H.M.V.S. CERBERUS











The



Argus.

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PREFACE

Contemporary Newspaper Reports

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Last Updated November 3 14 2004

THE "CERBERUS" TURRET SHIP (LAUNCHING)

The Mechanics Magazine, December 11 1868

On the afternoon of Wednesday week, the first armour—plated war vessel on the turret principle, built on the Tyne, for the Government, the "Cerberus," was launched from the building—yard of Messrs. Palmer and Co. (limited), Jarrow. She is 500—horse power, and is intended for the colonies, having been designed by Mr. E. J. Reed, the Chief Constructor of the Navy.

Her dimensions are:— Lengths between perpendiculars, 225ft.; length of keel per tonnage, 195ft. 7¾ in.; breadth extreme, 45ft. 2in.; depth of hold, 16ft. 6in.; burden in tons, O.M., 2107 23–94ths; moulded depth, 18ft. 6in.; loading draught, 15ft. 6in., leaving only 3ft. side exposed when in action.



Launching of the almost identical HMS Cyclops 2½ years later.

The turrets are situated at the fore end and the other at the after end of the breastwork. Each turret is 21ft. 3in. in diameter, and constructed of a shell skin of ½-inch plates in two thicknesses, upon which is built the backing of wood and the armour-plating, of equal thickness to that in the other portions of the ship. The turrets are revolving, being worked by auxiliary engines, and moving upon a centre spindle of great strength. Each turret will be manned by two 450-pounder Armstrong guns, each gun being 18 tons weight.

To give additional protection, however, to the men, the upper deck is of greatly increased strength, to withstand the battering of any raking shot. Along side the base of the turrets, and fore and aft, are placed the berths and cabins of the officers and crew, providing accommodation for thirteen officers, five engineers, twenty–five marines, fourteen stokers, and ninety–eight seamen, making in all 155 men.

Below the turrets and breastwork is a lower deck, on which are arranged the usual store—rooms, powder magazine, shot—rooms, &c. The hull of the "Cerberus" is divided by seven bulkheads, each being water—tight, and the bottom of the ship is double, so that if the outer shell or skin should be damaged by any means, the water can only get into one tank or compartment, and so the safety of the ship and crew is secured. As a further protection in case of temporary damage, there are five if Downton's large pumps on board, and each pump is connected with the whole of the ship, and can be used in cases of fire.

The "Cerberus" is ordered to be sent to Chatham, at which port she is to be fitted and completed, at the charge of the Melbourne Government, it being intended that she shall be sent to Australia.

1869

BUILDING COMPLETED

The Mechanics Magazine, January 15 1869

In addition to the double screw iron armour—plated turret ship "Cerberus", just completed at the yard of the Palmer Shipbuilding Company, Jarrow—on—Tyne, for the defence of Melbourne, the Government has ordered two other armour—plated turret ships — the "Abyssinia" and the "Magdala" — to be constructed for the defence of Bombay, both vessels being built from the same drawings and patterns as the "Cerberus". We hear that the contract for building the "Abyssinia" has been taken by Messrs. Dudgeon of Poplar, and that for the "Magdala" by the Thames Iron Shipbuilding Company, Blackwall.

TRIAL TRIP

The Mechanics Magazine, June 11 1869

The new turret ship built by Messrs. Palmer and Co., Jarrow—on—the—Tyne, for the Admiralty, made a trial trip off the Northumberland coast on Saturday, and her performance was deemed satisfactory. She left for Woolwich on Tuesday, and thence she will be despatched to Melbourne, Australia, where she will be kept for the defence of the harbour.

RUDDER TRIAL

The Mechanics Magazine, August 13 1869

The "Cerberus" turret ship was recently taken down the Channel, outside the Nore, for the purpose of testing the working of her balance rudder since the alterations made in the steering arrangements of the vessel. During the trial the vessel was found to steer in a far from satisfactory manner, and she will again be docked for the purpose of having some further improvements made in her rudder.

THE CERBERUS

TEMPORARY FEATURES

Williamstown Chronicle p.4, February 5 1870

An additional number of iron shipwrights have been entered at Chatham Dockyard for employment on board this armour—clad double—turret ship, 4,250 horse—power, which is being rapidly brought forward for sea, in order that she may be completed with the utmost despatch, as she is required to be finished by an early date, and sent to Australia. She has had an additional iron deck placed on her, in order to enable her to be navigated to Melbourne; and she is also to be masted. On her arrival at Melbourne she will have her temporary iron deck and bulwarks removed, one of the officials from the dockyard proceeding out in her to superintend the operation. There is a good deal to do in making her iron bulwarks and upper deck — intended merely for the purpose of the long voyage — and she will probably not be floated out of the dock till May next. This ship is an instalment of that fleet of the future when colonies shall pay entirely for their own defence. — European Mail.

ARRIVED IN MALTA 1

The Malta Times & Service Gazette November 30 1870

The Cerberus, double screw iron armour—plated turret—ship, carrying four guns, arrived at Malta, on Sunday morning, 20 days from Plymouth and 10 from Gibraltar. This vessel was recently constructed in England for the defence of the harbour of Melbourne, and will leave for her destination via the Suez Canal on Friday next. She is under the command of Capt. W.H. Panter, formerly a Navigating Lieutenant in the Royal Navy.

ARRIVED IN MALTA 2

The Malta Times & Service Gazette – Supplement December 7 1870

The departure of the Colonial turret-ship Cerberus for Melbourne, via the Suez Canal, has been delayed in consequence of bad weather. She was visited on Saturday afternoon by the Commander-in-Chief Sir Hastings R. Yelverton, K.C.B.

ARRIVED IN MALTA 3

The Malta Times & Service Gazette December 14 1870

During the stay of the Colonial turret-ship Cerberus in this port, we regret to say that a spirit of insubordination manifested itself amongst some of the crew, and 25 of them have been tried before the Magistrates on charges of this nature and for quitting the ship without the Captain's permission.

It is satisfactory to state, however, that the vacancies thus occasioned have been quickly filled by English and Maltese volunteers; and that several of the men in prison petitioned the Government to be allowed to rejoin their ship for the voyage to Melbourne, although their prayer was not granted, it is not being supported by the Captain of the ship. Two Maltese, Pietro Spiteri and Michele Calleja, also of this vessel, are now under

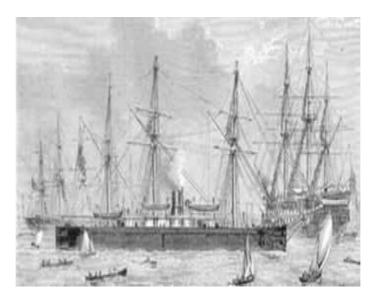
examination before the Magistrate Dr Grungo, on a charge of fraud. They were engaged here as stokers, signed the ship's articles as such, and accepted a note of advance for one month's wages (5.10. each), payable by Mr Azzopardi, the Ship's Agent, three days after her departure. This note was cashed at a small discount by Mr Giuseppe Bartolo. The men then went on board, and after remaing a few hours left the vessel, declaring that they would not proceed in her, "as they did not like the ship". Having disposed of the money, and being unable to restore it to Bartolo, they have thus committed a fraud, which renders them liable to several months' imprisonment. The Cerberus left on Sunday for Australia via the Suez Canal.

THE ARRIVAL OF THE CERBERUS

BENEFITS

The Age April 10 1871

The arrival of the Cerberus in Hobson's Bay yesterday must be a relief to the timid souls who had been scared by the report of a possible filibustering expedition, or who were inclined to attach undue importance to the visit of his Imperial Russian Majesty's corvette Haydamack. So soon as the additions which were necessary to bring the Cerberus to these shores have been removed, the colony will possess a harbor defence powerful enough to repel the attack of a squadron of ordinary men-of-war; while the difficulties which have attended the voyage of the first turret ship that has ever come half-way round the world, to say nothing of the melancholy fate of the (ship) Captain, are sufficient to deter any attempt being made to attack this port by a ship of the same class, Captain PANTER, his officers and crew, may well be congratulated for the feat they have performed in bringing, after a weary voyage of six months' duration, their ship safely from Sheerness to Melbourne. Their labors can only be disparaged for reasons similar to those which induced the Spanish courtiers to treat with derision the discoveries of COLUMBUS. Other men might have displayed equal courage, zeal, and determination, but it must never be forgotten that they were the first to make the egg stand up on end.....



Cerberus arriving in Pt Phillip Bay with temporary Barque Rig and raised sides. Australian Illustrated News, April 22, 1873.

There seems no reason to doubt that the Cerberus will give an excellent account of herself should she ever be engaged in actual battle. But the possession by this colony of a ship of her class is likely to keep unwelcome intruders from our coasts. The officers of the Haydamack, who were busily engaged yesterday in inspecting this latest arrival, and who seemed astonished to find that the turrets were up and the guns actually in position, will be able to inform the authorities at Cronstadt and Petropaulovski that the colony of Victoria has taken time by the forelock, and is prepared for every possible contingency. Ships like the Cerberus will strip naval warfare of its romance and panoply. It will no longer be a matter of dash and gallantry, but of science and calculation. Future Nelsons will have to obtain fame from their knowledge of machinery afloat, and the best officer will be he who can live the longest in the half–stifling atmosphere of the breast–work deck, the pilot box, and the turret, and who can induce his men to work their guns even when they have been deprived by the failure of the ventilating apparatus of a sufficiency of vital air, and nearly reduced to the position of the unhappy mouse under the airpump, so familiar to our boyish days. The Cerberus has been an expensive ship; from first to last she has cost £ 150,000. But if she be the last in the long list of costly items which make up

the million of money which has been expended upon the defences of this colony, she will not be unsatisfactory even as a matter of finance. The first necessity for a state is security, and since our statesmen will not take the obvious means that has been pointed out to preserve our neutrality, the next best thing is to place ourselves in a proper state of defence. With the Cerberus well manned and properly officered, there should be no reason to dread any force which is ever likely to be brought against us.

ARRIVED IN MALTA

Newspaper Name Unknown 1871

The turret system has received another and not very satisfactory illustration in the behaviour of H.M.S. Cerberus on her voyage to Australia. We only hear of her from Malta, and, so far, we cannot congratulate her constructors upon the success of her first sea voyage. She is reported to roll as much as forty degrees each way, and to pitch tremendously. Sometimes the whole part of the ship as far aft as the foremast was entirely lost sight of, and her decks were quite under water. With only room for 200 tons of coal on board, she is compelled to burn from 25 to 30 tons a day, in order to attain the very moderate speed of 5½ or 6 knots an hour. How she was to get from Aden to Galle, 2,100 miles, was a problem which her commanding officer had yet to solve. Either he must get a vessel to accompany him or meet him half way with coals, or he must charter tugs to pull her along. To add to the difficulty, and as if to afford additional evidence of the danger, numbers of the crew have deserted, and many express their preference for six months' hard labour in gaol to six weeks on board this uncomfortable vessel. Happily her freeboard is some-what higher than that of the Captain, and we trust that this circumstance may prove her salvation. One thing seems proved to demonstration - turret-ships, whether of high or low freeboard, cannot afford to carry masts. Of course, no one will be astonished to hear that, as the Cerberus appears to be such a very unstable sea-boat, the Government have now in course of construction four vessels of this type, the Cyclops, the Hecate, the Gorgon, and the Hydra. Without wishing to cause any needless alarm, we can only add our most ardent hope that we may not this year have a Cerberus catastrophe as a sequel to the Captain disaster of last year.

ARRIVED IN ADEN

The Argus Date Unknown

THE CERBERUS. – It is welcome news to learn that the Cerberus has arrived safely at Aden, having successfully encountered the fitful weather of the Mediterranean, the dangers of the narrow passage of the Suez Canal, and the reefs and shoals of the Red Sea. Lieutenant Panter writes from Aden, January 10, and says the heat of the weather and the slow progress nearly "cooked" him and the ship's company.

They left Suez on Christmas Day, and got through the canal in three days, but it was slow work doing 80 miles, for he was afraid to go faster than two knots and a half, as the vessel would not remain straight for two minutes together. She touched thrice, but so slightly that the composition was not taken off her bottom. In some parts she had only just room to pass.

Previously no vessel had gone through with such a beam, 45ft. at the top and 43ft. at the bottom, and, as her two screws stuck out on each quarter, they would be the first to take the ground or rather bank. However, to the great delight of her gallant commander, all that danger was over. It was "awfully hot" coming down the Red Sea, but Lieutenant Panter caused the sides of the vessel to be whitewashed and the effect was cooling. So soon as the Cerberus got to this side of the Isthmus, her compasses went adrift, and anxious work was the consequence, but fortunately the weather was clear, and Lieutenant Panter was able to take plenty of observations.

His intention was on leaving Aden when his engines were ready – expected to be two days afterwards – to

steam up the coast about 600 miles, so as to get well to windward, and then steer for Galle. He had taken in 400 tons of coals, and hoped to arrive all right at his second resting place. The ship's sails, he states, were next to useless, as she would not move with them unless it were blowing a gale, and then it was not safe to set them; but still he would have been sorry to have started from England without them lest her engines broke down. His intention was to go from Galle to Padang, on the coast of Sumatra, thence to Sourabaya, in Java, and then strike down south for Perth or King George's Sound. It was a long way round, but, as the wind was south—east, it was the only way he could see of doing the voyage. "Melbourne Argus."

THE ARRIVAL OF THE CERBERUS

The Leader April 15 1871

For the first time since the introduction of iron-clad vessels into the navies of the world have we to chronicle the feat of one of them having unassisted circumnavigated the globe.

Contrary to all expectations, Lieut. Panter has succeeded in bringing the iron-clad monitor Cerberus into Hobson;s Bay before the mail steamer arrived. According to his last advice, dated Galle, he was in hopes that he would arrive in Melbourne by the middle of April, and it was therefore expected that the incoming mail would have brought news of the departure of the Cerberus from King George's Sound, but to the surprise of everybody telegrams were received from Cape Otway about five p.m. on Saturday, stating that the Cerberus was off the Cape. This out everybody on the qui vive, and, at an early hour on Sunday a sharp look out was kept for the arrival in Hobson's Bay of the latest addition to the Victorian Navy. Nothing however, was seen of her until about twelve o'clock when her hull was seen looming in the West Channel, and by half past twelve o'clock she had passed the lightship, and shortly after bought up off Williamstown, about two cables lengths astern of the Nelson.

When she was first sighted down the Bay, Captain Payne, chief harbour master, and Mr. Call, P.M., put off in the harbour boat, and proceeded to meet her, but beyond this no official notice was taken of her arrival; and coming out, as she did, under the merchant flag, she was only boarded in the usual manner by the customs authorities. Some little recognition of her quality was however given as she steamed past the Nelson, the boys of which manned the rigging and saluted her with three hearty cheers, the ensign being dipped at the same time. Shortly after her anchoring Captain Koltovakoy, of H.I.R.M.S. Haydamack, sent an officer on board with his compliments to Lieutenant Panter, but some little doubt exists as to whether this was in strict accordance with naval etiquette, the Cerberus at present only flying the merchant flag. It was, however, a graceful compliment on the part of the Russian Captain, and as such should be appreciated.

No sooner had the iron—clad anchored in the Bay than the news was disseminated throughout the suburbs, and there was a general rush to Sand ridge in order to have a look at the novelty. The boatmen at the pier drove a roaring trade, and in a very short time the decks of the vessel were crowded with a throng of gaily dressed pleasure seekers, who swarmed over every part from hurricane deck to stoke hole. The crew were very obliging, and eager to show the visitors over every part; but owing to the crush, it was impossible for everything to be seen at one view.

As the Russian corvette Haydamack was gaily dressed with flags, it was currently believed that this was done as a compliment to the Cerberus. Such, however, was not the fact, the vessel having been decorated at an earlier hour in the morning in consequence of its being Easter Sunday, which day is a great holiday in Russia. Upon approaching the Cerberus, great disappointment was expressed at her appearance, which at present is so very different from what we Victorians had been led to expect by the description and photographs received of her. She now looks like an elongated gasometer fitted with masts and yards, and sent to sea on an experimental cruise.

Her sides, of iron, are perfectly straight from the water's edge to the top of the bulwarks, her stem and stern being precisely similar, and she now floats with a side of about eleven foot above the water's edge. She will, however, present a totally different appearance when the top hamper which was put upon her to allow of her being safely navigated to this port, is removed. Her deck will then be only about two feet above the water's edge, only showing her fighting turrets, funnel, ventilators, and armor(sic) plated pilot–houses.

CONSTRUCTION

To commence with the history of this iron-plated vessel, it may be said that about two years since an arrangement was made by the Victorian Government with the Imperial Government for the construction of a turret guard ship for the port of Melbourne to be maintained by the Victorian Government.

Designs were accordingly made by Mr. E.J. Reed C.B., Chief Constructor of the Navy, and the work entrusted to Palmer's Shipbuilding and Iron Company, Jarrow-on-Tyne.

This vessel was the Cerberus, and is the first vessel of her particular class that has been completed. She is described as an iron-plated twin screw turret ship with monitor deck and raised breastwork. Her dimensions are as follows:—Length, 335 feet over all, breadth of beam 45 feet, depth of hold, 16½ ft and with a registered tonnage of 2108 tons. The peculiarities of this vessel are that her sides, from some feet below the water line to the gunwale of the main or monitor deck, are covered with solid armor(sic) plates, 8 in. thick, with teak backing, and a strong framework behind.

The main or monitor deck, when the vessel is in her proper trim will be about 2 ft above the water line, although at present forming a second or lower deck. When in her normal condition, therefore, the only thing presented to the fire of an opponent would be the two turrets, the pilot house, companion and funnel, all of which are armor (sic) plated. The whole of these are contained in what is termed breastwork, which rises about 7 ft. above the main deck. The breast work is constructed of iron, covered with teak, and faced with armour plates 9 in. thick, so as to render it invulnerable. At each end of the breastwork rise the fighting turrets, each of which contains two 400 pounder Woolwich muzzle loading rifled guns, lying parallel to one and other, their muzzles projecting through small port holes in the turrets. Above the breastwork is another and smaller deck, which is supported on stout iron stanchions. From this deck access is obtained to the interior of the breastwork by means of two small companions, and where at present the steering apparatus for use in fine weather is fixed.

There is also two large ventilators for applying fresh air to the lower portion of the vessel in action, in each of which ventilators is fixed two pair of revolving fans worked by a small steam engine. The Cerberus is well supplied with engines, having no less than 12 in all. Four of these are employed in working the fans for ventilation purposes. Two are used for revolving turrets when in action, one is used for hoisting up the ash from the stoke hole, one is used for heaving up the anchor if required, and the other four are for working the twin screws. These latter consist of two pairs of horizontal double piston rod low pressure marine steam engines, with jacketed boilers, surface condensers, and double acting air—pumps of the power of 250 horses, each engine being 62½ horse power. These engines work twin screws, of four blades, one fixed, on each quarter of the vessel, and are also supplied with five tubular boilers.

The weight of these engines is 80 tons, and of the boilers 93 tons. When tried at the measured mile in Stoke's Bay, the greatest speed attained was at the rate of $7\frac{1}{2}$ knots per hour, but this was beaten coming up the Bay yesterday, when a speed of $9\frac{1}{2}$ knots was attained with a full head of steam. The armament of the Cerberus consists of four 18 ton Woolwich muzzle loading rifled guns of 10 inch bore. These guns weigh 18 tons each, and carry a shot weighing 400 pounds, being the largest guns yet seen in this colony. The total weight of her broadside is 1600 lbs, and to supply the necessary material for these guns she carries 360 common shell, 24 Shrapnell(sic) shell, and 30 case shot.

The guns are contained in the two armour-plated turrets previously spoken of, which revolve by means of two small steam engines. When in action the captain is seconded in a separate turret, which has small slots, from which he has a fair view of what is going on around. From this turret speaking pipes communicate with the two gun turrets, the engine room, and the helmsman, who is stationed within the breastwork below out of harm's way. The officer in charge of each turret receives orders from the captain by means of a telegraph, and having laid his guns to the required elevation, fires them simultaneously by means of a small handle communicating with the trigging gun. The centre of the guns can be raised or lowered at pleasure by means of

a very simple contrivance, and the elevating screw at the breech of the gun is easily worked by one man. The heavy recoil of the gun is prevented by indiarubber cushions of great thickness, which received the whole weight of the gun after firing. It might be anticipated that the explosion of such a charge would fill the turret with smoke, but such is not the case, the muzzles of the guns projecting far enough from the turret to prevent anything of the kind.

The only smoke in the turret is that issuing from the vent of the gun, which is necessarily small.

The boats carried by the Cerberus are six in number, consisting of one lifeboat, three cutters, one gig, and one dingy. The method of lowering these boats is rather novel in consequence of the davits being attached to the breastwork, and the boats therefore hanging immediately over the main deck, although level with the hurricane deck; but these davits are constructed with a hinge and key, and when the boats are required to be lowered the key is knocked out, and by means of tackle affixed to a purchase stanchion on the hurricane deck, the upper portion of the davits is lowered with the boat until clear of the ship's side, and the boat is then lowered away in the usual manner. In order to bring the vessel out to the colony it was thought advisable to build another deck upon her level with the upper portion of the armor(sic) plated turrets and above this has been raised an iron bulwark in the manner as the merchant ships.

The whole of this will, however, have to be altered, the masts and yards at present in use removed, and small lower spars put in their place, as it is not intended that the Cerberus shall carry any canvas when put to her intended use. During the greater portion of the voyage out the decks have been lumbered up with coal and stores, and in order to counterbalance the extreme weight thus thrown aloft, water has been pumped into the bottom of the vessel, in order to keep her steady when in a heavy seaway, but, owing to her flat bottom this has been found almost impossible.

The proposed number of crew, including officers, is 155, but at present she has not that number, owing to several changes which have taken place at various ports on the route, where men have been left behind in consequence of their unwillingness to proceed further on the voyage in such a strange vessel. This does not appear strange upon close examination of the ship as she at present appears. Her decks are low. and air within them close and stifling. Outside the iron—clad breastwork and within the present temporary side of the ship, is a narrow passage, running the greater portion of the ship's length, in which there is not the slightest ventilation, and, as at present constructed, this appears to be one great defect in the vessel. Going aft, however, the officers quarters are found to be far more airy and comfortable, thus leading to the supposition that, while the comforts of the gentlemen living abaft the mainmast has been attended to, that of the foremast hands has not been thought worthy of attention.

The officers at present on board are: – Lieut. Panter, R.N. command; Mr. A. Wigney, first officer; Mr. W. Levy, third officer; Dr. J.J. Macan, surgeon; Mr. H. Leslie, chief engineer; and messrs J.H. Williamson and Campbell, passengers. These two gentlemen have come out on the Cerberus to take charge of the dismantling of her, and place her in proper condition, before she is finally handed over to the Victorian Government, although they have nominally the sole control of her. Both these gentlemen are in the service of the Imperial Government, and at, the conclusion of this business for which they have taken this long voyage, they will at once return to England.

It may not be out of place to mention that the total weight of the Cerberus, as she at present lies in Hobson's Bay, is 3396 tons, but this will reduce to 3169 tons upon the removal of the top hamper, which has been built upon her, and weighing no less than 227 tons. The total of the Cerberus until her arrival in Hobson's Bay may safely be put down at £ 150,000, but of course this does not include the amount necessary to put her in proper condition for active service, which will necessarily swell the bill to the tune of a few more thousand.

THE VOYAGE

With reference to the passage of this unique vessel of war, we may remark, that twelve months has scarcely elapsed since Lieut. Panter left these shores for the purpose of bringing out the Cerberus to Port Phillip Bay. He left Melbourne by the English mail on 24th of April, 1870 and has consequently arrived within a fortnight of the twelve months. When on his way to england he successfully made arrangements with the necessary authorities for the Cerberus to pass through the Suez Canal. He arrived in England in June, and at once

reported himself at the Admiralty, presenting his credentials from the Victorian Government authorising him to take charge of and bring out the new war ship.

A long wearisome delay thereupon took place in order to decide under what flag the Cerberus should be sent out, as there was no precedent for a ship of her class being navigated under the merchant flag. This question was not satisfactorily settled until the early part of October 1870, the ship meanwhile lying at Chatham fitting up. During the whole of these five months Lieutenant Panter was unremitting in his attention to his duties, not being absent from the ship for more than forty–eight hours.

At last the business of taking in stores for the outward voyage was commenced; but at this time only twenty—five men had been shipped, and as the shot weighed 400lb each, the work was necessarily slow. When the Cerberus was handed over to Lieutenant Panter by the Admiralty, there was not a single article in the way of stores on board of her, and he therefore had the whole of his work to do to get the vessel ready for sea. At this stage of the proceedings another piece of red tapeism cropped up, and Captain Chamberlain, superintendent, objected to the vessel being supplied with provisions from the yard, as they did not come under the title of stores. This question had to be referred to the Admiralty, entailing a further delay of three weeks, but at last the matter was decided in Lieut. Panter's favor (sic). Everything being on board ready for sea, it was discovered that the two shot rooms were on the one side of the vessel, and 40 tons of shot having been taken on board against 20 tons of powder on the other side, the vessel had a strong list of six degrees.

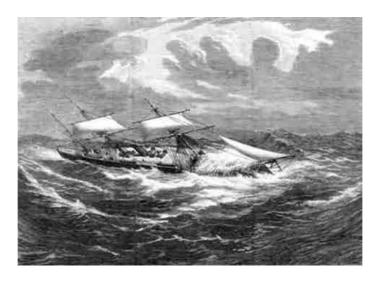
Another communication was forwarded to the Admiralty, requesting them to have this defect remedied, as the vessel was to be handed over in good condition. A reply was received from the Admiralty instructing him to fill up one of the watertight compartments, so as to bring the vessel on an even keel. Lieutenant Panter however, objected to this course, and after some little further delay the officials at the Admiralty agreed to remedy the defect, which caused a further delay of four days.

All these little inconveniences having been adjusted, the Cerberus proceeded down the river to Sheerness to adjust her compasses, which were found to have a deviation of 66 degrees. This matter being settled, on 29th October the Cerberus made her fair start on her voyage, the first port of call being Plymouth. In the Downs, however, she met with a stiff gale of wind, which, with a heavy head sea, tried all her seagoing powers, and kept her lower deck thoroughly washed the whole time. Indeed, to such an extent the latter process carried that the whole of the twenty–five men comprising the crew were consequently employed in baling the deck out with buckets.

During this gale the vessel was perfectly unmanageable, as she would neither steer nor steam more than $1\frac{1}{2}$ knots per hour, but as the cause of this was set down to her trim, it would be fully anticipated that the next port would put the matters right. Spithead was at last reached, and, as showing the heavy weather then prevailing, it may be mentioned that on the day following no less than sixty vessels put into the anchorage through stress of weather.

Proceeding thence to Plymouth, which was to be the final port of departure from the English coast, the crew of able seamen was increased from twenty–five to sixty–five, although the announced loss of H.M.S. Captain militated strongly against a full compliment of men being taken on board, the port was left on the 7th November. Two days afterwards a very heavy breeze sprang up, which lasted until the 12th. During this time the Cerberus behaved in a very bad manner, rolling so heavily that on one occasion the bilge pieces were fairly thrown out of the water. the ship rolled quite 45 degrees each way, and it is a current rumor (sic) in the ship that a man who was asleep on the lockers at the time she rolled so heavily was thrown about thirty feet without touching the ground. At this time the only canvas shown was a closed reefed main trysail with the head hauled in and a staysail or fore trysail used occasionally. Even with this canvas and the steam it was found almost impossible to keep the vessel head to wind, and Lieut. Panter puts this down to one of the worst gales he has experienced.

Upon arriving at Gibraltar a few days subsequently he was told it was a far heavier gale than the one in which the Captain was lost, and surprise was convinced that he had not to cut away his masts.



In a gale in the Bay of Biscay. (North of Spain) *Australian Illustrated News*, January 30, 1871.

This was particularly stated, as he carried 1900 tons above the water mark, and only 1800 tons below the water line. The admiral at gibraltar told him that he should not allow his vessel to roll more than ten degrees before he cut his masts away, but this advice he had not found it necessary to carry out. Fine weather was experienced through the Mediteranian Seas, and also through the Suez Canal and Red Sea, and our latest advice from Galle, dated 2nd March, stated that the Cerberus would leave two days subsequently. This turned out to be correct and variable north—east winds with fine weather were experienced to Batavia.

A short stay having been made a start was made for Australia, but strong N.W. winds and heavy weather were met with to N.E. Cape, from whose fine weather was experienced to Freemantle. A departure was taken from thence to King George's Sound on the 19th March, the latter port being left on 30th ult, and an arrival made here on Sunday.

The Cerberus was on Thursday towed along side the breakwater at Williamstown where she will be dismantled. The work of removing her bulwarks and other top hamper will be carried out under the supervision of Mr. J.R. Williamson, assisted by Mr. Thos. Campbell, those gentlemen having come out from England for that purpose.

Captain Panter has received through the hon. the Treasurer, the thanks of the Victorian Government for his successful achievement in bringing the Cerberus safe to port, and also of a notification of his promotion to be the senior officer of Victoria under the New Discipline Act in the Victorian Service.



Captain Panter

Australian Illustrated News,

May 20, 1871.

ARRIVAL OF THE CERBERUS

The Geelong Advertiser, April 22nd. 1871

The arrival of our ironclad, the Cerberus, on the 9th. April, created a considerable amount of excitement, it having been the opinion of many that she would never reach Victoria. This opinion was grounded on a letter received from her commander, Captain Panter, about a month previously, and which led many to suppose that she would never be able to carry sufficient coal to cross certain portions of the ocean, her sailing qualities being anything but first–class. We have got her, however, safe and sound, and there is a general opinion that Captain Panter has shown excellent seamanship. There can be no doubt his task was both a very difficult and somewhat perilous one. She steamed up the Bay at the rate of nine miles an hour, and when she arrived at Hobson's Bay, the boys of the Nelson manned the yards, and the Russian gunboat, the Haydamack, was a cloud of gaily coloured bunting. Captain Panter has since been appointed captain and senior naval officer of Victoria. We append an account of the voyage, which will doubtless be found interesting: —

OFFICIAL REPORT OF LIEUT. PANTER.

H.M.V.S. Cerberus, Hobson's Bay, 10th. April, 1871.

Sir, – In forwarding a copy of the log of this ship since I took charge of her from the Imperial Government, I have the honour to make the following report of my proceedings since I left Melbourne, on the 24th. of April last: –

On my arrival at Suez I visited the British Consul, with a view of getting information about the canal route, and having received a letter from his Excellency the Governor to the Consul-General in Egypt, asking him to afford me all the information he could on the same subject, I called on him at Alexandria, and from the information I gained I came to the following conclusion:

1st. That it would be useless to ask for a remittance of canal dues for the Cerberus, as it had then become an undoubted fact that vessels of any size could adopt that route, the transport Jumna, of 4000 tons, having gone through; but I found that, by being a man-of-war, I should only have to pay dues on my registered tonnage.

2nd. That there was plenty of water, but that the great difficulty would be in getting a vessel with such great breadth of bottom as the Cerberus has through without touching, particularly as her screws project well out on each quarter.

