

# **Beacon of the Bay**

## The Cape Brett Lighthouse Settlement and its Families



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Department of Conservation  
*Te Papa Atawhai*

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# Introduction

Lighthouses have a long history and hold a central place in not only New Zealand's but the world's maritime history. Cape Brett Lighthouse is one of the many along New Zealand's coast, each with its own colourful pasts. Cape Brett has a wealth of stories about its keepers, their families, their pets, and the buildings which made up a busy if isolated settlement. This book aims to share as much of this history as possible.

## A History of Lighthouses

The first known marine light is considered to be the beacon built by the Cush peoples of the Nile Delta about 3000 years ago.<sup>1</sup> This purpose-built beacon was located on the Egyptian side of the Red Sea and used for night navigation into and out of the waterways of the Nile and Red Sea.<sup>2</sup> The beacon consisted of a bronze basket filled with bundles of sticks hanging on a pole.<sup>3</sup> Homer's *Iliad* and the *Odyssey* also mention the use of navigation aids during the 9<sup>th</sup> Century. At the start of Book 10 of the *Odyssey*, as Odysseus and his ships arrive at Aeolia, the following reference is made supporting the presence of beacons:

*"For nine whole days and nights we held our course,  
and on the tenth we glimpsed our native land.  
We came in so close we could see the men  
who tend the beacon fires. But then sweet Sleep  
came over me—I was too worn out."*<sup>4</sup>

The 6<sup>th</sup> Century also saw the construction of a fire beacon at Dardanelles, Turkey and a lighthouse at Sigeum (now Cape Incihisari) in the Troad was reported by the Greek poet Lesches.<sup>5</sup>

The first substantiated lighthouse was The Pharos, one of the Seven Wonders of the Ancient World, built at Alexandria on the island of Pharos in ca280BC. It was designed by the architect and engineer Sostratus of Cnidus<sup>6</sup> and built under the patronage of Ptolemy I Soter and his son Ptolemy II of Egypt. Descriptions of it can be found in several literary accounts by Greek writers Strabo and Pliny the Elder and by Moorish and Arab travellers who in 1166AD wrote extremely detailed accounts of the three tiered structure. Briefly, the bottom tier of the light was 55.9m high with a cylindrical core, the second was circular 27.45m high with a side length of 18.3m, the top was 7.3m high and during his tour of the light he saw a total of 67 rooms within the light (see Figure 1).<sup>7</sup>

The Pharos was the world's tallest building and had a magnificent mirror which projected the light from the tower 'tens of kilometres away' and was said to have been used to detect and burn enemy ships.<sup>8</sup> As an icon of the ancient world it featured on many representations including coins such as the 'billion tetradrachm' struck during the reign of Emperor Commodus 180-192AD. The coin shows a galley with an inflated sail passing The Pharos (see Figure 2).<sup>9</sup> The light was used for about 1500 years before earthquakes in both 365 and 1303 AD irreparably damaged it, leading to its final collapse, reportedly in 1326.<sup>10</sup>



**Figure 1 - An artist's representation of the Pharos Lighthouse.**



**Figure 2 - A Roman coin with representation of lighthouse at Pharos.**

After The Pharos, construction of different lights progressed with the Romans as their empire spread and with the Phoenicians who were erecting beacons along their trade routes. By 400AD, 30 lighthouses had been built from the Black Sea to the Atlantic.

