History Underneath Your Feet: Excavations Near the Morro Bay Power Plant

In June of 1953, construction of the Morro Bay Power Plant began with the single largest building permit in the history of the county, costing more than "the total of all previous permits issued since the first" according to Kay Simpson, secretary of the commission at the time. However, the rich history leading up to this point tells an exciting story of American ingenuity and archeological discovery.

In August of 1951, Pacific Gas and Electric (PG&E) purchased the 140-acre construction site from the U.S. Navy. The area had previously been used as a base for amphibious assault training during WW2.² Environmental scientists determined that the compact soil, mild climate, and, most importantly, proximity to the ocean, would be ideal for the power plant.

Yet the legacy of this idyllic seaside location extended thousands of years prior to a power plant or even the notion of electricity. The presence of chipped rocks and the absence of stone grinding tools



An aerial view of the partially completed power plant. (San Luis Obispo County Telegram-Tribune, 7 May 1955)

suggests that humans first began periodically visiting Morro Bay from Napa Valley in 6000 BC.³ Archeological findings provide evidence that Native Americans started to permanently settle Morro Bay in 4000 BC. As the story and culture of these native tribes played out, the soil kept record of the events until rediscovery in the early 20th century. According to archaeologist John Parker, it's like "you've got a library of books no one's ever read." ⁴

¹ "Largest Building Permit Issued for PG&E Plant." San Luis Obispo County Telegram-Tribune, 7 May 1955.

² "Morro Bay Power Plant Construction Begins." San Luis Obispo County Telegram-Tribune, 27 June 1953.

³ Mikkelsen, Patricia, et al. *Prehistoric Adaptations on the Shores of Morro Bay Estuary*. San Luis Obispo County Archaeological Society , 2000.

⁴ Johnston, Kathy. "Saving the Story under Our Feet." *New Times*, New Times San Luis Obispo, 16 Apr. 2019

After PG&E purchased the property, the company set out to excavate the foundation for the powerplant. Engineers determined that a 90 foot wide and close to 10 foot deep reinforced concrete pad would be necessary to support the immense weight and pressure of the power plant machinery. Without government regulation in place at the time, the standard operating procedure was to either relocate any artifacts or bury them under concrete. This, however, was still a better result then what happened to artifacts found during more invasive aspects of the excavation.



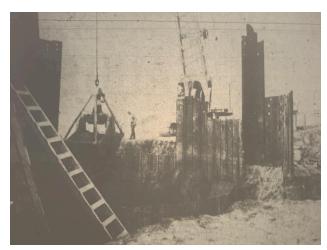
Workers clearing the site so that excavation can take place. (San Luis Obispo County Telegram-Tribune, 7 May 1955)

With the design of the power plant came operating requirements such as a necessity for cooling and refueling the industrial machinery. A 4,500 ft long submersible pipeline needed to run along the ocean floor and out beyond the bay. The pipeline connected to an offshore refueling station where oil tankers could deliver up to 8,000 barrels of fuel per hour to the plant.⁶ This new design along with the application of "sea water"

evaporators were among the first of their kind in the nation" according to PG&E engineer, Gordon L Coltrin.⁷

Unfortunately, artifacts encountered during the installation of this crucial equipment could not simply be paved over like the previous construction. Much of the piping needed to be dug deep into the seafloor of the bay. Without regulations, anything discovered was likely discarded or destroyed. Construction projects such as the Morro Bay power plant would later serve as an example for why regulation was necessary to preserve native artifacts.

In addition to this, damage to oyster beds, risk to boaters, and danger to the public all



The Coffer Dam during excavation. (San Luis Obispo County Telegram-Tribune, 7 May 1955).

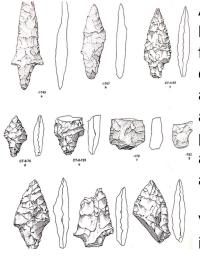
⁵ "68-Ft Piling Supports Smokestack." San Luis Obispo County Telegram-Tribune, 7 May 1955.

⁶ "Pacific Gas to Expand." San Luis Obispo County Telegram-Tribune, 19 Feb. 1953.