3rd. That Port Said was the best place for coaling, as it was generally about 38s. per ton there, and 54s. at Suez.

I then made up my mind that on account of the great expense of coals, as by this route it would be entirely a steaming voyage on account of adverse winds, and also the danger of getting the ship through, I would not adopt it if I could possibly avoid it.

On my arrival in England on the 13th. June, I reported my arrival to the agent–general, and also the Admiralty, informing them that I had been sent by the Victorian Government to take charge of the Cerberus for the purpose of navigating her out to Victoria, and that I was ready to receive her as soon as their lordships would hand her over to me.

At that time only two of her guns were in, and a great deal required to be done to her hull before she would be ready for sea.

On the 21st. of June I saw the chief constructor, and spoke to him on the advisability of trying her at sea with her guns and stores in, so as to ascertain her sea–going qualities, as she was the first vessel of this description that had been built, and I had a long voyage to make. He informed me that he considered it most desirable that she should be tried under all circumstances. On the 22nd. I wrote to Mr. Verdon on the subject, drawing his

attention to the fact that, as she had never been at sea, I could not decide as to which route to adopt until I knew her sea going qualities, and also that, should I have to try her myself, with my own crew, I might find defects which would require alteration, and that during the time they were being effected I should have to pay my men, which would entail a great expense on the Government; also, that I could not decide about taking my guns in the ship until I had seen her at sea, and that the chief constructor had advised me to apply for a trial.

Mr. Verdon forwarded my letter through the Colonial Office, but I never received any answer except an acknowledgement that my letter had been received.

On the 11th. July, soon after the outbreak of war, England was in such an unsettled state – everyone expecting that she would be involved in it – that I thought it was of the greatest importance that the Cerberus should get out as soon as possible, and I wrote to Mr. Verdon, offering to take her out without a trial, as there did not appear any chance of a speedy one; but at the same time suggesting that I thought it would be of great importance to get the opinion of the Admiralty as to whether they thought there was any cause for me to leave as soon as possible, and also as to the route they advised me to take.

In answer to this letter I was informed that under the existing circumstances they advised my getting to Melbourne as soon as possible, although they strongly advised me to go via the Suez Canal. I also took the opinion of Colonel Pasley and Captain Chamberlaine, superintendent of the Chatham Dockyard, and both gave me the same advice; but they thought I had better send my guns out via the Cape. I then suggested for the second time that the ship should be handed over to me, for at that time I had no control over her. I decided on taking my guns and ammunition in the ship, so as to be in an efficient state on my arrival, and also in case of it being necessary I should be in a position to defend myself during the voyage. I also applied to the Admiralty for the services of naval engineers, but they informed me that they could not spare one, as they expected to require them all in a short time, so I had to get them from private firms.

From this date (11th. July) till the 15th. September, I was waiting to receive the ship. She was nearly ready for sea as regards her fittings, but there were no stores on board. I went several times to the Admiralty to ascertain the cause of delay, and I was informed that their lordships had not come to any conclusion as to whether she would go out as a merchant ship or man—of—war. I also looked through the papers regarding the Victoria, to find out in what capacity she left England, and I found out she was not under any act, and therefore her men were not under any discipline act; but as the Cerberus was a different kind of vessel, and there was a European war going on, I did not think it right she should leave England without a clear understanding as to what regulations she was under.

Finally it was settled she should sail with a special pass from the Board of Trade, and on the 15th. Sept. I received a letter from Capt. Chamberlaine, the superintendent of Chatham Dockyard, informing me that he had orders to deliver the ship over to me when I was ready to receive her.

I informed him that I would take charge of her the next day, which I did, and then commenced shipping my officers and crew. I found no great difficulty in getting officers, with the exception of engineers, but I could not get any men. I had previously got the names of all I wanted, but when I placed the "notice" up in the town none came, and I then found that on account of the foundering of H. M. S. Captain, only five days before, the men would not come, and the whole time I was at Chatham getting my stores on board, which took me till the 22nd. of October, I could only get 25 men, and most of them of indifferent character; and to keep them on board I had to get a police boat to pull round the ship all night. When I got my powder and shell on board, I found that, owing to both the shell rooms being on the starboard side, the ship had a heel of 6deg. I wrote to the Admiralty about it, requesting that one of the shell rooms might be shifted to the port side. At first they wished me to fill up one of my compartments with water to counteract it; but I objected to that as I did not think it would be right to have to keep 25 tons of water continually in the ship, as it would increase her draught of water, and prevent her going through the canal, or over the banks at the entrance of Hobson's Bay. They then agreed to alter it, and I had to get all my powder and shell out again, and it took till the 22nd. of October to make the necessary alterations. On the 24th. I proceeded to Sheerness to adjust my compasses, and I found that they had such a great error, 66 degrees, that it was necessary to shift them, which I did, and finished the adjustment on the 28th.

On the 29th. of October, at daylight, I sailed for Plymouth, but soon after passing Dover I experienced such strong head winds, and the weather looked so threatening, and also being so very short—handed, I put into Spithead, and remained there till the 31st., as it was blowing a strong gale all the time, when I started again for Plymouth, arriving there on the 2nd. of November. On my passage I found that there was no means of getting the water off the lower deck except by bailing with buckets, and as I had already had 2ft. of water below, I decided on having two pipes let into the deck, so that the water would run into the main drain pipe. I could then pump it out. This I had done at Plymouth, and after coaling and getting some more men I sailed on the 7th. November for Gibraltar. On my passage across the Bay of Biscay I encountered a very heavy gale, and for some hours on the 15th. I expected she would have turned over, as she was rolling to 40deg. both ways, and at times some of her bottom was out of the water, and I had been informed at the Admiralty a few days previously, that I was never, if possible, to let her go over more than 10deg.

The gale lasted till the 12th., when I was off Finisterre. I then fortunately had fine weather to Gibraltar, where I arrived on the morning of the 27th., (sic – 17th.?) only having five tons of coal left. Here I found great difficulty in keeping my men on board, so much so that I had to get the assistance of the military and police. After coaling I sailed again for Malta, on the 20th., where I arrived on the 27th. The crew broke out of the ship as soon as I anchored, and I had to send twenty–five of them to gaol. I found it was necessary to take strong measures or I should have lost them all. In some cases they said they would sooner go to prison for six weeks with hard labour than toil in the ship. With the exception of the "stokers," I did not fill up their places, as I had already found that I should never be able to do anything with the sails, and therefore should not want so many men. After coaling and cleaning the ship's bottom, which was very dirty, and overhauling the engines, I was on the point of starting when a heavy gale set in, which kept me a week longer in harbour. I sailed from Malta on the 11th. December, and arrived at Port Said on the 19th. During my passage I had fine weather, and I tried the ship under all circumstances. Both sailing and steaming, but she would do nothing under sail.

On my arrival at Port Said I visited the canal authorities, and tried to get them to let the ship go through with the tonnage she was before her top—sides were put on, which was only 800 tons. This I found they would not do, so I requested them to re—measure the ship, as I was not satisfied with the measurement I got at Chatham. They did so, and I got through with a tonnage of 1,154, instead of 1,307 (the Chatham measurement). As her steering qualities were so bad, I deemed it prudent to take a tug through the canal, and, after taking in 198 tons of coal, I started at daylight on the 21st., and arrived at Suez on the evening of the 23rd. I found, owing to her great beam under the water, 43ft., and her screws projecting so far out on each quarter, and also her bottom being only half an inch thick, that it was very dangerous work getting her through, for if her screws had touched they would have broken, and if her bottom had struck at all hard it would have bent it, so I only proceeded at the rate of about two miles per hour. I just touched twice, but not hard enough to take the paint off her bottom.

The Magdala, her sister ship, which came through about a week afterwards, broke her screws. For ordinary ships I don't consider the navigation of the canal is difficult, but the Cerberus took up certainly three times as much room as any other ship would. On the 24th. I took in 30 tons of coal, and proceeded down the Red Sea on Christmas morning at daylight. The first night after I left Suez my compasses altered their deviation, which very nearly put me on shore twice: it was blowing a fresh gale, and there was no anchorage, so I had to go on; the next morning, as soon as I could get observations, I found out the cause. I made a very fair passage to Aden, where I arrived on the 6th. of January, and after overhauling the engines and taking 400 tons of coal on board, 200 tons of which I had to stow on my decks, I started again on the 14th. for Galle. I had to steam nearly 600 miles up the coast of Arabia before I could stand out to sea, on account of the N.E. monsoon, which at this time of the year blows from the E.N.E., and then I kept away from Galle, arriving there on the 31st. January. I found it necessary to clean her bottom again here, and after doing so, and taking in 325 tons of coal, I sailed again on the 4th. February for Batavia.

I experienced very fine weather all the way, and arrived there on the 17th. and after cleaning the boilers and engines and taking in 305 tons of coal, I sailed on the 25th. for Australia. Soon after leaving the Straits of Sunda I got into very rough weather, and for three days I was close to a hurricane. I had run down the south—west side of it to avoid the centre, which would have been fatal to the ship, and consequently I had to go some distance out of my way; and when I got down to the western coast I had strong head winds for three days. I tried to work her down under sail, but I never succeeded in getting more than a knot and a half out of

her, so I was obliged to go into Freemantle and get enough coal to take me to the Sound, where I arrived on the 22nd. of March, and after cleaning the ship's bottom and coaling I sailed again on the 30th., and, with the exception of the first two days I have had fine weather all the way. I sighted the Otway at half–past 2 p.m. on the 8th., and arrived in Hobson's Bay at 1 p.m. on the 9th.

In conclusion, I have the honour to inform you that the principal causes of my anxiety during the whole voyage have been –

1st., my never having had a trial, and therefore not knowing what stability the ship had; also the general idea amongst the officers, both at Admiralty and Chatham, Sheerness, Portsmouth, and Plymouth dockyards, that she was not fit for a sea—going ship, and further, the bad steering qualities of the ship, as when it was blowing I seldom got her to steer within three or four points of her course each way, and consequently at times she would get into the trough of the sea, which made it very dangerous, as I have had nearly the whole way upwards of 2000 tons of weight above my water line, and only 1800 below it.

2nd. Her sails being almost useless to her, I had always to trust to my engines, and at times I have had to carry 154 tons of coal on my upper deck, which made her roll very heavily.

I also beg to inform you that I have at all times received every assistance from my officers, who have always shown a great desire to carry out my orders, and have performed their duty to my satisfaction; but as regards the men, I am sorry I can not say the same. Having had such great difficulty in getting any men in England, I had to take any one I could get, and, consequently, with a few exceptions, they were all indifferent characters, and have given me a great deal of trouble. I have had to discharge and leave behind me in prison 32 since I left England. I do not think that their behaviour was entirely due to their being afraid of the ship, as I do not think either men or officers knew the state of her stability, and I have not considered it necessary to let them know there was at any time any danger, except so far as it was necessary to make them careful.

I wish also to bring under your notice that, soon after my arrival in England, I found that I should be called upon to serve in the Royal Navy, but as the Victorian Government had entrusted me with the important charge of bringing the ship out, and had also gone to the expense of sending me home for that purpose, I considered it my duty to accept the alternative, and to go on the retired list of the Royal Navy, so as to be able to carry out the orders and to merit the confidence placed in me, and of which I informed the agent—general at the time of making my election in England.

Hoping that the Government will be satisfied with the way in which I have carried out the duty they have entrusted me with – I have the honour to be, Sir, your obedient servant,

W. HENRY PANTER, Lieut. R.N., Commanding H.M.V.S. Cerberus.

REMOVING TEMPORARY WORKS

Australasian May 20 1871

Since her arrival in Port Phillip, some six weeks ago, our turret ship of war the "Cerberus" has undergone a considerable change in her outward appearance. Her brave array aloft of mast and spars, and her expansive equipments of standing rigging and running gear, &c., together with her bulwarks, have all disappeared and this floating fortress will before long be in fighting trim, and ready to offer grim welcome to any hostile invader rash enough to thrust himself within range of her ordnance.

The work of sending down the topmasts, rigging, sails, &c. was carried out by hands employed by the Government for the purpose, but the removal of the top-sides, decks, &c., was performed by contract. The whole of this latter work had been put together in the strongest possible manner – in fact, in such a substantial manner as is rarely seen except in Government dockyards in England – and considering the extra strength of the upper works of the vessel, it is almost surprising that the dismantling process has been got through with

such singular rapidity. The contractor for stripping the "Cerberus", Mr. James Deane, has been by no means idle and during the 11 days he has been at work the decks have been cleared of all bitts, timber-heads, iron capstan and windlass, riding bitts forward and aft, anchor-stoppers, hawee-pipes, and chocks, skylights, companions, combings, deck planks, iron bulwarks, iron topside plates, iron beams, and shelving, and the iron plating attached to the beams and permanent upper deck; these, together with all the cabin fittings fore and aft, put up for the voyage out, have been landed and removed away from the ship. Should no impediment, in the shape of unfavourable weather, or from any other cause arise, Mr. Deane hopes to be able to complete his contract within a month from the present date. The entire work of dismantling has been under the supervision of Mr. Williamson and Mr. Campbell, who superintended the fitting-up of the "Cerberus" and came out in her.

FIRST TRIAL IN VICTORIA

The Argus 21 August 1871

The first trial trip of the Cerberus is arranged to take place to-day, and the monitor is to leave her anchorage at 1 p.m. for the purpose of steaming a few miles down the bay and trying her guns. For this purpose it is proposed that her skeleton crew shall be assisted by a few men of the Naval Reserve. Judging from a question put in the Legislative Assemply last night, it would seem that some of our legislators are anxious to be on board during the trial, but it may be surmised that they know not what they ask. The vessel is to be put in fighting trim, and thus all visitors will have to be either on the flying deck, which can only accomodate a few; or on the fighting deck, which, being only 3½ ft. above the water's edge, is washed by the sea at nearly every movement of the vessel, supposing there is a breath of wind; or in one of the compartments below, where they can see nothing, and the accomodations are not of the most attractive sort. However, the affair is one resepecting which a good deal of interest is naturally excited.

A CRUISE IN OUR IRONCLAD

The Herald Monday Evening August 28 1871

(By a pleasure–seeking contributor)

I have just visited the "Pearl City" in the Cerberus and, wonderful to relate, have survived the experiment, nay, more, have an increased respect for ironclads, and shouldn't in the least object to a similar risk of life, nay, once a week, on an average. Whether or not the splendid Ministerial lunch and sundry bottles of No.2 on board had anything to do with it, I decline to say; but I stick to my first assertion — I like ironclads.

Having "friends at court" I got off from Williamstown in this Harbor-Master's boat, and boarded the monster. When I had last visited her, it was a work of great difficulty to clamber up her steep side ladder; but now, I stepped almost at once on to her deck from the boat. I was introduced to her polite commander, and found him, to my surprise, a much younger man than he represented in the plates of the day.

WEIGHING ANCHOR

From the lower deck I ascended to the flying deck, and from that elevation watched the process of weighing Martin's patent (and ponderously) anchor by the steam windlass. Slowly and surely the links keep rising out of the water, and lots of boys from the Nelson, with crooked rods of iron, fork it up, and pass it below; the hose playing upon it as it comes up, link by link, to wash off the crust of mud, with which it is coated. After thirty six fathoms patent anchor



have been brought up then up comes the unwieldly mud-hook, and the order is passed "easy ahead."

Just then the Rangoon comes close past us, and firing her usual two-guns, politely "dips" her ensign to Her Majesty's colonial man-o-war, Cerberus, and as she goes onto her anchorage at Sandridge, we ponderously put ourselves in motion, and with a great deal of fuss under our stern (I was greatly puzzled at first to know stern from her bow) caused by the revolving of her twin screws, we were off.

I was told she drew 16 feet of water and noticed she got under weigh (I like good words) at 20 to 11.

These facts may possibly interest your readers, but they did not interest me so very particularly at the time, the fact being that I was busily occupied in gazing intensely down a sky-light that I found afterwards belonged to the wardroom, and where I saw a clean white tablecloth spread. What was placed thereon I forbear, in mercy, to tell your readers; suffice it to say, it satisfied me!

So with mind at peace on the subject of famine, I tranquilly again ascended to the upper deck, and found the vessel was steaming a good steady eight knots an hour. The sea had scarcely a ripple on it, and a sea breeze, tempered by the sun, almost made it like a summers day.

I think my next proceeding was to get into conversation with the chief officer, and a very jolly old fellow I found him. He told me, among other things, that he had been thirty years in H.M. Navy.

PATENT LOG

The next thing of interest was the heaving overboard of the patent log, to see exactly how fast we were going, but she frequently stopped to fire guns. I form the conclusion that this patent log business was a "delusion and a mare" for all the use it was made of.

The next motion on board was the event of the day "lunch." The breadth of the beam of the Cerberus is considerable, and still allowing for passages, pantries, and side—cabins, the wardroom is a spacious apartment, but not one—third as large as its requirements demanded on this occasion.

Place aux dames. The ladies took the seats of honor, and such of H. M. Ministers who has risked their lives in their country's service took their seats without the usual oaths, and then there came a scramble, and nothing but the presence of mind of the Parliamentary waiter in charge saved the very tablecloth from being eaten, I believe.

There must be something, after all, in sea air. My recollections of that lunch now are a medley of the popping of champagne corks, and the distant sounds as of fifty blacksmith's shops in full swing.

ENGINE ROOM

At last I went aft, or for ard—I haven't the least idea which—to see what caused all the banging and clanging, and speedily found myself in the engine—room.

I remember Thackeray's definition of what the Mediterranean steamer's engines seemed to say as he lay in bed at night, and which he defined as "spoke-shave! bullock-smithy! spoke-shave! bullock-smithy!" but I defy Old Nick himself to get any sense out of the engines of H.M. ironclad Cerberus. I fancy I caught something in the quick sound of the revolving cylinders, but it sounded too much like oaths to be reported here.

In the engine–rooms the swing–lamps gave a lurid glare, making darkness, and all its horrors of machinery in motion dimly visible, and the clank and clash of the piston–rods deafened the stupefied (I do not particularly allude to the lunch) observer. I was glad to crawl (I think that is the correct term) on the upper deck again, and found they were just heaving over–board a cask, with a flag stuck in the bung for the purpose of firing at.

GUN PRACTISE

I watched the heaving (a good nautical word) of the cask over—board with considerable interest (there was no risk attached to it); but when afterwards I incautiously looked in at one of the turret encumbrances, and I saw a large **** *** bolstar, that my natural instincts told me contained powder rammed down the muzzle of a gun that would have contained me comfortably, I decided that, as accidents do occur sometimes, I would adjourn to a distant portion of the vessel. In a few minutes the vibrations of the screws ceased, and the two steam—pipes blew off, when there was a flash and a crash, and I behold a shot, weighing 4 cwt, flying through the air, and as plainly to be seen as a cricket ball at a match. It struck the water, throwing up a small cloud of spray, and ricocheted (sic) about 100 yards to the right, when it struck the water again, and disappeared. The revolving turret is very simple, and the aim is to be got, tolerably certain.

The captain of the turrets, (not of the gun) controls the revolution of the turret with one hand, while with the other he fires off the gun the instant it covers the object. His head is, necessarily, above the turret, and exposed during the time of taking aim, but it would take a good rifle shot to interfere with him during the few seconds of time he is exposed.

We took on board the pilot about nine miles from Geelong, but Captain Panter piloted us through the narrow channel himself. Directly we were through the narrows we were surrounded by yachts of all sizes, rigs and descriptions, crowded by people, and presently the tug Sophia met us, fairly black with the sight—seers.

It was a quarter past four, and the city of (I was about to say the dead, but I won't, they have been so kind to us!) Geelong was before us, so we thought it incumbent upon us to fire off two blank cartridges, which we accordingly did, and I thought the echoes would never cease, reverberating among the hills. Corio Bay looked very pretty and all the vessels there were dressed for the occasion.

We dropped the "Martin's patent" precisely at 4.30 and I had the honor of being *red where in the captain's gig of the Cerberus of the Senior Naval Officer of Victoria. I was present at the banquet, of course, but I leave the description thereof to other journals.

I noticed that Ministers of the Crown and my bretheran of the press (to use a colonial term) "skedaddled" by the last train, at 9.30; not so myself. I stopped to enjoy myself – with which intention I came down; and have a distinct and grateful recollection of the open hospitality of his Worship the Mayor, and the kind courtesy of the Veteran and senior town clerk of the Australian Colonies.

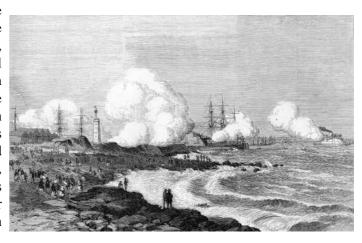
Apropos of the town clerks, the three senior ones were present—Messrs Waire, Eville, and Fitzgibbon.

ATTACK ON THE WILLIAMSTOWN BATTERIES

The Illustrated Australian News April 23 1872

THE ATTACK OF THE CERBERUS

The Williamstown division of the Naval Reserve went on board the Black Eagle at half-past nine a.m., and proceeded to the Sandridge Town River, where they joined the rest of the brigade. The full strength of men and officers was 178, of whom 112 were detached to the Nelson, under the command of Captain Fullarton, while 70 men under the Lieuts. Steel, Elder and Surgeon Curtis joined the Cerberus, the crew of which numbered 29 all told, but there were on Monday, in addition, several of the Nelson boys on board. So soon as the men were at their posts the vessel left her moorings and proceeded under easy steam down the bay, all the men being kept under cover, and



Captain Panter, who was in command, being stationed in the commander's box, so that not a soul was visible as the ship left the harbour. After proceeding some little distance the Cerberus went at full speed, which however did not exceed seven knots an hour, the two masts were struck, and were converted for the nonce into an apparatus for catching torpedoes, they being set out in front of the ship, and connected together by a spar 45 feet long, to which half a dozen grapnels were attached. By the time this work had been executed, the ship had gone some twelve miles from the lightship, in the direction of Portarlington. The men went to dinner, and the Cerberus commenced to retrace her course, her head being directed to the mouth of the Koroit Creek, about three miles west of the Williamstown lighthouse. Refreshments over, both with officers and men, preparations were made for action. The various coverings were fastened down, and the turrets were manned by the Naval Reserve, Lieut. Elder, with the Williamstown division, forming the crew of the fore, and Lieut, Steele with the Sandridge men, that of the after. Each cupola requires in addition to the captain of the turret who directs the gun, and the captain of each gun who is responsible for the elevation, a crew of ten, five to each gun. There were, therefore, besides the lieutenant in charge, thirteen men in each turret. Twelve were, in addition, required at each to work the guns in and out, eight for the magazine, and two powder monkeys. In actual warfare eight additional men would engage in serving shell.

CONDITION OF SHIP

On her trip down the bay the Cerberus had, owing to the foulness of her bottom, steered very badly, and Captain Panter therefore decided upon working his ship from the hurricane deck in order to avoid any risk of getting aground. In addition the commander, six men who were engaged in steering, were men exposed to the enemy's fire. One gun had become disabled during the drill on the previous Saturday owing to a trifling injury to one of the cogs in the wheels of the carriage. So that it had to be sponged from the outside. With these and some minor exceptions, the Cerberus was in the same condition that she would be in actual service. All the railings around the ship were let go, and everything made as snug as possible.

COMMENCEMENT OF ACTION

A few minutes before three o'clock, the Cerberus having gone as close in shore as she could with safety, two men being kept all the time in the chains heaving the lead, she steamed from the mouth of the Kororoit Creek towards Williamstown. At 3 p.m., a shot was fired from one of the Williamstown batteries, and immediately

afterwards the Cerberus commenced to take the right centre, and lighthouse fortifications in flank. The enormous weight of her metal, her guns carrying 4 cwt. shell, and requiring 30lb of powder, enabled her to shell the shore defences with little or no risk to herself. Since none of them could do execution at more than 2000 yards, while the guns of the Cerberus could carry double that distance: beside which the embrasures of the Williamstown batteries did not cover the attacking ship, which had kept so far to the westward as to be completely outside the strip of sea commanded by the fortifications. After firing several shots, and then a broadside, the Cerberus steamed out of the reach of the fire from the Williamstown right and centre batteries, and then went up again to attack the Nelson. While doing this she was exposed to the fire of the Williamstown lighthouse battery, which kept up the ball manfully. The great feature of defence was, however, the Nelson; which, after firing at long distances the large one hundred and fifty pounders from her forecastle, kept up a very heavy discharge from her three decks, the gallant old ship being warped in such a manner as to keep her broadside to the Cerberus. She, on her part, went close in, raked her adversary fore and aft, and then steamed towards Sandridge shores, where she engaged the western battery, which has latterly been erected in the direction of Fisherman's Bend. This defence, and the three others on the same shore, viz, the lagoon, the central and the St Kilda right, blazed away at the Cerberus, which did not go close enough in to run much risk. At no time was she within 1500 yards from any Sandridge batteries, while to the western she was never nearer than 2000 yards. The Nelson, however, was not idle, for notwithstanding the heavy fire she had been sustaining for so long, she kept up a brisk discharge at the Cerberus long after that ship had gone clear away from Williamstown and was on the Sandridge side of the Bay.

FIRING RATE

At 3.30 p.m., after having fired 114 shots, 100 with 30 lb, of powder, and 14 with 40, the Cerberus went out of action and returned to her moorings, it not being thought prudent to go near the batteries in the direction of Emerald-hill, in consequence of the shoal water. There was no means of ascertaining what damage has been done to the defending force, but the attacking vessel had not gone through the engagement scathless, The concussion of the enormous guns had not only broken every pane of glass in the ship, but had actually started the iron work around the armor (sic) plating. A piece of iron 2½ inches, which fastened one of the boats' davits to the deck had been moved several inches by the wind of a gun, and the covering to the wardroom ventilator had been carried away, debris going on to the mess table, and demolishing the remains of the luncheon. Everything moveable had been completely destroyed, and all that in nautical parlance is styled gingerbread work had been shaken to atoms. The chart house had suffered very severely, the shutters were strewn on the deck, and the contents of the erection were everywhere but in their right place. The noise when the guns were fired was almost deafening, and, but for the precaution that some of the visitors had adopted at the suggestion of Dr. Curtis, of stopping their ears with cotton wool, their (sic) might have been permanent injury to there (sic) tympana. A man named John Gray, of the Williamstown division, while engaged to the fore battery sustained a contusion of the thigh while the guns were being run out, and one or two others received trifling injuries which did not necessitate the interference of the surgeon. The gunnery (sic) was remarkably well managed. It would be impossible to ascertain how the guns were served so far as direction and elevation were concerned, but there is no doubt of the rapidity of the fire. At one time during the engagement there was a shot from each cannon every minute and a half, and the men were working with great activity and smartness. Indeed, considering the comparatively rare occasions that they have of being drilled on board the Cerberus their proficiency was both creditable and remarkable. The ship stood the concussion very well indeed, her guns had never before fired over the bow and stern, so that her raking the Nelson as a parting shot was rather experimental, but no injury was done to any portion of her framework. The great advantage she has over the batteries, and even almost any other vessel afloat, is the ease with which she is manoeuvred - she turns in a little more than her length, almost as if she were on a pivot – and the distance at which her enormous guns will do deadly execution. After mooring the Cerberus the Black Eagle came off with the men who had been on board the Nelson, and the officers and men left the Cerberus with three cheers for Captain Panter.

THE NELSON

Captain Fullarton, together with Sub-Lieutenants Bland and Blomb, Surgeon McLean, and 110 men proceeded on board the Nelson shortly after 10 a.m. and, after exercising the crew at the main deck guns and getting their dinner, they ran out heavy warps and anchored so as to move the ship into such a position as to be able to fire a broadside into the Cerberus when she approached, and afterwards to shift position so as to

continue the fire after the attacking ship had passed and was proceeding towards Sandridge. While the Cerberus was engaging the Williamstown batteries the Nelson fired her 150 pounders, and so soon as the Monitor got within range the 32 pounders on the main deck were manned, and a heavy fire was kept up, not only while the Cerberus was coming up, but long afterwards. While just abeam broadside were fired both from the main and lower decks 64 pounders. The total number of shots fired was 700. The guns were all manned by the Naval Reserve, the ship's boys being employed as powder—monkeys, and the ship's company kept hard at work in the magazine. Had he Nelson got under way the general effect would have been much heightened, and the old ship would have shown what she really could do. The men behaved admirably throughout, and the rapidity of their firing was beyond praise.

SANDRIDGE AND WILLIAMSTOWN

The steamer Gem, was busy all the forenoon in ferrying spectators over to Williamstown, where the attack would commence. Sandridge, like St Kilda and the whole intervening beach, was even more active than if the invasions had been actual Crowds assembled on the Railway and Town Piers, the vessel at the seaward ends being quite black with people, with hundreds of men and boys swarming up the masts and out along the bowsprits. Young Australians evinced their pluck by climbing right to the top masts and spreading on the highest yards. At little more than five minutes after two o'clock the first puff of white smoke was seen to rise from the other side of Williamstown and a boom came across the waters, indicating that the invading Cerberus was at hand. The cannonade thenceforward became brisk, as the Cerberus ran the gauntlet of the three Williamstown batteries, returning the fire of each. Then the old Nelson joined in, and altogether there was tremendous hurly burly of firing, so completely enveloping Williamstown in smoke as to render it invisible from Sandridge. The Gem, on her way across, had to steer for a time by bearings, for no Williamstown was in sight. Her voyagers smelt powder, for once in their lives, as strongly as if they were in the midst of a naval engagement. It was just like a fog all around, and the general opinion expressed was that powder smelt just like fog too. In a minute or two the shore batteries at Sandridge and Fisherman's Bend, towards the mouth of the Yarra, set to work. What the last named battery was blazing at formed a puzzle to everybody, unless it was the Russian man-of-war Isamroud, which lay beautifully in its line of fire, with the great white national flag, crossed by St Andrew's cross in blue flapping lazily at her mizzen. Anyhow, the gunners could be seen as active as ants, hopping about round their cannons in the scrub, and every now and again sending out a puff. No doubt it was excellent practice. When the Cerberus had rounded the breakwater at Williamstown it was, of course, futile for the batteries there to waste any more powder, but the Nelson peppered away to the last, firing parting shots after the monitor as it proceeded grimly on its way to silence the Sandridge battery. Hundreds of country folk were at Sandridge and Williamstown, who never saw the Cerberus before. Some called it the "building", others the "animal" but few could bring themselves to regard it as a ship. The Cerberus, by the way, has been new painted lately. She is now of a grey color all over, including the funnel. It was a fine spectacle to see her exchanging shots with the Sandridge battery. The explosions from her big guns are terrible, and the manner in which the smoke goes circling rapidly upon the surface of the ocean, as if unwinding itself, shows the force with which the charge is expelled. The sightseers had their fill truly.