The Chinese began constructing lighthouses and beacons in the 12<sup>th</sup> Century and Arabic writers reported on lighthouses in the Persian Gulf in the 10<sup>th</sup> Century.<sup>11</sup> In Europe this period of construction also saw a utilization of church steeples or towers as navigational aides as well as fires being lit on headlands.<sup>12</sup>

By 1819 construction had seen a total of 235 lighthouses constructed in Europe of varying forms. One of the most famous of these was the Cordouan light in southwest France, considered the first ‘modern’ lighthouse with staff dedicated to overseeing the its operation. Work began in 1584 with the final product a 51m high elaborately constructed tower.<sup>13</sup> The tower was embellished to the extreme, described as resembling a wedding cake. It contained not only the living quarters for four keepers but a private room and chapel for the King. It is also the first example of a sea swept tower – built in the open ocean – in the world.<sup>14</sup>

The Eddystone tower off the coast of Plymouth in England came as a revolution in lighthouse construction and had a large influence on the form of New Zealand lighthouses. Because it is in an extremely exposed location it has been rebuilt five times over 400 years The first incarnation was built 1698 and had to be rebuilt a year later because it needed strengthening. The second was swept away just four years later – in 1703 – with its keepers, its designer, Henry Winstanley, and the workers who were there to stabilise the tower.<sup>15</sup> The third version was much stronger but the candles used for the light set fire to the roof and after 47 years the tower burnt down.<sup>16</sup> The fourth tower was built between 1756 and 1759, was conical in shape and constructed of interlocking stone masonry with a low centre of gravity. It had a tall tower so the light was not obstructed by waves or sea spray.<sup>17</sup> This was by far the soundest, lasting 127 years until the base rock began to crack.<sup>18</sup> The low centre of gravity and the conical shape became central features in future lighthouse construction throughout the world. The fifth tower, still in use today, was completed in 1882.

### **New Zealand Lighthouses**

The New Zealand coast was plagued by shipwrecks from the earliest period of settlement. In 1808 New Zealand’s first outright shipwreck occurred at Cape Brett when the schooner *Parramatta* was blown ashore during heavy weather as she was leaving the Bay of Islands to head back to Sydney.<sup>19</sup>

The first navigational device to appear on the New Zealand coast is believed to have been a beacon established at Maketu, near Tauranga, around 1831-32.<sup>20</sup> From then there seems to have been similar moves by New Zealand’s other provincial governments to establish different devices to aid shipping. A lantern, with reflector, was established on Nelson’s Boulder Bank in 1848.<sup>21</sup> It had a visibility of 12 nautical miles.<sup>22</sup> Four years later, in 1852, a temporary keeper’s cottage was established on the Wellington Heads at Pencarrow.<sup>23</sup> The cottage was tended by George and Mary Bennett until replaced in 1859 when New Zealand’s first lighthouse was lit on 1 January.<sup>24</sup>



In 1854 the central government established the first agency to deal with the question of lighting the coast.<sup>25</sup> The Beacons and Lighthouses Committees review found the existing situation severely lacking, which is not surprising as there were only temporary beacons established around the coast and no substantial lights.

The Pencarrow light — marking the eastern entrance to Wellington harbour — was honoured with the country's first, and seemingly only woman to preside over a light.<sup>26</sup> Mary Bennett was the first keeper, who took over after her husband died in 1855. Pencarrow's was a white flashing light with a visibility of 30 nautical miles (nm).<sup>27</sup> It was followed in 1862 by a permanent light on Nelson's Boulder Bank that had an increased visibility of 12.5nm.<sup>28</sup> Both towers were organised by the Wellington and Nelson provincial councils respectively with the cast iron towers ordered from England.<sup>29</sup>

In November 1862 the Marine Board Act was passed, establishing the Chief Marine Board under the Postmaster General.<sup>30</sup> The purpose of the Act was to remove control of harbours and shipping from the provincial governments and gain control of lighthouse management.<sup>31</sup> A month later the board was renamed the Marine Board.<sup>32</sup> This lasted for four years, during which time there was a burst of construction with five lighthouses built during 1865.<sup>33</sup>

