humility of man, without which, man would not be what he is. These sufferings bring men together in a community more than when they are well-fed and free from distress.

On the way back to the boat, the group hears the sound of chickens over a wall and tries to buy some for dinner. The owner agrees to sell a couple, but they must catch the chickens first. This proves to be difficult, and many of the passers-by and small boys of the town are enlisted to help, as the chickens elude every attempt at capture. Finally, through sheer exhaustion, they are caught and taken back to the ship, where Tiny reluctantly kills and cooks them. They are a bit tough and not good eating.

A boy named Raul offers to take Steinbeck and Ricketts in his canoe to a tide-flat visible from the boat for collecting. He knows the Spanish names for many of the species they encounter and helps with the collecting. A wide variety of new organisms are collected, and there is a mangrove forest above the sand that provides a new habitat to explore. It does not seem very pleasant, as it smells bad, and all the creatures there seem be skulking among the roots looking for a chance to ambush each other. All in all, though, the day is satisfying from a collection standpoint. Raul has been using a harpoon typical of the locals, and they purchase it from him.

When they return, there are many local boys waiting with specimens, which Steinbeck and Ricketts sort through to buy what is useful. There is a soldier affectionately keeping all the boys in line and preventing them from causing mischief or trying to cheat the collectors. One of the boys has a species of the puffer family, which is very poisonous. The boy does not sell it, but instead says he has another buyer for it. Steinbeck provides a long discussion of the various fish of the puffer family and what has been written about them, including many accounts of locals and foreigners alike eating the fish and suffering paralytic poisoning as a result. Steinbeck wonders whether the fish developed poison because it is slow and has few other defenses, or whether the fish was able to become slow and listless because it was poisonous and predators would not eat it.

Tiny returns to the boat with a few specimens, which are typically unremarkable but representative of the more common species in the area. The party goes walking in the town to take their leave, as they will sail in the morning. The town feels strangely familiar and they at home in it, as if it were known to them for much of their lives. The

Gulf works like a dream or mirage on their minds and those of other travelers, always calling its visitors back to it.

March 23

March 23 Summary and Analysis

In the morning, the Western Flyer sails to San Jose Island, where they had planned their next collecting stop. However, the island appears blackened and with little life from a distance. When they go ashore, they find that this impression is accurate and there is not much of interest to collect. Even the approach is difficult, and in spite of much coaxing and flattery, the Sea-Cow refuses to cooperate. The shoreline is rocky and difficult to approach. When they land, they find that the natives must be smoking meat on the island, as they find fire-rings, fuel, clam- and turtle-shells, and piles of turtle meat. There is no indication of why this island has been chosen for this activity, as it is not convenient nor are any of the raw materials available near the beach.

Angry at the Sea-Cow for not helping, the group rows back to the boat and asks Tex to take it entirely apart and put it back together from scratch, hoping to make it finally run. He does so, and this once, it seems to be working, even in the water. The group takes heart that it may now run in the future. To top off a strange and difficult day, biting flies descend on them in the evening, causing much discomfort. Since they are unable to sleep, Tiny tells stories about his past which are too racy to be repeated in the book, for fear of the reactions of certain of Steinbeck's readers.

March 24, Easter Sunday

March 24, Easter Sunday Summary and Analysis

On Easter Sunday morning, Steinbeck and Ricketts find themselves on a yellow sand beach on a lagoon ringed with mangroves, and spend a lazy day swimming, wading, and admiring its beauty. Rather than spending much time collecting, they let their minds wander to the church in La Paz, the meaning of the day, and philosophical speculation. They consider two ways of thinking—one which aims to improve the lot of poor and unemployed people overall, and one which looks more broadly at the larger system of society, realizing that there is only employment for seventy percent of the people, no matter how you may strive to help a particular one. So, if one is helped, another must fall as the overall balance is maintained.

Similarly, an example is given of the sea-hare, a marine creature that lays millions of eggs, of which only a few survive. Steinbeck imagines the sea-hare telling its offspring to work hard and strive, so that they may grow up into a fine specimen like their parent. How ridiculous that would be, under the circumstances, as only a few can survive and none could predict which those would be. These two examples are given as an introduction to a long discourse about teleological and non-teleological thinking. Teleological thinking concerns itself with finding a specific cause and effect, and in laying out how things should be. Non-teleological thinking attempts to look at the larger whole and simply understand and evaluate what is. Patterns may exist, but they are only a small part of a larger whole, which is more valuable to understand.

Three examples are given to more specifically illustrate what is meant by teleological and non-teleological thinking: First, why some men are taller than others; second, why some matches are larger than others; and third, the meaning of leadership. This last is perhaps the most interesting of the three. Leadership in a teleological sense is one man having certain qualities that cause other men to follow him. In a non-teleological sense, leaders are simply those who express most directly the tendency that the rest of society is moving towards, and therefore they represent the entire movement. The authors make a further distinction between physical teleology, which relates to material matters and bodily health, and spiritual teleology, which looks for cause and effect in the emotional or spiritual realm.

An example is given of a whistle being blown just before explosions at a mine, to warn neighboring residents. Teleological thinking, for those who can see only part of the pattern, could lead one to conclude that the blowing of the whistle causes the explosion. A non-teleological thinker would explore the interrelationships between the activities at the mine and come to understand that both are part of a larger pattern of excavation, which in turn is part of a larger pattern of commerce, and so on. While this approach may lead to a seemingly endless set of inquiries, at least it is less likely to result in incorrect or partial conclusions. For example, this thinker will correctly conclude that the blowing of the whistle comes before the explosion, but does not cause it.

To the extent that non-teleological thinking ever results in a more definite answer, it tends to be in a situation such as the sciences, where a pattern can become known in a relatively complete way, at least until the next major breakthrough occurs. The previously understood answer will then be found to be a subset of the new understanding, such as when Newtonian mechanics gave way to quantum physics. One of the greatest concerns the authors present with teleological thinking is that is constricts a person emotionally to believing in a particular absolute conclusion, without leaving room for contrary information or changes in understanding of the larger picture over time.

The authors suggest that most people are not comfortable with non-teleological thinking, and prefer absolutes and clear answers that relate cause and effect, even if wrong or incomplete. These people may view teleological thinking as hard-hearted, for example, with respect to the unemployed percentage of people discussed at the beginning of the chapter. However, an example is given of how accepting what is may be a kinder course of action than trying to force an emotionally distraught person to face the irrationality of her fears. The fears themselves are what is, and this is at least as important as whether they should exist, at least in terms of caring for the person.

The authors draw a connection between non-teleological thinking and some metaphysical, mystical, and philosophical treatises that consider opposites to be united as part of a larger whole. Yet, they also indicate that this approach should not be thought of as mystical, any more than quantum physics or higher mathematics are considered as such because they use concepts like infinity. The most basic meaning of the pattern is described as "it's so because it's so" or, something is because it is. While this could also be said in a superficial way, it is not meant that way here, but as a deep understanding of reality and the relationships of the parts to the whole.

This chapter is one of the most-cited and discussed chapters of this book, and yet it is very different from the rest. Most of it comes from an essay that Ricketts wrote years before the voyage, which Steinbeck inserts into this point in the narrative. The difference in writing style can be seen very clearly as Ricketts's arguments are laid out by means of numbered examples and logical discussions, include terms and concepts from physics and mathematics, and are both more abstract and more direct than Steinbeck's usual approach. It is not known why Steinbeck may have added this essay in just here, but it does represent a theme that Steinbeck returns to often throughout the book. The concept is that biology should be approached with an eye toward how each individual part fits into the larger whole of nature and not just as an enumeration of individual parts. Also, Steinbeck frequently relates marine organisms to men and visa versa, and clearly thinks of both as equally representative of a larger pattern.