VENTILATION

The Argus January 8 1874

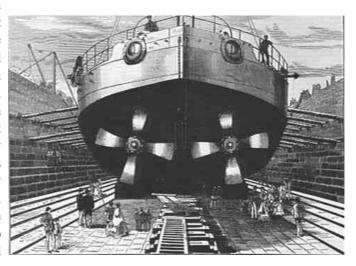
"A man named Clark, who has for some time past been employed on board the turret ship Cerberus as stoker, died somewhat suddenly on Tuesday night. Early in the day Clark was seized with an epileptic fit, & as his case was considered an extrordinary one, he was promptly removed to the Melbourne hospital where he died soon after being admitted. His body was taken back to Williamstown yesterday morning, & the funeral, which will be conducted with military honours, will take place today. It is stated that the man's death was accelerated by the very bad ventilation below on board the Cerberus, but this is mere rumour. It is a fact, however that there are at present 2 persons residing in Williamstown whose health has been injured through the ill–ventilation of the furnace room of the ship & who have had to leave the service on that account. It is hoped that the matter will be inquired into, & the evil rectified, if it should be found to exist."

THE CERBERUS IN THE GRAVING DOCK

The Australasian Sketcher May 16 1874

VIEW OF STERN & TWIN SCREWS

When the ironclad monitor, the Cerberus, was in the Graving Dock a good deal was seen of her that was never visible before, and the strange proportions of this grim sea monster presented themselves in a new aspect. She was seen to be, in fact, throughout about three-fourths of her length, an immense iron chest of vast strength. Her bottom is flat and her sides perpendicular, the point at which bottom and sides join being only slightly rounded off. The great buoyancy which this configuration gives the ship enables her to carry her ponderous weapons of offence and defence, together with stores and other necessaries. That the box-like shape of the Cerberus is not conducive to speed is obvious enough; but then it is not required of her to be swift.



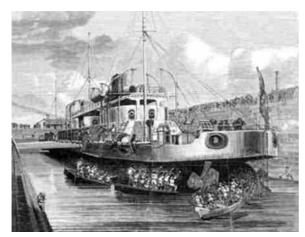
She is intended for defensive and not for aggressive warfare, and if she can effectually repel hostile attacks it is not necessary that she should pursue and capture the attacking enemy; yet she is not altogether wanting in the qualities that confer speed. In so far as those can be conferred without much sacrifice of displacement, she has obtained them. Her bow is nearly as sharp as the bow of a clipper ship, and very shapely, while she has a clean run aft. Her screw—propellers, represented in our engraving, are so placed, under her counters, that it will be very difficult for an enemy's shot to reach them. The comparative shortness of the ship will render her very handy to work, and when in action she will be able to turn right round in a few minutes, her propellers working in opposite directions. Notwithstanding the 9in. or 10in. thick deposit which the Cerberus attracted while at her moorings in the bay, her bottom is as sound as ever. Her outer plates are scarcely corroded in the slightest degree, and would almost seem to have been protected rather than injured by the miscellaneous mass that was found adhering to them. This picture, and also that of the old Government house, are from photographs taken by Mr. Burman, photographer, Gertrude—street.

THE CERBERUS IN DOCK

The Illustrated Australian News May 18 1874

DRY DOCK

Our artist has here chosen an excellent view of the Victorian ironclad Cerberus, in the new dock at Williamstown. This vessel is one of the most powerful ironclads in any part of the world, excepting England. There is a twin vessel of war in the harbour at Calcutta. When in fighting trim her deck is only two feet above the water. The armament is contained within the two shot—proof revolving turrets. She is propelled by twin four—bladed screws. Our artist's sketch was taken when she was resting on the blocks & the sides propped up by a double line of shores. The sides & bottom of her hull and the blades of the screws were covered with a coating of mussels, barnacles & vegetable matter from 5 to 6 inches thick, proving, when exposed by the pumping out of the water, that this vessel did not go into dock before it was necessary.

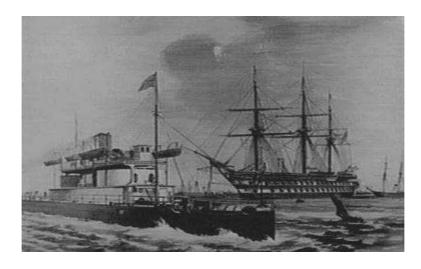


The crowds who went down to see the monster in dock were numbered by thousands. It is only when the vessel is in dock that her great power and dimensions are seen. Considerable diversion was afforded the onlookers when the water was pumped out of the dock by witnessing the boys regaling themselves with the mussels they took off the vessel's side in large quantities, some as big as a man's hand. Before going out of dock the Cerberus will be thoroughly repainted. It has been said by jocular people that when the authorities in England christened this vessel the Cerberus they mildly insinuated that Melbourne is a modern Hades, as the business of the three headed dog was to guard the gate of that tropical place. Be this as it may, England has given us a three–headed dog that can bite most effectively.

The Australasian Sketcher July 11 1874

OUR VICTORIAN NAVY

THE supplement presented this month of "Our Navy" gives a representation of four vessels, the Cerberus, the Nelson, the Victoria, and the Pharos, which at present constitute our war fleet, so to speak. That this colony should aspire to possess such an institution may be deemed Quixotic by some, and ridiculous by others; but as there is no attempt at aping the armaments or the great naval powers, and as the vessels comprising our fleet are engaged at present in quite other than destructive purposes, we do not altogether coincide with this opinion. Just as we have a volunteer force as be commencement of our army of the future (should that unfortunately ever be required), and as the military training received by the members fits them for campaigning, should the necessity arise, so we have, on the other hand, the germ of a naval force in the vessels forming the subject of our engraving, and in the men who are being trained on board in marine artillery practice and naval tactics generally. In these present "piping times of peace," when "grim visaged war has smoothed his wrinkled front," and the lion and the bear, at least, are lying down together, it may be considered superfluous and uneconomic to maintain either military or naval force in such a sparse community as ours. The millennium, if imminent, has not, however, yet arrived, and so long as " wars and rumours of wars "are liable to crop up, it is well, even in a small way, to be prepared for any emergency that may arise.



Although the vessels of "our navy" are few in number, they are singularly diverse in appearance, and in the Nelson and the Cerberus we have the extremes of a century in the agencies employed in naval warfare. Two vessels more unlike each other, and yet constructed for almost the same purpose, can scarcely be imagined-the one the very ideal of the line-of-battle ship of naval romance, bristling with cannon and towering on the waves like a "castle of the deep;" and the other low, uncouth, and grim, and looking like a half-tide rock in the water, or, as has been irreverently expressed, like a floating gaswork, the two turrets being the gasometers. The duties performed by the vessels of "our navy" are no less varied than the appearance each presents; for while the Cerberus is retained exclusively for defence of the port, the Nelson is utilised as a training ship for boys who are indebted for their bringing up to state parentage, and in the reclaiming of street Arabs and the youthful Bedouins of our social community the old ship has performed, and still continues to perform, a most important part. The Victoria-the first vessel having pretension to naval status which the colony acquired, was for some time a show ship, or nearly so, until occasions arose when signal service was rendered by her, and both in these colonies and in New Zealand her presence was found eminently useful. Of late years she has been chiefly engaged in marine survey work along the coast, The Pharos is used chiefly for harbour work, for which purpose she was built. Her duties consist principally in taking up and replacing buoys and beacons, and in conveying stores, materials, etc., to the various lighthouses and coast telegraph stations of the colony. Like the Victoria, she has also been engaged in the cause of humanity, and on more than one occasion she has been sent to scenes of shipwreck to render succour and assistance. Some details concerning the vessels of "our navy" are appended, and as first in importance, although not largest in size, we give

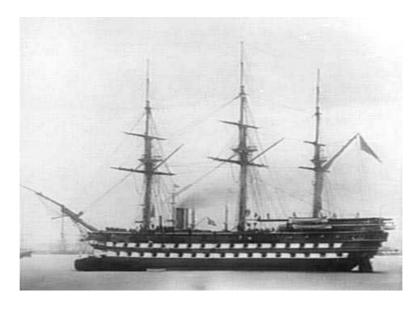
THE CERBERUS.

For the purposes of harbour defence against an attacking force the Cerberus is admirably adapted, and in this consists her chief value. She is an armour-plated vessel, or what is technically known as a "turret ship," and is constructed on the same principle as the Magdala and Abyssinia, and other vessels of a cognate character in the British navy. In order to afford adequate protection to the shipping and port of Melbourne, it was agreed to make application to the Home Government for such a vessel as the Cerberus, and the request was readily granted, the colony paying a portion of the cost of her constriction and equipment, and the British Government the remainder. She was begun in October, 1867, and was draughted by Mr. E. J. Reed, chief constructor for the navy. The order for her construction was given to Messrs. Palmer, of the Jarrow Iron Works, Newcastle-on-Tyne, at whose establishment the iron-clad frigate Defence was built for the Royal Navy. In length she measures between perpendiculars 225 feet, her beam being 45 feet, and depth 16 feet 6 inches, and her burthen is 2,107 tons. Her design, like the other floating fortresses already mentioned, is on what is known as the breastwork principle, which is to protect the ship all round to a height of about 12 feet above the line of flotation. The breastwork is of immense strength, and for about three feet and a half above the water line it is plated with armour eight inches in thickness, and for a like distance below the water it is plated with iron six inches thick, tapering to five inches and. four inches fore and aft. These iron plates are backed with teak planking 11 inches and nine inches thick, according to the thickness of the plating, and inside of this again are two skins of iron plate, so that the vessel is rendered well-nigh invulnerable. The breastwork includes the main fighting portion of the vessel, and at one end of it are the turrets, while inside of it are two engines for working them. The turrets are constructed to carry each two 18-ton guns, and these are

of the newest and most effective description. The turrets, which can be worked by manual or steam power, revolve once in one minute, and the weight of each, guns included, is something like 200 tons. The guns are 10-inch bore, muzzle loading, and made to carry 400lb. shot or shell. They will send shot a distance of four miles, and every precaution is made for recoil. When engaged in action the ship can be covered, and the whole of the crew on board can be directed without a man being exposed to the enemy, and if she were to be boarded by a hundred or more men they would be unable to injure her, or prevent her blazing away with her guns. The ship has also a double bottom, so constructed that it can be filled with water, and the vessel sunk to within two feet of her water-line. This space is divided into two compartments, and is an element of safety, her lower deck is partitioned off into eight watertight compartments. There is ample ventilation secured throughout by strong currents of air driven by steam fans, and means are taken for the escape of foul air. The Cerberus is propelled by twin screws, so that she can turn on her own length, and the screws are fitted with Maudslay's Shifting blades. Her engines were made at Maudslay and. Field's works, London. They are very effective, and drive her at a speed of 9½ knots. Her interior is literally crammed with machinery, and there are on board engines for working the turrets and the capstan, pumping water into the ship and out of it; for hoisting and fanning. and a variety of other purposes. This machinery was supplied by Messrs. Palmer, the builders of the vessel. The Cerberus was brought out here by Captain W. H. Panter, formerly of the Royal Navy, but who now commands the Victorian navy. Captain W. H. Norman, of the Victoria, had gone home for her, but he died before the Cerberus was ready for sea. A start was made on November 7, 1870, and after coming through the Suez Canal, and calling at various points afterwards, she reached Hobson's Bay on April 9, 1871. The Cerberus was taken into the Alfred Graving Dock recently, and not before time, for the growth of marine crustacean and parasites under her water-line was something extraordinary. The Cerberus, at stated times, goes down the bay for shot and. shell practice, and on such occasions she is manned, in addition to her own crew, by members of the Naval Reserve Force. This force, it may here be mentioned, numbers over 200 men, commanded by Captain R. Fullarton and Lieutenant Elder, and Sub. lieutenants Bland and Dennis. The Cerberus is commanded by Captain W. H. Panter, Mr. Leslie, R.N, is chief engineer, and the guns and all thereunto pertaining are in charge of Mr. Pounds, formerly gunner of the Nelson. Leaving the Cerberus, we come next to

THE NELSON,

one of the finest specimens extant of the "wooden walls of Old England," and between which and the Cerberus there is very little affinity. The Nelson was sent out here by the Admiralty to form a portion of our port defences, and to be used as a blockship, and also as a training school for boys of our colonial navy. The Nelson was launched in 1814 as a line-of-battleship, and was pierced for 120 guns. She lay for years, however, without being fitted out or equipped, but In 1860 she emerged from her obscurity, and was lengthened and. converted into a screw steamer. She had originally five decks, but the upper deck was razed, or cut down, and a spacious poop deck left. She has now an upper deck, main deck, lower deck, and orlop deck. On the lower deck she carries 20 rifled guns (68-pounders), and on the main deck a similar number of 32-pounders. She has also two formidable pieces of ordnance, on pivot slides, in the forecastle. These latter are seven-and-a-half ton guns, and carry 150lb. shot. On the upper deck there are also six small brass 12-pounders for boat-work or field-work. The boys are exercised at the light 32-pounders, which are found useful for such purpose; and the men of the Naval Reserve force train with the guns of larger calibre on the lower deck.

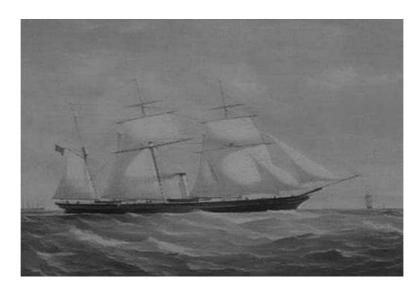


Nelson as a 2 gun deck ship (1860 - 1878)

The Nelson is well furnished with all the munitions of war, and she has on board guns the shot from which would penetrate the plating of ironclad like the Warrior or Gloire. When she left England for the colonies she was the only line-of-battle ship in the navy which possessed such an armament. It is in the cause of peace, however, that the Nelson at present does duty. Soon after her arrival here she was got ready for the reception of boys who had become a burden on the state, either through the death of their parents or desertion by them; and of these waifs and strays no fewer than 1,200 have been received on board up to the present time. The avenge annual number on the list is about 350, and for the control of these, and for the performance of other duties on board, there is a staff of 36 officers and men. The boys receive a first-class education from competent teachers, and, as a rule, prove apt scholars. They are also trained to habits of strict discipline, and all over the ship there are evidences of order and scrupulous cleanliness. In addition to instruction in nautical matters, many of the boys are taught a trade, and sailmaking, and carpentering, as well as tailoring and shoemaking, are, or were, carried on to a considerable extent. As the lads grow up, some are transferred to the Cerberus or Victoria, others enter the merchant service, and not a few are taken into service by respectable tradesmen, farmers, and others, and, as a rule, the lads turn out well, and give great satisfaction. The Nelson was brought out here In February, 1860s, by Captain C. B. Payne, the present chief harbour-master, and she made the voyage successfully via the Cape of Good Hope. The ship at present is in charge of Lieutenant F. Turner, who has under him Sub-lieutenant Heathcote and other officers. The men of the Naval Reserve force are also exercised at the guns on board the Nelson. From the Nelson we come to

THE VICTORIA.

This vessel has not the strength of the Cerberus, nor yet the dimensions of the Nelson, and at all points differs widely from either. What she lacks in bulk, however, she possesses in beauty, and a finer model of a vessel of her class bas never been seen in these waters, her lines her lines being the perfection of symmetry. The Victoria was built and equipped as a sloop of war, and was launched in 1855 from the yard of Messrs. Young, Son, and Macnay, on the Thames. She was draughted by Oliver Lang, of the Naval Dockyard was built for the Victorian Government, under the superintendence of Captain W. H. Norman, who held command of her until his death In 1867. The Victoria has an armament of seven guns, six broadside, and one long 32–pounder forward. This latter was exchanged for an Armstrong gun of larger calibre during the last Maori war.

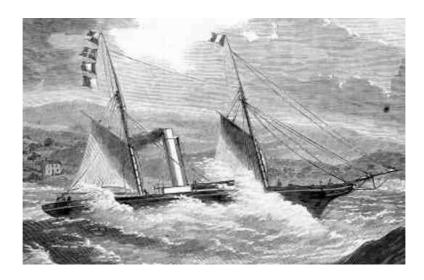


The Sloop Victoria

She is 176ft, in length, and is propelled by a screw driven by horizontal trunk engines of 12O-horse power. The engines were made by Rennie, of London, but during the years she has been here they have undergone considerable repair, and in some portions renewal. The Victoria, during the first year or two of her career here, was employed in the Water Police department, One of her earliest cruises was to Port Curtis, to bring back repentant diggers from that overdone and disastrous rush. In 1860 she did good service by taking over troops and stores from Hobart Town to New Zealand, where she remained for some time, and was most useful as n despatch boat, and also in conveying men and military stores to the various ports. After playing her part in New Zealand, she was despatched in 1861 to the Gulf of Carpentaria, with instructions to meet, the Burke and Wills exploration party, and a few years afterwards she was engaged in the cause of acclimatisation, having been selected to convey salmon ova over to Hobart Town. No small portion of her time has also been spent in looking after wrecked vessels, and. in 1859 she brought on the passengers and crew of the steamer Thistle, which was lost off Port Albert. She was also at the wreck of the Netherby at King's Island, and. in 1865 she made a trip to Auckland Island, where the Invercauld and the General Grant were lost. Before leaving the island she left stores and live stock for the use of any shipwrecked people who might land there. Of late years she has been engaged exclusively in marine survey work, under Captain H. J. Stanley, R.N., and recently she made a trip to Sydney to bring His Excellency Sir George F. Bowen here. The Victoria was an idea of Sir Charles Hotham's, but he died before she came out here. The officer at present in charge of the Victoria is Lieutenant G. P. Tandy. After the Victoria comes

THE PHAROS,

which differs from the others in that she has not yet been equipped as a war vessel, and that she is entirely a colonial production. The Pharos is a composite—built vessel, and was modelled by Mr. Douglas Elder, of the Government Marine Yard. She was launched in 1865, and was built specially for harbour work—taking up and replacing buoys. and transporting stores to the lighthouses. She is a compact little craft, of about 120ft. in length, and 20ft. beam; and should the occasion arise she could easily be converted into a gunboat. Her engines were made by Fulton, of Melbourne, from designs furnished by Mr. J. Wilson, Government Marine Engineer. They work well, and drive her along at a speed of about eight or nine knots. The Pharos has also been engaged in coast survey, and, like the Victoria, bas frequently been turned to good account in looking after wrecks, her latest cruise in this respect being to King's Island, to the spot where the large iron clipper ship British Admiral was recently lost. She is kept in first—rate order, and although she has been some eight or nine years afloat, she has still the original metal on with which she was sheathed.



Illustrated Australian News August 8, 1868.

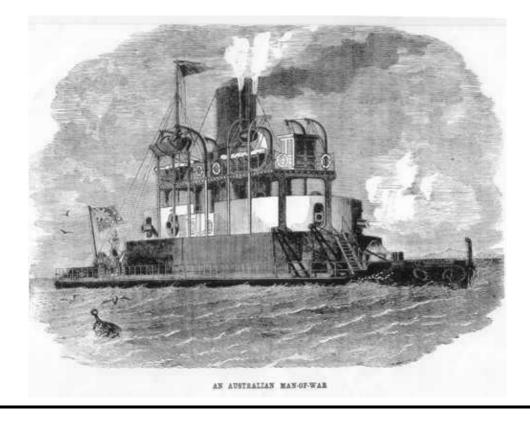
In addition to the foregoing the Victorian Government have also two small paddle steamers—the George Rennie and Bendigo—both of which are employed in the dredging department. All fly the Victorian flag, which is the ordinary blue ensign of the Royal Navy with the constellation of the Southern Cross in white stars on the fly.

AUSTRALIAN COAST DEFENCES

Scientific American, March 4, 1876

Some time since, the Government of Great Britain withdrew the troops which were usually kept doing a kind of garrison duty in the colonies, and left the colonial administration to defend themselves from any sudden attack, of course holding in itself in readiness to despatch ships and regiments to any place as soon as the news of intended or actual hostilities reached a military or naval station. The Australasian colonies have, therefore, constructed floating batteries and men–of–war for harbor and coast defence, which are, for the most part, manned by volunteers.

We publish herewith an engraving of a powerful ironclad, the Cerberus, belonging to the colony of Victoria. She cruises around the mouth of Port Phillip Bay, and is powerfully armed, carrying four heavy guns throwing shot weighing 400 lbs. each. The guns are erected in two bomb proof revolving turrets; and the deck of the ship, when she is ready for action, is only about 26 inches above the water line, the vessel then drawing about 16 feet 6 inches of water. An additional revolving turret, carrying 1 gun, is placed in her bow, and a similar one in her stern.(webmaster's note: these extra turrets did not exist) She is propelled by twin screws with four blades each, driven by powerful engines.



GUN PRACTISE

The Age, April 12, 1877

The turret ship Cerberus left her moorings last Monday morning, and proceeded to the Head's for target practice under the command of Captain W.H.Panter. On Tuesday the big gun practice took place. Fourteen shots in all were fired, at various distances, the vessel being under way at the time. The firing was very good indeed, six of the shots fired striking the target, and, as the first shot fired carried the target partly away, the mark was more difficult to hit.

The time was much quicker than on any previous occasion. Nine of the projectiles were recovered from the shore the same afternoon. Wednesday and Thursday were devoted to firing the boat guns and Martini–Henry rifles, the practice in both instances being excellent.

The Cerberus returned to Hobson's Bay late Friday night. About fifteen miles down the Bay the crew beat to night—quarters, and fired twelve rounds of blank ammunition.

NEW COMMANDER

The Argus, April 13, 1877

Captain Mandeville, the new commander of the Cerberus, is allowing no unnecessary delay to take place in acquainting himself with the peculiarities and capabilities of the turret ship.

This morning she leaves her moorings on a cruise to the Heads, for a shot and shell practice, and general drill, and it is expected that she will remain away for a week or longer.

The new steering gear will also be thoroughly tested, the minor defects which have affected it on a recent trial having been cured, and one or two improvements introduced. These latter will be made a subject of experiment during the cruise.

Should a favourable opportunity occur it is probable that the Cerberus will take a short trip out—side the Heads.

STEAM STEERING FINAL TRIAL

The Argus September 28 1877

A final trial of the new steam—steering apparatus of the turret ship Cerberus, before accepting the work from the contractor, was made yesterday, and the results of the tests were of a thoroughly satisfactory character. On the previous trial the tubes containing the oil or liquid necessary for acting on the steering gear were only temporary, but they have now been replaced by new tubing from England. Several minor alterations were also found necessary, and these having been accomplished, everything is now complete and effective, and the huge and heavy craft has not only been rendered much handier for manoeuvring, but is also far more easily managed, and the steering, which under the old style of things, was both laboursome and unstead (sic), is now, so to speak, mere child's play. The Cerberus, in command of Captain T. C. Mandeville, and with Lieutenants Tandy and Heathcote on board, got under weigh yesterday morning, and left her moorings at 7 o'clock, in company with H.M.S.S. Sapphire. The Cerberus escorted the Sapphire some 15 miles down the bay, and previous to parting company the band played "Auld Lang Syne". After wishing a pleasant voyage to the Sapphire, the Cerberus dropped sentiment and proceeded to business, and was put through a number of evolutions, while a boat in charge of Lieutenant Heathcote was sent off to measure angles for calculating various distances, such as determining the diameter of the circle in which the vessel would turn, with both

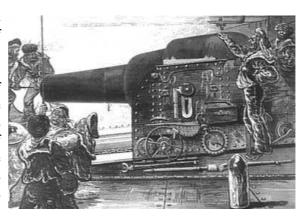
engines going ahead at full speed. &c. The trials, both as to speed and steering, were to the satisfaction of Captain Mandeville, and also of Mr. A. Wilson, engineer—surveyor to the Steam Navigation Board, who was present on behalf of the Government, to examine the work previous to its passing out of the hands of the contractor. The Cerberus returned to the bay in the course of the afternoon, picking up her mooring about 2 o'clock.

INSIDE THE TURRET OF THE CERBERUS: "LOAD"

The Australasian Sketcher June 9 1877

INSIDE THE TURRET

At a time when, owing to the disturbed condition of Europe and the possibility of England becoming involved in hostilities, our defences are regarded with interest, our illustration, giving an inside view of one of the turrets of the Cerberus, will be looked at with attention. The Cerberus has two of these revolving iron turrets, each of which has two guns. In our engraving one of these is fully shown, and the other is just visible in the background. The guns are of 10 in. bore, and muzzle loaders.



They throw a shot or shell of 400 lb. weight, and weigh 18 tons each. The charge of powder ranges from 45 lb. to 60 lb., and the range of shot is about 4 miles. Good execution can be done at a range of 3½ miles. Thus, the four guns of the Cerberus are equal to throwing a broadside of 1,600 lb. of iron a distance of four miles. It is very unlikely, unless some quite unforeseen contingency should arise, that the Cerberus will ever find herself opposed to a vessel of equal defensive plating and offensive armament. The operation of loading depicted in our engraving is performed by seven men to each gun. The shot is hauled up by three men, and run round to the proper position for loading, and slipped into the mouth of the gun. The sponging out the bore is done by two men. All the movements of the gun and of the turret are executed by machinery, and are regulated with the greatest nicety by the gunner in his position at the breach.

THE IRONCLAD CERBERUS

The Argus August 20 1877

STEERING

Ever since the turret-ship Cerberus has been in these waters, it has been found that her steering gear was to a certain extent defective, as it was impossible to manoeuvre her with any rapidity in the narrow channels of Port Philip Bay. This rapidity in the narrow channels is, of course, of the greatest importance, but by the ordinary steering gear with which she was originally fitted it took eight or ten men to get her wheel over from hard-a-port to hard-a-starboard, or vice versa. Even when this was done the ship would make such a turn that it was a matter of time and difficulty to get her on a straight course again. These were all serious draw-back against her efficiency as a means of defence, and the late commander of the vessel on more than one occasion urged on the Government the desirability of having her fitted with some steam steering gear, so as to make her more manageable. This advice has always been supported by the testimony of those naval officers who have visited the port and inspected the Cerberus. It can be quite understood – even by non-nautical men – that an immense power would have to be ezerted (sic) on the rudder of such a vessel, when we state that it measures 8 ft by 12 ft, or presenting an area of 96 square feet, and giving a resistance of about 48 tons. This is the cause of the great number of men required to steer her, and as it was impossible for all to work easily and together as one man, it can be easily seen that if she was given a spoke or even half a spoke too much helm she would necessarily make a most erratic course, instead of going along in a straight line. Ultimately, in September last Sir James McCulloch gave instructions to have designs prepared for the necessary work. This was entrusted to Mr. A Wilson, the inspecting engineer to the Government, who decided upon working out an idea of his own in preference to adopting a steam steering gear in use in some of the large ironclads belonging to the Imperial navy. In the latter case, a barrel worked by steam has been adapted to the ordinary system of wheel chains working from either head of the tiller, but the noise from the continual clanking of these chains has been found to be so great that the new system has been unanimously voted a nuisance, and in some cases the old-fashioned steering gear has been reverted to. Mr. Wilson has been enabled to carry his idea into practice, and as it has now been fully tested on board the Cerberus and found to answer well some account of it may be interesting. The helmsman steers the ship from an ordinary wheel on the flying deck above the fore turret. Attached to the wheel is a screw working a series of shafts and pinnions down to the lower deck mid-ships, where it connects with and so works the reversing eccentrics of a double-cylinder engine of 12 horse power. These work on a large piston contained in an oil cylinder, from which are carried inch pipes leading aft on either side of the ship. On each side of the tiller is another cylinder in which works a ram. As the wheel is put to port the screw in the central cylinder is forced over to the starboard side, sending the oil before it, and acting upon the ram on the starboard side of the tiller, the helm is pushed to port, and at the same time the oil returns by the pipe on the port side according to the central cylinder. By reversing, the wheel on deck the opposite effect is produced and according to the number of revolutions given to the wheel so is the tiller moved to port or starboard. The machinery is most ingenious, and Mr. Wilson spent a pretty good deal of time improving his design so as to render it perfect. The working drawings have been prepared, tenders called for, and ultimately that of Mr. T. Tozer was accepted, the price being about £1,600. The contract time expired in April last, but owing to many unforeseen difficulties it was not until the beginning of the present, month that the whole of the machinery was in working order and ready for testing. In order, however, to ascertain whether the cylinders are perfectly tight water has been used in place of oil, in order to save the latter, and several leakages were discovered. About 10 days since Captain Mandeville took the ship about three miles down the bay for the purpose of giving the machinery a trial. Like all new engines it worked stiffly, and Mr. Wilson and Mr. Tozer, who were board, noticed several alterations necessary. It was however, admitted by all that the new method of engineering was a great improvement on the old one, and some experiments were made with the view of testing how quickly the helm could be shifted. It was then found with both engines going full speed ahead a complete circle could be made by the ship in 4m 20s. With one engine going full speed ahead and the other engine going full steam astern the circle was made in 4m 20 s. This was the same time as with the engines at full steam ahead but the diameter of the circle was much smaller. Going full steam ahead it took two men 1 m 35s to put the helm from hard—a—port to hard—a—stern at the same rate of speed it took 45 s only to put the helm from amidships to either side, while to perform the same manoeuvre with the engines going at half speed 23 s were occupied. These experiments were considered very satisfactory, as hitherto it had taken eight to ten men five minutes to put the helm to one side to another. Mr. Wilson was not, however, quite satisfied with the result, as he considered that one man should be able to alter the helm in 40 s.



The sailor has his left hand on the steam-steering wheel and the officer at bottom is using one of the telegraphs to the engine room.

The Cerberus having to leave Hobson's bay for the Heads on Monday, 13th inst. Mr. Wilson and Mr. Tozer again proceeded with her, and found that as the machinery was worked the stiffness wore off, but some of the men appeared somewhat nervous in making use of the new gear. The wheel acted much more quickly on the rudder than they had been used to that they would give her a little too much helm, causing her to make a some what uncertain course. This will however, be remedied as the men become use to steering the vessel, and the perceptible improvement was noticeable when the Cerberus was returning to her moorings on Saturday last. With some of the men she made a very straight course, while others still shifted the helm rather too much, and so caused her to "yaw" about a bit. After clearing the mouth of the South Channel some further experiments were made as to the manner in which the helm could be changed and a circle completed. It then took 19 s. to put the helm from amidships to hard-a-starboard with the engine going three quarter speed ahead, and the ship described a circle in 4m 45 s. The diameter of this circle was about 150 yards. With one of the engines going ahead and the other astern at three quarter speed the ship pivoted on her centre, completing the circle in 5m 14 s. On the whole the experiments must be considered very satisfactory, and Mr. Wilson is to be congratulated on the success of his invention.

