END OF THE SS PALO ALTO

THIS CONCRETE SHIP NEVER WENT TO WAR BUT ITS DUTY AS A TOURIST ATTRACTION WAS EQUALLY HAZARDOUS - **BY ROGER CAIN**

Nature is reclaiming one of the last concrete ships of the Great War. The SS *Palo Alto* was designed as a tanker but its method of construction was going to be quite unusual since the hull would be formed out of concrete. At the time, this was not a new method of construction but actually dated back to 1848 when Joseph-Louis Lambot built a ferrocement dinghy in France. This led to other ferrocement ships including ones constructed as barges to be utilized on European canals.

Obviously, as time moved forward so did the ferrocement designs. These vessels became known as "concrete ships" and were built of ferrocement (reinforced concrete) and steel instead of more traditional steel or wood. The advantage of ferrocement construction is that the materials are cheap and readily available. Disadvantages include the fact that construction labor costs are high as well as the operating costs. Ferrocement designs require thick hulls, which results in either a larger cross-sectional area that hurts hydrodynamics, or leaves less space for cargo.

On 2 August 1917, Nicolay Fougner of Norway launched the first self-propelled ferrocement ship intended for ocean travel. This was an 84-foot vessel of 400 tons named *Namsenfjord*. With the success of this ship, additional ferrocement vessels were ordered

The *Namsenfjord* pioneered the concept of ocean-going concrete ships.

The SS *Palo Alto* in all her glory during one of her very few voyages under her own power.