



# Mobile Treatment and Rehabilitation Enclosure (MTRE) for small pinnipeds

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The North Slope of Alaska is a demanding and harsh environment. Being prepared for an oil spill involving wildlife in this region requires training, innovation, and partnerships. For the past three years the Alaska SeaLife Center (ASLC) in partnership with Alaska Clean Seas and collaborating with National Marine Fisheries Service, Oiled Wildlife Care Network, and animal care experts from affiliated zoological institutions have worked toward preparing for such an event.

Protocol development is an essential and initial process to accomplish response goals. In 2011, the ASLC developed protocols for the care of oil affected phocid seals in Alaska, focusing on the need for remote, deployable operations in the arctic. While developing these protocols, ASLC drew from its experience caring for pinnipeds at its facility as well as from its involvement in the statewide marine mammal stranding network. As the only institution authorized to rehabilitate stranded marine mammals in Alaska, the ASLC is uniquely placed to assist in mitigating risks associated with possible oil exposure to these animals.

Finding resources to treat oiled wildlife is a challenge on the North Slope, especially for medium to long term care. With that in mind the ASLC has designed and developed a Mobile Treatment and Rehabilitation Enclosure (MTRE). This deployable enclosure and pool with a life support system meets Animal Welfare Act holding specifications for small pinnipeds including harbor seals, spotted seals, ringed seals, and ribbon seals. The enclosure is designed to be assembled by 2 to 4 individuals and ready for use within 12 hours. While it is purpose built for small pinnipeds it would also be appropriate for short term, triage care of other marine mammals such as walrus calves, polar bear cubs, and sea otters. As a test of our oiled pinniped protocols and the MTRE this system was deployed during the mutual aid drill on the North Slope in August of 2013.

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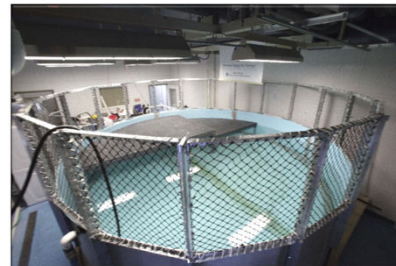


Figure 1: Set up at ASLC



Figure 2: Harbor seal being introduced to pool



Figure 3: MTRE set up at ASLC



Figure 4: Life Support System



Figure 5: Palletized components



Figure 6: Removing components from pallets



Figure 7: MTRE assembled during mutual aid drill



Figure 8: Set up on Northslope