In 1866 the Marine Amendment Act led to the dissolution of the Marine Board and the formation of the Marine Department under lighthouse engineer, James Balfour.<sup>34</sup> The Act forced the dissolution of the provincial lighthouse committees and brought all construction under the direction of the Governor.<sup>35</sup> The Marine Department was then transferred to the jurisdiction of the Customs Department in December 1869.<sup>36</sup> James Balfour and his staff, between 1870 and 1879, built an impressive 11 coastal lights and six harbour lights in just nine years with the department also becoming a separate entity during this time (1878-80).<sup>37</sup> The department's short-lived independence came to an end when it was reabsorbed into the Customs Department in 1881.<sup>38</sup> Between 1880 and 1897 a total of 26 major coastal lights were erected completing the network. Construction was absorbed by the Public Works Department from 1893.<sup>39</sup>

With completion of the major network the Marine Department began to fill in the gaps in the lighting system - one of these being the coast between the lights at Moko Hinau and Cape Maria Van Diemen (see Figure 3). This is the gap that Cape Brett Lighthouse was to fill within the next few years.

Once construction was completed the department turned its focus to the day to day running and management of the lighthouse system. The department underwent no major changes until 1972 when it was absorbed by the Ministry of Transport, later becoming part of the ministry's Nautical Branch.<sup>40</sup> In 1990 it became a separate Crown entity – the Maritime Safety Authority – before being renamed Maritime New Zealand in 2005.<sup>41</sup>

Maritime New Zealand currently operates 24 lighthouses and 74 light beacons from the head office in Wellington.<sup>42</sup> Faults are detected and repaired remotely via the MNZ active control system.<sup>43</sup>