FIRING PRACTISE

As this was the first time Captain Mandeville has had the Cerberus under weigh for drill purpose at the Heads, some interest was evinced in her trip on this occasion. She left her moorings in Hobson's Bay at 9 a.m on Monday last and, proceeding down the South Channel, anchored off Queenscliff at an early hour in the evening, where she remained for the night. It was intended to proceed with shot and shell practice on Tuesday, but owing to Dr. Williams, the health officer, being in quarantine with the ship Macduff, and the other health officer having to be in readiness to clear the mail steamer on her arrival, it was impossible to obtain a doctor on board, and as it is not considered desirable to practice with the heavy guns in the absence of a medical officer, the target practice had to be foregone for the day. The men were, however, drilled steadily through the day, and Dr. McFarlane going on board on Wednesday, the target— a small topgallant sail— was taken on shore, and erected in front of the sandstone cliff between quarantine ground and Point Nepean. In connexion (sic) with this practice Captain Mandeville inaugurated a system somewhat different to what has hitherto been the

custom. The different ranges have usually been measured and buoyed, but this time that was dispensed with, and the firing all took place at about 1,800 yards, leaving those in charge of the guns to ascertain their own elevation &c. It had been intended to keep Cerberus steaming about during the firing, but as there was such a heavy sea rolling in through the Heads, it was decided to drop anchor underfoot during the practice. The weather was rougher than on any other occasion on which shot practice has been indulged in, but the shooting was exceptionally good. The fore turret was in charge of Lieutenant Heathcote and the after turret in charge of Mr. Tubbs, the gunner. Ten rounds were fired from each turret, viz, six rounds of solid shot and four rounds of shell. Another innovation was also made on this occasion, and with very good results, as it will give the men considerable instruction in gunnery practice. Usually the officer in charge of the turret has laid the gun, but this time it was decided to allow No.1 at the guns to fire two rounds each, and the No.2 one round each.

From the following record it will be seen that capital practice was made.

Dividing the firing into four classes, it may be said that six shots were first class, seven second class, three third class, and four fourth class. Any of the three classes would, however, have struck a vessel, while one of the fourth class shots failed owing to the tube hanging fire. On Thursday boats` crews were sent away from the ship to try and recover some of the shot, but there was such a sea rolling around Point Nepean, that the men were unable to land, and accordingly the day was devoted to drill on board.

The weather moderated somewhat during the night, and on Friday morning the men were able to land, when they found the shot had proved, most destructive to the cliff, great masses having been bought down, quite embedding the target. The crew were only enabled to dig out two shots, one of which had been fired on some previous visit. On Saturday morning the Cerberus got up steam and returned to town by the West Channel, picking up her mooring early in the afternoon. The survey party now at Point Nepean have been reduced to short allowance of provisions and water, in consequence of the ship Macduff being placed in quarantine. It is very difficult to land at the Point when there is any sea on, and consequently as the party are cut off from Portsea by the intervening quarantine ground, their water was reduced to such a low ebb that on Friday they were glad to get a breaker of water from the Cerberus. They were, however, in hopes of being relieved to—day, as they have nearly completed their work.

	Fore Turret			
1	Shot a few yards to the right of target – elevation good	Lieut. Heathcote		
2	Shell burst a little in front & struck target	R. Williams No.1		
3	Shot a little high to left	T. White No.1		
4	Shot hit the target	R. Williams No.1		
5	Shot high to left of target	P. Martin No.2		
6	Shot just over target, very good shot	T. White No.1		
7	Shot high, a little to left	J. Lawson No.2		
8	Shell burst on target; splendid shot	Lieut. Heathcote		
9	Shell very high; direction good	Lieut. Heathcote		
10	Shell high, burst in cliff; direction good	Lieut. Heathcote		

	Aft Turret			
1	Shot a little short, direction good	Mr. Tubb		
2	Shot a few yards to right; elevation good	M. Neville No.1		
3	Shell knocked target away	M. Neville No.1		
4	Bad shot, tube hung fire	J. Ovendon No.1		
5	Shot a little high to left	J. Ovendon No.1		
6	Shot short; ricocheted over cliff	M. Proctor No.2		
7	Shot high to right	J. McNeill No.2		
8	Shell burst on remains of target, completely burying it	Mr. Tubb		
9	Shell a little high; burst where target had been	Mr. Tubb		
10	Shell a little high; burst where target had been	Mr. Tubb		

THE NAVAL RESERVE

The Argus September 21 1877

This effective body of men as at present constituted numbers 225 men, including officers, and seamen and is formed into two divisions, representing Williamstown and Sandridge, and the whole command is under the command of Captain Fullarton. The men of the Reserve are drilled ashore in their orderly-rooms at Williamstown and Sandridge twice a week; besides, there is an extra night a week for new members and men backwards in drill, and they are thoroughly versed in great gun, cutlass, sword bayonet, field gun and infantry drills. No man is allowed to fall in at general quarters until he has gone through the preliminary drills, which usually take three or four months.



The Naval Brigade Passing Victoria Barracks Illustrated Australian News., June 1 1891

After men are thoroughly perfect in their drills, they are rated as trained men, and have some small privileges in drilling shorter hours in their orderly—room. A divisional muster takes place once a week in each district and a muster inspection of arms, uniform and accoutrements, at which every member is expected to attend, is held once a month. A muster for drill afloat takes place on the first Saturday afternoon in each month, and a general muster for a full days drill afloat once a quarter. Every man of the Reserve must pass through the course of musketry instruction once a year. A thorough system of discipline is maintained whilst the men are under arms or afloat.

Every man, on entering the drill-room shoulders arms and salutes the room as he would the quarter-deck afloat. The men of the Reserve are in the prime of life, averaging from 25 to 36, stout muscular fellows, able to undergo any amount of hard work, and several of them wear medals for service in the Royal Navy. The petty officers are able, zealous and efficient, and the other officers, on account of the insufficiency of their numbers, until recently have always had to do double duty and are possessed of a very pardonable amount of pride and *esprit de corps*.

No man is admitted into the Reserve under 20 nor over 40 years, and the average height is about 5ft 8 in. The Naval Reserve was enrolled in the beginning of 1870, for the purpose of giving a crew to the Nelson and the Cerberus, and it is but justice to say that Reserve was formed originally from the old Volunteer Naval Brigade, and that a majority of officers and men volunteered from its ranks to serve in the new corps, and thereby voluntarily made themselves amenable to all, the provisions of the Discipline Act. The Naval Brigade, as a volunteer corps, was always admitted to be the premier corps in the volunteer force, both for drill, discipline &c, and was trained to act either afloat or ashore and never missed an encampment, general muster field day, or boat flotilla attack. Their discipline was always maintained by the officers in command treating them as a homogeneous unit, and not as separate companies, and it may be remembered that after encampments or general musters they were never allowed to break up into disjointed bodies and disperse, but always struck their tents together, and with their little fife.and.drum band marched off the ground with every officer and man in his place, as a disciplined military body should do. The present officers of the corps are Captain Fullarton, commanding; Lieutenant Elder (commanding the Williamstown division), Lieutenant Denis, Sub –lieutenant Robertson, Surgeon McLean, and Assistant surgeon Malcolmson.

HOSKINS INSPECTION

The Argus, November 22, 1877

Commodore Hoskins, of the Wolverine, accompanied by Captain Murray, of the Sapphire, paid an official visit to the turret ship Cerberus yesterday morning. They were received by Captain Mandeville and his officers in undress uniform.

The vessel was under steam, and the men were exercised in the turrets, which were set to work, and the movements of loading and so forth gone through. The vessel did not leave her moorings, nor was any actual firing done. After a thorough inspection of the turrets and guns at work, attention was directed to the fire pumps. The taps used for filling the water spaces were turned on and off, and other movements executed. The new steam steering gear, recently fitted, was tried, and worked very smoothly.

Everything passed off satisfactorily, and the commodore made a thorough acquaintance with the appointments of the ship during his visit, which lasted about two hours.

WAR FOOTING

The Argus, December 24, 1877

Consequent upon the news received from Europe, the Cerberus has been placed upon a war footing.

Captain Mandeville has received orders from the Chief Secretary to ship 12 additional men, which will bring the crew up to the necessary strength, and other requisitions which the commander has made to secure the complete efficiency of the vessel have been assented to. A confidential report has been received from Commodore Hoskins regarding the Cerberus, and this has been transmitted to Commander Mandeville, and all its recommendations are being acted upon.

The commodore expresses the highest opinion of the value of the Cerberus as a protection for the port if she is properly supplied with men and stores, and the Government have decided to accede to all requests and suggestions. The improvements suggested by the commodore are of a technical character, and it is not advisable to enter into details respecting them. We may mention, however, that he speaks of the new steam–steering apparatus as a success.

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FIRE REWARD

The Argus January 11, 1878

Some time ago a fire occurred on the hulk Deborah, and was extinguished by the crew of the Cerberus, who displayed much activity on the occasion. The owners, Messrs. McMeckan, Blackwood & Co., wished to reward the men, but Captain Mandeville objected to their receiving any money, as contrary to the rules of the Imperial service. In a second letter the firm enclosed a cheque for £25, and on the matter being referred to the Chief Secretary, he permitted the men to receive it, and suggested that it might be applied to some corporate purpose, such as the band or library fund. The crew have resolved to hand the amount to the Melbourne Hospital, and to nominate Captain Mandeville as a life governor.

THE VICTORIAN IRONCLAD "CERBERUS".

The Graphic, April 13th, 1878, page 372.

Research by Shirley Joy with assistance from the "Monash University Rare Books Department".

Attention has of late been seriously directed to the unprotected condition of our colonial ports in case the mother country should be involved in war. The Australian colonies are especially deserving of consideration in this respect because, as in proportion to the extent of the coast—line, the harbours of Australia are few in number, and an active enemy might, even without venturing on any offensive movements, cause immense loss and suffering by simply blockading the ports. Thus Port Jackson, on which Sydney, the capital of New South Wales, is situated, is practically the only outlet of importance for the entire colony; and the same observation applies even more forcibly to the colony of Victoria, as Melbourne and Geelong, the two chief seaport towns, are both situated on the shores of Port Phillip, which, although in itself a wide expanse of water some forty miles across, is approached from the sea through a narrow neck scarcely a mile in width. A colony thus situated, and un—provided with either ships or forts, might evidently, as far as its seagoing commerce is concerned, be held at the mercy of a single hostile vessel. Of late, however, the Victorians have been aroused to a sense of their danger and, although in consequence of the laying aside of the Forts and Armaments Bill, it has not been possible to carry out the whole of Sir William Jervois' report relative to the defence of Port Phillip Heads, nevertheless steps have been taken to put the port into a better state of defence.



Engraving courtesy of Shirley Joy Digitally prepared by Captured Image P/L, 23 Bunney Road, Sth Oakleigh

The 'Cerberus', ironclad turret-ship, was purchased last year by the Victorian Government. She is now under the command of Captain Colebrooke Mandeville, lately retired as Commander from the Royal Navy, and has

a full crew on board. She was recently inspected by Commodore Hoskins, R.N., who was satisfied with her efficiency. The line—of—battle ship 'Nelson' also is to be cut down so as to make a frigate of her, in which case, as her draught of water will be reduced, she will be much more useful than she is now, and will be able to take an active part in the defence of the port. The batteries at the Heads are also being strengthened, two 12—ton 9—inch guns having been sent down to Queenscliff, together with four 80—pounder Armstrong guns. The two heavy guns will be placed in position so as to command the entrance to the Heads as far round as Point Lonsdale; while the 80—pounder guns will take the place of the lighter ordnance now in the batteries.

Our engraving is from photographs kindly furnished by Mrs. Mandeville, St. James's, Tunbridge Wells.

NEW MAST

May 13th, 1878. Argus newspaper.

The turret ship Cerberus, with her four 18 ton guns (400 pounders), is now in a thoroughly efficient state. The engines, including those for working the turrets, the steering gear, and the capstan are in perfect order. The turrets revolve noiselessly and swiftly, making a complete revolution in 39 seconds. A small starboard after boiler was recently found to be somewhat defective, but this has been repaired, and with the remaining boilers are now in good condition. Captain Mandeville found that the "conning tower" – that is the tower from which the commanding officer fights the ship – was very much confined, and he has had that defect remedied by having a cupola fitted to it. This can be raised or lowered at pleasure by means of screws.

Hitherto, there has been no place aloft from which a "look-out" could be kept, but Captain Mandeville has obtained permission from the Government to step an iron mast, with a circular "top", or platform. On this will be placed a Gatling gun, which has been ordered from England, and the electric light will also be shown from this "top" at night time for torpedo work. This mast if fitted with a derrick will be found useful in many ways.

The painting at right, by James Millett, shows the conning tower with cupola, military mast and a single gun. (possibly a nordenfelt)



Geelong Advertiser 19 June 1878 p.4

THE CERBERUS AND THE HEADS BATTERIES.

The sensational announcement made by the *Argus* on Monday, with reference to the Cerberus running the gauntlet of the batteries at the Heads was materially modified yesterday by our contemporary, as follows:—

The proposal that the Cerberus shall run the gauntlet of the works at the Heads has attracted general attention. We were not aware until Monday of the events which led up to Capt. Mandeville's application, and in justice to that officer they require to be stated. It seems that a report on the defences from Lieuteuaut Colonel Scratchley, R.E., was forwarded to Capt. Mandeville for his perusal, and in this report Lieuteuant Colonel Scratchley refers to the superiority of guns on shore to guns on floating batteries, and intimated that as the Cerberus was here, she would have to be utilised, a reference which seems to have been taken by Captain Mandeville to mean that if the ironclad was not here it would not be worth while, to send for her. From any dictum of this sort Captain Mandeville absolutely dissents, as in his opinion the Cerberus is essential to the defence of the port, and the batteries could better be dispensed with than she could be. In this frame of mind, Captain Mandeville wrote the following letter:—

"Naval Office, June fifth, 1878.

Sir.

-In connection with your correspondence No.4122, I have the honor to recommend that I may be permitted to take the Cerberus to the Heads for the purpose of allowing the artillerymen to practice at her with smooth-bore guns of small calibre while under way. Life will not be imperiled in the least by this practice, and little or no damage can be done, as the boats, davits, &c., will he removed. I propose that the Cerberus should go out two miles from Queenscliffe, and should steam in at a moderate rate of speed, say, 7½ knots, within a mile past the batteries. This experiment will. prove the value or otherwise of elaborate forts, and give practical experience to the permanent artillery corps.

I have the honor to be, sir, your most obedient servant,

(Signed) C. T. Mandeville, Capt. Commanding Naval Forces. The Hon. The Treasurer."

It will be noted that Captain Mandeville proposes that the test should be made with smooth—bore guns of small calibre, and not with any of the rifled ordinance in position. There is a misapprehension on this point, and it has to be explained that Captain Mandeville bars the 80 pounders as well as the 300 pounders now in position at the Heads. But Captain Mandeville says that at a distance of a mile the small—bores can be depended upon as much as the rifled guns, while the vessel would be subject to no risk. He adds that the practice which he suggests is not unknown. Sister ships to the Cerberus, named the Magdala and the Abyssinia, are stationed at Bombay, and Captain Mandeville reports that it is a common practice there to take the vessels out, and for the local artillery to fire at them with smooth—bore guns, with the result that the monitors always succeed in dodging their adversaries. The matter was informally before the Cabinet on Monday afternoon, but was not dealt with, and the Treasurer will have a further interview with Captain Mandeville before giving final orders for the experiment.

[The Age positively asserts that there is no foundation for the statement of its contemporary, and ridicules the idea as absurd and senseless.]

BALL FOR CREW

The Argus May 16, 1879

The crews of the Cerberus, Nelson & Victoria had a most enjoyable gathering on board the Nelson yesterday afternoon. Permission had been given the men to have their friends on board the frigate for an afternoon's enjoyment, and a ball was arranged for the occasion. The sailors, their wives, and friends were conveyed to the ship in tug steamers from the Ann–street pier, Williamstown. On the spacious main deck of the Nelson dancing was entered into with great spirit to music excellently rendered by the Cerberus band. The large party returned to Williamstown after dark.

REPORT ON BOILERS

The Argus November 6, 1879

The official report on the Cerberus boilers, dated 16th October, is as follows:— "The plating and stays are reduced to about 50 per cent. of their original dimensions. When constructed the were to carry 40 lb. pressure per square inch. They are now only capable of working to 17 lb. pressure. I am of the opinion that they cannot now be advantageously repaired, but with an expenditure of, say £100 they can be used when required during the next twelve months, but only at the above reduced pressure. To maintain the Cerberus in an efficient state it will be necessary to take immediate steps to supply new boilers, the cost of which is estimated at £7,000.—(signed) ALEXANDER WILSON, Engineer Surveyor."

CAPTAIN MANDEVILLE'S INJURY

The Argus January 27, 1880

Some weeks ago Captain Mandeville, of the Cerberus, while experimenting in his own house with a miniature torpedo, received some troublesome injuries in the leg through an explosion which accidentally occurred. A few days since hemorrhage commenced, and the medical men who were consulted found much difficulty in stopping it. Last evening, however, the artery was secured, and the bleeding stopped and Captain Mandeville is now progressing satisfactorily, and with care and patience is likely to recover. The relapse is in a great measure attributed to his eagerness to get about immediately after the accident and before the injuries he had received were healed. The Cerberus is ready to move to Geelong, but in consequence of her captain's state of health she is under orders to remain at present in Hobson's Bay.

TARGET PRACTISE.

The Argus August 4 1880

H.M.V.S. turret—ship Cerberus was floated out of the Alfred Graving Dock yard yesterday morning after undergoing her annual overhaul. An examination of her plates showed no signs of deterioration, her hull was found in thoroughly good order. The floating out was a delicate business, owing to her momentum and proximity to other craft, notably the P. and O. Company's S.S. Hydaspes; but she was so handled that she came out safely, after being turned completely round within scarcely more than her length. She then steamed down the bay for shot practice, having on board a few visitors, mostly members of the Naval Torpedo Corps. The sea was rather lumpy, but notwithstanding her undeniably weak boilers, and under a strong head wind, her gun deck being repeatedly washed by heavy seas, the Cerberus made a good eight knots per hour.

When a few miles down the bay, a target was laid out, and at a distance varying from 800 to 1600 yards, 20 shots were fired with solid shot, or shells filled with sand. A few shots fell short, or a little aside, or burst, but they only served as foils to the steady good aim and admirable judgement as to distance generally displayed by the gunners. Shot after shot was direct in line, and scarcely a rowing boat would have escaped. The instructions given to the men in the turrets were, in the main, to fire when they got a good sight, and they gave a good account of themselves.

Captain Mandeville personally directed operations.

The effect on board of the discharge of the guns was peculiar, for the concussion not only splintered in pieces the shutters to the chart—room on the upper deck, but, when a shot passed over the deck side longitudinally, actually broke up a bulk containing stores so as to lay them open to the weather.

When the target - a wooden triangle surmounted by a red flag - was taken in it showed that one of the shots had actually struck off one corner.

In the end the Cerberus steamed safely back to her moorings off Williamstown.

VISITING FRENCH WARSHIP.

The Argus August 27 1880

On Wednesday Captain Dufresse and the officers of the French war steamer Finister`e paid a visit to the turret ship Cerberus. The men were put to general quarters, and the visitors expressed their high opinion of the cleanliness and order of the vessel, and also of the smartness of the crew at exercise. Captain Dufresse and his officers breakfasted on board the Cerberus previous to the inspection, by invitation of the officers of the Victorian naval forces. Yesterday the petty officers and men of the Finister`e were invited on board to lunch

by the petty officers and men of the Cerberus, and there was dancing afterwards. The visitors were charmed with their reception, and gave three ringing cheers at parting, the band of the Cerberus playing the spirit stirring "Marseillaise". The utmost good feeling was shown during the entertainment.

COMMODORE WILSON'S REPORT.

The Argus November 23 1880

Commodore Wilson's report on the Cerberus is a valuable document. Commodore Wilson found the ironclad "clean" and "healthy", and of the sanitary arrangements he says they are "quite satisfactory". The crew went to quarters, and the ship was cleared for action with silence and rapidity. Fire was opened from the turret in six minutes and 50 seconds. The men have been properly trained in the use of the guns, but the commodore thinks that they should have more target practice with the ship under way, and he recommends that the Imperial rule of quarterly practices under steam should be observed. Considering the high pay the men receive, the commodore thinks that they can afford to dress better than they do.

The engines are in as efficient a state as when they were put into the ship; but the boilers are defective, and, allowing for repairs to be effected on board, cannot be depended upon for another twelve months. After suggesting some changes in the hanging of the boats and some additional stop cocks to the boiler, Commodore Wilson calls attention to the fact that the armament of the vessel is defective, inasmuch as she has no small arms to protect her against torpedo boats or boarders. He recommends that six Gatling or Nordenfelt guns should be procured. He points out also that though an electric lighting apparatus has been obtained it is useless, because there is no high–pressure steam–boiler on board.

The report has been referred to Captain Mandeville, who has noted its contents. Captain Mandeville reminds the Treasurer that he applied for the Nordenfelt guns two years ago, and also that he has repeatedly applied for the high-pressure boiler for the electric light apparatus, and that he obtained a vote for the purpose last year, but the money was "saved" – that is, not expended. The full extent of the target practice under way was, he shows, not pointed out to Commodore Wilson. With the statement as to the condition of the boilers Captain Mandeville concurs.

PRESENTATION OF LONG-SERVICE MEDALS

The Age, January 27 1881

The distribution of medals, awarded to members of the Victorian Volunteer Force for long and effective service, took place in the Town Hall last night. There was a large attendance both of visitors and the various volunteer corps, the latter appearing in uniform, and under the command of their respective officers. No general parade state was taken, but approximately estimated, the number must have been 1,300 officers and men.

Prior to the commencement of the proceedings the Commandant announced that Captain Mandeville had taken advantage of the present opportunity of presenting Thomas White, Stephen Newing, and John Peerless with medals awarded to them by the Imperial Government for active service rendered by them in the New Zealand war. The recipients named came forward, and amidst much cheering, were presented with the medals, the decorations being attached by Lieutenant Collins, of the Cerberus.

Colonel Anderson then announced that the honour of presenting the first issue of the medals in question having devolved on the officer commanding the local forces, it was his duty to provide against misconceptions, which might result from a verbal address. On an occasion of so much interest and importance to the volunteer force, a clear understanding should exist as to the mode in which volunteers were to prefer claims, and the manner in which the medals were to be awarded. In General Order, No. 77–80, it was intimated to the force that the medals would issue. After consultation with several experienced officers the conditions published on the 20th August, 1880, under the heading of "Conditions for the issue to officers and men serving under the Volunteer Statute 1865 of a medal for long and efficient service," were promulgated, and also printed on the reverse side of the forms supplied to commanding officers, &c., for claimants. These conditions having been read by Captain Bull, the medals were presented by Colonel Anderson, in accordance with the following list:—

LONG AND EFFECTIVE SERVICE MEDALS 26th January, 1881. (A full list of names in corps groups followed)
End.

The Port Phillip Herald Saturday, March 5, 1881

THE CERBERUS TRIP.

By Electric Telegraph – From our Special Reporter

QUEENSCLIFF, This Day.

The firing from the turrets of the Cerberus necessitated the removal of everything from above and below. The railings all round were unshipped, and the davits passed down deck. Everthing was made *** comfortable. This appeared to work admirably, as the average speed through out the channel was between six and seven knots. The depth of water drawn averaged 15 feet fore and aft.

On arrival at Queenscliff, anchorage was made on the east side, abreast of the Quarantine ground, H.M.S. Victoria being anchored close ahead.

ELECTRIC LIGHT

Preparations were then made for the electric light, and shortly after seven o'clock last night the Cliff was brilliantly illuminated. The light was shifted into different positions, and had a very pleasing effect. Persons could be distinctly seen from the Cerberus as they walked on the shore and principal streets of Queenscliff.

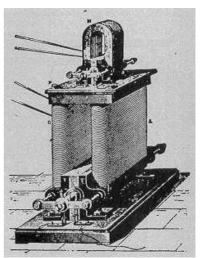
Throwing the light to the Victoria and the vessels anchored, hearty cheers were given by those on board for the display.



Cerberus Flashing Electric Light on Childers and Victoria *Illustrated Australian News* April 15, 1885.

The dynamo machine used was one belonging to the Railway department; and although the effect was very good, it only gave those who were in charge of the lamp, an idea of what the light would be like if the Wilde machine belonging to the Cerberus could be used.

After showing the light Lieutenant Murray endeared to light both lamps, but this was found to be impossible on account of the smallness of the machine, and regret loud and strong were expressed that the boilers which would have allowed the Wilde machine to be used had not been purchased, and put on board.



Wilde Generator. image courtesy of Tommy's History of Western Technology

This morning shortly before six o'clock the men were piped up, and within the space of a few minutes all were busily engaged in what is termed saying their prayers—that is, holystoning the docks. The steaming against head winds yesterday gave the look out and side of the Cerberus a very different appearance to when she left the Bay, being covered with smoke, but by seven o'clock she was in good and clean order.

The whole of the men worked admirably, and seemed to take a great interest in the operations to be carried out. The boats were then got in readiness to convey the necessary communicating wires and torpedoes into position for the operation to be carried out during the day.

This was commenced by a cable being taken from the Cerberus towards shore, and at intervals of about three hundred feet four hand cables were taken from junction boxes through disconnecters, though a small model torpedo containing a few ounces of gun cotton to circuit closer buoys which, when struck by a boat completed the circuit of a firing battery and exploded the torpedo.

Previous to the torpedo being laid every part of the apparatus was carefully tested, so as to prevent the possibility of failure.

The following appeared in a portion of yesterday's Issue of the Herald.

Friday, 4th March.

TARGET PRACTISE

Shortly after nine o'clock this morning H.M.C.S. Cerberus was got under weigh, and proceeded down the Bay, by the West Channel, for turret practice.

The officers on board comprise Captain Mandeville, Senior-Lieutenant Collins, Gunners Richards, Groves

and Tubb, of the active service.

The civil officers were J.A. Thomyson, Hayman, Breeds and Dr. Llewellyn.

For the electric light to be displayed this evening, Lieut. Murray Sub-Lieutenants Houston and Schroder were present to carry out the operations.

When off the Red Bluff operations were commenced, and a triangle target was set adrift without the slightest appearance of movement in the Cerberus. She was bought round to a distance of between twelve and fourteen hundred yards. The first shot from the turret on the fore side completely shattered the target into pieces. A smaller targets(sic) was laid out and the practice carried on was most successful, each shot going within a few yards of its mark.

It is surmised that the electric light will be a great success to-night. The Cerberus steamed admirably, considering the steam power had been reduced greatly. The steam throughout was over seven knots. Only sufficient hands were on board to work one of the turrets successfully, the vessel only having a skeleton crew on board.

TORPEDO INCIDENT.

March 5 1881 (see separate publication – "The Torpedo Incident".)

THE TORPEDO EXPLOSION

Argus June 14 1881

TO THE EDITOR OF THE ARGUS.

Sir, will you allow me to offer a few remarks upon the late torpedo explosion, and comments which have been published in The Argus.

I may premise that I was for a number of years connected with the practical working of telegraph lines, both serial and submarine that I have used many galvanic batteries, and know the effects produced by the different kinds, and which would be the most suitable to perform any particular kind of work.

A sea-cell battery is not new to me or to any other person who has worked on a cable, indeed it forms one of the most ordinary means of testing. The character of the current set up by it, therefore, is well known to electricians, and it was not, I am sure, ignorance of the current, but a knowledge that it could only be one of the most harmless kind that would be in Mr. Murray's mind if he thought of the possibility of the indiarubber covering of the firing—line being removed, and the copper wire coming in contact with the iron of the ship. That such a contingency was very unlikely to happen is well known to any one acquainted with Hooper's core, and the difficulty of removing the indiarubber from the cooper's wire, and yet upon it depends the possibility of a sea—cell having been established at all. This point appears to have been lost sight of, but anyone wishing to investigate the matter must first find that contact, and good contact, with the ship was made before he discusses the question — Given the contact, what would be the current?

I have read the evidence given before the coroner and the board, the latter's report, Mr. Murray and Mr. Doyle's comments, the letters to you of Major Cracknell, Mr. Moors. and Mr. Joseph, and your article of Monday last; and I have come to the conclusion that the difficulties in the way of the establishment of good electrical contact between the zinc case of the torpedo and the iron of the ship are so great as to be practically inseparable and that if such contact were established I agree with Mr. Murray and Major Cracknell, who experimented, the former from the Cerberus, with arrangements similar to those on board at the time of the accident, and the latter in Sydney, with arrangements much more likely to produce a current sufficient to heat a platinum fuse of the ordinary service type than those which existed at Queenscliff, that it is impossible for the explosion to have been caused by such a combination. I say this notwithstanding Mr. Joseph's assertion that he fired four platinum wire fuses by means of a sea—cell. That gentleman does not give us any details of his experiments, and he is so evidently retained for the defence of the board, or of his comrades who are members of it, that I must conclude that the conditions under which he experimented were no only (to quote

him) "unlike those under which the Cerberus disaster took place," but very different. Perhaps even his fuses were very sensitive, made so for the occasion. No, Sir, it seems to me Mr. Joseph and his friends on the board made a mistake. If the latter had believed in the sea—cell theory they should surely have made the needful experiments from the Cerberus, and when Mr. Murray and others interested were present.

There is another point which proper ****** does not seem to have been laid. Everyone knows how instantaneously electricity acts; and if the explosion had been caused electrically it would have taken place the moment the torpedo touched the water, whereas a minute at least elapsed between contact with the sea and the explosion.

Assuming the existence of dynamite in the torpedo —— about which, after reading the evidence taken both at the coroner's inquest and by the board, no impartial person, I think, can entertain any doubt whatever —— the accident is easily accounted for. On the opposite supposition I confess myself baffled, for I feel sure, from my knowledge of electricity, no theory as yet advanced can explain it. Why so obvious a solution of the difficulty presented by the dynamite theory should be discarded, and a witness of unblemished character like Mr. Doyle discredited, may be surmised, but it is not the less surprising.

One word more. The board say Mr. Murray acted wrongly in keeping the end of the firing line on board the ship. The usual practice, they say, is to send the firing line away with the torpedo, and to bring back the battery end to the battery after the mine is laid.

I do not know where that is the usual practice, but I do know that in an official torpedo manual which I have seen there is a description of the method in which mines are to laid, also a drawing of a launch fitted with torpedoes. Both the description and the drawing show one end of the firing line attached to the torpedoes and the other end on board the ship which contains the firing battery. That is just as Mr. Murray had the firing line at the time of the explosion, so that if he erred, it was in good company, and in accordance with authorised usage. I am &c.,

June 10 Cable

NAVAL REGATTA IN HOBSON'S BAY

ARGUS February 18 1882

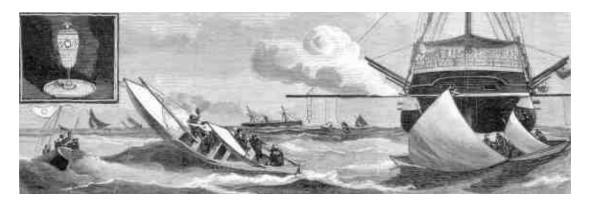
A regatta was held on Saturday last under the auspices of the Victoria Yacht Club and the officers of the Naval Forces, to commemorate the visit of the Russian Squadron to Hobson's Bay. Additional interest was taken in the regatta as the Russian crews had achieved easy victories over their opponents in New South Wales and Tasmania, and so rendered the results of Saturday's contests all the more surprising, as the visitors crews were unable to secure a place in any of the races. The piers at St. Kilda, Sandridge, and Williamstown were thronged with spectators, and the bay itself, notwithstanding the heavy sea and strong southerly wind that prevailed throughout the afternoon, was fairly swarming with craft, steamers, steam pinnacles, yachts, and every description of sailing boat cruising about the scene. A numerous party of ladies and gentlemen was present by invitation on the Nelson, which had been secured as flagship, and their pleasure was greatly enhanced by the playing of the band of the Afrika. Admiral Aslanbegoff visited the flagship at about 3 p.m., and a guard of honour from the Cerberus.