Unnamed section - p. 126

Unnamed section - p. 126 Summary and Analysis

Around noon on Easter Sunday, the ship sails out of the lagoon and to the next collecting stop south of Marcial Point. The tide does not go very low and it is difficult to collect much of interest. That night, they collect many invertebrates by placing a light near the surface of the water and catching what the light attracts. The next tide is not at a good time, so Steinbeck and Ricketts go ashore before dawn to do night collecting with flashlights. One large and beautiful lobster is found and taken. Steinbeck enumerates a wide variety of other species collected on this reef and how some species, like sea cucumbers, are much more active at night. There are also a great many invertebrates, which the crew calls "bugs". This morning the sea is very smooth, making the labeling and sorting easier as they sail to their next destination. On the way, they catch skipjack and Mexican sierra to eat, and Steinbeck proclaims the Mexican sierra to be the most delicious of all the fish they eat.

March 25

March 25 Summary and Analysis

At mid-day, the Western Flyer arrives at Puerto Escondido, a beautiful mangrove-ringed lagoon with an interior channel to the town. The channel is shallow enough that the captain decides to anchor outside of it. The group does some fishing and collecting of specimens, and has a particularly difficult time handling a sea-cucumber with a habit of expelling its insides when taken out of water. A ten-foot manta ray frightens Tiny as he is rowing around in the skiff by swimming quickly and directly under his boat, which the ray could have flipped with its wings. Some coastal Indians come up in a canoe selling sea-scallops, clams, pearl oysters, and conchs. Steinbeck comments on how if a species is edible or dangerous, all the locals know where to find it, but other species might as well be invisible.

A rowboat arrives with a working motor, which is immediate perceived as being of a different species from the Sea-Cow, since it obeys its owners. In it are several local ranchers and vacationers, who invite Steinbeck and Ricketts on a big-sheep hunting expedition. They accept because they want to see the countryside. The ranch gets its water from deep underground, and grows tomatoes and grapes. The men set out on an expedition to the mountains on mules and horses, with their Indian guides walking. Along the way, they learn something of the local plant life. After climbing a steep trail, they reach a pretty area high in the mountains with a little stream and pools, palm trees, and a place to rest. Here they set up camp and the Mexicans tell racy stories and jokes in Spanish late into the night, which Steinbeck and Ricketts are unable to fully understand.

In the morning, the Indians set off to do the actual hunting, while the rest of the hunting party enjoys the day. Steinbeck and Ricketts rather like this approach, as they did not particularly want to kill anything anyway. Their hosts describe what they know of the United States, which is overly idealistic, but their guests do not want to disappoint them by correcting them. Steinbeck and Ricketts enjoy the day, and wonder how the water-loving creatures of the area found this place when there is no other water for miles around. Again, the concept is expressed that is laid out in the previous chapter, "it is so because it is so". There is almost no point in asking why, because it will only lead to a much larger body of questions that they cannot answer. Eventually, the Indians return, having found only some sheep droppings, but not the sheep themselves. Ricketts and Steinbeck are just as happy that no sheep have been shot.

Returning to the vessel, Sparky fixes a large meal of spaghetti for dinner. At this point, patterns in their collecting are starting to become apparent, such as certain species that are everywhere, including a stinging worm that is Tiny's particular enemy. Purple-spined sea urchins, anemones, barnacles, limpets, porcelain and hermit crabs, and sea cucumbers are among the most common species. Steinbeck comments on the large number and variety of species they have already collected, and finds himself surprised

at the larger expeditions that have gone before them and the comparatively few species they collected. Because even this expedition feels somewhat rushed, Steinbeck imagines that there is still a great deal to be discovered after they have come and gone.

March 27

March 27 Summary and Analysis

Early in the morning, the collecting party sets off in the skiff to the inner bay at Puerto Escondido to do some collecting. At first it is dark, and near dawn they see some civet-like animals near the shoreline, which disappear into the mangroves. Near the entrance to the bay, the ocean water mingles with the bay water and the number and variety of specimens increases greatly due to the wide variety of habitats and niches there. Steinbeck mentions again how painful it is to collect in the Sea of Cortez because of the many stinging, cutting, spiny, biting species there. One sea-anemone stings them very badly here. However, this one location provides a good cross-section of the species they have seen so far.

Afterwards, the boat sails for the port city of Laredo, where they are eager to see a famous church and its associated mission. They wait for some time at the entrance to the harbor for the officials to find their uniforms and sail out to greet them. Upon going ashore, the expedition members serve as a source of merriment to the local girls, and the older women have to apologize for their giggling. A small boy acts as a guide to the town and takes them to the mission, which has fallen into disrepair. There are paintings in a small intact chapel that they wish to look at more closely, but there are bars in the way. They visit the shrine of Our Lady of Laredo, and feel that she is the heart of the town, in spite of the church being ruined.

The vessel resupplies, and then they sail north to Coronado Island, catching fish along the way. Here, they turn over stones and painstakingly try to dislodge coral specimens without breaking them, which proves to be very difficult. Steinbeck and Ricketts notice several species that appear to be similar to species in Monterey Bay, and later find that they are actually the same. At this, Steinbeck speculates on a division they are noticing between tropical species south of this point and coldwater species north of this point, which are similar to those they are familiar with along the coast. They debate how these more northerly species got here originally, and discuss several theories that have been published. At last, they settle on one developed by a paleontologist in preference to one developed by a biologist, and remark how strange it is that someone from another field might provide the information needed to solve their puzzle. This is given as an example of how a more holistic approach to science is useful.

Steinbeck laments how a good hypothesis (such as that of the biologist) can blind a person to alternative theories and even to actual data that could disprove it. He gives an example of a prominent university who proclaims a species extinct, ignoring information provided by residents that the species in question is alive and well on the local beach. He then draws an analogy to the area of law, which some believe can cause things to happen or prevent them from happening, but which he believes only reflects what most people already think should happen. The persistence of beliefs of the mind over actual reality is further illustrated by an entertaining story the crew makes up one night about

another crew member. They tell themselves that as the full moon approaches he will turn into a werewolf, and make up all kinds of examples of how his behavior fits the pattern. Then, he frightens them all as he comes in from his watch with wild hair and red eyes, because they have been busy entertaining themselves with this notion.

March 28

March 28 Summary and Analysis

After having worked very hard collecting the last few days, everyone sleeps in this morning. Steinbeck gives a defense of relaxation and laziness as a positive process that allows for greater enjoyment of life and the rejuvenation needed for more focused effort later on. He provides examples of nervous make-work for the sake of activity, ranging from obsessive-compulsive behavior to people starting wars. With this rationalization in hand, they enjoy their leisure until nine am, when the Western Flyer gets underway once again, sailing toward Concepcion Bay. Schools of tuna and swordfish leap all around them, and they are successful in catching many tuna, but not the swordfish.

The come within sight of Mulege, which they have heard has unfair port fees and malaria, so even though it looks enticing, they don't stop in there. Along Concepcion Bay, there is a peninsula which is their next collecting stop. Here there are very beautiful snail shells in the thousands, which Sparky collects to keep and give to his friends back home. Steinbeck listens the call of the dove, which seems to arouse a great longing and sadness. He wonders about innate senses of hearing and smell which must be ingrained in man's psyche, even when a particular man has not encountered that smell or sound before.

Here the cooler they brought along is beginning to have trouble, because the temperature on the deck is so hot, and they are also out of ice. After dinner, they again put a light in the water and collect interesting fish, including flying fish, transparent fish, and snake-like eels. By putting baited crab-pots on the bottom, they collect aggressive spiny sea urchins and snails with eyes on stalks. It seems to Steinbeck and Ricketts that any available food or decomposing bodies would be instantly eaten with these creatures around. They keenly wish they had brought a full-size aquarium into which they could place interesting species and observe their interactions and activities over time. An example of some observations they had made in Monterey is given of sea anemones and their feeding habits. Now there are some things about the behavior of the species being collected that they will never know, not having enough time to observe them in their native habitat or create controlled experiments of their behavior.