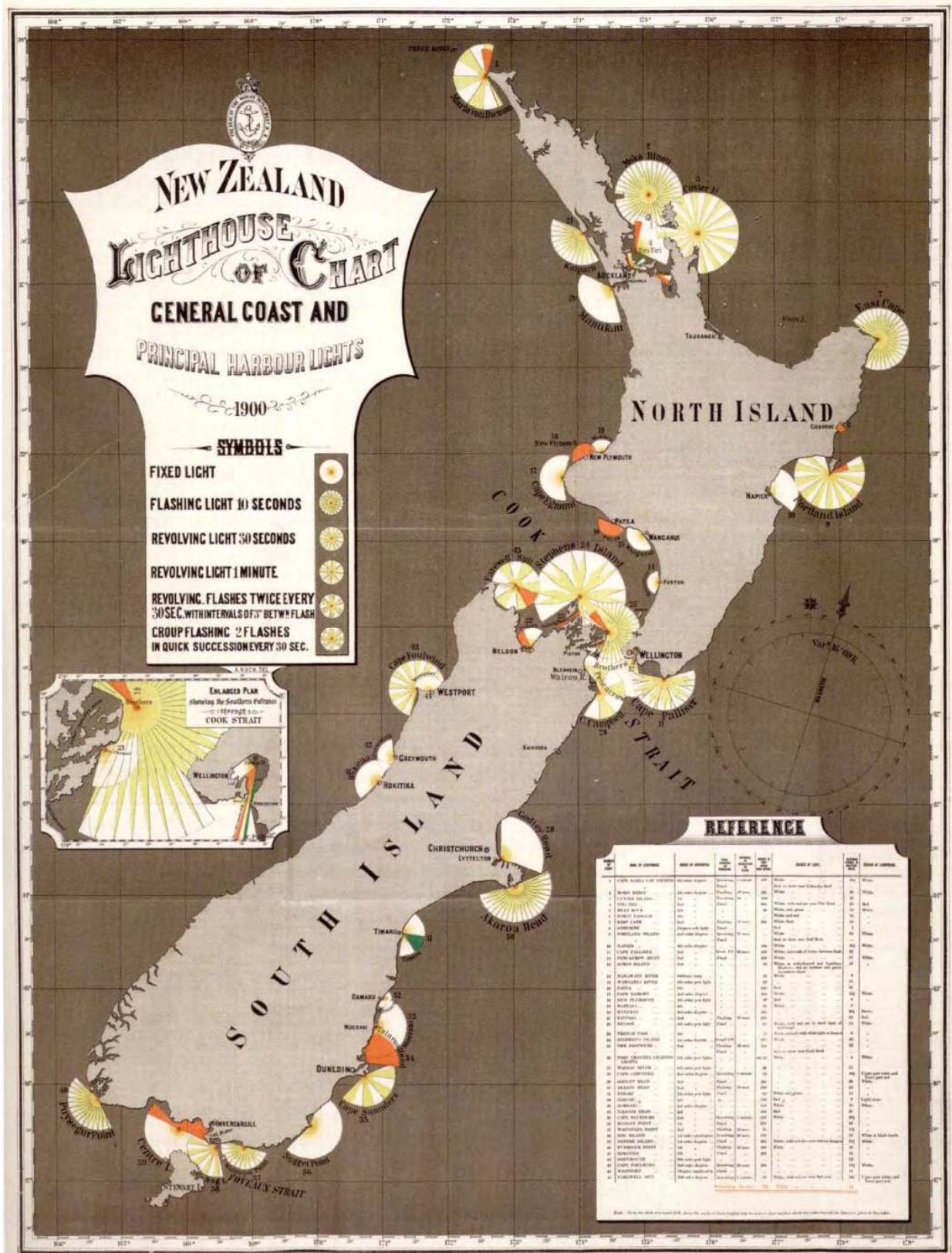


Figure 3 – Lighthouse Chart from 1900 showing the gaps in the lighting system that needed to be filled – note the unlit coast between Maria Van Diemen and Moko Hinau.



Figure 4 – Map showing location of the Cape Brett Lighthouse.



Figure 5 – Map of the Bay of Islands.

## Cape Brett Lighthouse

**AUCKLAND 13th January.**  
 The Government steamer *Hinemoa*, which left the port of Auckland last week, is engaged selecting a site for a lighthouse between here and the North Cape. The Shipmasters' Association was consulted upon the question, and it is understood that the majority of the replies were in favour of Cape Brett, although some suggested The Cavillies, near Doubtless Bay. Mr. Allport, secretary to the Marine Department, was a passenger in the *Hinemoa* in connection with this matter.

Figure 6 – Article on the *Hinemoa*'s movements from 14 January 1908.

The first discussion of the need for a lighthouse at Cape Brett was in 1874 – when Mr J.R. Williams hosted a public meeting in Russell to relay the recent proceedings of Parliament. During this meeting the floor was opened to questions and one gentleman enquired as to a lighthouse for Cape Brett — Mr Williams replied that he ‘*would be very glad to see a lighthouse on the Cape, but did not think it would be granted by the government.*’<sup>44</sup> In 1896 the Nautical Advisor proposed a light in this location – though the suggestion was passed over in favour of other lights.<sup>45</sup> Thirty-three years later the

idea was again mooted by the Marine Engineer to the Secretary of the Marine Department in a 1907 report.<sup>46</sup>

*'The North Cape, or Cape Brett on the Southern side of the Bay of Islands appears to be the best place where a light is most urgently required as there is now no light between Cape Maria Van Diemen and Moko Hinau'*<sup>47</sup>

The report went on to point out that a light at Cape Brett was the most wanted light in the Colony.<sup>48</sup> Consultation with the Shipmasters' Association put forward the Cavalli Islands – a little north of the Cape - and the Poor Knights Islands to the south, as alternative locations.<sup>49</sup> In December 1907 the Cape Brett Peninsula was chosen as the most advantageous location for a light for shipping purposes,<sup>50</sup> following investigations by Captain Bollons of the *GSS Hinemoa*, Mr J.A. Wilson, Auckland District Engineer, and the marine engineer of the time. Orders were soon put in for the necessary building materials and lighthouse parts, most of which had to be come from England.<sup>51</sup>

Construction on the settlement started in 1909 after surveying on the newly acquired land at the tip of the Peninsula.<sup>52</sup> The light was first lit on the evening of 21 February 1910 and kept a watch on this coast until 5 October 1978 (the beacon was first exhibited the following night).