The handsome trophy presented by Mr. J. S. Butters for the race for man-o-war and Government sailing boats was greatly admired. The vase and the salver are of silver and richly chased after the Indian fashion.

Commander Duiker and Lieutenants Alaze, Collins, R.N., and Scott, R.N.R., acted as judge and starters, Mr. A. M. Henderson as timekeeper, and Mr. J.Barker (the hon. Secretary of the V.Y.C.) was indefatigable in his endeavours to promote the general comfort of all.

In order to start the races as fairly as possible a line was stretched from the Nelson to a boat moored some distance off. But this arrangement did not answer very well, as in the first sailing race, owing to the heavy sea, the boat dragged the line, and shortly after the S.S. City of Adelaide, in passing, caught the rope on her propeller, and towed both boat and rope some distance away with her. The boat was bought back and replaced, but the races were afterwards sent off to flying starts. The following is an account of the various events:—

RACE FOR SAILING BOATS.



Illustrated Australian News, February 22 1882

1. Race for Man-of-War and Government Sailing Boats Prize, Benares vase and salver, presented through the Victorian Yacht Club by Mr. J. S. Butters. The course, about six miles, as laid out on day of race, was from the Nelson, round the Success and Dynamite hulks, and back to the flagship; twice round.

The start for this was effected at 2h. 22m. 41s. Quickly after the signal gun was fired and the boats were under way, but owing to the mooring anchor having dragged four of the Russian and Customs boats got jammed together, and sailed about 800 yards before getting clear. The Naval Reserve (sailed by Mr. Grimwood) went away with the lead, closely followed by one of the Russian boats. The latter soon tailed off, and the Customs (sailed by Mr. Herman) drew up and tool second place before completing the first round, the rest extending a

long distance behind. The official times taken were as under:-

	h	m	S	
Naval Reserve	3	24	45	
Customs	3	27	43	
Afrika (cutter)	3	28	0	
Afrika (barge)	3	35	25	
Plastoun (cutter)	3	37	35	
Vestnik 🔀	3	40	45	
Plastoun (barge)	3	43	391/2	

The clever sailing of the Naval Reserve boat was the subject of general remark, Mr. Grimwood being highly praised for the skill he exhibited.

A protest was entered by the Russian officers, on the grounds that the start was unsatisfactory and the course was unknown to their crews. A meeting was subsequently held, at which Lieutenant Scott moved, and Lieutenant Collins seconded, "That the protest be allowed, and the race sailed again at 2 o'clock on Wednesday next." After some discussion, the race will therefore be sailed as proposed.

SECOND CLASS YACHT RACE.

2 Race for Victoria Yacht Club Second-class Yachts. Prize £10 presented through the club by Mr. H.P. Fergile; second prize £3. Course- From Nelson round lightship, flag off St. Kilda pier, wreck buoy off Sandridge; twice round, finishing at starting line. All marks to be passed on port hand. No. 1 position next Nelson. To be sailed under V.Y.C rules and allowances.

The Rory O'More was first off, Minnehaha second, the Payche making a mistake at the start, being left behind. After passing the lightship the Minnehaha overhauled the Rory O'More. In the first round the Minnehaha passed the flagship at 4h. 11m. 8s. and the Payche at 4h. 11m. 28s. In the last round the Minnehaha gained considerably, the time being:—

	h	m	s
Minnehaha	5	26	271/2
Rory O'More	5	40	9
Pache	5	43	461/2

The Viking was also entered but did not start.

BRIGHTON AND ST. KILDA YACHT CLUBS.

3. A Race for Boats belonging to Brighton and St. Kilda Clubs. Prize, £5 second £2. Course – same as for V.Y.C. yachts, but once round. Course may be reversed, as boats have to start with the wind. To be sailed under V.Y.C. rules. No allowances.

Seven yachts entered for this, but two only came to the scratch, viz, the Zivola, of Brighton, and the Alice, of the St.Kilda Clubs. The Alarm, of the Brighton Club, arriving just too late for the start, which took place at 8h. 21m. 58s. the Zivola winning at 4h.58m. 1½s., the Alice coming in at 4h. 58m. 33½s.

RACE FOR GALLEYS.

4. A race for Man-o'-War and Naval Reserve Galleys, six cars. Prize £5 presented by the Victorian Yacht Club. Course– two miles straight, from the Sandridge Town pier to the lightship.

Great excitement existed over this and the following events, as it was thought that the Russians possessed very superior boats, and on account of their having been victorious in the rowing races as Sydney and Hobart, but the Victorian crews proved themselves superior to their opponents both in physique and style of pulling. The Cerberus gained every stroke from start to finish, and came in nearly 100 yards ahead of the two Reserve crews, who rowed a desperate race for second place, which was ultimately secured by the Williamstown, the Afrika being fourth, Vestnik and Plastoun following. Enthusiastic cheers were given for the winners, and a subscription was made on board the flagship for presentation to them.

Cerberus Example 2	1
Williamstown Naval Reserve	2
Sandridge do.	0
Afrika 🔀	0
Vestnik X	0
Plastoun	0

SHIPS' GIGS RACE

5. A race for Ships' Gigs, 6 oars. Prize £5, presented by the Victorian Yacht Club. Course—From Nelson round wreck buoy off Sandridge, and back. Only three crews entered for this, which was won easily by the representatives of the Connaught Ranger, with the Blair Drummond second, and the Drumlanrig third.

RACE FOR THE CUTTERS



Illustrated Australian News, February 22 1882

6. Race for Man-o-war and Naval Reserve Cutters. 12 oars. Prize £5, presented by the Victorian Yacht Club. Course- From the Sandridge Town pier to the lightship. This was the race of the day. One of the principal features of this race was the appearance of the eight crews as they waited the signal to start with the oars on end in the usual man-o-war style, and the instant the gun was fired being dropped into the rowlocks, a splendid struggle again taking place between the crews of the Cerberus and the Williamstown and Sandridge Naval Reserves, the Russian crews being as in the other races left far in the rear. All the boats got well away at the start, the Cerberus and the Nelson rowing stroke and stroke for more than half the course, very closely followed by the two Reserve crews, the others gradually dropping behind. Greater pluck and determination were never witnessed in a boat race. Every man in the boats appeared to exert himself to the utmost, and notwithstanding the heavy sea and strong wind against them. The form displayed was remarkably good, the swing and the dip of the oars being as regular as clockwork. The official times taken as the boats passed the flagship will show the close positions of the first four boats:—

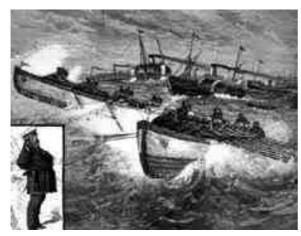
	h	m	s	place
Cerberus 🚟	5	57	281/2	1
Nelson Market Nelson	5	57	37	2
Williamstown Naval Reserve	5	57	39	3
Sandridge Naval Reserve	5	58	211/2	0
Afrika 🔀	6	0	381/2	0
Do.	6	1	15¾	0
Plastoun	6	5	121/2	0
Vestnik X	6	5	241/2	0

In which order the boats finished.

This bought the programme to a very satisfactory conclusion. The committee and other officers were very deservedly complimented upon the manner in which the arrangements of the regatta had been carried out.

THE NAVAL REGATTA: THE CUTTER RACE

The Australasian Sketcher February 1882



Insert: The Admiral watching the Contests.

We notice elsewhere the Naval Regatta, which was held in Hobson's Bay on February 11. The race delineated by our artist is the Cutter Race, in which there were eight boats engaged. The Cerberus men came in winners, and the Nelson were second, the crews of the Russian men—of—war making but a very poor show in the race. In our engraving the Cerberus men are leading, and the Nelson boat second. The official times taken as the boat passed the flagship will show the close positions of the first four boats.

Cerberus 5h. 57m. 28½s., 1;

Nelson, 5h. 57m. 37s., 2;

Williamstown Naval Reserve, 5h. 57m. 39s., 3; Sandridge Naval Reserve, 5h. 58m. 21½s. ,0;

Afrika, 6h. 0m. 38½s., 0;

Afrika, 6h. 1m. 153/4s., 0;

Plastoun, 6h. 5m. 12½s., 0;

Vestnik, ≥ 6h. 5m. 24½s., 0;

in which order the boats finished.

ORDERING NORDENFELT GUNS

The Argus March 2, 1882

The prospect of a European war has induced the government to expedite the defence operations, which have been proceeding rather slowly for some years. Instructions have been issued that the construction of new boilers for the Cerberus shall be proceed with without delay, in order that vessel may be speedily equipped for service. Mr. Wilson, secretary for harbours, has completed the plans for the boilers, and tenders will be called for the work in a few days.

Telegrams have been sent to Colonel Pasley, acting agent–general, requesting him to at once purchase four Nordenfelt guns for the Cerberus and Nelson, and six breech–loading broadside pieces on the improved Armstrong pattern for the last named vessel. These weapons were ordered about two years ago, but the instruction was countermanded. The platform and carriages were constructed at the Woolwich Arsenal, and are now awaiting delivery. The guns are to be 7in. in bore, and from 11ft. to 14ft. in length, as Colonel Palsey may advise.

With a supply of ammunition, the purchase will involve an outlay of upwards of £8,500. The guns are to be sent out to the colony immediately. A contract has been let for the completion of the Swan Island battery, and that work is to be hurried forward.

Another very important decision has been arrived at by the Cabinet, which has resolved to re—establish the permanent artillery force disbanded in 1880 by the Berry government. Probably this will be deferred to enable Parliament to express an opinion upon the intention, but should there be any more decided indications of a European war it is likely that the corps will be organised in anticipation of the Legislature assenting. Such a body is regarded as being indispensable for the proper manning of the batteries, and the Government feel confident that their determination will receive general approval.

The Herald 27 March 1882

THE CERBERUS A SCARE ON BOARD.

A strange but stupid scare occurred on board H.M.S.(sic) Cerberus yesterday afternoon. The vessel is at presently lying alongside the railway pier Williamstown, pending alterations to her boilers, and going into Alfred Dock. When the Nelson was bought out during the afternoon the men (who were below) rushed to the upper deck, and informed the officer in charge that the water was coming in rapidly, and that the vessel would shortly sink. Lieutenant Collins was not on board at the time. Gunner Tubbs who was in command, at once called for the engineers, but not one of the three was to be found. Separate messengers were despatched to their residences, and in a little time, two arrived. During the interval the greatest alarm was experienced on

board, as it was thought that some visitors during the day had opened some valves, and left them so, and no one appeared inclined to go below and ascertain the state of affairs. Upon arrival of the engineers, and when the pumping gear had been got in readiness, one man went down to ascertain where the water was making, but to his surprise could not hear or see anything to denote sinking. It was then found that the R.M.S. Shannon, which had arrived on the opposite side of the pier during the afternoon after getting moored let off steam at intervals, and the noise was so great with the vibration in the lower deck of the Cerberus, and the sound so much like water rushing in, that it caused the men to report the circumstance. When matters were fully known a hearty laugh from all on board was indulged in.

TESTING BOILERS

Argus April 25 1882

The turret ship Cerberus, which has been in dock in order to be cleaned, and have the bottom coated with patent antifouling composition, was floated out yesterday, and before proceeding to her moorings, trial was made of the engines and boilers. During the period the Cerberus was laid up, the boilers received a special overhaul, in order to make them serviceable until they can be replaced by new ones. The work had been done satisfactorily, and yesterday during the spin round the bay the engines went smoothly and well. The boiler pressure was only 8lb., but even at this reduced rate, a speed of from five to six knots was attained. The original pressure was 30lb. The turret engine was worked by one boiler, which has received extra strengthening, enabling it to work up a pressure of 17lb.

THE TURRET-SHIP CERBERUS

DEAD-POINT FIRING GEAR

The Argus May 10 1882

Owing to the representation recently made as to the weakness of the Cerberus boilers and their inulity (sic) in case of emergency, an official inspection of the vessel was some time ago determined upon, but in consequence of ********* Mr. A. Wilson, inspecting engineer, this arrangement could not be adhered to, and the examination has now been indefinitely postponed.

The Cerberus boilers, five in number, the safety of which is now in doubt, were first placed in position in 1868, so that they have now been in actual use for double the time allotted to ships belonging to the Imperial navy, where, as a rule, they are changed after seven years` service. The boilers have been repaired and patched so frequently that they are now almost past further improvement, and while originally they could be worked up to a pressure of 30lb. with perfect safety, an 8lb pressure is all that may now be risked, and this is just sufficient to get the ship under weigh, and to maintain actual motion through the water.

In order to discover what pressure the boilers can really bear, it is proposed to take the vessel down the bay to an anchorage, to substitute cold water for steam in the boilers, and to make the test in this manner out of consideration for the safety of those engaged in it, in preference to the ordinary test by steam. When the required water pressure has been bought to bear, it is proposed to fire a few rounds from the 18ton guns as a further test, since the concussion caused by the discharge of these huge pieces of ordnance has the effect of causing a vacuum in the interior of the vessel, which momentarily decreases the resistance offered by the air pressure on the outside of the boilers, and increases the probability of the metal giving away.

By such a trial as this it is considered that the real condition of the boilers can be ascertained. During the last few years some very important alterations and improvements have been made in the method originally devised for working both the vessel and the large guns, some of these designs being sufficiently ingenious to be worthy of notice. One very neat piece of mechanism, known as the dead–point firing gear, was designed by Mr. Break, the second engineer of the vessel, to remedy a defect which had long been manifest in the working of the guns, and which had in the case of a vessel belonging to the Imperial navy, and more recently in that of the Cerberus itself, led to considerable damage. The vessel first alluded to – H.M. turret ship Monarch – went

to quarters late one night, and in the hurry and bustle prevailing the guns were fired while the muzzles were considerably depressed, the result being that the whole of the fore part of the vessel was battered into fragments by the immense 400lb. Projectiles intended for the enemy. A similar accident happened several years ago to the Cerberus, on the occasion of some members of the Williamstown Artillery indulging in shot practice. In order to prevent

THE CERBERUS

The Australasian Sketcher July 29 1882

BOILER REPAIRS

SOME information as to the state of this ironclad will be of interest at the present time. It will be remembered that a short time ago the Cerberus was placed in the dock to have her boilers repaired, and that she was made to fit to steam at a low rate of speed. Her engines and boilers were made by Messrs. Maudslay and Son of London, and the former drives twin screw cylinders 43in. in diameter having a 2ft 8in stroke and when first tried they exerted 1,400 horse power. The boilers are five in number-three large and two small, and are of the box type, which is now obsolete in this class of vessel. They could originally be worked at a pressure of 30lb, but in course of time became so impaired as to become unsafe. They have now been patched in about 50 places and four of them can be safely used with a pressure of 8lb, and the fifth with a pressure of 17lb. The latter is set apart for the working of the turrets and the steering gear, and the others are for driving and screwing



HMS Thunderer's Boilers

Two 4 furnace square box boilers in HMS Thunderer (left boiler damaged by explosion) Cerberus had 3 furnace boilers.

After the repairs were executed a short trial trip was made, and a speed of about seven knots an hour was obtained. If one of the boilers broke down in any way now there would be no steam power available for working the turrets and steering gear, but that work could in such a contingency be performed by manual labour.

TURRET OPERATION

The turrets revolve on pivots and are turned by a spindle which catches on a ring of cast iron teeth underneath. These teeth being of cast iron are liable to break, and do break frequently in practice. The breaking of one or two does not disable the turrets, but if four consecutive teeth snapped off the spindle would have nothing to catch by at that particular place, and manual labour would have to be employed to pass the gaps on. It is unfortunate that these teeth were not made of wrought iron. However, those damaged in practice have been always easily replaced, and none of them would be easily injured by an enemy's fire as the base of the turret is well protected.

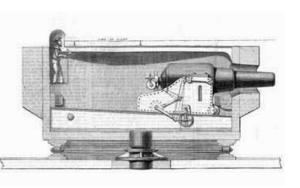
ARMOUR PLATING

In fact, all the vital parts of the vessel are enclosed with armour plate from 9in to 10in., thick above the water line, and 6 in., below the water. When immersed for action, the vessel exposes but 3ft. of free board, covered with armour of 8 in, to 9 in. thick. The deck, which of course, could not be exposed to a vertical fire, consists of 2¾in. plates of iron, covered with 4½in. of teak. On this deck also, around the turret, is what is called the glacis plate, 3in. thick. The turrets themselves have armour—plate from 9in. to 10in. thickness but the actual thickness of their walls is about 2ft., for the iron is backed with teak and packing and there is also an inner

skin of iron. The breastwork between the turrets has 8in, to 9in. armour, and its deck is formed with 1½in. iron plates, and 4in. of planking. The central structure—the pilot tower, from which the commander handles the vessel—is enclosed with 8in. and 9in. plates. As the three small observation apertures on each side of this tower do not command a very comprehensive view, an opening has been made in the roof, and is shielded with a caul. Above all is the firing deck or superstructure on which the boats are placed when the ship is made ready for action. Here, too, are two electric light projectors, but they cannot be used at the present for lack of steam power. In action the flying deck and its appurtenances might be destroyed, but it is believed that however much this superstructure might be knocked about the working of the turrets would not be interfered with. The fact, however, remains that the flying deck projects over both turrets, and that this is not the case in the turret ships which have been more recently constructed. It has been stated that the armour of the turrets is backed by teak, and it should also be mentioned that the walls of the vessel generally are strengthened much in the same way. The hull has two bottoms, and it is the space between them that is filled with water when the "emersion" takes place. The vessel, apart from her boilers, is at present in excellent order – trim and clean outside and inside.

RML GUN OPERATION

As is well known, each turret contains two powerful guns −10in. muzzle–loading Armstrongs. They throw projectiles weighing 400lb. The charge of powder required varies from 44lb to 70lb., according to the description of the projectile, and each shot costs from £3 to £4. The shells provided for their use contain 406 balls each, and there are 14 of these balls to the pound. Fifteen men are required for each gun, and the weapons are laid by the captains of the turrets, who direct the men in accordance with the general instructions they may have received from the commander in the pilot tower. The guns have an extreme elevation of 11 deg., which means a range of about 5,000 yards, and The captain of the turret having ordered the guns to be elevated or depressed, moves the turret himself with a steam lever, and takes aim over sights on the top of the turret. If both guns were fired at once at the same elevation their projectiles would strike a few feet from each other. The Cerberus can fire by broadsides, by turrets, or independent firing can be carried on.



Cross Section of a Coles Turret

SHIP LAYOUT

On the main deck are the old and new steering gear, racks of Martini-Henry rifles, Adam's revolvers and boarding pikes, a machine for generating electricity, the cook's galley, and around the base of the turrets are the appliances for serving shot, shell, and ammunition. The lower deck is divided into five compartments, which when the sliding doors are closed, are water-tight. The steerage compartment is occupied by the men, and underneath it is a storeroom. The next is allotted for the petty officers, the middle ones for machinery and boilers, and the two aft for the officers and commander. Below the officers` cabins are the shot, shell and ammunition magazines.

If the vessel were rammed or pierced with a shot, then the doors of the injured compartment would be closed and if that were done successfully, she would survive. The Cerberus is manned by Captain Mandeville, commander; 1st Lieutenant, Mr. Collins; paymaster, Mr Thompson; chief engineer, Mr. E.J.Huysmans, chief gunner; Mr. Richards. R.N. gunner, Mr. Tubbs; assistant –engineers Mr. Brakes and Mr. Harrow; and 102 men.

GATLING GUN

Argus August 28 1882

The Gatling gun exhibited by Sir William Armstrong and Co., at the recent Melbourne Exhibition, has been

purchased by the Government, and is now in position on board the Cerberus. The weapon was offered to the Treasurer some months ago by Mr. De Jersey, agent for the firm, but the terms were regarded as being too high, and negotiations were, for a time, suspended.

It was then submitted to the South Australian Government and they also declined to purchase.

The Victorian government was again communicated with, and the terms having been modified, Sir Bryan O'Loghlen secured the gun. It is an important addition to the armament of the Cerberus, and would be useful in repelling boarding parties, and torpedo boats, or in any other engagement. One of the nine—inch guns for the Swan Island Battery was mounted during last week. The equipment of this fort is progressing rapidly.

Argus, 9 November 1882

TURRET CROWN WHEELS

It is intended when new boilers are placed in Cerberus, to remove the cast–iron crown wheels on which the turrets move, and introduce instead wheels composed of material less liable to fracture. The cost of the alteration is estimated by Captain Mandeville at £4,000. There are spare segments of wheels in the ship, so that if those now in use get out of order they can be replaced.

LETTER OF THANKS

Argus Dec 18 1882

The following letter has been received by Captain Mandeville, of the Cerberus: – Department of Mines and Water Supply.

Sir, I am directed by the Hon. Minister of Mines to convey to you the expression of his sincere thanks for the very valuable services rendered by you and the officers and men under your direction, in connexion (sic) with the late deplorable accident at Creswick. The Hon. A.T.Clark, who was assisting Mr. Burrowes in his efforts to afford relief to the men who were imprisoned in the New Australian Company's mine, considers the energy displayed by the various officials is deserving of all praise, and this sentiment is fully endorsed by Mr. Burrowes. — I have the honor to be, &c.,M.D.L.Pierse, Private Secretary. Dec. 14,1882

NAVAL RESERVE

The Argus February 24, 1883

Captain Fullarton remarked that the Naval Reserve had been in existence for 10 years, and he had never had occasion to exercise his power of imprisoning a man. He considered the present system much better than that of the old Naval Brigade. Sir W. Jervois had declared the drill of the men to be perfect, and the Earl of Clanwilliam said he had never seen a naval reserve to compare with this body. The Naval Reserve had arrived at its present perfection simply because the men were paid for their service.

He would recommend that each colony should form a confederation for attack and defence, with a central armoury, and a central point for gathering men, and that a naval and military academy for the training of officers should be established. America had a standing army when her population was little more than that of Australia. He considered the election of officers the weakest point in the volunteer system.

RENEWING THE BOILERS OF THE CERBERUS

The Illustrated Australian News

March 21 1883

For a long time past it has been a matter of notoriety that the boilers of the Cerberus were in a very unsafe condition, and as long ago as September 1881, they were condemned by the authorities as being unsafe when worked up to the nominal pressure, and during the last twelve months, when it was necessary to get up steam, a pressure of more than 8 pounds to the inch was impossible as the concussion of firing the 18 ton guns, with which the vessel is armed, would have rendered a greater dangerous (sic). Some months ago a contract was let to Messrs., Forman Bros., Yarra—bank, to supply new boilers, and the work was at once undertaken. The new ones have been completed, and are being placed in position as rapidly as possible. They are considered a great improvement on the old square box boilers known in the English navy as the low

fighting boilers, and as may be seen in the illustration, are cylindrical in shape, a form which has greater resisting power, and dispenses with the necessity for a multitude of stays, which are usually much in the way of cleaning operations. They are 13 feet 6 inches in diameter, and 10 feet deep, with a ¾ inch shell and 7/16th combustion chambers. On her trial trip, the Cerberus made 9¾ knots per hour, but, with the new boilers, she is expected to make 10. Considering her tonnage (2500 tons), and her low relative horse power, this may be considered fair speed.

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It was at first thought that the vessel would need to be stripped to her armor (sic) plates to get the boilers out on one side at least, but this was obviated by one of the engineers, who constructed a model to scale, demonstrating that after the funnel, &c, had been removed from the upper deck, there would be just room to lift them through the hatchway thus made, and this resulted in a considerable saving being effected. The model in question is in the possession of Captain Mandeville, and is an object of interest to visitors. Since her arrival in this port various improvements of importance have been made, in the Cerberus, a Gatling gun has been added and the electric light is fixed over each turret, with the attendant machinery. She has also been fitted with steam steering gear and a contrivance by which the mishap of blowing away the deck's fittings is rendered impossible. This is also an invention of one of the engineers, and is also effective in its action that

the after turret is to be fitted with it also. After the Cerberus has received her new boilers she will be docked and have a thorough overhaul, after which, it is believed, she will be as formidable as a means of defence as ever she was. Our illustrations show first the old boilers as they lay on the wharf after being taken out, and secondly, the manner in which the 50 ton steam crane was used in hoisting them out. The bottom sketch gives the stoke hole where the work of taking the boilers out of their positions had to be performed, and it is satisfactory to note that the contractors performed this work with success and promptitude. It is anticipated that a couple of months will see our best means of defence in a thorough state of efficiency, and with a judicious arrangement of our land forces and batteries, we should be able to repel the attack of any force likely to be sent against us in the event of hostilities taking place between Great Britain and any other powers.

THE CERBERUS

The ironclad turret ship Cerberus still lies alongside south wharf, where she has been since the beginning of February last, and where she is likely to remain for at least two months longer. The new boilers are finished, and in position on board, and the fittings and connections are now being made. The work is being done by day labor, supplied from the Public Works department, under the direction of the chief engineer of the ship. It is probable that the Cerberus will have to go into dock when her repairs are completed, as there is a large growth of barnacles upon her bottom. The number of men on board the Cerberus when on active duty is about 70, with exception of about a dozen or fifteen, these have been in the meantime transferred to H.M.S Victorian warship, Nelson, where they undergo their regular routine of drill, which could not be the case were they kept on board the turret ship.

DOUBLE BOTTOM

It may not be known to our readers that the Cerberus has two bottoms, and, in order to keep the second and inner one from corroding, about half a dozen men are continually employed from day to day, all the year round, scraping and repainting the iron. As they have to be on their hands and knees all the time, and have to creep through very low compartments of the vessel the air, from the fumes of the paint and other causes often becomes very foul, and fresh air has to be pumped in, and the men at this kind of work have to be frequently changed.

LIGHTING & VENTILATION

The officers private quarters on board the Cerberus seem to be particularly dark and ill-ventilated, and while the repairs are being executed we think the Government might arrange for the better lighting and ventilation of these. We understand that the electrician of the Cerberus and Lieutenant Collins are formulating a scheme for lighting between decks with electric light. This would save labor, keep the air purer, and give greater illumination. It would necessitate the providing a smaller engine than the one that now works the two electric arc lights on the deck of the ship, but it is believed that the expense would be considerably less than the present system.

ADMIRALTY CONSIDERING UPGRADING GUNS

The Argus August 3, 1883

In Major Sargood's memo on the naval defences of the colony, which was presented to the Legislature on Wednesday, the Minister states that, knowing that the 18-ton muzzle loading guns with which the Cerberus is armed are not nearly as powerful as the new breech-loading guns, he consulted Admiral Sir Cooper Key, Admiral Herbert, and Colonel Maitland (superintendent of the gun factory at Woolwich) as to the advisability of mounting 8in, or 10in. breech-loading guns in her. He was informed that the Admiralty were conducting a series of experiments with a view to the introduction of heavier guns into the turret ships of the navy, and that Admiral Key would advise him of the result of their enquires. The memo, adds that as the adoption of these modern guns would materially increase the effectiveness of the Cerberus, a telegram was sent to the agent–general requesting him to see the Admiralty upon the point, and advise thereon with Major–General Scratchley. A cable message this morning states that the Admiralty have informed Mr. Murray Smith that they disapprove of the proposed change in the armament of the Cerberus.

REORDERING NORDENFELT GUNS

The Argus September 8 1883

Lieutenant Collins in his letter to Major Sargood referred to The Argus, yesterday, mentioned that Mr. Nordenfeldt had perfected a new machine gun, 10-barrelled, rifle calibre, with carriage and limber in one. This gun is capable of firing 1,200 rounds per minute.

Major Sargood has recommended the Treasurer to order six of them, and Mr. Service has agreed to do so. They will cost about £750 each.

BOILERS INSTALLED

The Argus September 11, 1883

The turret-ship Cerberus was removed from the River Yarra where she has been undergoing repairs during the last few months, to the Alfred graving dock yesterday afternoon for the purpose of being cleaned and painted.

New boilers connected with the main engines have been placed in the Cerberus, together with an auxiliary boiler and engines for working the electric light, by Messers. Foreman and Co., of the Yarra Boiler Works, for a sum of £6,875, which, in additional item of £3,000, for removing and replacing the decks, the additions, makes the total expenditure about £10,000.

The boilers have been designed by Mr. Wilson, the engineer and secretary to the Harbours and Navigation department, and the work has been carried out in a very satisfactory manner under the supervision of Mr. Spencer.

ATTACK ON CAPTAIN MANDEVILLE

The Age September 28 1883

Mr. McIntyre made a coarse attack on Captain Mandeville in the Assembly last night, in the course of which he twitted Mr. Berry with doing all in his power from motives of personal friendship to retain that officer in the service. The Chief Secretary repudiated any such feeling with much warmth, and expressed his disgust at the attacks made on Captain Mandeville by a section of the Melbourne press. The circumstances of that officer's appointment were detailed by Mr. Berry, from which it appeared that when Captain Panter retired from the command of the Cerberus the vacancy was offered successively to Captains Payne, and Fullerton. Both these officers declined it and Captain Mandeville then applied. His papers were produced, and on being referred to the commodore of the station, that the officer reported on them satisfactorily, the result being that Captain Mandeville was appointed by Mr.Berry as chief naval officer on probation. This lasted twelve months, at the expiration of which time he was permanently gazetted and since that time his record has been an excellent one. The state of his ship and the efficiency of his crew were always reported on by English naval officers in the most favourable manner, and no official charge had ever been made against him. Mr. Berry said his regret at the necessity to do away with Captain Mandeville's services was balanced by the knowledge that his successor was an officer of much merit but at the same time he and the other gentlemen who were dispensed with would be fairly treated by the Government, Captain Mandeville's case being deserving of special consideration, as he had received a serious injury while in the service of the colony.

LEAVING DRY DOCK

The Argus September 29 1883

The turret ship of war Cerberus was floated out of the Alfred graving dock yesterday and taken alongside the dock pier to have her overhaul and refit completed. The Cerberus, during her stay in dock, had the bottom cleaned and painted. It also received a plentiful coating of Borthwick's patent anti fouling composition. The Cerberus is now in effective order in so far as machinery and the vessel herself are concerned. Her armament will now receive some attention.

TRIAL TRIP OF THE CERBERUS

The Age 17 October 1883

The Cerberus yesterday made a trial trip down the Bay, after having had new boilers put into her. The vessel was not in perfect trim the fitters having only left her on the previous day, but everything was in readiness for actual work.