March 29

March 29 Summary and Analysis

At this point in the voyage, the tide chart is no longer usable, as the tide takes a long time to run up into the Sea of Cortez and they have not been able to revise the chart with their short stops in each place. They start using a marked stick to watch the rise and fall of the tide and indicate when they should begin collecting. A beautiful day dawns on Concepcion Bay, and the time is right for collection about ten in the morning. The shoreline seems much like Puget Sound in Washington State, with a rocky area above and sand below and groves of algae below low tide. There are many crabs, shrimp, conchs, and limpets to collect.

Around noon, the Western Flyer gets underway and heads for San Lucas Cove, while the preserving and labeling of the specimens continues. They pass Mulege and continue on for the day. Tex is gaining weight on the voyage and everyone decides to put him on a diet since he is getting married when he returns. He suffers through the diet for only three days, finding it an excruciating experience, yet manages to actually gain a few pounds by sneaking food at every opportunity.

At about five pm, San Lucas is reached and the expedition makes anchor at the entrance to a salt-water lagoon that is too shallow to enter. There are also biting bugs closer to shore, which encourages them to anchor further from shore. In the evening, a shark circles around the boat, which they scare off with a pistol shot. They do more night fishing, and Tiny and Sparky devise a way to catch flying fish by one of them prodding a fish to fly into the other's net. Everyone stays up late drinking and trying to remember cures for a hangover, one of which involves snails and shrimps. They decide that general protein and alcohol will do, and employ fried fish and whiskey. Although the medicinal whiskey was emptied as part of the celebrations on leaving port in Monterey, it appears that several members of the expedition have brought personal stores "just in case", so that they are more than adequately provided for.

March 30

March 30 Summary and Analysis

In the morning, the tide is out and the party begins collecting. There are many different kinds of crabs and clams, some of which are eaten locally. These species seem to have a greater tolerance for freshwater than most marine species, which may be because they live in a lagoon where the salinity varies. After this collection is finished, they sail for San Carlos Bay, near Santa Rosalia. Feeling pressed for time, they do not stop in Santa Rosalia, although Sparky and Tiny are always anxious to spend time in the towns. Santa Rosalia is a mining town built by a French company, and looks very different from others they have seen. The vessel anchors near San Carlos Bay, which has an inner lagoon at which they hope to collect some new species. It is covered with seaweed and sandhoppers, which they try to collect, although with little success.

March 31

March 31 Summary and Analysis

In the morning, the low tide is quite high and the wind is up, making it difficult to collect onshore or underwater. Instead, they carefully survey the upper zone of the beach, and Steinbeck provides a summary of which species have been found to be most common in their travels so far. Rather than the rare species, Steinbeck notes that they are more interested in the common species and beyond that, the interrelationships between species and their habitats. They are especially interested in species that live symbiotically—his term is commensally. He gives a number of reasons why species might do this, including not eating each other and/or eating the same kinds of food, thriving under similar environmental conditions, protecting each other in some way, and dividing up the tasks of daily life.

As the party sails northward in the Sea of Cortez, they see fewer people and signs of human life. Every now and then evidence of fishing and cooking activities are encountered, but otherwise it is mostly quiet. Not much changes, and the pace of life is tied to the seasons and the ocean. Steinbeck believes it would be hard to convince the local Indians that very much about the northern way of life is worthwhile. Most of what we take for granted as daily activities may appear frantic, complicated, and mostly unnecessary. Seen in this light, even the science that the party is doing may seem unnecessary and without purpose. Steinbeck eventually realizes that the real reason they are doing it is because they enjoy it and the creatures are beautiful and fascinating.

Life on the Western Flyer has become more casual, as most everyone is wearing only hats and shorts. They are eating mainly fish and biscuits, except when Sparky makes spaghetti on Sundays and Thursdays, and drinking large amounts of coffee. Someone makes lemon pies, but everyone fights over them so much that they decide not to make any more of them. All the cares of the civilized world have dropped away, and they are living in the moment, surrounded by the sea in all its infinite detail.

Early in the evening, they lay anchor at San Francisquito Bay, their next collecting stop. Here on a lagoon there is a little Indian house with a canoe, which seems deserted. The party collects on the other side of the bay so as not to intrude, but the weather is cold and unpleasant. Rather than stay ashore long, they return to the boat and lower some nets to the bottom to see what might be collected there. Upon pulling them up, they find a large shark hanging on to the bottom. This shark is left on the deck to die so that they can preserve it, but it breathes very slowly and refuses to die all night long. Tiny and Sparky find this very disagreeable and unnatural, and finally Steinbeck and Ricketts have to put it in formaldehyde in the morning. Steinbeck speculates that perhaps this is an ability that has developed in solitary fish that could get stranded for many hours at high tide, whereas in schooling fish the ability to swim and leap quickly away from predators is more important.

Steinbeck comments further on the idea of fish in schools, likening this to humans in collectivized nations or the effects of universities or factories on young men. The fast and the slow are weeded out, in order to produce a uniform speed of manufacture, or a uniform way of thinking, dressing, and behaving. He points out that schools of fish rely on rapid reproduction to sustain the species, and wryly comments that in societies undergoing collectivization, one of the first calls is always for population growth. On the theme of common versus rare, he notes that although they intended to focus on the most common assemblages, they happen to be collecting quite a few rare species, at least fifty unknown to science by the most recent count. However, it is the common species that are of the greatest importance, for if a species like plankton were to disappear, the food base of the entire ocean would be lost. Once again he draws out the theme of the interconnectedness of nature, including man's place in it, and how important it is to understand that we are all one thing. In his view, this is and has been the most important discovery of both religion and science throughout the ages.

April 1

April 1 Summary and Analysis

Next, the Western Flyer sails for Angeles Bay, their last collecting stop on the west side of the Gulf. They have been having trouble with their camera equipment, especially the motion picture equipment, so they decide to get it all out and really figure out what to do with it. This produces a great argument among the entire party on board, and in the commotion, pictures are still not taken. Their photography efforts are so poor over the life of the expedition that the laboratory back home decides to use their footage as a primary example of what not to do with a camera, as they have done just about everything wrong as is possible to do. Steinbeck makes this very funny, but there is a definite sense of helplessness with this new technology.

As they pull into Angeles Bay, it appears there is an unknown settlement here with an airstrip, and a very odd sense of something strange going on. There are both Mexicans and Americans here, who claim to be fishing, but seem overly interested in what the expedition is doing here and when they will leave. The Mexicans go about pretending to fish while the party is collecting. Later that day, a disreputable-looking schooner appears and anchors quietly on the other side of the bay. The group continues to collect in various different habitats, generally trying to avoid trouble but wondering what is going on. The Western Flyer stays the night, with everyone feeling as though they are interfering with some illicit activity, and then they get underway in the morning.

April 2

April 2 Summary and Analysis

In the morning, the Western Flyer sails south to Puerto Refugio, a bay along the east coast of Guardian Angel Island. The island is desolate and inhabited only by rattlesnakes, with tall mountains, rocky shores, and strong tides. In the late afternoon, the collecting party takes the skiff to shore, where there is much flotsam and debris and skeletons of various birds, fish, and mammals littering the shoreline. However, there is no evidence of humans. Walking around the point, they find an area with abundant tidepools and spend some time collecting there. The water is cold, the waves strong, and the beach rocky, creating a high-energy environment and abundant marine life. Steinbeck believes this challenging environment creates stronger and healthier species, and makes an analogy to troops that are constantly faced with challenges as opposed to those who live an easy life. One is honed by their experiences and the other grows undisciplined and bored, and easier to overcome in battle.

The island is mysterious, and there are many rumors about it. Everyone wishes they could return someday and explore it further, inland as well as coastal areas. Being so remote and desolate, they could believe almost any fanciful stories about it unless proved untrue. However, the crew is getting anxious to return to civilization, having been deprived of the pleasures of town for so long. Tiny and Sparky especially enjoy the favors of the locals, which Tex is prohibited from, being engaged. Tony is more interested in the problems of navigation and anchorage than exploring the towns. Steinbeck is careful not to mention it too much for fear of alienating a certain portion of his readers, but he states euphemistically how interested they are in maintaining the "physical" health of their crew, and makes numerous references through the book to a strong libido being a healthy and positive part of a biologist's (or crew-member's) personality.

