Discover Alcatraz: A Tour of Braille and Tactile Cartography
Design by: Steven Feher

The tactile book Discover Alcatraz: A Tour of the Rock, consists of fifty-three pages of tactile maps, elevations, features, and braille text. It is the braille and tactile version of the standard visual, self-guided information pamphlet available on Alcatraz Island. My intent was to design and create a book as informative as the one created by the Golden Gate National Parks Conservancy so that people with visual impairments and blindness are encouraged to visit and explore with confidence, these beautiful and significant places.

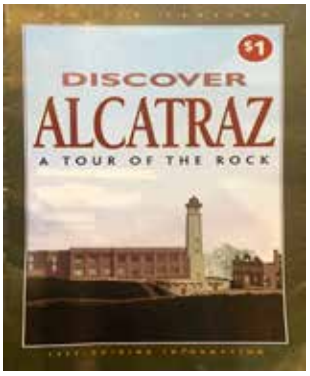

Image 1: Original Parks Conservancy Discover Alcatraz pamphlet

The task of this project was to make a tactile and braille version of the existing visual booklet in every aspect. Both contain a timeline of Alcatraz Island, compelling historical information about different eras of the Rock, contextual information on important structures, interesting trivia, and a map of the island. Where they differ is that the tactile version contains two cartographic aspects: an overview of the island, and a depiction of the island's elevation relative to primary structures on the island or an elevation map.

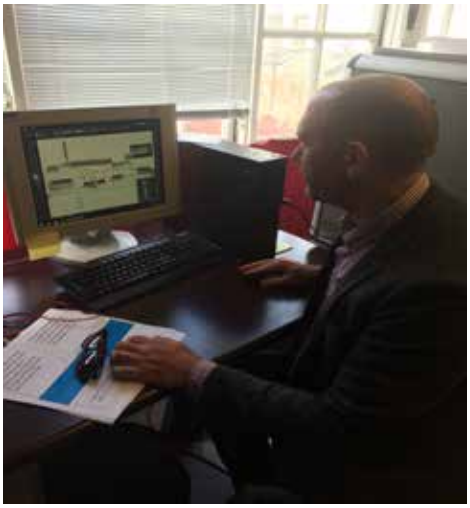
Image 2: Using Adobe Illustrator to design overlapping visual & tactile elements

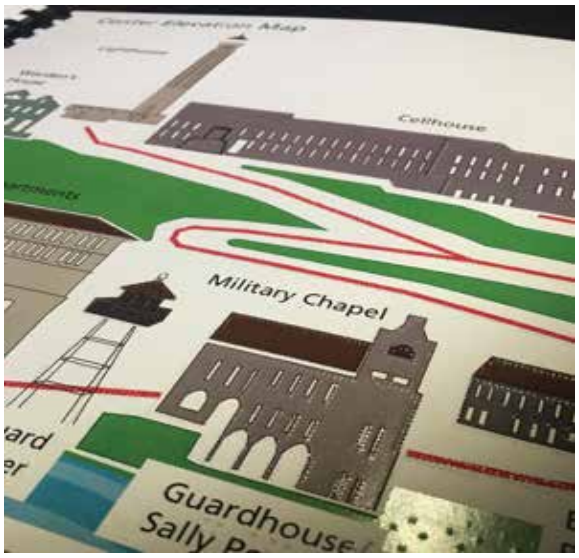

Image 3: Tactile Central Elevation Map

The purpose of this elevation map is to describe its topography for a visitor with visual impairments. Scale is notably absent on this map. The aim of any helpful map is to convey spatial information with clarity and accuracy. Tactile clarity requires that textures, features, and symbols must be at a size that is legible; therefore a small staircase and a building may be represented as the same size. Another critical quality is that each symbol, line, texture, and feature is placed in their proper relationship to each other so that the visitor has an appropriate orientation to various features while travelling in a space. Elevation here is illustrated as the path winds its way from the dock to the top of the island.

Image 4: The ViewPlus printer/embosser is used to produce each visual/tactile page.

I received a B.A. in Geography from SF State in May of 2015. My senior internship was spent at the LightHouse for the Blind and Visually Impaired in the Access to Information Services (AIS) department. It was in the AIS department where I learned all aspects of tactile cartography and design with the unending patience and guidance from Lead Designer BJ Dietz Epstein and the steadfast trust from AIS Director Greg Kehret.

My inspiration to pursue tactile cartography was initiated largely by my education in somatic therapy as it intersected with Geographic Information Systems (GIS). Representations of space and data are almost exclusively visual by nature. In the visually impaired community this is called sight dependent learning. Somatic education taught me that our bodies process a whole range of sensory inputs to create meaningful mental maps of the world around us constantly. In some cases, sensory inputs other than vision work much faster, efficiently, and holistically. I enjoy communicating the discipline of geography through maps and believe that modern mapping can benefit greatly by utilizing more of our sensory spectrum to translate the richness and complexity of the data we currently have available. While the book is tailored to be of most benefit to the blind and visually impaired community, my hope is that it also a tool of inspiration for those who are curious about tactile literacy, and of the various pathways we can create functional, mental maps of the places we all wish to travel through.

Image 5: Enjoying a trail hike supervised by an orientation & mobility specialist.