A better day for the trial could not have been chosen, the air being calm and the Bay placid. A start was made at noon, and the ship steamed down the Bay to a point about 12 miles below the lightship. Only the representatives of the press, the officers and crew.and Mr. Wilson. secretary for ports and harbors. were on board. Having arrived at the point indicated. Captain Mandeville gave orders to the crew to prepare for practice, and the turret guns were loaded. The usual triangular target having been floated, the ship steamed away for about a mile, the practice being for 2000 yards. Considering that the crew had no recent opportunity for practice, the firing was fairly good and tolerably accurate. The target was not hit, but had a vessel of even small size floated in the place occupied by the target it would have faired ill with her.

Some practice at short range with the gatling gun was also carried out with most satisfactory results. The square tin fired at was riddled, and the shot fell immediately around the tin like hail.

After gun practice had been bought to a close the Cerberus steamed back to her moorings. On the return trip some attempt was made to measure the pace of the vessel. Under 28lb. of steam, the engines make 86 revolutions per minute, the speed was logged at fully 9 knots an hour. That was the best result attained, and under the circumstances it may be considered most satisfactory. It must be understood however, that the boilers and pipes are not yet covered with non–conducting material, and a large amount of power is lost by radiation. There is also a tendency, as with all new boilers, to prime. This, however, will not occur again. Mr. Wilson, the Government engineer, has no doubt that when the boilers and pipes are covered the vessel will attain the speed of 10 knots. There are some minor connections yet to be made that will add to the efficiency of the vessel, and when all is in perfect order an official trip will probably be made. Owing to one of the washers of the hydraulic rams connected with the steam steering gear getting out of order the apparatus did not work to the satisfaction of Mr. Wilson, and he had the appliance thrown out of gear, and the hand steering machinery applied. This matter will be easily rectified, and as the steering appliances have been fully tested previously, no hitch need be looked forward to in the future.

The Cerberus cast anchor at six p.m. at her old mooring ground in Hobson's Bay. Gunner Smith, recently arrived from England, officiated as acting Lieutenant. In the evening after being anchored for some time the new electric apparatus was tried, and found to work most satisfactorily.

The Argus February 1, 1884

ELECTRIC LIGHT AT GEELONG

The electric light was burned on board the Cerberus between a quarter to 9 and a quarter to 10 on Wednesday night, and the display was witnessed from the piers by a number of Geelong residents.

FIRST DAMAGED GUN.

August 26 1884 (see separate publication - "The Damaged Guns".)

Williamstown Advertiser September 20 1884

ASSIST SS GABO

As the SS Gabo was coming down the river on Friday week to go to sea one of her crew had the misfortune to topple over into the water. Luckily the steam launch of HMVS Cerberus noticed the mishap and rendered immediate assistance.

Williamstown Chronicle, 27 September 1884

MOCK GUN TURRETS

Two full sized models of the Cerberus turrets and guns have been ordered by the Council of Defence to be constructed for drill purposes. One will be placed at Williamstown and the other at Port Melbourne, in order that the divisions of the Naval Reserve at those towns may become efficient in turret exercises.

LIFE ON A VICTORIAN MAN-OF-WAR.

Williamstown Chronicle February 23 & March 1 1884

One of the most conspicuous objects in our harbour, and one which is most calculated to excite the curiosity of visitors to Melbourne, is our ironclad turret-ship Cerberus as she lies at her moorings, about midway between Sandridge and Williamstown, and some 300 yards to the Sandridge side of the fairway. To those who are unfamiliar with naval architecture of the modern school, her appearance is a strange anomaly, and it is no easy matter for them to understand that, small and unassuming as she looks, she ranks amongst the most effective fighting ships that science, assisted by practical experience, has yet devised. Compared with the Nelson, which is moored but a short distance from her, she appears but a mere pigmy, the contrast between the two being most striking. The Nelson is one of the fine old ships of which England was once so proud when she was wont to boast of her wooden walls and hearts of oak. Cut down and altered as she has been, she is still a stately vessel. Her great hull, with its many painted ports, lofty masts, and massive spars, all present an appearance of grandeur which cannot fail to excite admiration. On the other hand, there is nothing what-ever of an imposing character in the outlines of the Cerberus. Her low black hull shows but some 3 ft out of the water. This is only relieved by her two white-painted turrets, the overhead deck supported by massive ironwork, her short smoke funnel, the steering house, and a stumpy little mast, which can be used for lookout and signalling purposes. Protruding, however, from the two portholes of each turret are to be seen the polished muzzles of her great guns, and it is in the possession of these that she shows her power, whilst it is at

once seen that the very insignificance of her appearance is in her favour, rendering her but a poor mark for an enemy, whilst her ironclad sides and turrets are well calculated to withstand the blows administered by an antagonist.

As a rule, her decks present but little appearance of animation, and it is seldom that more than the figures of the two or three men on duty are to be seen thereon. Quiet, however, as all seems to the passer—by, a busy little world exists beneath those decks regulated by a discipline that would do credit to any man—of—war, and the visitor who is fortunate enough to be shown over her by her courteous officers is delighted to find that not only do we possess a magnificent vessel, but a right good crew as well. Notwithstanding the fact that the Cerberus is but seldom away from moorings, she is provided with a fair complement of men, who are sufficient to work her at any moment her services may be required, and who are kept thoroughly efficient by regular exercises and drill.

The Nelson has no regular crew, but is in charge of a few men drafted from the Cerberus; but, should she be required, she would be manned and officered by the Naval Reserve, who are a splendid body of men. As but few people have any idea of what life is on board a man-of-war, it may not be uninteresting to Victorians to know something of the crew of their own ironclad, and the routine to which they are subjected.

CREW COMPOSITION

In the first place, it should be stated that the crew of the Cerberus numbers seventy—seven all told. Her commander is Captain Mandeville who has command of the permanent naval force of the colony. His next in command is Lieutenant Collins, who is at present in England. The gunnery and instructive branch is under the supervision of Mr John Smith, R.N. and Mr J.H. Tubb, who has for many years been gunner in the naval forces. The chief engineer is Mr Huysman, who has under him two engineers (one being away on leave), and one artificer, and fifteen stokers. He has charge of the engines, twenty in all, and also supervision of the engines of the Nelson. The apparatus for generating the electric light is under his care, as well as the two steam launches belonging to the Cerberus. Besides being a first—class engineer, Mr Huysman possesses a thorough knowledge of torpedo boats and the Whitehead torpedo, with the working and construction of which he is fully acquainted. Mr J.A. Thompson is the paymaster. He keeps all the accounts of the naval forces, including the Naval Reserve, conducts the correspondence, receives all stores and hands them over to the different branches of the service, checks the accounts for the same, and is also responsible for the victualling of the force. He is, in fact, accountant, paymaster, corresponding clerk, and storekeeper, all in one. Mr Frogley is the chief boatswain, and Mr Nielson chief carpenter, but they are located on the Nelson, as their services are more required there.

DAILY ROUTINE

The ordinary daily routine of the crew is one that most lands-men would regard as rather monotonous, but to the tar there is a charm in being afloat which compensates for all drawbacks. The crew are necessarily all early risers, and have also to 'turn-in' early at night, and it is no wonder that, with their regular mode of life and the pure air they breathe, they are a fine robust lot of men. The first to be called up in the morning are officers, the boatswains' mates, and hammock-stowers, who are aroused at a quarter past 5 o'clock, the hands being 'turned-up' a quarter of an hour later. At twenty minutes to 6 they muster and wash decks, and at half-past 6 the hammocks of night-duty men (who are allowed the extra hour) are lashed up. At a quarter to 7 a flag, 'letter B', is hoisted, which is a signal to recall 'liberty men' who are on shore, and who are supposed to leave the Williamstown pier by the time the flag is lowered, which is five minutes afterwards. At five minutes to 7 the cooks of messes prepare breakfast, which is served at 7 o'clock. At half-past 7 o'clock the boatswain crews 'clean, in the rig of the day', that is, they tidy themselves and dress in the costume of the day, blue or white 'rig' as may be ordered. The watch on deck fall in at quarter to 8, at which time the watch below cleans the lower deck and steerages, and the boat for officers and the post is got ready. The recall for officers is hoisted at ten past 8, and at ten minutes past 9 hands are set to clean. There are divisions and inspection at half-past 9, and drill in accordance with routine. Drills are dismissed at half-past 11, and the decks are cleared up. Dinner is partaken of at noon, and a quarter-past 1 o'clock the men fall in again and are drilled. At the same time a boat is sent away for the post. The drills are dismissed, decks cleaned, and pumps rigged at half-past 3, and at 4 a well-earned 'supper' is sat down to. Quarters at half-past 4, when 'liberty men' are

landed, and a boat is got out for officers and the post. 'Liberty men' are those of the crew who are permitted to go ashore. The boats not required are hoisted in at sunset, and the order is 'stand by hammocks'. The lower deck is cleared up at a quarter to 9, and at 9 o'clock the order is 'out lights on the lower deck', and 'the weary sailor turns to rest'. Petty officers turn in at 10 o'clock, and officers at 11 o'clock.

The commanding officer has to visit the different parts of the vessel once each day and night. Besides the duties mentioned a fixed weekly routine is followed in the following order: On Sundays the decks are cleared at 6 o'clock in the morning. The church party is landed at 10 o'clock, and dinner is served when they return, which is generally at about 1 o'clock. At 6 pm. they 'shift clothing'. On Mondays they have general quarters in the forenoon, and class drill in the afternoon, reference to which will be made further on. On Tuesday mornings, small—arms men are landed, if practicable, or the men are exercised at turret drill, and in the afternoon at cutlass or pistol drill. Wednesday mornings are set apart for rifle drill, and the afternoons to fire quarters (which will also be referred to again), also rifle and sword bayonet drill. At half—past 4 o'clock on the same afternoons, hammocks are scrubbed. On Thursdays they land small—arms men if practicable, or have class drill in the morning, and in the after—noon 'liberty men' are landed, and extra drill men fall in for drill. They are put to turret drill on Friday mornings. After dinner to cleaning and paint work, and at half—past 4 o'clock sling clean hammocks. Saturdays are set apart for cleaning the ship, and liberty men are landed in the afternoons. The foregoing are the regular routine duties of the crew, which are of course distinct from those of the engineer's staff, who have plenty to do, as will be seen by the following outline of their particular work:

ENGINEERS

They have daily to turn main and all auxiliary engines, and effect all necessary repairs to the same. On Sunday they clear up, generally. Each Monday they have to examine and work all watertight doors, ventilating, sluice, and magazine Hood valves and cocks, and the connections to the same. On Tuesdays they examine the interior of the double bottoms, longitudinals, air valves, fresh water condensers, fire pumps and connections. Each Wednesday there is an examination of boilers, super–heater and connections, turret engines, and gear for revolving the turrets. On Thursdays they examine and refit, as may be necessary the steam launch and cutter, steering rams and connections. On Fridays there is an examination of the electric lights and dynamo machine, telegraph gear in connection with the different parts of the ship, both mechanical and electrical. Saturdays are set apart as general cleaning days. The crew have most time to themselves in the evenings, and they then amuse themselves as they like. In fine weather, after the duties of the afternoon have been performed, they 'tumble up' on deck, and indulge in various kinds of pastime, singing and step–dancing, jumping, and a dozen other modes of amusing themselves; and there are not a few of them who spend a good deal of their spare time at fancy work, in which some sailors display great taste.

ENTERTAINMENT

When the weather is bad they find plenty of amusement for themselves below and many hard—fought games of crib, euchre, whist, draughts, and chess have been played upon their mess—tables whilst their quarters have rung again with the boisterous laughter which has followed the narration of a tough yarn, or the perpetration of a good joke. Manly as sailors are, there are no men who give themselves over to pleasure with more abandon and boyishness than they do, and the very wantoness of their mirth does one good to witness.

RATIONS

The men are rationed in first—class style, and, of course, fare much better in port than they would if at sea. Fresh provisions, meat, vegetables, bread, etc are brought off from the shore at half past seven o'clock every morning. Before being received over the gangway they are inspected by the quartermaster cook, and steward. If passed, they are checked by the paymaster, and apportioned to the cook of each mess. The men are each allowed half a gill of rum per day, or an equivalent in money, which is recorded to their credit.

The half of each watch is allowed to go ashore on alternate nights, leaving the ship at half-past 4 pm. and returning at 7 o'clock next morning. The men not absolutely required on board are allowed Public holidays.

The conduct of the men is, as a role most exemplary, and the officers have but little trouble with them, as they

are thoroughly amenable to the discipline of the ship, and do their work in a willing and satisfactory manner. Should however, any of them misbehave themselves, the vessel is provided with a dungeon deep' in the fore compartment, where they can be confined pending inquiry when in port, or imprisoned when at sea. The prison has, however, been 'to let' up to the present, and may it long continue so.

TURRET DRILL

The best day upon which to visit the Cerberus is Monday, which is known as general quarters day. It is on this day that the whole crew are put to quarters, and go through turret and other drills, the men from the Nelson taking their places with the others. The turret drill is most interesting, but it is much slower than it would be at sea, as the turrets, etc. have to be worked by manual power, whereas, when the vessel is at sea or in action all is done by steam power. All the work is done by the sound of the bugle, the different calls of which are under- stood by the men. The first thing done is to clear the ship for action, and upon the sound of the order the crew rush up from below and swarm the decks. Each man knows his post, and in a wonderfully short space of time the deck fittings railings, etc are all removed, hatchways and ventilator gratings are covered in by great heavy iron plates, secured on the inside. The vessel then presents a singularly bare appearance. No means of entering her is to be seen, excepting the turret port holes, and the grim muzzles of the guns there offer but a slight inducement for any boarding party to negotiate that mode of entry. The ship having been cleared for action the turrets are manned, and an officer takes charge of each turret to take sights on the object to be fired at, and also to fire the guns, by means of an ingenious contrivance, which enables them, In the Turret - "Elevate". The Australasian, May whilst standing in the 'well' of their respective turret, to fire which gun they please. The muzzle of each gun is elevated or depressed by appliances within the turrets, and the lateral sight is obtained by revolving the turrets themselves.



28 1898 photo courtesy of "Newspaper Collection, State Library of Victoria"

The guns being muzzle-loaders have to be run back in order to load, but being mounted on inclined planes, they slide out again to position of firing. When firing, the 'kick' or rebound sends them right back to the loading position, but in drill, tackle has to be used to haul them back. When merely drilling, a dummy charge, representing 50 lbs of powder, is used, and an ordinary chilled 400 lb projectile. After the guns have been brought to bear on an imaginary vessel, and are supposed to have been fired, the turrets are immediately swung round, so that the portholes will not be exposed to the enemy's fire whilst the guns are being reloaded, and they are swung round again as soon as all is ready for further firing. The whole work is done very smartly, and notwithstanding the celerity with which the movements are carried out, there is no undue noise or bustling about, the ponderous guns and massive turrets being worked with wondering ease.

LANDING PARTY

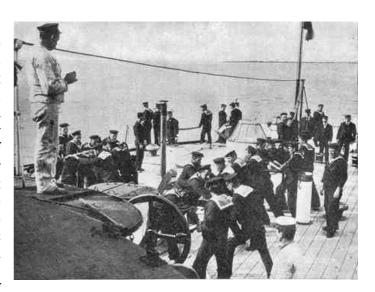
The crew are then put through review exercises as a landing party, and right well they look as they stand in company upon the deck, in their easy-fitting garments, with belts and crossbelts, and carrying their Martini-Henry rifles. They go through the bayonet drill and firing exercises, after which arms are grounded, and they do half-an-hour or so at cutlass drill, in which they are very proficient, as has been seen when the men have appeared in public assaults-at-arms. Besides these exercises, there are classes for ammunition instruction, etc. so as to make them proficient in every branch of their work.



Cutlass Drill. *The Weekly Times*, July 14 1900 photo courtesy of "Newspaper Collection, State Library of Victoria"

FIRE DRILL

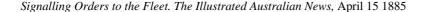
Another interesting feature on quarter days is the fire-quarter drill. The first intimation of fire drill the men have is the alarm rung out by the big bell. In an instant the bugle calls the crew to man pumps, and, for a few seconds only, there is a bustle and excitement as the men go to their quarters. The signal given denotes the locality of the supposed fire, and, in a few minutes, four powerful jets are brought to play, two being supplied by pumps forward, and two aft. There are two 9 in. pumps, and two 7 in. These are worked by manual power when in port, but when at sea steam is used, when, of course, a much greater pressure is maintained. Even by manual labour, however, a splendid supply of water can be obtained, each nozzle throwing jets of water to a distance of over 20 ft. In the event of fire, buckets and wet blankets would also be brought into requisition.



Fire Stations. *The Australasian*, May 28 1898 photo courtesy of "Newspaper Collection, State Library of Victoria"

SIGNALLING

Signalling also forms a portion of the drill, and some of the men are very proficient at this. The mode adopted on the Cerberus is the semaphore system, in the day time flags half yellow and half red being used, as these two colours are supposed to show out best. At night the signalling is effected by flash light.





BAND

At one time the Cerberus possessed an excellent band, and its strains were often listened to with pleasure by those on the other vessels in the Bay as they were wafted over the water. The band used frequently to appear in public, and was greatly appreciated. Although some of the members still practice together, the majority no longer belong to the crew, and therefore the vessel may be said to be without a band.



The Crew of the H.M.S. Turret Ship Off Duty *The Illustrated Australian News*, May 13 1878.

It is a great pity that the crew are not afforded better opportunities for practice in the Bay, for, no matter how perfect they may be in their drills, still nothing can do so much to make them thoroughly proficient as the actual manoeuvring of the vessel and firing practice. The Cerberus has recently undergone a thorough overhaul, and is in perfect order for trials of any kind.

Daily Telegraph

TIMETABLE

Deeds not Words Wilson P. Evans, Hawthorn Press, 1971, Melbourne.

During the years from 1884 to 1895 the daily routine changed slowly, and in the last mentioned year the Victorian Naval Forces were working to the following routine;

- **4 am** Light galley fire.
- **6.00** Call Officers and Men. Lash up and stow hammocks.
- **6.15** Fall in. Scrub decks.
- **6.30** Up Guard and Steerage hammocks. Men away in boats after 10 o'clock the previous

night were allowed to sleep 15 minutes extra.

- **7.10** Bugle for cooks. Two men dropped out for five minutes to prepare breakfast. Men on overnight leave were now on board after pulling back to the ship from Williamstown.
- **7.15** Breakfast. Half an hour was allowed for this.
- **7.45** One watch clean lower deck and the other watch dress in rig of the day.
- **8.00** Colours. Watch in rig of the day falls in for work.
- **8.20** Officers return from overnight leave and take breakfast.
- **8.45** Cleaning lower deck. Watch changes to rig of the day.
- **8.55** All hands to clean arms and accourrements.
- **9.05** On belts, or return arms. Officer inspects lower deck and reports all in order.
- **9.10** Hands to Divisions. Prayers.
- **9.20** All hands fall in to be told off for drill, classes, or working parties as required.
- 11.30 Secure guns and return gear to Petty Officers.
- 11.45 Clear up decks, sweep down, and place everything in order.
- **Noon** Dinner for which 75 minutes were allowed.
- 13.15 Both watches fall in on the upper deck. Drills, classes or duties as for forenoon.
- **15.30** Dismiss drills, classes and working parties.
- 15.45 Clear up decks.
- **15.50** Bugle for cooks.
- **16.00** Supper. Time allowed was 30 minutes. Hands on duty shift to night clothing and liberty men to best clothing. Officers proceeding on leave left the ship at this time.
- **16.30** Hands at evening quarters. All hands inspected. Away liberty boat. Watch on board proceeded to pump up all tanks. This required about 800 gallons. All required boats were readied for night lowering. Four men of the watch aboard were told off for keeping the night watches. This meant 6 hours night watch in the gun– boats, & 4 hours in Cerberus & the Depot.
- **17.30** Away mail boat to Port Melbourne to pick up mail after arrival of 6.30 pm. train from Melbourne.
- **19.00** All hands to hoist in mail boat.
- **21.00** Officer on duty made rounds & received reports from men stationed for special duties.
- **22.00** Pipe down.

THE DEFENCE OF THE COLONY

The Argus 7 February 1885

The Minister of Defence has addressed to the Premier the following memorandum relative to the defence of the South Channel and other matters:—

SOUTH CHANNEL FORT

The original design of this fort has necessarily been modified from time to time, consequent upon the great improvement made in the power of the guns during the past few years. The final plan has now, however, been definitely settled (save in a few minor points) and within three weeks tenders will be called for the first portion of the work, consisting of an extension of the stone annulus so as to form a harbour in which the torpedo boats could be stationed, and sheltered by the fort, and which may take six months to complete. While this contract is proceeding, the specifications will be prepared and tenders called for the main work, which will be built on a foundation of cement–concrete cylinders, a class of work not yet undertaken in Victoria, and which will require great care in executing to stand the heavy superstructure of the fort. The guns (three 9in. B.L. on hydro–pneumatic carriage) for this fort have also been ordered.

DEFENCE OF THE SOUTH CHANNEL

Knowing the vital importance of thoroughly defending this channel, and that, until the erection and arming of the fort, it is practically open to any attacking force, I, on the 28th October last, addressed a memo, to the naval and military commandants, asking what steps should be taken for the defence of the South Channel, pending the erection of the fort.

The report received from the naval commandants was as follows:-

H.M.V.S Nelson Williamstown, December, 1884

Sir,-

With reference to your memo, of the 28th October, requesting a full report as to the best and quickest method of defending Port Phillip, and especially the South Channel, from an attack by an enemy's ships, I have the honour to offer the following remarks:—

Commencing with the South Channel, I must first call your attention to the fact that it is laid down as a maxim that electrical mines should not be used beyond the range of the guns of the place to be defended. In the present instance, it is absolutely impossible to adhere to this rule, as it will always be necessary to keep the South Channel open for navigation as large ships cannot enter by the West Channel, and, consequently, mechanical mines, which are equally dangerous to friends and foes, cannot be used.

The portion of the South Channel that, from its narrowness and depth of water, renders it suitable for defence by submarine observation mines, and where firing stations can be placed, within easy distance of the mine-field, is considerably beyond the range of any guns now placed, or that could be placed, on the neighbouring headlands.

It is therefore absolutely necessary, in order to ensure an effective submarine mine defence that the South Channel fort should be completed. In the absence of a gun defence from a fort or forts, I have stationed the Victorian squadron in the position I consider best calculated to afford protection to the minefields and firing stations, but it must be remarked that in the time of war the Victorian navy will have other duties to perform,

such as the defence of any other port that may be threatened, and that possibly they or some of them may not be available when Port Phillip is attacked.

Attached is a chart drawn by Lieutenant Hely–Hutchinson showing the proposed position of mine–fields and the position of ships defending. The better to explain the proposed defence of the port, I will suppose an enemy's ship attempting to enter the Heads and proceeding towards the South Channel at a speed of 13 knots, and show the difficulties she would have to encounter, allowing 3,500 yards to be the effective range of the defending guns. The ship I will consider to be entering on clearing mark (A) Admiralty chart. She should be under fire from Nepean fort for one mile, or 4m. 37s. of time. She then comes under fire of the Queenscliff battery, and gradually bearing away for the South Channel, will be under fire of both forts for 4,800 yards, or 11 minutes of time. She is then out of range of Nepean, and a quarter of a mile further off Queenscliff, and comes under fire of the proposed guns at Point Franklin and Point King, for 20 minutes. I do not consider the last–mentioned guns of much value protecting the entrance of the channel, but they would be of great use in preventing enemies' vessels from anchoring between Observatory Point and Point King whilst preparing for further operations.

DISPOSITION OF THE FLEET

The squadron, consisting of the Cerberus, Nelson, Victoria, Albert, Fawkner, Batman, and three torpedo-boats will be stationed as follows:— The Cerberus, accompanied by the Victoria and the Albert, would attack the enemy immediately she entered the Heads, who would thus be exposed to an additional fire from four 18-ton guns, one 25-ton gun, one 12-ton gun, and one 4-ton gun, besides small guns and machine-guns. Two of the torpedo-boats should accompany the Cerberus, and, under cover of the fire from the ships and forts, attack as opportunities occurred. As soon as their torpedoes were discharged, they should retire at full speed to the Nelson, which would carry spare torpedoes. The boats Batman and Fawkner will be stationed in rear of the first mine-field. The Nelson will be stationed at the east entrance of the South Channel with supplies of spare ammunition, torpedoes, &c., and will be in readiness to assist in defending the mine-fields. The third torpedo boat will be in reserve with the Nelson.

For the positions of the first and second torpedo-field, of the firing stations and their construction, and also the mode of laying down and firing the mines, see Lieutenant Hutchinson's charts and my confidential report. The first torpedo-field will consist of 42, 500lb observation mines. The second torpedo-field will consist of 102, 250lb observation mines. It will be necessary to defend certain positions in the neighbourhood of the South Channel with mechanical torpedoes (See confidential report) In the event of the enemy passing the forts and overpowering the ships, they would, in proceeding down the South Channel, come under fire of the Batman and Fawkner when ***** Should the enemy succeed in destroying or forcing the first torpedo-field, the gunboats will retire in rear of the second torpedo-field, and act in conjunction with the Nelson in protecting it. The reserve torpedo boat and the two others, if available, will attack as opportunities occur. I should recommend that the chief harbourmaster be consulted as to the placing of additional buoys to mark the Lelis, Symonds and Pinnacle Channels, to enable vessels of small draft to navigate them in safety. The depth of water and strength of the tide at the Heads considerably increase the difficulties of defending the entrance to observation mInes. Suggestions that I trust may overcome this difficulty, and also a plan for distributing a certain number of large mechanical mines, will be found in my confidential report.

I suggest that, in the event of war being suddenly declared, and taking into consideration the incomplete state of the forts and the amount of torpedo plant available, as well as the scarcity of officers and men trained to torpedo work, that the West Channel be completely blocked by mechanical miners and other obstructions, shown in the confidential report. Any attempt to destroy these obstructions would have to be undertaken under the fire of Swan Island fort. Electric lights and guard boats would be required at night. The above system of defence will enable the Victorian navy and the torpedo corps to concentrate all their efforts in the defence of the South Channel. In the event of war, the navy at its present establishment of officers and men would not be able to assist in laying down torpedoes, and consequently, whatever system of defence is decided on, it will be necessary to take frequent opportunities of practising the torpedo corps in laying down the mine—fields and testing them.

I attach a list of stores, boats, &c., required for the torpedo defence according to this plan, and a further list of

stores that should be procured and held in reserve. The defence of Hobson's Bay is not included in this report, though supposing that the enemy succeeded in overcoming all the obstacles in the South Channel I see no reason why Hobson's Bay should not still hold its own if properly defended. The military commandant has, I believe, under consideration the gun defence of Williamstown and Sandridge, and I propose to fit as spar—torpedo (sic) boats such as steam launches belonging to Government Departments as may be available. A Whitehead torpedo boat for special service in Hobson's Bay would doubtless be a valuable protection. On the outbreak of war I should recommend the Government to select certain suitable steamers, which, ballasted and protected as shown in my confidential report, would be a valuable addition to the naval forces. The unarmoured vessels of the Victorian navy could be similarity protected at small cost, the material being always at hand. In conclusion I beg to call your attention to the prudent defenceless state of Western Port by sea and to suggest that immediate steps be taken to arrange a submarine of defence under the present circumstances, this defence must necessarily consist of mechanical or electro—mechanical mines.

I have the honor to be, Sir, Your obedient servant, A. BRODRICK THOMAS.

A report was also received from the military commandant, accompanied by tables showing boats, mines, cables, stores, &c. required for two lines of torpedo defences for the South Channel, showing the distribution of torpedo corps, and particulars as to necessary alteration in the staff of the torpedo corps. If the alterations recommended were made, the total annual cost of the torpedo establishment was estimated at about £8,550. The commandant says the temporary system of defence must be jointly carried out by the naval and military commandants, as the artillery fire in immediate support of the mine–fields must be naval artillery fire.

From those reports it is clear that the main defence must in the meantime be by torpedoes covered by the guns of the ships, supplemented by guns in temporary employments on shore. These recommendations are now being carried out.

TORPEDO CORPS

When dealing in my regulation scheme with this branch of the Defence Forces, it appears to me imperative that, for this special and dangerous class of work, it is necessary that there should be a small permanent force, say, of 12 men, who would take charge of the torpedo stores, valued at about £50,000, and, by regular practice, become skilled in the effective us of same. These suggestions having been thoroughly endorsed by the naval and military commandants, by Major Ellery, and subsequently by Major–General Scratchley, several Royal Engineer non–commissioned officers and articles have been obtained, and an officer specially recommended by Major–General Scratchley will shortly arrive, when suitable men will be selected locally to complete the permanent staff.

MOUNTING 80-POUNDER GUNS

On taking office I found that many of the 80-pounder guns required new cartridges, the old ones being more or less unsuitable and unsafe. While at home, I ascertained that rapid strides were being made in perfecting the Moncrieff system of disappearing carriages, and Major-General Scratchley, having shortly after reaching England, advised me to the same effect, it was deemed undesirable, and especially as the forts were not ready to be armed, to spend money upon carriages of the old obsolete make, when in a few months the new system might be adopted. Exhaustive and most successful experiments have been conducted by the War Office; and Major-General Scratchley having informed me that, a few weeks prior to his departure, the pattern had been finally approved, an order has been sent home by telegraph for 11 of the hydro-pneumatic carriages for the 80-pounder guns, which, with the one already ordered, will provide us follows:-

One for the work on Queenscliff neck. Four for the Queenscliff fort. Three for the Swan Island fort. Four for the Point Nepean fort.

GENERAL

Captain Thomas, in his report, deals only with the guns and vessels actually in the colony, but, in addition to these, there will shortly available:—

The Gannet, Harbour Trust steamer, 12 knots, carrying one 6in. B.L. gun. The new steamer of the Harbour department, 12 knots, carrying one 6in B.L. gun. And four other local steamers, each carrying a 6in B.L. gun. Apart from several of the M.L. guns now in store could be placed in local steamers, if required. The supply of ammunition on hand and ordered is ample both for small arms and heavy guns, and orders for the extra torpedo stores required will be placed in a few days.

F.T.SARGOOD, Minister of Defence.

QUEENSCLIFF BATTERY

Now mounts three 9in. R.M.L. guns, and four 80 pounder R.M.L. guns. The guns are en barbette. The gorge of the battery is closed by a high loop—holed wall for musketry defence, with "keep" at one angle, and small bastions at two points of wall, also for musketry defence. Hydro—pneumatic carriages have been ordered for the 80 pounder guns. To complete armament of fort a heavy new type 10in B.L. gun is to be mounted on a hydro—pneumatic disappearing carriage in a pit and machine guns are to be placed on "keep" and at bastions in wall. The fort is now fit for service. Magazines and storerooms exist, also ammunition for guns that are mentioned.

SWAN ISLAND BATTERY

Now mounts three 9in R.M.L. guns, and one 80–pounder R.M.L. gun. The guns are en barbette. The fort is nearly on the water level; height of parapet, about 20ft.above the ordinary H.W. mark. The gorge of the fort is closed by an earthen keep; height of parapet, about 20ft. On the right flank is a camping ground, with earth parapet surrounding it. On the left flank is a similar enclosure, used as a torpedo store. The whole battery is surrounded by a palisade, with caponieres for flank defence by musketry. To complete fort two 80–pounder guns have been mounted and machine guns supplied. The fort is now fit for service. Magazines, &c. exist, and ammunition for guns. A small barrack for, say, 20 men stands in rear of the keep inside the palisades.