April 3

April 3 Summary and Analysis

On this day they sail southward along the coast of Guardian Angel Island, encountering schools of jellyfishes that cannot be easily netted or preserved. Steinbeck discusses the Seri Indians, which have been rumored to be cannibals, though no proof of this has ever been found. He goes on rather tongue-in-cheek about how, if other societal restrictions were removed, man might easily overcome any other objections to such food. He discusses the history of the Seris, who have been violent toward other tribes and visitors (though not cannibals). However, try as they might, they don't see any of the local Indians onshore.

At the island of Tiburon, they stop to collect on a reef and rocky shoreline, where there are many different kinds of habitats and species present. Tiny spends his time taking the skiff into little inlets to harpoon sting-rays. At night, they collect a number of barracudas that come to feed on the fish attracted to their light. Just at dusk, by a strange turn of events, Sparky accidentally harpoons a bat, which causes much boasting and teasing later on. The party discusses the strange prejudices that seamen have about sailing and sailing literature while they wash their shirts in preparation for reaching the town of Guaymas. Here is possibly the only mention of Steinbeck's wife, who was on board though never referenced directly—as an example of a prejudice seamen have against mentioning a woman on board who is always someone's wife (she may also have been the one making the lemon pies).

April 22

April 22 Summary and Analysis

The Western Flyer sails south the entire day, and toward the end of the day begins to see fishing boats from the town of Guaymas. Along the way, the crew catches fish for eating and does repairs. Near Guaymas, the fishermen seem entirely too spotless in their white outfits, and the crew feels some contempt as a result of being a bit dingy and salt-encrusted. As it is late in the day, the port fees will be high and so they chose not to go in that night, but to anchor in a nearby bay and do some collecting. Though there is not much on the beach of interest, just after dark a large school of tiny fish come in and make a hissing noise in the water all around them. Tiny and Sparky catch and fry great numbers of them, and they are very tasty, each eaten in a single bite. The seemingly millions of fish in the water cause Steinbeck to speculate on schooling behavior. For example, how do they decide when to turn? Are the ones on the outside considered sacrificial food for predators so that the main school can live? It seems to him as if the behavior of the school is better understood if it is thought of as a single entity, than if one tries to understand the behavior of a single fish within the school. [Note: the actual date of these events is almost certainly April 4, as the Western Flyer returns to port in Monterey on April 20.]

April 5

April 5 Summary and Analysis

In the morning, the Western Flyer sails into the port at Guaymas. This is a large city that is bustling with news of the war, politics, and other topics the expedition party has been living entirely away from for some time. Rather than welcoming it, the group finds that this is more of an intrusion into the life they have been leading, blissfully free of such distractions. They begin to feel the end of the expedition weighing on them. Only Tex and Tony are at all anxious to return; the rest of them wish to stay, but the charter is of a fixed length so there is no choice. Steinbeck feels that they have received many great gifts in the Sea of Cortez, most notably a way of seeing life, time, and beauty that is different from anything they have previously experienced. He feels there has been some grand exchange, that this place has become part of them and they a part of this place. Guaymas seems different to Steinbeck than the other towns they have been in, somehow outside the Sea of Cortez experience, with its focus on news, business, and tourism. They do many things in town, but Steinbeck does not care to mention them.

April 8

April 8 Summary and Analysis

After several days in Guaymas, the Western Flyer is piloted back out into the Gulf again. They sail only a short ways and drop anchor, listlessly catching and eating a few fish for dinner. Everyone feels a bit gloomy for various reasons, some wanting to stay and some wanting to get on to the end. Early in the morning, they are woken up by fishermen heading out to work, complaining about the Japanese trawlers that are taking all the shrimp. It is an unpleasantly hot and humid day, and they decide to find the Japanese fishing fleet to see what is happening. Only about an hour south they come upon the Japanese processing ship as well as the smaller ships that do the fishing by dredging the bottom. Steinbeck wonders why the Mexican government would allow this total destruction of food and fisheries resources.

Steinbeck and Ricketts decide to go aboard one of the dredge boats. Once their papers are examined and the purpose of their expedition known, they are welcomed aboard to watch as the dredge hauls come in. The Japanese keep only the shrimp, while all the other fish are thrown overboard, where they are dying and eaten by gulls and other fish. Steinbeck and Ricketts are shocked by the waste of food, although they like the crew members they meet. They receive permission to collect representatives of each species to take with them, and the crew brings them rarities they had found during the dredging, such as sea-horses. Steinbeck discusses the waste of food resources for some time, and gives the United States' destruction of its own natural resources as a bad example which the Mexican government ought not to follow. He cannot understand why the Mexicans would allow foreign fishermen to take their national resources.

After this stop, the Western Flyer sails south to Estero de la Luna, where there is an inland sea that may be interesting for collecting. On the way, Tiny decides he wants to hunt giant manta rays with harpoons that he and Tex rig up. However, he is continually unsuccessful as they always sound and break the lines. Tony anchors the vessel near the lagoon in the evening, and there they spend a strange and restless night. In the morning, Steinbeck and Ricketts take the skiff to shore for collecting. On they way, they are lost in the fog and become convinced that a storm is rising. Badly frightened, they end up landing not far from where they planned, and continue with their collecting. They meet some unfriendly Indians and find the beaches to be unproductive. Not wanting to stay here, they returned after a short time to the boat.

Steinbeck feels that this was not a friendly place, and wonders if there can be some kind of signal, scent, or other indication that gives a person a "feeling" that a certain place is good or bad. Some places seem to give off a certain mood to all that encounter them. Steinbeck suggests that the products of our minds are too often discounted when it comes to factual reality. He and Ricketts have had many discussions on board and at other times about how to understand the different ways of thinking and the best way of receiving another's ideas. He gives examples of some men who are so fixed in their

thinking that they violently criticize the smallest things, such as a punctuation mistake, rather than face the possibility that there may be new evidence proving them wrong. He feels that the best kind of receptivity is one in which a man listens, tries to understand the idea without any limitations, and only then thinks about it analytically and critically, bringing his own ideas and experiences into play.

Some feel that ideas can be dangerous. Steinbeck believes they can only be dangerous when given the wrong kind of situation in which to grow. He gives as an example communism, which requires the discontent and oppression of workers to appear desirable to them. If the root causes are addressed, the idea itself will be seen as it is and will no longer be dangerous. Turning as he so often does from philosophical discussion to factual detail, Steinbeck reports that they then sail all day down an uncharted coastline toward their last planned stop, and anchor offshore as night falls.

April 11

April 11 Summary and Analysis

At mid-morning, the vessel heads toward the mouth of the Agiabampo estuary. Steinbeck, Ricketts, Tiny, Sparky, and Tex head ashore to do some collecting. However, there are not many organisms here other than puffer fish, various crabs, conchs, and eel-grass. Sea-birds are feeding in great numbers on sand-worms. The group decides to head back to the boat and they begin their sail back across the Sea of Cortez toward home. That night, as they are sailing, the group has a spirited discussion of the waste of fish by the Japanese. Tiny, as a fishermen, is enraged by it. As biologists and philosophers, Steinbeck and Ricketts present an alternate point of view—the fish thrown overboard are not wasted, but eaten by the gulls, other fish, and invertebrates. All of it is part of one big cycle of life. If everything is seen as part of the larger whole, then nothing can be wasted; all energy goes somewhere. This contrasts with Steinbeck's earlier, more practical sentiments about the waste of food resources.

Steinbeck sees the history of the human race not as a linear progression, but as a series of bursts of nervous energy, which the people of the time do not understand. He gives as an example the current war, stating that in a hundred years, it may be seen as not going in the direction that people now think, or not having the intended result. There seems to be a cycle in civilization of organization followed by dissolution that repeats itself over and over. Perhaps if this cycle could be studied, the purpose of the type of destructiveness associated with war, as well as the purpose of pain and suffering, could be better understood. If mankind were willing to study itself as it does other species, these things might be understood. So many people seem to fear this process, as if it might strip away what it means to them to be human, or their understanding of God.