⁷ "Morro Uses Sea Water Evaporators." San Luis Obispo County Telegram-Tribune, 7 May 1955.

had to be considered in the design of the high-pressure cooling system. Before the underwater network for the seawater evaporators could be constructed, a temporary coffer dam was built to section off part of the bay. This allowed workers to excavate and install the system on the dry seafloor. The dam was later removed upon completion of the job.⁸ With excavation complete and these key components in place, the seaside town was prepared for a power plant that eventually provided energy to over 3 million people.⁹

Although excavation of the powerplant did not have a positive impact on artifacts unearthed during construction, numerous stone tools and fossils have been discovered within proximity, specifically at a location known as Site-165. This area has taught archeologists a tremendous amount about the lives of early settlers.



Lanceolate points recovered in Morro Bay created during the Early Period (Prehistoric Adaptations on the Shores of Morro Bay Estuary. San Luis Obispo County Archaeological Society, 2000)

Artifacts discovered here demonstrate that fishing and hunting were not common food sources for the tribes that first visited Morro Bay. Instead, seasonal locals lived on a diet of primarily shellfish and nuts. 10 The largest number of artifacts found date back to between 4000-5500 years ago. This included etched rocks, bone tools, drills for puncturing holes, and numerous beads used for trade. In addition, "three human burials were found at the site" according to archaeologist Deborah Jones.

Very warm and dry inland environments, a 45-meter increase in sea level, colder ocean water temperatures, and significant advancements in hunting and fishing technology eventually led Native American populations in eastern California to move to the coast and Morro Bay. ¹¹ Fossil records and the large increase in notched projectile

points for hunting and fishing found at the site support this theory. Data recovered from fossilized skeletons demonstrate that the diet of these groups evolved from basic shellfish to diverse seafood including marine mammals and fish. This is evident due to the discovery of planked canoes and barbed harpoons that were built in 2000 B.C.

The excavation of the Morro Bay power plant laid the foundation for a structure that dramatically improved lives of local citizens for decades. Yet the surrounding area tells

⁸ "Sandy Waste Becomes Plant Site." San Luis Obispo County Telegram-Tribune, 7 May 1955.

⁹"California Power System Gains Industrial Giant." *San Luis Obispo County Telegram-Tribune*, 7 May 1955.

¹⁰ Mikkelson.

¹¹ Mikkelson.

a story of how the humans lived throughout the past millennia. In the process of construction, some archaeological resources were lost, but this demonstrated a need for regulation. Even still, the surrounding area has served as a valuable asset for scientist to learn more about the people who enjoyed this idyllic seaside location long before we ever did.

Works Cited

- 7 May 1955.
- "California Power System Gains Industrial Giant." San Luis Obispo County Telegram-Tribune, 7 May 1955.
- Johnston, Kathy. "Saving the Story under Our Feet." *New Times*, New Times San Luis Obispo, 16 Apr. 2019, www.newtimesslo.com/sanluisobispo/saving-the-story-under-our-feet/Content?oid=2947939.
- Jones, Terry. 29 Apr. 2019. Personal Interview.
- "Largest Building Permit Issued for PG&E Plant." San Luis Obispo County Telegram-Tribune, 7 May 1955.
- Mikkelsen, Patricia, et al. *Prehistoric Adaptations on the Shores of Morro Bay Estuary*. San Luis Obispo County Archaeological Society, 2000.
- "Morro Bay Power Plant Construction Begins." San Luis Obispo County Telegram-Tribune, 27 June 1953.
- "Morro Uses Sea Water Evaporators." San Luis Obispo County Telegram-Tribune, 7 May 1955.
- "Pacific Gas to Expand." San Luis Obispo County Telegram-Tribune, 19 Feb. 1953.
- "Pacific Gas to Expand: \$44,000,000 Steam Power Plant Planned at Morro Bay." *The New York Times*, 1953. pp.37. *ProQuest Historical Newspapers*,
- Parker, John. "City of Morro Bay Mess." *Lake Country Archaeology*, www.wolfcreekarcheology.com/morro_bay_mess.html.
- Sandoval, Niki. 28 Apr. 2019. Personal Interview.
- "Sandy Waste Becomes Plant Site." San Luis Obispo County Telegram-Tribune, 7 May 1955.