POINT NEPEAN FORT

No guns are mounted. Emplacement for six guns, with racers laid in four of them. Magazines complete, except fittings. Four 80–pounder guns with carriages and platforms are ready to be mounted. These could be mounted and used within a fortnight. The guns are en barbette. It is intended to alter the plan of mounting of all the guns, to place an extra 10in. B.L. gun in a detached position on the point. All the guns will be eventually on hydro–pneumatic carriages in pits.

WILLIAMSTOWN BATTERY.

Now mounts one 80-pounder R.M.L. gun, and two 68-pounder S.B. guns. It is intended to remodel this battery, mount a new type B.L. gun in a pit at the salient, thicken the parapets, traverses &c.

SOUTH CHANNEL FORT

Three 9in B.L. guns, and four 6in. B.L. guns, all on hydro–pneumatic carriages, have been ordered, and will be utilised in other positions, pending the completion of the fort.

REDOUBT AT QUEENSCLIFF NECK

Design, an earthen redoubt, with musketry flank defence, to mount a 6in. B.L. gun, and an 80-pounder R.M.L. gun, both on disappearing carriages; also, machine guns.

DETACHED GUN-PITS AT QUEENSCLIFF AND NEPEAN

Will contain each an 80-pounder. R.M.L. gun, on disappearing carriage. Each work is, or will be provided with an electric light apparatus. For intercommunication an electric cable will be laid between the various batteries and forts. The commanded areas — the spaces covered by the (reasonable) fire of each gun— have been marked on charts. For finding the position by cross bearings, signaling stations at each work will be established.

Argus, 14 March 1885

NAVAL FORCES ADVERTISEMENT

Victorian Defences.

WANTED, for Victorian Naval Forces, 50 ABLE SEAMEN, to be engaged for six months at 5s. a day pay with rations, and an allowance of £3 for uniform. Men must have previously served in menof-war and be under 40 years of age.

A. B. THOMAS. R.N.

Naval Commandant

March 14, 1885.

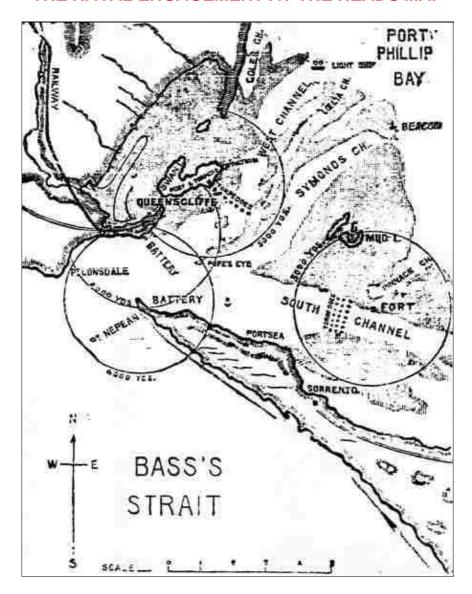
ON BOARD H.M.V.S. CERBERUS.

The Age Newspaper Monday 6th April 1885 (BY OUR SPECIAL REPORTERS)

NIGHT DRILL

The fleet having anchored on Thursday evening shortly before sunset within a mile of the South Channel lighthouse, masthead lights were hoisted, the torpedo boat Childers moored to the Nelson and the crews of each ship sent to night quarters. Captain Thomas, who was determined to give the men a foretaste of the work they would have to undergo on the following day, when the fleet would run the gauntlet through the Heads and engage both the Queenscliff and Point Nepean forts, rudely disturbed the slumbers of the Nelson crew about half-past nine o'clock by giving the order to cast loose the guns for drill. The men were out of their bunks and at the guns in a minute. There was no noise or confusion. Each gun was charged with dummy shot, run out and ready for firing in three minutes. By means of flash lights the order was sent to the Cerberus at ten o'clock at night to prepare to meet an approaching enemy. Notwithstanding the fact that the men were soundly slumbering after a hard day's work, they jumped to the guns with astonishing celerity, which did not fail to command the favourable comment of Captain Fullarton. All through the night the officers on board the different vessels were on the qui vive, for they did not know the moment Captain Thomas would order the torpedo boat Childers to attack the fleet during the night. However, the Commandant has gone to bed and slept until six o'clock, when the reveille sounded the first parade. After breakfast, at half-past eight o'clock the order was given from the flagship to weigh anchor, and half an hour later Captain Thomas was taken on board the Cerberus and Commander Collins on the Victoria gunboat. The Nelson was left behind in charge of Lieut. Tickell.

THE NAVAL ENGAGEMENT AT THE HEADS MAP



ATTACKING THE SOUTH CHANNEL FORT

A few minutes afterwards the fleet was under way, heading for Queenscliff, the Cerberus leading, followed by the Victoria, the Albert (which had come down to Capel Sound during the night), and the torpedo boat Childers. When the Cerberus was within 1000 yards of the South Channel fort, now being constructed (as indicated on map given above), the order was issued to fire at the fort with the starboard guns, assisted by the Nordenfeldts. Fuses were only used, the powder being reserved for the engagement at the Heads.

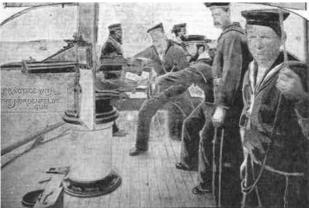


Works at the Fort, South Channel Australasian Sketcher, March 28 1880

RESISTING A TORPEDO BOAT ATTACK

When it was concluded that the fort had been demolished, the bugle sounded to prepare to resist a torpedo attack on the starboard side. The order was obeyed in remarkably quick time. The fore and aft Nordenfeldt guns were manned whilst about thirty men, armed with Martini–Henry rifles, lay down on the breast–work and also on the flying deck, and delivered well directed volleys at the supposed approaching torpedo boat.





The Cerberus: Repelling a Torpedo attack by night. Illustrated Australian News, April 1 1891

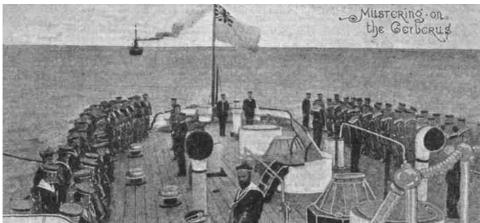
Practise with the Nordenfelt Gun. *The Australasian*, March 31 1894

photos courtesy of "Newspaper Collection, State Library of Victoria"

The men at the Nordenfeldts were supposed to be protected by bedding and iron screens. Captain Thomas' quick eye discovered the boatswain and an assistant working at the anchor chains on the fore deck, and he immediately pointed out that no man would be there during an actual engagement.

MUSTERING

The bugle sounded to muster on the quarter deck, where the Commandant read out the comments of Captain Fullarton on the work done by the Cerberus men whilst going down the Bay on the previous day. Captain Thomas pointed out that it took 3 minutes and 17 seconds to man the turret guns and prepare for action, and said he trusted the men would do it the next time within the three minutes. He had a slight complaint to make against the petty officer, who only provided eleven fuses instead of twenty five for each turret, but that was more than counter—balanced by the noiseless manner in which the men went about their duties.



Mustering on the Cerberus. *The Australasian*, March 31 1894 photo courtesy of "Newspaper Collection, State Library of Victoria"

DUELING WITH THE FORTS AT THE HEADS

On approaching the heads some anxiety was shown by the men to know the next move of the Commandant, who was most mysterious as to his intentions. At first it was stated that the Cerberus would not go through the Heads, but immediately she was abreast of Queenscliff a warning gun was fired to attract the attention of Captain Ind, who was in charge of the Queenscliff fort, the object being to signal that the Cerberus and the rest of the fleet would go through the Heads, and on returning engage both the Queenscliff and Nepean batteries. Captain Ind, who had been watching the whole of the previous night, expecting an attack from the fleet, came to the conclusion that the firing of the gun was a challenge to begin hostilities. In a few minutes the Queenscliff batteries were blazing away in earnest at the Cerberus, which was only going at half speed through the Rip.

Captain Thomas, who was evidently taken aback at the answer, immediately ordered both fore and aft turrets to engage the forts, so as to protect the gunboats and torpedo boat Childers, which were steaming slowly astern. The order was obeyed with alacrity, and a rattling fire was kept up for a considerable time. The Queenscliff battery replied to the Cerberus fire with precision and rapidity, commencing with the 80-pounders on the extreme right of the fort, and finishing up with the three 9-inch Armstrong guns on the left. In order to show the rapidity of the fire from the Queencliff batteries, it may be stated that they fired twenty-four shots before the Cerberus got out of range.

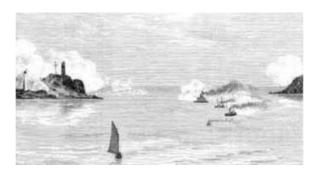
The artillerymen then turned their attention to the Victoria and Albert, who had not been ordered to fire, and who, if they had been, could have done very little with the breech-loading Armstrong stern chasers. Whilst this was going on, the Nepean battery next opened on the Nelson, but the firing was of a fitful character, quite unworthy of the fort, which is reckoned to be second to none in the colonies. Captain Thomas did not think it worth while to reply to, but signalled instead that he would engage that fort when steaming through the Heads again. After going about a mile and a half outside the Heads, the Cerberus turned round and steamed for the Heads at full speed. The gunboats Victoria and Albert were signalled to prepare to engage the Nepean fort, and in a few minutes both those vessels presented a scene of unwanted activity.

One mistake, however, was made. The Victoria wheeled round and fired its 25 ton breech-loading gun at the Nepean fort without having first received orders from the flagship to do so. Naturally enough this drew the fire of the battery upon the Victoria, to whose assistance the Cerberus had to come by prolonged and indiscriminate firing both from the fore and aft turrets. In the meantime the Cerberus had again come within range of the Queenscliff battery, which once more opened fire, and a splendidly sustained cannonade ensued on both sides. Captain Thomas ordered the Cerberus guns to tackle the Queenscliff battery, whilst the Victoria and Albert, which had been indiscreet enough to fire before they were ordered, were deputed to silence the Nepean battery. The engagement at this moment was a most impressive one.

In and about the Heads a number of both large and small craft were cruising amidst the volumes of powder smoke, which hung heavily on the surface of the water, and at times totally obscured the land batteries from view. The well directed fire from the Queenscliff batteries boomed across the water and mingled with the roar of the 18 ton guns on board the Cerberus, the 25 ton on the Victoria and the breech—loading stern chasers and heavy gun of the Albert. Far astern was the torpedo boat Childers, which was perforce compelled to be quiescent during the engagement. At any moment, however, she was ready to advance with lightning like rapidity for the purpose of blowing up any vessel which might bar the passage through the Heads.

As the Cerberus again breasted the Queenscliff fort the guns, which were served with remarkable more opened a brisk cannonade, and would not be silenced by the fire from the Cerberus. The fire at 1000 yards was chiefly from the 80-pounders, which belched forth at the Cerberus in such a manner that had the guns contained projectiles, and the aim of the artillerymen been accurate, the Cerberus would have experienced a very bad time of it. On getting within 600 yards range of the 9-inch Armstrong gun, which carries a 200 lb. projectile capable of piercing 14 inches of armour at 2000 yards, was laid on to the Cerberus, which replied in a rather erratic manner, owing to seven of the

charges missing fire. This was not due to any defect in the fuses, but owing to the smallness of the blank charge. The latter only weighed 7 Ib., whereas the proper charge is 70 lb. of powder. The noise from the Queenscliff battery was terrific, as it rolled along the surface of the water and reverberated again and again in the air.



Engaging the Queenscliff and Nepean Batteries. The Illustrated Australian News, April 15 1885

As the Cerberus passed inside the Heads the fire of the battery ceased to a considerable extent owing to the powder running short. The fire from the Nepean battery was so feeble that the Cerberus men likened it to a "potato squirt." The Victorian and Albert gunboats and the torpedo boat Childers were also subjected to a raking fire when they came in range of the Queenscliff battery, the men of which never seemed to tire. As the fleet got inside the Heads the order to cease firing was given on board the ship Cerberus, which came to a stoppage opposite the Queenscliff pier. To sum up the day's proceedings—the firing of the Cerberus was carried out with great precision by the men, who were rather nonplussed at first when called upon to fire at the land batteries whilst the vessel was in motion. After the first round, however, they trained the guns with such precision that had they been charged with shell they would undoubtedly have played sad havoc with the Queenscliff batteries, the men of which are exposed in a veritable man—trap.

From the Cerberus No.3 and 4 men of each gun at Queenscliff were plainly visible on the ramparts, and afforded excellent targets to a skilful marks—man. Such, however, was not the case at the Nepean battery, not a man of which could be seen.

The men worked well, kept quite cool, were noiseless in their actions and patient for the word of command. The firing of the Victoria and Albert was performed with regularity and precision, the men on each vessel working like Trojans. It is questionable, however, if they would have been able to get through the Heads with such celerity had the engagement with the Queenscliff fort been one in real earnest. After a short stay at Queenscliff the Cerberus, under the command of Captain Fullarton, returned to her consort, the Nelson, in Capel Sound. The two gunboats, Victoria and Albert and the Childers, proceeded to the same rendezvous later on. All the vessels let go their anchors, and the crews went to quarters for the night. On Sunday, the crews of each vessel will be conveyed on board the Nelson, when Captain Thomas will read prayers both morning and evening.

THE DEFENCE FORCE

The Argus April 10 1885

Nothing definite has yet been decided by the defence authorities as to what steps shall be taken in connexion(sic) with the several offers made to raise volunteer corps as to a reserve for the militia. The commandant is at present preparing a report on the subject, and when this has been placed before the Minister, the Council of Defence will take action. The uncertainty as to what the authorities may propose on the matter has already caused some annoyance. Within the last few days an artillery officer, not at present actively

employed, but considered one of the best men, in the service, was anxious to obtain information, as he had a very fair prospect of a sufficient number of volunteer artillerymen to form an extra battery. No information could be given at headquarters, and no encouragement was offered to proceed further with the project, "which consequently lapsed."

Although the rifle club movement has been such a decided success, it is found that most of the clubs have been established at towns so far inland that the services of the riflemen could hardly be availed of in case of emergency. The Minister of Defence is anxious to promote the formation of the rifle clubs in the vicinity of the coast — at such places, for example, as Frankston and Phillip Island. In the event of threatened invasion, and with regulations in force affiliating rifle club members with the militia, a force of riflemen could thus be rapidly concentrated at any point where a landing was likely to be made. Inquiries are now being made as to the prospects of forming rifle clubs at several points on the coast.

On Monday next Major General Scratchley, accompanied by Colonel Disney, the Commandant, Major–General Downes, Secretary of the Council of Defence, and Colonel Walker, will visit Queenscliff to inspect the batteries and complete some lesser details in the scheme of defence. The party went down to Queenscliff a few days ago, but the rough weather prevented them carrying out the object of the visit.

In a paragraph recently published in The Argus, publicity was given to the high estimate formed by Admiral Tryon as to the value of the turret ship Cerberus for defence purposes. At the time of the Easter manoeuvers it was intended that the British commander on the Australian naval station should personally inspect the different vessels of the fleet, but Admiral Tryon was unable to carry out this idea, and was obliged to make the inspection by deputy. Some of the officers of the Imperial warship Nelson were detailed to inspect the other vessels, and their expert knowledge has enabled them to furnish statements, which although less interesting to the general public than Admiral Tryon's remarks on the Cerberus, will be useful to the naval authorities here. Generally the comments of the visiting officers are favourable, but the following defects are pointed out in the different reports. Concerning the condition of the ships the reports state:—

"The hull of the Nelson is in good condition, so far as can be seen, with the exception that the outside of the ship and upper deck require caulking. The foremast is very much decayed. The Albert and Victoria are only deficient in not having their guns. The Cerberus is in good order, so far as her hull is concerned, but the upper deck requires renewing, The boilers of the Nelson are old and thin, but with occasional repairs will last for another two years should the ship be required for service."

The report furnished by Captain Lake refers to the appearance and of work of the naval force, and confirms the high estimate previously held as to their powers. Captain Lake's report as follows:—

"I was invited by Captain Thomas to go on board the several vessels, and see the permanent and reserve forces go through their drill. I first visited H.M.V.S. Cerberus. A guard of seamen was drawn up on the quarter deck to receive me, and the manner in which they handled their arms, and their general appearance, gave me the impression that they had been well drilled, and were thoroughly efficient. The guns were then cleared for action, under the superintendence of Captain Fullarton, who was in command of the ship, and the officers under him. This was done smartly and quietly, The men all seemed to know their stations, and worked with precision and quietness. There was no noise whatever, and every man seemed to know his work and station. The arrangements for passing up shell and powder, closing water tight doors, and firing in action, were all that could be desired. I next visited H.M.V.S Albert, commanded by Lieutenant Dennis. The guns were cleared for action, and worked with smartness and precision. The boats were manned and armed in a very satisfactory manner, and the arrangements for passing up ammunition were also highly satisfactory. I then visited H.M.V.S Victoria, under the command of Lieutenant Scott, when the same evolutions were gone through with an equally satisfactory result.

In conclusion I would beg to remark that I was much struck with the general efficiency of all the ships, and the great zeal and attention and general interest that both officers and men seemed to take in all they did, and I think that Captain Thomas, Captain Fullarton, Commander Collins and all the officers of H.M. Imperial and Victorian navies, working under them, deserve great credit for the general efficiency of these ships. I also beg to state that this visit took place in ****. I also beg to state the visit took place immediately on their return

from a cruise, when the officers and men had been kept incessantly at work, both day and night, going through evolutions, such s attacking the forts, which necessitated them being constantly on deck. and on the alert, during the three days and nights they were away."

Admiral Tryon, in referring to these reports states:-

This satisfactory condition, both as to the personnel and material of the force, must be largely due in the first place to the naval commandant, Captain Thomas, but it is clear that officers and men, and all under his command, have ably supported him, or this important part of Her Majesty's naval forces would not be in the satisfactory condition to which I am proud to bear testimony to.

A meeting of Germans favourable to the formation of a German military corps was held last night, at the Fitzroy Town Hall. About 400 persons were present, of whom the great majority were Germans. Mr. J.Hamill was voted to the chair. Mr. G.C.Clauscen explained the reasons which had induced him to call the meeting, and apologised for not having first consulted the Turn Verein in the matter. With this exception the speeches were all in German, all attempts to revert the (to some) more facile Anglice being greeted with the general cry of "Deutsch!"

The two speakers were strongly opposed to the proposal. One of them alluded to the aggressive policy of England in regard to the acquisition of foreign territory, and said that while one day they praised the Germans the next they called them the Chinese of Europe. The other was strongly of opinion that Germans in Australia should not combine to assist the English Government in a conflict with any country which was at peace with Germany. Mr. Julius Saxe deprecated any such remarks. The Germans in Victoria were under the protection of English laws, and enjoyed the prosperity of the colony, and in the case of an attack it was their duty to assist their fellow colonists, to the utmost of their power. (Loud applause.) If they took arms in such a cause, he believed it would be for the benefit of Germany, of the colonies, and indirectly of England.

Mr. P. Behrendt said that when they had left the Vaterland behind they should be ready to bear arms for their adopted country. (Applause.) Why should not the Germans in these colonies fight for Australia just as Germans in the United States had done for America! The chairman said that during the time of the last war with Russia a very good German company had been formed in Geelong, and another in Melbourne by Mr. L.Kitz, and he himself had been in the artillery for many years. Several other speakers supported the proposal. Mr. Behrendt moved, and Mr. F.Meffert seconded:— "That a committee be appointed to consider the desirability of organising a German military corps in connexion (sic) with the defence force of the colony." This was carried almost unanimously, there being only three dissentients. The following were elected members of the committee:— Dr. F.Peipers, Messers. P.Behrendt, J,Hamill, E.Hartung, L.Hesse, G.C.Clauscen, F.Meffert, O.Brinkman, A.Bahlman, H.Schreiber, H.Diedrich and F.Brunier (secretary). Cheers were given for the Emperor William and Prince Bismarck, and for Mr. Clauscen, and the national song "Deutschland, Deutschland uber Alles," was lustily sung as the meeting separated.

Mr. M.Baldwin, for many years in the Royal Artillery at home, convened a meeting for yesterday evening, at the Parkville Hotel, Sydney road, to form a defence corps. Mr. H. Steel occupied the chair. About 30 names of men willing to join were handed in, consequence of insufficient notice, the attendance was more limited than had been expected, and the meeting was adjourned until Wednesday evening next, at the same place and time. Mr. Baldwin was for a number of years drill instructor to the St– Kilda Artillery, under the volunteer system.

The overhaul given to the turret ship Cerberus and the gunboat Victoria is so far complete that it was intended to have floated them out of dock last night, but it has been now delayed until Monday, when both vessels will come out in thorough sea—going trim. About 70 men out of 120 required to complete the Naval Reserve have been enrolled. It is expected that the balance will be accrued in a few days, and in anticipation of the completion of the force, arrangements have been made for the new men of both divisions to commence drill next week.

The Pilot Board has forwarded a number of recommendations to the Minister of Defence regarding the steps they think should be taken in the present crisis, even if war is not actually declared. Some of the suggestions have, however, already been anticipated. The members of the board are of the opinion that special pilots

should be appointed to take vessels through the minefields, and that, even in the event of war, the port should not be allowed to close or pilots withdrawn from their station outside. The subject of extinguishing the lights at the Heads during the night is also dealt with.

At a meeting of the Committee of Defence formed by the Melbourne Harbour Trust, some recommendations from Captain Fullarton in connexion(sic) with the organisation of a Harbour Trust corps were addressed. The Trust are willing to give their employees 14 day's leave of absence for drill purpose in addition to the ordinary training to be obtained by half day and night drills. The trust is also desirous of raising 100 extra men from their employees to form a land force. It is suggested that the Government should allot their duties, and that the corps should simply be recognised as identified with the Harbour Trust. The men themselves are anxious to be affiliated in some way with the Naval Reserve, in order that they may be under the command of Captain Fullarton, but this idea is not considered feasible. The committee of the trust have written to the Minister, asking him to fix a date for an interview, and they are sanguine of being able to remove the scruples which the Council of Defence entertain about accepting the services of the corps. A site for defence purposes, containing 63s..6p., has been permanently reserved on the shores of Corio Bay.

By advertisement in The Argus of today, Major Ellery, the commanding officer of the Torpedo Corps, requests all past members of the corps who are willing to volunteer for the service in the event of war being declared to send their names and addresses to him at once.

1885 WAR SCARE PREPARATIONS

The Australasian Sketcher May 6 1885

The probability of war arising out of the difficulty between England and Russia has given considerable impetus to defence preparations in Victoria. The temporary fort for the protection of the South Channel in Port Phillip harbour is almost complete, and submarine mine-fields have been laid in each of the channels. Every effort is being made to bring the militia force up to the limit of 3,000 fixed by the act. The strength of the Permanent Artillery force has been increased to the number named by Sir William Jervois and Major-General Scratchley in their scheme of defence as being necessary to man the batteries at Port Phillip Heads. The strength of the Naval Reserve is also being increased, and as the difficulty with the reserve has disappeared through the Government acceding to their wishes in the matter of short service, there is no difficulty in obtaining recruits. There is some promise of the old volunteer system being resuscitated, and meetings for the formation of corps have already been held, but as yet no definite step in this direction has been taken. The popular idea is to establish volunteer corps as a reserve for the militia, and a large body of trained men, who cannot spare the time for drill required by the militia regulations, are prepared to enrol themselves should the authorities favour the proposal. The Government are considering regulations framed with the intention of affiliating the country rifle clubs with the militia force in the event of war being declared. The formation of a Yachtsman Naval Reserve corps and a German colonists` corps are both being considered. A large Melbourne business firm has initiated the project of forming a volunteer rifle corps amongst its employe's (sic). The Melbourne Harbour Trust offered to form a naval corps amongst its employe's (sic), but asked for special regulations in the matter of payment and drill. Although there are at present a sufficient stock of rifles in the colony to arm a force of about 11,000 men, the Government have ordered fresh shipments of weapons with rapid feeders attached. During a recent visit to Melbourne, Admiral Tyron, of the Australian Naval Station, inspected the fleet, and reported very favourably to the Governor concerning all vessels. Admiral Tyron considers the turret-ship Cerberus a formidable vessel, and one of our best means of harbour defence.

THE NAVAL DEMONSTRATION

The Argus June 1 1885

When the review of the naval and military forces of the colony was held at Albert Park a week ago, the former division of the defence force was for the time out of its element, and so on Saturday the men had an poportunity(sic) of showing what they could do afloat. At 2 o'clock a large number of gentlemen invited to witness the evolution of the fleet assembled at the Port Melbourne town Pier, and were taken off the Nelson by the steamers Despatch and Gannet. The party were the guests for the day of the Minister of Defence, Colonel Sargood, and amongst those present were His Excellency the Governor and suite; The Premier, Mr. Service; the Chief Secretary, Mr. Berry; the Minister of Lands, Mr. Tucker; the Commissioner of Customs, Mr. Langridge; the Postmaster General, Mr. Campbell; and Mr. Thornley, M.L.C. The Ministry had a large Parliamentary following, a considerable number of the members of both Houses of Parliament being present. Nearly all the Harbour Trust Commissioners attended, and the land branch of the service was represented by many officers in uniform, including Colonel Turner, the commanding officer of the Field Brigade, Colonel Price, of the Mounted Rifles; Colonel Hutton, of the Volunteers; Major Fellows, of the Staff, Major Snee; Captain Joseph, of the Torpedo Corps; and Lieutenant Inglis, the adjutant of the Field Brigade. There was also a large number of private citizens on board. The Nelson was the flagship for the day, and here Captain Thomas, senior naval officer, received his visitors.

As the naval display was held in Hobson's Bay, amongst the shipping in port, those who were not experts in naval architecture had some difficulty in picking out the vessels forming the fleet, which were all lying at different stations. The yellow funnels, very much resembling those of the Adelaide steamers, and the fact that both gunboats and torpedo boats are painted black and yellow, assisted the landsmen to pick out the armed vessels.

There was no mistaking the gigantic Cerberus, over towards Williamstown, with her hull a mere black band on the water, and her conspicuous white turrets, rising up in contrast against the darker background. The turret—ship was under command of Captain Fullarton for the day. Further up towards the river mouth the twin gunboats Albert and Victoria lay side by side.

The Victoria with her huge bow gun, the finest piece of artillery in Australia, was under the charge of Commander Collins, while Lieutenant Dennis was senior officer in the Albert, The three torpedo boats, Childers, Nepean and Lonsdale, well out in the bay were not noticed at first, but later in the afternoon they made themselves conspicuous, and the smaller pair were perhaps as much observed and admired as anything else in the fleet.

Compared with those vessels, the occupation of which was war pure and simple (if such terms are permissible when applied to modern warfare) the hopper barges Batman and Fawkner even in their dual capacity were not interesting. There were several armed steam launches under way.

While the vessels were getting under way some interesting illustrations of the working and effects of mines were given by Captain Thomas and Lieut. Hele–Hutchinson on board the flagship.

First a small hand torpedo, with a coil of red fuse attached to what seemed a brass-barrelled pistol, was brought up. The torpedo, not of itself larger than a champagne bottle, was thrown well out from the vessel, and just as it disappeared beneath the green water, Lieutenant Hely-Hutchinson pulled the trigger of his pistol, which was really an instantaneous fuse. The explosion of the torpedo cast a column of water high in the air, drenching the occupants of the boats fastened astern of the Nelson. these puny torpedoes are intended as suitable presents to cast into a boat bringing a boarding party alongside, and fill the place of the obsolete hand grenade.

The next experiment, the firing of a 250lb submerged mine, resting on the St Kilda bank, about 300 yards from the Nelson, was more exciting. The position of the mine was marked by a buoy, with a red flag attached. As soon as the circuit was completed from the flagship an immense column of water was thrown into the air, assuming the shape, for an instant, of an iceberg, towering up to a height of 150ft., and then as rapidly dissolving. When the great volume of water fell back upon the ocean, the position of the mine was marked only by a broad acre of mud and foam.

By this time the other vessels of the fleet were in motion, the order of battle being that each should pass on the

St Kilda side of the Nelson, and in turn engage the big man-of-war with their guns. The Cerberus, in the van, was the first to open fire from one of her fore turret guns, and although only the smallest possible charge was being used, the rush of smoke was enormous. The spectators on the after deck of the Nelson, even without their glasses, could see everything that took place on the Cerberus. After each shot the turrets revolved rapidly, so that the second gun was brought to bear. The huge 300-pounders ran out and in, as easily as though a man with a Martini was bombarding the flagship.

Even the bright band of steel showing the nozzle thickness of the turret guns was discernible. And yet not a man was visible on board the Cerberus. To the watchers on the Nelson it might have been a deserted ship with automatic guns and turrets, but for the fact that before each shot there was a bugle command to fire.

The Nelson replied with her between-deck guns, and the heavy discharges thrilled the big ship at her moorings. The Victoria and Albert were next in the line, and both fired with their stern chasers, only the big bow gun of the Victoria protruding – silent but threatening. No men were visible on the gunboats either until they came round to seaward of the Nelson, when some blue jackets opened fire with small arms from one of the fore ports. With the hopper barges the case was very different, for here nearly every man was visible, and the group of tars working at the big gun on the bows of both barges were a most tempting mark for the Nelson guns.

At the range a good many iron round shot would have rained about the solitary guns of the Batman and Fawkner, while the opportunities for pot shooting with a rifle were most tempting. Last, and most decidedly least, in the aggressive line of vessels now steaming in a long line down the bay was the Lion – a lion so small as to be nothing more than a mere cub. The little field piece in her bows looked like a pea shooter by contrast with the 300 pounders of the Cerberus. When the puny launch raced at the Nelson as though about to run her down, and fired her Chinese crackers, everyone admired Captain Thomas's forbearance, for it would only have been a just punishment to capture the Lion by putting out a boat–hook and lifting her on board the flagship.

Attention was next directed to the torpedo boats, and although two of these were each smaller than the Lion, their great speed and capacity for infinite mischief placed them on a par with the turret—ship as far as commanding the respect of the onlookers was concerned. The Childers did no active work, so that attention was confined to the two smaller boats, the Nepean and the Lonsdale. But for the yellow funnels, both boats decked as they are, would be nothing more than a mere dark streak on the water, and it could be easily understood that on a night attack the electric light is required to fix their locality. The bows of the Nepean and Lonsdale projected down towards the water—line, and in shape are not unlike some of the great steam rams built for the United States navy. The cutwater of each boat is as sharp, however, as that of a sculling shell, and their speed is something remarkable. Going against the waves the white spray flies high over the tiny boat, and at a distance resembles steam issuing from the bows.