In the morning, they are surrounded by fog, and the sounds of voices can be heard not far off. Tony berates Tiny and Sparky for getting them off-course again, and it turns out they are near Espiritu Santo Island, on the west side of the Sea of Cortez. The party decides to go ashore at San Gabriel Bay for one last collecting stop, as it is a beautiful reef with a mangrove swamp. There is a very nice beach of brilliant white sand, and it seems that many of the species here are light-colored. They collect many interesting species here and then play in the water, reluctant to go back to the boat as this will be their last stop before heading back to Monterey and they are not quite ready to leave the Gulf. Even Tony and Tex are feeling it. At last, they start up the motor, stow the gear, and spend the afternoon getting ready for the coastal run. They returned to sailing night and day and to their old watch schedule. As they round the point of Baja California, thunder claps, the winds rise, and the water turns grey, leaving the peaceful sunniness of the Sea of Cortez behind.

April 13

April 13 Summary and Analysis

As the Western Flyer heads north, the weather worsens and movements on the vessel become unsteady. It is hard to reconcile the ocean with the Sea of Cortez—they seem like two different entities. As the boat sails on the heaving sea, Steinbeck and Ricketts try to make sense of what they have just experienced. They have found a new place, a new way of thinking and living and being in that place, and were able to observe the life there. Yet, what they had experienced is not yet fully understood, and this will take time. In the meantime, they sail the windswept sea with a cargo of little organisms, and the boat becomes one with the wind.

Characters

John Steinbeck

John Steinbeck is both the author and a main character of the Log of the Sea of Cortez. Steinbeck grew up near the coast in Salinas, California, and first becomes interested in marine biology when he takes a summer course at Stanford University. Upon moving to Pacific Grove, California with his first wife Carol Henning, he meets Ed Ricketts soon afterward. The two of them form a close friendship, and spend many long hours debating concepts of biology and philosophy that fascinate them both.

Steinbeck and Ricketts eventually form a desire to collaborate on a book project, but the first one they work on is not completed. However, it leads to the idea of a marine biology expedition to the Sea of Cortez. The success of several of Steinbeck's novels, including Tortilla Flat, Of Mice and Men, and Grapes of Wrath, has given him the financial means to participate. While Carol accompanies him on the trip, she is not mentioned in the book, possibly because their marriage is already in trouble when they leave and ends shortly after their return. She is the seventh person mentioned in the first chapter, aside from Steinbeck, Ricketts, the captain, and three crew members, who make up the expedition.

The book is told largely from Steinbeck's perspective, although it is intended to be a composite of Steinbeck and Ricketts' experiences during the journey. Steinbeck participates actively in the planning and provisioning of the voyage, and is one of the two main collectors on the expedition. He never differentiates his actions from those of others, always using the word "we" to describe their activities, which makes it difficult to form a clear picture of the personalities and activities of any of the expedition members. However, whether the group is collecting, visiting the locals, or philosophizing, he is directly involved.

Steinbeck's mind is very reflective, and in the midst of collecting species or visiting a town he is apt to go off on a reverie of philosophical thinking prompted by some event he sees. He is a keen observer of biology and the human race, including his own behavior and thought processes, and is interested in following those thoughts wherever they may lead. One gets the impression that he finds these philosophical explorations far more interesting to write about than presenting a clear and factual account of the journey, for which he relied on the journals of others. Nevertheless, he does his best to summarize the key events of the journey, especially with respect to the species being collected.

Ed Ricketts

Ed Ricketts is the co-leader of the expedition to the Sea of Cortez and the co-author of the original book, Sea of Cortez, from which this log is taken. It is his daily logbook from

which most of Steinbeck's narrative is formed. Ricketts is a marine biologist who works at the Pacific Biological Laboratories in Monterey, California. Like Steinbeck, in the year prior to the expedition he also completes an important work; in his case, one on the intertidal marine biology of the California coast, titled Between Pacific Tides. Ricketts is never described or referenced in the Log itself, as Steinbeck intends him to be part of the "we" he uses throughout the narrative. Therefore, it is difficult to get any sense of Ricketts from the main text. However, Ricketts dies shortly after the book is published, and Steinbeck adds an introduction to the book titled "About Ed Ricketts". This introduction appears as an afterward in the Log of the Sea of Cortez, and it is here that one learns more about Ed Ricketts and his personality.

Ricketts has an interesting personality and is known for teaching others to think, either directly or by example. He has a great lust for life, women, and food, and yet has a very scientific mind. His laboratory is well-organized, but his business affairs are not. He has a wide-ranging, inquiring mind and is interested in truth of all kinds—whether relative or absolute. He has a hatred for cruelty and empathy for people or animals in pain. In many ways, Steinbeck perceives him as paradoxical. For example, Ricketts has a dislike for the passing of time and is continually late for all appointments. However, if time is part of an experiment or he needs to be somewhere (such as low tide) for a scientific purpose, he is exact about the time. He engages in science and in life with all of his senses.

Ricketts is a keen observer of human behavior and is very tolerant of other peoples' theories, even those that might be considered fanciful. There are many strange visitors and happenings in his laboratory, which he accepts with equanimity. He dislikes popular mysticism; at the same time, some of his scientific beliefs and philosophy verges on the mystical, in his attempts to understand the whole of biology or of mankind. He hates to get his head wet and takes great pains to avoid this when he is collecting in tide-pools. He is drafted and serves in both World War I and II as a soldier, though he is a very non-violent type of man. He has a great love of alcohol in spite of prohibition and of music, and enjoys a good party. Ricketts was famous in his pursuit of women and his sexual exploits. All of these things, and many others, Steinbeck records in homage to his good friend after his death.

Tony Berry

Tony Berry is the captain and owner of the Western Flyer, the purse-seiner that Steinbeck and Ricketts hire for their expedition to the Sea of Cortez. He has a calm, sober demeanor, and is cautious and intelligent. A young man with some navigational abilities, he has participated in research expeditions in the past and is relatively tolerant of of the odd equipment and requirements that accompany them. His primary concerns as the captain are safety, accuracy, punctuality, and orderliness, although he has the flexibility and presence of mind to respond to unforeseen circumstances. He believes that there is right and wrong in the world, and stands firmly on the side of right. Though generally a quiet man, he might speak up if he perceives a wrong attitude or action, and

then he may become quite outraged about it until the situation is put to rest. He prefers not to speculate, but rather to follow the tried and true.

Tony is nearly at one with his boat. When at the helm, he reflexively and instinctively responds to changing conditions and anticipates course corrections before they are needed. Though he is patient and quiet when others are at the helm, they nevertheless find his presence daunting, knowing how he values maintaining a true course. He navigates with a steady hand through seas where the charts are uncertain and the shoreline unknown. He finds the mirage where land meets sea unsettling, when the true shape of the land cannot be made out. Putting into port, he seldom participates in activities onshore, having a cautious wariness of strangers and other cultures.

Tex Travis

Tex Travis is the engineer on the three-person crew of the Western Flyer, hired in Monterey to join the expedition to the Sea of Cortez. Tex has a love affair with diesel engines, which has led him to become a ship's engineer by profession. The simplicity, logic, and order of a diesel engine appeals to him. Steinbeck describes him as thoroughly identified with the engine when aboard ship, sleeping peacefully when it is running well and physically pained when it is broken or in disrepair. In contrast, Tex has an antagonistic relationship with the skiff's outboard motor, the Sea-Cow, which seems to have a mind of its own and only runs when it is not needed.

Tex joins in with the other members of the crew on shore-leave expeditions, although he is not as at home in Mexican towns as are Tiny and Sparky. After they reach the Sea of Cortez, he begins to go ashore with the others to help out with collecting specimens. Though he has an equal share in the chores, he hates to wash dishes and only does so after the entire expedition unites to persuade him with cajoling and threats. Tex is engaged and will be married upon his return. He loves to eat and gains weight during the voyage, in spite of a short-lived attempt by the others to put him on a diet.

Tiny Colleto and Sparky Enea

Tiny Colleto is a seaman on the three-person crew of the Western Flyer, hired in Monterey to join the expedition to the Sea of Cortez. Sparky Enea and Tiny grew up together in Monterey, and were good-natured trouble-makers in their younger days. The two of them are presented as inseparable and almost interchangeable, doing the same things at the same time and generally having the same approach to life. They are avid and successful fishermen, and provide fresh fish to the expedition while in Mexico. They pay somewhat less attention to navigation, particularly if occupied by fishing. Hence, the boat tends to go off-course during their watches, which they always take together. Still, they never seem to go aground or get the expedition in any real danger.

Tiny and Sparky have seamen superstitions, and claim to have seen the Old Man of the Sea. They like to test limits and rules and provide a counter-balance to Tony's steadfastness. As much as Tiny loves to fish, he has a soft heart and cannot bear to

cause an animal too much pain. Tiny catches most of the fish that Sparky cooks for the expedition, and is particularly good at harpooning, though he is not successful at catching one of the giant manta rays. He also helps out with collecting specimens once they reach the Sea of Cortez. Tiny and Sparky both enjoy shore leave and exploring the towns and villages they encounter. They speak Italian, which is apparently good enough to communicate in most places.

Mexican Officials

In each major port town there are officials who greet them and review their papers, normally before they have gone ashore. Often the officials can be seen from the boat, lounging at the shoreline, but before they can come out to the boat they must find their uniforms, clean themselves up, and get "official". This takes a longer or shorter time depending on how long it has been since another visitor has arrived. Once on board, they conduct a minor ritual of examining paperwork, offering and smoking cigarettes, and perhaps a small drink. The party has obtained very impressive credentials from the Mexican embassy before leaving, and has no trouble anywhere in Mexico in spite of the war and the volatile state of politics in Mexico.

The Small Boys of La Paz and Loreto

Especially in La Paz, the small boys of the town are like a force of nature, swarming over the boat, following the party around town, and offering to do anything and everything the visitors could possibly want. The boys are kept in check somewhat by local policemen, who are affectionate but stern as they keep the boys in from causing too much mischief. Steinbeck and Ricketts enlist the boys in helping them find marine invertebrates and fish specimens, which they buy for a few centavos each. This results in a deluge of specimens as each tries to outdo the others. Certain small boys also make themselves useful in more specific ways, such as acting as a guide to the town or helping to catch chickens.

The Indigenous People of the Sea of Cortez

In several remote locations, the expedition encounters a lonely ranch or dwelling, usually with a canoe pulled up to it and a few inhabitants. These people will usually paddle out to the boat to talk, do a little trading, or just watch the activities of the expedition party. Steinbeck comments on their timelessness, apparent peace, and the simplicity of their lives. They seem to be more a part of the places in which they live, and the places a part of them. They know exactly what they need to know to live where and how they do, and do not bother themselves with other things. Their hardwood canoes and harpoons are the most precious of their possessions.

Japanese Fishing Fleet

South of Guaymas, the Western Flyer encounters a Japanese mother ship and a number of dredging vessels fishing for shrimp, which the local fishermen have been complaining about. Steinbeck and Ricketts go on board one of the dredging vessels to observe its operations. Each haul dredges the bottom clean and all the local species are brought up. Only the shrimp are kept, and the rest are thrown back into the sea for the gulls and other fish to eat. The crew operates in a highly precise rhythm, and seem very nice, in spite of the ecological damage they are doing. Once their mission is known, the crew begin bringing Steinbeck and Ricketts interesting species they have found and seem very pleased at their visit.

Objects/Places

Sea of Cortez, Mexico

The Sea of Cortez is the destination of the voyage described in this book, otherwise known as the Gulf of California. It lies between Baja California and the mainland of Mexico, on the Pacific side just south of California. To reach the Sea of Cortez, the expedition party sails down the coast of California, further down along the coast of Baja California, then into the Sea of Cortez. They then travel up the west shore of the Sea along the eastern coast of the Baja Peninsula, cross over to the eastern shore of the Sea of Cortez along the coast of Sonora, then back to the tip of Baja California and up the coast again to Monterey Bay.

Western Flyer

The Western Flyer is the vessel that Steinbeck and Ricketts hire for their expedition. Its captain and owner is Tony Berry, and it is a purse-seiner, which is a type of fishing vessel. The Western Flyer is described as a very well maintained vessel, in impeccable condition, clean and shipshape, and seventy-five feet in length. Her engine is in top condition, her paint is new, and her tools clean and polished. This all impresses Steinbeck and Ricketts, compared to the other vessels they have been looking at.

Monterey Bay, California

Monterey Bay is the starting and ending point of the expedition, and the location of Ed Ricketts' laboratory. The first four chapters take place there, as the expedition vessel is outfitted and begins its voyage.

Cabo San Lucas, Mexico

A small cannery town at the southern tip of Baja California. Also known as Cape San Lucas. The expedition stops here to be formally welcomed into this region of Mexico and to visit the town.

The Sea-Cow

The crew's nickname for the skiff's outboard motor. Because it refuses to function except when it is not really needed, the crew think of it as a conscious entity out to thwart them whenever possible.

La Paz, Mexico

A colonial port city on the west side of the Sea of Cortez, on the Baja Peninsula. The Western Flyer stops here to resupply, collect specimens, and attend Good Friday services.

Puerto Escondido, Mexico

A port town on the west side of the Sea of Cortez, on the Baja Peninsula. Steinbeck and Ricketts accept an invitation here to go big-sheep hunting with some local ranchers.

Laredo, Mexico

A large colonial town on the west side of the Sea of Cortez, north of Puerto Escondido on the Baja Peninsula. The expedition party stops here to visit the famous church and enjoy the town.

Angeles Bay, Mexico

The northernmost bay on the Baja Peninsula side of the Sea of Cortez that the expedition visits. Here they find an uncharted settlement that appears to be engaging in some illicit activity, but leave before they can find out what it is.

Guardian Angel Island, Mexico

An island on the northwest side of the Sea of Cortez that is the Western Flyer's northernmost stop on the west side of the Sea. The island is mysterious and uninhabited, except by rattlesnakes, rumors, and myths. The expedition sails over the tip of this island and down the eastern side on its way to the eastern shoreline of the sea.

Tiburon Island, Mexico

An island along the east coast of the Sea of Cortez that marks the Western Flyer's northernmost stop on the east side of the Sea.

Guaymas

A port city on the east coast of the Sea of Cortez, where the Western Flyer stops for a few days near the end of their expedition. This is a relatively modern city with newspapers, rail, and telegram communication.

Themes

Everything as a Part of One Whole

The most profound concept that permeates both Steinbeck and Ricketts's thinking is that everything is part of one whole, and the whole is also reflected in each being. This idea affects how they see the world around them, how they relate the parts to one another, how they do science, and their philosophy of life. The idea is most strongly and directly developed in the "Easter Sunday" passage in chapter fourteen. Here, they present "teleological thinking" as looking for limited cause and effect relationships between just a few objects or actions. "Non-teleological thinking" reflects their point of view, and attempts to look at all things as part of a larger whole. One is constantly asking the question "why?" and "what else might be happening that relates to these events?". This question and the answers to it lead to yet more questions, which begin to give a larger picture of what is really happening. This larger picture is still a subset of the whole, and therefore, one never really reaches the end of the questions.

This, to Steinbeck and Ricketts, is the whole point. Many times throughout the book they poke fun at or complain about scientists who become so rigid in their thinking that they cannot accept new ideas. Or, a hypothesis may be developed which seems to so neatly explain what has been observed that it is accepted from then on without question, even when new data suggests a more complex situation may exist. Steinbeck and Ricketts present the advancement of science as a series of plateaus, each of which encompasses and transcends the previous one. The existing hypotheses are not discarded, but are seen to be subsets of the new understanding. When non-teleological thinking is employed, there is room for more than just right or wrong. The goal becomes a greater understanding of the whole.

This concept is also seen in how Steinbeck and Ricketts perceive the world, including both marine organisms and the human race. There are many examples throughout the book in which Steinbeck observes the behavior of a tidepool organism, which prompts him to speculate about how the behavior of that organism is like that of certain humans. He may give human characteristics to the marine organism (anthropomorphizing), or what is more unusual, give marine invertebrate characteristics to humans. An example is when he likens a successful marine biologist to a starfish, always questing out in various directions with his tentacles. To Steinbeck, this is more than just a literary device. He sees our marine origins reflected in the human race and believes that since we are all part of one whole, traits from one species may manifest in another. To Steinbeck, the greatest religious, philosophical, and scientific thinkers all expressed this same concept—that all things are interrelated and inextricably part of one whole.

The Purpose of Science

As the expedition party encounters the local Indians and Mexicans throughout the trip, they are constantly asked what they are doing and why. The group finds this a difficult question to answer in a way that the local population will accept and understand. Beyond this cultural difference, however, is a deeper question of why any person engages in science, and what the ultimate goal is. Steinbeck muses on this question and seems to reach several different viewpoints, which may in part reflect his views and may in part reflect Ricketts's views, as they are indistinguishable in the text.

First, there is the reason that Steinbeck feels the locals will not accept, which is that they just wish to understand more of the whole world, fill in gaps in their knowledge, and make a simple list of species they encounter. This is the most basic of all reasons—to understand the world better. However, Steinbeck is careful to point out that it is more than cataloging species, though that is a necessary activity. Steinbeck and Ricketts, at least, are interested in the interrelationships among species and their habitats. Because of this, they would like to observe the species in their natural habitat and record their activities, and if possible, place them in an aquarium and conduct controlled experiments. Steinbeck derides biologists who only work with dead specimens, meticulously recording the length of a certain body part or other dry information. He prefers the messiness of real life for what it has to teach.

Second, there is the sense that, because these organisms are part of the whole in which humans also live, there is something to be learned about humans by observing even the most lowly of creatures. In them, Steinbeck sees basic drives of reproduction, food-seeking, competition, selection for conformity, strengthening against adversity, and cycles of dominance, death, and repopulation that seem to relate to similar drives and activities in humans. Steinbeck bemoans man's general unwillingness to study himself as a species that is part of the natural world, given what could be learned from that type of observation.

Lastly, Steinbeck slowly comes to the idea that they do science simply because they enjoy it. The longer the expedition party spends in the Gulf, the more they simplify their lives and perspectives and approach a philosophy of living in the moment. This movement toward immersion in a place and time seems to bring a different perspective. Instead of trying to explain what they are doing to the locals using "northern" rationales, or making up something that is untrue, they come to realize a more basic truth. They do this because they like to do it, because the marine life is beautiful, and they become more a part of the area they are living and traveling in.

Contrasting Ways of Life

During the voyage, Steinbeck and Ricketts readily take the opportunity to interact with the locals whenever possible, as do Sparky and Tiny. While Sparky and Tiny concentrate on the towns and the pleasures to be had there, Steinbeck is more interested in observing the lifestyles of the people in the Gulf, both inside and away from

the towns. From them he gains a sense of timelessness, sense of place, simplicity, and basic priorities. He feels that they are much more a part of the places in which they live than are the northern cultures, who colonize a place and change it beyond all recognition.

Steinbeck's thoughts on this subject appear to be at least partly influenced by World War II, which was underway at the time of the voyage. While in the Gulf, he feels the cares of the modern world slowly slipping away—war, destruction, cars, trains, communication, finances, politics, and all the stress that goes with them. He becomes aware of just how complex a world the northern cultures have created for themselves and begins to question its value. He recognizes that each side may see the other unrealistically, as the locals he meets think everything is abundant and everyone is provided for in the United States. Still, for the first time, he lives according to the tides and the sea, becoming part of a place as never before, and this has a profound effect on his thinking. He describes this as a gift that this voyage and the people he has met have given him.

The expedition party becomes so immersed in this natural way of living that it is eventually quite a shock when they reach a town that has communication, railways, newspapers, and tourist attractions. While Sparky and Tiny throw themselves into it, everyone else is uncomfortable. In the end, even Sparky and Tiny feel the pull of the Gulf as they round Cabo San Lucas and head for home. It is fortunate that they have some days to travel up the coast yet, as there is a sense that time is needed for the transition even from the Gulf to the ocean, much less back into northern culture with all its complexities.

Style

Perspective

The results of the Sea of Cortez expedition were originally published in 1941 as a two-part book authored jointly by Steinbeck and Ricketts, entitled Sea of Cortez. The first part consisted of the narrative drawn from log entries and journals, and the second part consisted of a scientific compendium of the species collected on the journey. This current version of the book was first published in 1951 and contains only the narrative description of the expedition. Although Steinbeck is listed as the author, Steinbeck did not actually keep a logbook during the journey. His factual account of the voyage is taken largely from logbooks kept by Ricketts and the captain of the Western Flyer, Tony Berry. The text reflects a variety of different voices, including Steinbeck's own thoughts, text that was jointly worked out between Steinbeck and Ricketts, and excerpts written almost entirely by Ricketts. In places, the work reflects ideas and conclusions reached by both Steinbeck and Ricketts over the course of the voyage and over many years of discussion prior to the voyage. In other areas, tension can be seen between the philosophical views held by Steinbeck and Ricketts, and the book represents an opportunity to present this debate in the light of actual observations during the voyage.

At the time of the voyage, Steinbeck was a noted author with a personal interest in marine biology, and Ed Ricketts had become a well-known marine biologist with the publication of his seminal work on intertidal biology, Between Pacific Tides. They intended the original book to be both a scientific work and an expedition narrative, in the tradition of Darwin's The Voyage of the Beagle. Both are detailed catalogues of scientific information about the species encountered along the way, as well as travelogues and forums for discussion of philosophical and theoretical issues related to the science. This version of the book, the Log from the Sea of Cortez, contains only the narrative from the original book without the scientific appendices. As a result, it is readable for any audience with a personal interest in travel, science, and philosophy.

Tone

The book is written almost entirely in the first person, although it is notable that Steinbeck nearly always uses "we" rather than "I". This reflects his sense of the expedition as a joint venture between himself and his friend Ricketts, as well as both authors' insistence to their publisher that the book was jointly written. Because the two friends share many philosophical viewpoints, it is often difficult to determine where one person's thinking leaves off and the other's begins. Because of the use of the term "we" to refer to any number of the expedition's members, and Steinbeck's tendency to treat Tiny and Sparky as interchangeable, it is nearly impossible to determine who is specifically doing what.

In many areas, Steinbeck simply gives a more polished voice to Ricketts's ideas, whose writing style is frequently not as accessible as Steinbeck's. In other cases, Steinbeck inserts material from essays written by Ricketts prior to the expedition where he deems it relevant. Finally, there are many sections where Steinbeck explores his own thinking about man's place in the natural world, the interrelationships between organisms and communities, and the value of scientific research.

In the first version of the book, the authors followed their original intent to present the voyage in two different lights: a purely scientific one, and a more impressionist, subjective narrative. Because the Log of the Sea of Cortez presents only the narrative portion of the original book, it is largely subjective in nature. The Log does shift between being a description of events throughout most of the book to a few chapters devoted almost entirely to more rigorous exploration of science and philosophy. While attempts are made to present both in the context of the voyage, there are clear differences between them and the shifts are sometimes abrupt. However, taken together they make an interesting and entertaining whole, particularly to readers who enjoy the occasional philosophical diversion.

Structure

In Steinbeck's introduction, he discusses the making of a book, and likens it to the voyage itself. As he describes it, both have a starting point, a planned course, stops along the way, and an ending. Either may get off course, and original plans may turn out not to be feasible in every particular. He decides to allow the form of the book to follow the structure of the expedition, starting the book with the planning and provisioning of the expedition and ending it near the end of their voyage with reflections on the trip. In between, most of the chapters are dated and reflect log entries from those dates.

To the extent that the narrative describes events that happen during the voyage, the contents of each chapter correspond fairly well to the dates that make up the chapter titles. However, some dates are skipped, at least one is incorrect, and some chapters cover more or less than a day. Other chapters are undated, especially at the beginning. Steinbeck uses the structure of the voyage only loosely in constructing the book, as an overall framework on which a description of the voyage and discussions of science and philosophy are placed. Most chapters contain both a factual account of events and some philosophizing about related topics.

Quotes

"And a boat, above all other inanimate things, is personified in man's mind. . . . This is not mysticism, but identification; man, building this greatest and most personal of all tools, has in turn received a boat-shaped mind, and the boat, a man-shaped soul. His spirit and the tendrils of his feeling are so deep in a boat that the identification is complete." Chap. 2, p. 14

"Once in a while one comes on the other kind [of biologist] - what used in the university to be called as a "dry-ball" - but such men are not really biologists. They are the embalmers of the field, the picklers who see only the preserved form of life without any of its principle. Out of their own crusted minds they create a world wrinkled with formaldehyde. The true biologist deals with life, with teeming boisterous life, and learns something from it, learns that the first rule of life is living." Chap. 4, pp. 25-26

"For the ocean, deep and black in its depths, is like the low dark levels of our minds in which the dream symbols incubate and sometimes rise up to sight like the Old Man of the Sea. And even if the symbol vision be horrible, it is there and it is ours. An ocean without its unnamed monsters would be like a completely dreamless sleep." Chap. 4, p. 28

"To name a thing has always been to make it a familiar and therefore a little less dangerous to us." Chap. 9, p. 46

"a man looking at reality brings his own limitations to the world." Chap. 10, p. 71

"the world is furrowed and cut, torn and blasted by man. Its flora has been swept away and changed; its mountains torn down by man; its flat lands littered by the debris of his living. And these changes have been wrought, not because any inherent technical ability has demanded them, but because his desire has created that technical ability. . . He is the only animal that lives outside of himself, whose drive is in external things - property, houses, money, concepts of power. He lives in his cities and in his factories, in his business and job and art. But having projected himself into these external complexities, he is them. His house, his automobile are a part of him and a large part of him." Chap. 10, p. 73

"We have made our mark on the world, but we have really done nothing that the trees and creeping plants, ice and erosion, cannot remove in a fairly short time. And it is strange and sad and again symptomatic that most people, reading this speculation which is only speculation, will feel that it is a treason to our species so to speculate. For in spite of overwhelming evidence to the contrary, the trait of hope still controls the future, and man, not a species, but a triumphant race, will approach perfection, and finally, tearing himself free, will march up the stars and take the place where, because of his power and virtue, he belongs. . ." Chap. 10, p. 74

"the people we call leaders are simply those who, at the given moment, are moving in the direction behind which will be found the greatest weight, and which represents a future mass movement." Chap. 13, p. 115

"In such a pattern, causality would be merely a name for something that exists only in our partial and biased mental reconstructings. The pattern which it indexes, however, would be real, but not intellectually apperceivable because the pattern goes everywhere and is everything and cannot be encompassed by finite mind or by anything short of life - which it is." Chap. 13, p. 124

"Seeing a school of fish lying quietly in still water, all the heads pointing in one direction, one says, 'It is unusual that this is so' - but it isn't unusual at all. We begin at the wrong end. They simply lie that way, and it is remarkable only because with our blunt tool we cannot carve out a human reason." Chap. 16, p. 136

"I am much more than the sum of my cells and, for all I know, they are much more than the division of me. There is no quietism in such acceptance, but rather the basis for a far deeper understanding of us and our world." Chap. 16, p. 137

"It is often considered, particularly by reformers and legislators, that law is a stimulant to action or an inhibitor of action, when actually the reverse is true. Successful law is simply the publication of the practice of the majority of units of a society, and by it the inevitable variable units are either driven to conform or are eliminated. We have had many examples of law trying to be the well-spring of action; our prohibition law showed how completely fallacious that theory is." Chap. 17, p. 149

"And it is a strange thing that most of the feeling we call religious, most of the mystical out-crying which is one of the most prized and used and desired reactions of our species, is really the understanding and the attempt to say that man is related to the whole thing, related inextricably to all reality, knowable and unknowable. This is a simple thing to say, but the profound feeling of it made a Jesus, a St. Augustine, a St. Francis, a Roger Bacon, a Charles Darwin, and an Einstein. Each of them in his own tempo and with his own voice discovered and reaffirmed with astonishment the knowledge that all things are one thing and one thing is all things - plankton, a shimmering phosphorescence on the sea and the spinning planets and an expanding universe, all bound together by the elastic string of time. It is advisable to look from the tide pool to the stars and then back to the tide pool again." Chap. 21, p. 178-179

"The man best fitted to to observe animals, to understand them emotionally as well as intellectually, would be a hungry and libidinous man, for he and the animals would have the same preoccupations." Chap. 23, p. 189

"We had been drifting in some kind of dual world - a parallel realistic world; and the preoccupations of the world we came from, which are considered realistic, were to us filled with mental mirage. Modern economies; war drives; party affiliations and lines; hatreds, political, and social and racial, cannot survive in dignity the perspective of distance." Chap. 26, p. 200

"Why do we so dread to think of our species as a species? Can it be that we are afraid of what we may find? That human self-love would suffer too much and that the image of God might prove to be a mask? This could be only partly true, for if we could cease to wear the image of a kindly, bearded, interstellar dictator, we might find ourselves the true images of his kingdom, our eyes the nebulae, and universes in our cells." Chap. 28, p. 219

"We had all felt the pattern of the Gulf, and we and the Gulf had established another pattern which was a new thing composed of it and us." Chap. 28, p. 221

"The Western Flyer hunched into the great waves toward Cedros Island, the wind blew off the tops of the whitecaps, and the big guy wire, from bow to mast, took up its vibration like the low pipe on a tremendous organ. It sang its deep note into the wind." Chap. 29, p. 224

Topics for Discussion

What do you think is the purpose of science? Describe the different reasons why scientists might study the natural world and which you think are most valid and important.

Discuss Steinbeck's proposition that all organisms and processes are connected and part of a single whole. For example, do you think we can learn anything about the human race by studying marine organisms or other invertebrates? What about fish, birds, or higher mammals? At what level are all these species connected and in what ways? Do you think this is a religious, philosophical, or scientific belief?

Do you think society today is too complex? Could we benefit from a more timeless approach to living in a place, or is this way of life a thing of the past? Give some examples of ways your life might change if you had a chance to take a "time out" and live in such an environment. Where would you go and what would your daily life be like?

Natural science today typically consists of controlled experiments with careful observations, varying only one thing at a time to observe the result. How does this contrast with the approach Steinbeck promotes? What are the pros and cons of each method?

Steinbeck and Ricketts conducted this expedition in the 1940s, when this area of Mexico had not yet been accurately charted or surveyed. Even then, Steinbeck lamented the passing of the historical naturalist expedition, as in the days of Darwin. Do you think the days of this type of science/exploration are past? Find an example of a recent exploratory investigation (National Geographic Explorers is a good place to start) and discuss its goals. What gaps in knowledge was it trying to fill and what new areas did it explore? Was it successful in its goals?

Steinbeck often gives inanimate objects a human personality, particularly boats and related gear. One of the best examples in the book is the Sea-Cow, the recalcitrant outboard motor that never seems to function when it is needed. Think of some object in your life that you give a human personality to. Why do you think you do this? What purpose does it serve? Why did the crew of the Western Flyer take this approach with the Sea-Cow?

In this book, Steinbeck and Ricketts choose not to differentiate themselves from each other, and speak always of "we" when describing their activities. Steinbeck sometimes extends this "we" to members of the crew as well, and possibly to his wife who was present but is never mentioned. This approach confused his editors, who never knew who was speaking and which material came from which author. Why do you think they did this? How does it affect the narrative of the book? Discuss what effect it had on you as the reader, if any.