There is no smoke from the yellow funnels, and but for these distinctive marks of a steamer boat, they might almost be mistaken for huge porpoises plunging through the waves. One of the boats rushed at the Nelson, and just as it seemed as though she were about to dash herself to pieces against the great walls of the man—of—war, the engines were reversed, the foam tossed about as though by an explosion of a small mine, and in an instant the boat was rolling alongside without sound or motion.

The firing of the Whitehead torpedoes was watched with the keenest interest by all on board. With the heavy guns most of them were familiar, but the torpedoes were a novelty. On the deck of the Nepean, half peeping from their beds, were the two Whitehead torpedoes, in shape not unlike the huge cigar borne as a trophy by one of the Melbourne trades on Eight Hours Day. They may be arranged so as either to sink or rise to the surface when their velocity is expended, and as it was desirable that these should be recovered each was gauged to float when it had spent its power. The Whitehead torpedo explodes when the point comes in contact with a vessel, but of course neither of the two now used was loaded. It was impossible to convey any idea of the accuracy with which the torpedoes might be used in actual warfare, beyond discharging them so that they might rise in the vicinity of the mark aimed at instead of striking it while yet running beneath the water.

The steam launch of the Nelson was taken out some distance from the flagship, and on the signal being given

the Nelson dashed at her full speed. When within 200 yards, and just after passing astern of the Nelson, the torpedoes leaped from their resting beds, and shooting over the ship's prow like brazen sea— serpents, disappeared beneath the water. One of them seemed to have taken the ground for an instant, for mud mixed with flame boiled up to the surface. Then nothing was seen for a time, until within a few yards of the steam launch on one side the flickering flame of one expired torpedo was observed and another light burning on the water just ahead of the launch showed where the second spent engine had risen, Torpedo officer Dann had made very accurate calculations, and experts pronounced both shots to be excellent.

Then came the Lonsdale to show how spar torpedoes were used – a less delicate but vastly more dangerous operation than working with the Whiteheads. The torpedo is fixed on the end of a spar, between 20ft. and 30ft. long and explodes on being brought in contact with a vessel. At the very instant of striking the torpedo against the side of an enemy, the little vessel bearing it swerves away sharply, so as to avoid, as far as possible, the effects of the explosion. The target was a small iron buoy moored close to the Nelson, and its position was indicated by a blue and yellow flag. To hit the target running at full speed was in itself a clever feat, and in the first try, the Lonsdale, sheering off as if from a vessel, missed her mark. The torpedo boat swept around in a graceful circle, and as she shot past the target a second time a little cloud of smoke and foam shrouded the flag for an instant, showing that the first failure had not been repeated. The torpedo had been neatly exploded, and the long red spar that carried it was floating out with the tide.

The closing scene in the naval demonstration was an attack to be made by the torpedo boats on the other vessels of the fleet. In order to obtain a good view of this sham fight, the visitors were taken on board the Gannet and Despatch. It was noticeable that the majority found their way rapidly to the saloons, where Colonel Sargood had furnished antidotes against the effect of sea air and increasing appetites. As the steamers passed astern of the French transport ship Allier a merry salute was blown by the buglers on her deck, and the ensigns dipped in formal fashion, the greeting being acknowledged from the steamers. The French ship, whose officers were present by invitation on board the Nelson, was flying the white ensign at the main, but the Imperial flag was quite obscured by the glory of three broad tri–colours floating out in the breeze.

The sham battle was opened by the Childers, lying off near the Nelson, making a sudden dash at the Cerberus as soon as the signal to commence was given. But the turret ship was ready for her, and the big guns thundered out one after another in quick succession, while the rattle of Nordenfeldts, Gatlings and Martinis showed that Captain Fullarton had prepared a perfect hailstorm as a greeting for the Childers. Nothing could stand that imaginary leaden tempest, so the Childers swerved off and left the turret ship unmolested. Each of the torpedo boats had its special mission, but after the first dash they were at liberty to blow up an armed vessel wherever opportunity offered.

Then the powers of those flying twins, the Nepean and Lonsdale, were seen to full effect. Silently and swiftly they shot about like sea sprites, there making an unexpected dash at one of the gunboats, and there stealing a march upon a cumbrous hopper barge, whose defenders were perhaps engaged at another point. As soon as the boats were fired at, they promptly sheered off. To have hit such fast sailors with big guns even at close range would have been a very clever feat; but their plates are thin and fragile, and the Nordenfeldts from the Cerberus must have played havoc with them, more especially with the fire indiciously concentrated about the waterline.

The Cerberus is not the sort of vessel with which torpedo boats may trifle, for the turret—ship is built in watertight sections, each independent of the other, and with even the fore and aft compartments full of water the ship would still be afloat and firing. If the crews of the other vessels had not an anxious 15 minutes in keeping off torpedo boats on Saturday afternoon Lieutenants Houston and Holmes were not to blame.

As it was getting late, the firing soon ceased, and the demonstration was over. The Lonsdale ran alongside the Gannet to take Captain Thomas back to the Nelson, and as the Naval Commandant stepped off the steamer the visitors paid him the well—earned compliment of three lusty cheers, those on board the Despatch following suite with vigour. Returning to Port Melbourne pier, greetings were waved to the French officers, now on board their vessel. The party were landed, and returned to town at an early hour, a great many of those present having received their primary education in naval warfare.

During the afternoon the excursion steamer Williams took off a large number of people anxious to have a close view of the operations. The piers at Port Melbourne were crowded with spectators, and the shores of the bay were dotted with other groups of onlookers right round St Kilda.

The demonstration would no doubt have been more interesting if held out in clear water, where the positions of the whole fleet could have been picked up at a glance. In the bay the number of Yachts and sailing boats darting about helped to confuse landsmen slightly, and were no doubt of some assistance to the torpedo boats in their operation.

SHIPS INVOLVED

The following report upon the state and condition of the naval forces on Saturday has been supplied by the commandant (Captain Thomas) to the Minister of Defence:—

- 1. H.M.V.S. Cerberus, 2,850 tons, armoured turret ship, 9 knots; 4 18–ton guns and 4 1in–Nordenfeldts; boilers very good, new 1884; 9 officers and 142 men.
- 2. H.M.V.S. Nelson, 2,700 tons, wooden frigate, 10 knots; 2 7in., 68lb–guns, 20 64 pounders, and 8 32 pounders; boilers fair, probably last two years; 9 officers and 145 men.
- 3. H.M.V.S. Victoria, 450 tons, steel gun vessel,12 knots; 1 10in. 25-ton gun, 2 12pounders, 2 1in. Nordenfeldts; boilers very good new in 1884; 3 officers and 40 men. Additional steel plating for protection of boilers and men at guns now being made.
- 4. H.M.V.S. Albert, 350 tons, steel gunboat 10 knots; 1 8in. 12 ton gun, 1 6in. 4 ton gun, 2 9pounders, 2 1in. Nordenfeldts; boilers very good, new in 1884; 3 officers and 40 men. Steel plating for protection of boilers and men at guns now being made.
- 5. H.M.V.S. Gannet, 400 tons iron paddle steamer, 12 knots; 1 6in gun just arrived, not yet placed in position; boiler very good, new 1884. Not manned by naval forces, being employed in conveying His Excellency the Governor and visitors. Steel plating for protection of boiler and men at guns now being made.
- 6. and 7. H.M.V.S. Batman and Fawkner, each 400 tons, iron steam hopper barges, 8 ½ knots, 1 64pounder each; boilers very good, new 1884. 3 officers and 20 men each. Steel plating &c., being ordered. To be armed with 1 6in. rifled gun.
- 8. Lion 80 tons, steam patrol boat, $8\frac{1}{2}$ knots; 1 6 pounder Armstrong; boilers very good; 2 officers and 10 men.
- 9. Spray. 40tons, steam patrol boat, 8½ knots 1 6 pounder Armstrong; boilers under repair; 2 officers and 10 men. The boilers are undergoing a thorough repair, and will be completed June 3; should then be in good condition.
- 10. Childers, ——tons, first—class steel torpedo boat, 19 knots; 2 15in. Whitehead torpedoes, 2 Hotchkiss machine guns; boilers very good, new 1884, 2 officers and 10 men. At present only one 15in. torpedo in the colony; patent dropping gear has been made to enable the boat to fire 14in. torpedoes, also three more 15in. are ordered.
- 11. Nepean, second-class steel torpedo boat, 17 knots, 2 14in. Whitehead torpedoes, 2 spar torpedoes (33lb. gun-cotton); boiler very good, new 1884. 2 officers and 7 men.
- 12. Lonsdale, second-class steel torpedo boat, 17 knots; 2 14in. Whitehead torpedoes, 2 spar torpedoes (33lb. gun-cotton); boilers very good, new 1884; 2 officers and 7 men. There are only three 14in. Whitehead torpedoes, consequently the Lonsdale is one short. Five more are completed and on the way out, and 20 have been recently ordered. Patent dropping gear, to enable this boat and the Customs No.1 to fire 14in. Whitehead torpedoes, has been ordered and is now nearly completed.

- 13. Commissioner, torpedo launch, 9 knots; 1 3pounder Whitworth gun, 2 spar torpedoes (33lb. gun-cotton) boiler very good; 1 officer 9 men.
- 14. Customs No.1 torpedo launch 9 knots; 1 3pounder Whitworth gun, 2 spar torpedoes, (33lb. Gun-cotton), boilers very good. (unreadable) The Customs No.1 is unable to join the squadron, being on duty at Queenscliff.

TOTAL VICTORIAN NAVY PRESENT AT REVIEW

Ships	Tons	Officers	Men
12	7,230	45	400

TOTAL OFFICERS AND MEN IN NAVAL FORCES

	Officers	Men.
Permanent	33	210
Reserves	13	337
Totals	46	547

Forty stokers omitted to be added, which makes the number present 600.

Note.— Six one—inch four—ton Armstrong guns have just arrived in the Falkland Hill, also a large supply of ammunition. Three of these guns are to replace the muzzles—loaders in the Gannet, Batman, and Fawkner, the remaining three to be held in reserve for arming fast steamers in war time. Three acts of patent dropping gear have been made—one for Childers, to enable her to fire either description of torpedo, and one set each for the Commissioner and Customs No.1, both of which vessels will now be armed with both Whitehead and spar torpedoes. A 14–knot 56ft. double—ruddered boat has been ordered from Mr. White of Cowes, Isle of Wight, to act as guard boat. She is fitted to carry Whitehead torpedoes and a machine gun. All torpedo boats carry hand charges (2½ lb gun—cotton) and instantaneous fuse for destroying boats.

A.B.THOMAS, Naval Commandant.

1887

LOAN OF HOPPER BARGE

The Argus, November 10 1886

The Minister for Defence, has at the instance of Captain thomas, R.N., naval commandant, requested the loan of one of the Harbour Trust's iron hopper barges for experimental purposes, to be fitted out as an impromture fort, to carry one 64lb. M.L.R. gun, with the necessary protection; the vessel to be returned in good order and in her present condition. The object in view is to ascertain, how, at leisure, the best manner of providing; in the event of war, increased and impromture defences for the channels. At today's meeting of the trust the Finance Committee will recommend that the use of one barge be granted, as requested, provided that the time for which she will be required does not exceed one month.

DOWN THE BAY WITH THE FLEET

By a non Combatant.

The Herald, April 12 1887

Having spent a day on board the Cerberus under steam, during the Easter manoeuvers just finished, the writer may be able to supplement the Bookish Theoric, as Iago says, with a trifle of practical experience, although he will not be so presumptuous as the Frenchman who qualified himself to write a treatise on the Laws of England by attending two days at the Old Bailey; and the Cerberus is unpleasantly suggestive of a monster watch-house, all iron cells. Your author found it getting monotonous, and deserted to Queenscliff first chance, along with Mr. Bonisto and two gorgeous military officers. They contrasted with the plain garb of Admiral Fullarton and all his officers, whose uniform was as simple as that of the United States Navy. Why cannot we have sensible, plain, cheap uniforms in our little Army, as with the United States! Our Lieutenants outfit costs about £30, and this causes a most mischievous line of demarcation to be drawn between officers and men, simply a financial one.

The Cerberus is not an antiquated ironclad, though rather stale, and she may be compared in style with the more powerful Thunderer, a valued ship even with the Meditteranean Fleet. Is the Cerberus sea—going? One might not like the chance of turning turtle in Bass's Straits, as the unlucky captain did in the Channel, with the loss of 250 men, including the inventors and a son of Mr. Childers. Of course a bulwark might be put up along the lower flat of the Cerberus. Sydney would like to see her — alive, and Hobart would rush. However, she is only treated as a floating battery, a moveable Swan Island or Pope's Eye. By—the—way, an officer points out to us a sea mark, just in front of the Pope's Eye buoy, near the Heads, and this mark indicates a spot where an island battery is to be erected if the Government will only fork out a quarter of a million.

The hauling up of the anchor is accompanied, in a paradoxical fashion, with running out, like lightning, of a great length of chain, a mystery which your mentor will not attempt to fathom. The Cerberus made her ten knots an hour, just for a spurt, going down to the Bay. One has to be aboard to appreciate the tremendous power of the engines, which force along that submerged mountain while the sea boils behind as if a volcanic eruption was proceeding. The stokers are in one of the hottest places on earth and could not feel much more if they were passing through the Red Sea. You keep going down as with the successive stages of Dante's Inferno. "In the lowest deep, a lower deep," according to the hyberhole of Milton.

Steam does all the work, driving the ship, working the turrets, steering. The economy of space is amazing, everything packed as closely as a young lady's trunk, when she has to jump on it, to make it shut. Under the hatches in the Cerberus, with all battened down, and the sea dashing upon the deck, while the ship rolls and scoops it up, must be Hades and Gehenna. The officers have a snug little cabin, with green fittings, but where it is located is a puzzle from the outside, and a continual puzzle even from the inside, as you stumble about the turrets, the engine room, and the cramped lower deck, garnished round the walls with any number of rifles, revolvers, and cutlasses hanging in their leathers. It is as difficult to find your way in the mazes of the Cerberus as amid those of the Law Courts.

What experience in warfare has there been with ironclads? During the Crimean war some clumsy troughs were tried—floating batteries—and they eventuated in France leading the way, only twenty—six years ago, by turning the wooden two—decker Napoleon into the ironclad Le Goire, upon which the English followed suite with the Warrior: but do not let us forget that terrific combat between the ironclads Monitor and Merrimac in the American Civil War, which sounded the knell of the wooden ships. The Austians beat the Italians in the sea fight of Lissa, where some ironclads were engaged. For the rest of the experience we have to go to America. There has been a good deal of ironclad collisions among the South American Republic, but the great European nations only dare to spar with their expensive toys.

Signalling is the prettiest part of the business. Admiral Fullarton, proudly surveying his fleet from the

Cerberus hurricane deck, speaks to an officer, who passes the word to the smart young sailor who does the signalling. The first thing is to run up to the masthead the flags which denote the name of the ships signalled, and a Cerberus officer watches through the telescope her response, just as you call out "Are you there?" with the telephone, and get your reply. Then the hand–flags, a mixture of red and yellow, come into play, used with utmost deftness and celerity so that, on Admiral Fullarton's command all the ships of the squadron will fall into line readily as a boys boats, the signal being flagged on from ship to ship.

The torpedo boat, Childers, had occasion to come alongide the Cerberus, and she is the rummiest looking thing ever floated; but of course, she has plenty of little sisters. Why she looks nothing but a mass of raw iron flung upon the water, roughly shaped off something like a torpedo, and rolling as if she was going to propel herself along like a gambolling porpoise. The Commander is an eccentric looking fellow enough, in a suit of white duck, trimmed with red braid, and he wears a straw hat, altogether a thoroughly common sense, free and easy, as—you—please uniform — is it patented? The Childers just flies through the transparent green water, and one watches her screw feathering as rapidly as a bus wheel.

You enter a Cerberus turret by a man-hole in the top of the gasometer, and you have to take it on trust where you are going to, in the bowels. Each turret has two eighteen ton guns, muzzle loaders, and they are as close together as possible, so that all four guns look in a straight line while trained on one side, and the huge Cerberus heels over somewhat under this weighting. At the word of command, the naval brigade men on board, scamper of to their stations, the turret crews disappearing like monkey's into their dens. Perhaps you call to mind that terrific explosion of a gun in a turret of the Thunderer, when fifteen men were killed or wounded.

Lieut. Gough kindly explained the sighting of the guns, up to a range of about three miles and it is an intricate combination of allowances for one thing or another. The firing is done by the captain of the turrets, who has his back to the wall midway between the two guns, the recoil of which is stopped by four buffers, as with a locomotive terminus. The guns will never recoil right to the buffers, unless their chains happen to give way. It is usual to fire both guns of the turret at once, and an earthquake ensued. A strange thing is to watch the turrets revolve, from above with a noise like that made by the tramway. A turret can be whipped round in half a minute.

The engagement present to the writer's mind while on the Cerberus, was between the ironclads Admirante Cochrane and Huascar respectively, of Chili and Peru,in the war between those countries. The Huascar, a smaller Cerberus, was pounded to smash, and her commander, Captain Gran, was absolutely cut in half, together with a so-called shot-proof tower in which he stood, his top half being blown right away with that of the tower. Both the Admirante Cochrane and Huascar were constructed in England, and the builders must have thought the **** was good for trade, for £100,000 worth of intricate work, as with a watch, is knocked to pieces in a few minutes by guns like those of the Cerberus.

"BOYS OF THE BRIGADE" THEIR EXPLOITS IN THE EIGHTIES

The Williamstown Chronicle, 14 January 1932, p.3

The Naval Brigade in the eighties and nineties was the crack corps of Williamstown, and there was a keen rivalry between it and the permanent navy. During the visit of H.M.S. Wallaroo in 1887, a naval cutter race was arranged between crews from the Wallaroo, H.M.V.S. Cerberus and the local brigade. The course was from the Port Melbourne pier round lightship and back again, and it was not only the longest but the fastest race ever rowed by naval men. The brigade crew won, with the Cerberus second and Wallaroo third.

Mr Fred. Wade, who was a member of the winning crew, has supplied us with the names of the winners, and proudly he says this crew was never beaten.

They were:— Drill Instructor Bates (coxswain), Messrs. Jack Evans, W. Williams, Dick Rowe, W. Johnson, T. Bell, W. Robinson, G. Hannan, F. Wade, A. Hyde and H Henningsen. He says that about 400 yards from home his crew put on an extra burst, and drew away from the Cerberus crew, who had been pulling neck and neck, and won by a few lengths.

The victory was celebrated by a dinner in the old Academy of Music, next to the Morning Star Hotel, and it was a great night.

THE FLEET AT THE HEADS.

The Ballarat Courier April 2 1888

The Victorian fleet having taken the officers and men of the Naval Brigade on board, weighed anchor from Williamstown at half past eight o'clock on Friday morning, and was soon under full steam, bound for the Heads. There was the iron-armored turret ship the Cerberus, under the naval commandant Captain Thomas; the veteran frigate the Nelson, under Captain Fullarton; the steel gunboats Victoria (Commander Collins and Albert (Commander Dennis), the armed paddle steamer the Gannet (Lieutenant Scott), the armed hopper barges Batman (Sub-Lieutenant Richardson) and Fawkner (Lieutenant Tickell), and the steam torpedo launch the Commissioner. The number of men they carried was 625, which included the permanent force, the naval brigade and a large contingent of extra cooks and stokers. The Nelson steamed a course for the South Channel, for the purpose of taking up a position to defend the South Channel fort. The remainder of the ships, with the flagship leading, formed in single column line ahead of her, and in this order proceeded down the bay. The Cerberus had 120 feet of torpedo net on each side of her, to protect her in the vital parts. The speed attained was about seven knots. A large amount of routine duty had to be performed, and on the Cerberus Lieutenant Gough and Chief Gunner Smith worked like Trojans in telling the men off to their stations. Various evolutions were performed. On reaching the West Channel Captain Thomas signalled for the torpedo boats Childers and the Gordon, which were at Swan Island with Lieutenant Hutchinson and Lieutenant Heath, to join the fleet. They ran out smartly, and were soon making graceful evolutions under the bows of the Cerberus. At half past one o'clock, the flagship dropped anchor off Queenscliffe, and the signal was made for the captains to confer on board. The Albert, the Batman and the Faulkner were ordered to Swan Island, and the Victoria to the South Channel to join Captain Fullarton. The Gannet was to remain in company with the flagship. Since last Easter the Victoria and Albert have been fitted with an electric light of 20,000 candle power, similar to that on the Cerberus and Childers, and in the evening signals were exchanged with a satisfactory result. The principal event in the manoeuvers will take place on Sunday night and Monday morning, when the ships representing the enemy will endeavour to enter the Heads. Captain Thomas promises some surprises, and the engagement will possess many features of interest, besides furnishing an interesting spectacle. - Argus

DIRECTOR FIRING

H.M.S. CERBERUS The Argus, 3 April 1888

The ships of the Victorian squadron, after taking stores at Williamstown on Monday afternoon, weighed anchor again, and steamed down the bay against a head wind and in a choppy sea. They lay during the night in the West Channel, and early this morning they dispersed for firing practice. On the flagship a special interest attached to this work, as the new director was to be subjected to a practical test.

The director consists of a horizontal arc, and a support carrying a telescope which is worked on trunnions, and provided with the vertical correction arcs and verniers. The horizontal arc is a semi-circular frame graduated in degrees representing bearings before and abaft the beam. It enables the manipulator to ascertain the angle and elevation of an object, and to make corrections for the speed at which the vessel is steaming. The instrument has been in use in the Imperial navy for many years. Its introduction to the Cerberus is one of the improvements which have been made by Captain Thomas since his return from England. It is intended to be used for broadside firing. For this purpose it is shipped on the conning tower, which is the station occupied by the commander in action. It gives the commander entire control over the fire, and enables him to deliver it at

any time, and on any point he may select. He has an all—round view, and he would often see the object when it is out of sight from the gun deck owing to the smoke, darkness, or direction. He takes his sight with the director, he gives his advice with regard to angle and elevation to the man in the turrets by means of speaking tubes, and he fires the guns simultaneously by simply turning a key in the battery of the electric gear. The electric gear on the Cerberus is not complete, and the firing has to be done by the men themselves. It is, however, in process of construction.

For the practice which took place to-day a target, consisting of two barrels moored together and carrying flags, was sent afloat. Commander Collins occupied the conning tower, and Captain Thomas superintended the operations generally from the quarter deck. The order was first given for the broadside firing on the port beam. A concentrated broadside from the Cerberus would have destructive effect upon any object it struck. There are two turrets, four 18-ton guns. Seventy pounds of powder are used in each charge, and the weight of the projectile is 400lb. The weight of metal discharged would therefore be 1,600lb, and if the shots struck in the same spot they would make an impression upon the most heavily armoured ironclad, whilst they would at once sink any vessel of ordinary calibre. The distance given for the first shot was 1,000 yards beyond the target; but the direction was good, and if a Russian ironclad had been there it would have received the whole weight of the charge, which, unless it was a vessel of great strength, would have disabled or sunk it. The second broadside was fired with even better result. One of the flags was struck, and the projectiles dipped in the water only five yards beyond the target. The concentration was so complete that all the shots would have hit a target 10ft. square. One of the projectiles was seen to burst over the object. It is probable that it collided with another of the shot, and that the impact caused the explosion. The projectiles do not at once sink. In this instance they made two long hops after they first came into contact with the water, and then when their momentum was spent they disappeared. The Cerberus literally trembled when the broadside was fired. A cloud of smoke and burnt saltpeter enveloped the ship, soot and paint were shaken from the funnel, and the shield deck around, the turret was blackened. Captain Thomas, being satisfied with the results obtained, gave the order for independent firing on the port beam. In this practice the gunners themselves sight and fire the guns; but the distance was ascertained by Captain Thomas by a trial shot from the Nordenfelts. Only three shots were fired, the distances varying from 1,550 to 1,700 yards. The target was not hit; but two of the projectiles fell close to it, and would have struck a vessel lying in the same position. The target was drifting with the tide. Had it been stationary the results would have been better.

At about 11 o'clock Captain Thomas signalled for the other ships to form in column of division line, and in that information they steamed towards Queenscliff. On reaching the pile light they lay—to, and Captain Thomas then gave orders for the disposition of the fleet. The Albert was sent to Dromana, with instructions to engage in signalling practice by the electric light with the Victoria at Queenscliff. The Cerberus was to lie off Queenscliff and to exchange signals in the same way with the forts. The other ships of the squadron were ordered to remain at the north end of the West Channel, and to go through a programme of routine drill drawn out for them by Captain Thomas.

OUR DEFENDERS

The Illustrated Australian News November 9 1889

VICTORIAN NAVY

The naval defence of Victoria have not been neglected. Indeed, competent authorities have declared it to be the strong arm of organization. There are now 385 men of all ranks in the permanent force, which is under the command of Captain W.F.S. Mann, R.N.: and 382 in the Naval Brigade, commanded by the veteran Captain Fullarton. The latter contingent is a description of militia, which, however, is subjected to be a fine body of men, not excelled for physique in any other part of the world. The men are all practical seamen, and each year attend for a stated number of days upon on or other of the war ships forming the Victorian navy, and are taken on cruises, extending over several days, for drill and gun exercises, as well as training in the general duties appertaining to a man of warsman. These trips are productive of the best results, and while o board the men are under the strictest discipline, and are required to lose no opportunity in perfecting themselves in their duties, and performing them with smartness and precision.



DESCRIPTION OF SHIPS

There are no less than sixteen vessels in the Victorian navy, and the head of which stands the armor(sic) plated turret ship Cerberus. 3480 tons, 1660 h.p. She carries four 10 inch 18 ton M.L. guns and four Nordenfelt guns. The frigate Nelson, though obsolete and very poorly armed, might nevertheless serve the purpose in an emergency as a description of floating battery. There are two steel gunboats, the Victoria and Albert, each carrying heavy modern guns. The former has a 12½ ton 8 inch B.L. gun; one 6 inch B.L. and two 13–pr.B.L. guns and two Nordenfelts. The Albert is also similarly armed. There are three torpedo boats in our small fleet, namely, the Childers, 63 tons, 800 h.p. four 15 inch Whitehead torpedoes and two Hotchkiss guns; the Nepean and Lonsdale, 150 h.p. each, and carrying two torpedoes each. Provision has also been made for placing a 6 inch 4–ton B.L. gun, together with several Nordenfelts, upon two Harbour Trust dredges and the tug boat Gannet. The screw steamer Lady Loch is provided with 2 5 inch 2 ton R.B.L. guns, and in addition there are 3 torpedo launches. The list completed by the Courier and Ellingamite, two steel merchant cruisers,

each provided with 4 - 13 pounders quick firing.

It will be admitted, after perusing this list, that though none of the vessels are very formidable, still, in conjunction with the extensive fortifications constructed at the Heads, a warm reception awaits any enemy who may venture to attack Melbourne. In a few months Victoria, in common with the other Australian colonies, will receive the additional protection afforded by the new squadron, consisting of five swift cruisers and two torpedo catchers, in course of construction in the Imperial Naval Dock Yards. This squadron is to be maintained at the cost of the colonies, and will remain in Australian waters, but act in conjunction with and under the command of the admiral in charge of the Imperial squadron on the Australian station.

The coloured two-page illustration we give of our naval defenders depicts a contingent of the naval brigade upon duty on board one of the Victorian gunboats. They are engaged upon gun exercise during one of the periodical cruises about the Bay and along the coast, to which reference has already been made. Captain Fullarton is deserving of every credit for the high state of efficiency to which the Naval Brigade has been bought under his command, and his men have more than once received the warmest commendation from such an able officer as Captain Thomas R.N. before he rejoined the Imperial Navy. So long as the colony has such sturdy arms as are to be found in the Naval Brigade and amongst our permanent naval forces to rely on. Victorians need not fear anything terrible in the nature of a knock down blow from any Russian or French ships of war.

1891

THE NAVAL MANOEUVERS

BY WIRE FROM OUR CORRESPONDENT The Herald March 30 1891

THE HERALD

QUEENSCLIFF

The fleet arrived off here yesterday evening. The programme does not differ greatly from that of last year. There are to be no fireworks displays, or such in the way of spectacular show. The authorities being determined to give the men as much practical drill as possible. The vessels are officiated as last year, except that Lieutenant-Commander Hamilton, R.N., takes the place of Lieutenant Heath in charge of the torpedo fleet. We left the anchorage in the usual single column, headed by the Cerberus, the other vessels following at a distance of two cables. The famous old frigate Nelson in tow of two of the Hopper gunboats, and the p.s. Osprey brought up the rear. Nothing of note occurred on the trip to the Heads, except that the turret ship, which slipped through the water at astonishing pace, considering her water displacement and age, on one occassion refused to be affected, turning the half circle before brought back to her course. We are given to understand that the steering machinery is peculiarly complicated, and requires the greatest watchfulness to keep it accurate. The crew, although, of course, there are some growlers, perform their duties with a fair amount of alacarity, but it is not expected that they will be perfect in their stations for a couple of days at least. Last night we were subjected to a torpedo attack, but the attacking party were unfortunate in the night being particularly bright. The fleet, which were drawn up in a circle, with the flagship in the centre, had no difficulty in picking up the torpedo launches, which were fairly riddled with the heavy volleys poured into them by the war ships before they got into close range, so as to be dangerous. The engagement was a very pretty spectacle. Today we are engaged in gun practice at the moveable target. A rather severe accident happened to Lieutneant Fey, second in command of the torpedo fleet, who yesterday had his shoulder dislocated while bathing at the depot, by which he was incapacitated from further duty during the cruise. The shooting at the fixed target was very fair.

REPAIRS

The Argus August 12 1891

"Mr. A. Wilson, the engineer of ports and harbours has furnished the Minister of Defence with a report concerning repairs which are necessary to the ship Cerberus. Mr. Wilson states that the steering apparatus of the vessel can be improved for a sum of £150, and he also suggests that some repairs should be made to the decking at a cost of £200."

A NEW TORPEDO BOAT FOR VICTORIA

Illustrated Australasian News Feb. 1. 1892

About three years ago the British Admiralty gave an order to Messrs. Yarrow and Co. for six seagoing torpedo boats. These were built on quite a new model, and on trial proved to be the fastest, handiest and best boats possessed by the royal navy. This was afterwards amply verified in actual service, for the manoeuvres of the following and succeeding years proved these vessels to have quite exceptional seagoing qualities, in addition to speed and manoeuvring powers.

The Argentine naval authorities took advantage of the British experience, and gave the above firm an order for six seagoing torpedo boats, which were "constructed on the same lines and with similar machinery." The vessels were delivered at the end of last year, and came fully to the expectations of the authorities; indeed, the last of them, which was fitted with a new class of machinery, obtained the great speed of 24½ knots on a two hours loaded trial, which far exceeds the performance of any vessel of equal dimensions. The success obtained with this type of vessel induced the Victorian Government to entrust Messrs. Yarrow and Co. with the order for a first class seagoing torpedo boat from the same drawings, but with such improvements as suggested themselves to the firm. The outcome of the above order is the vessel we illustrate, and will now proceed to describe.

She is 130 feet long by 13 feet 6 inches broad at the water line, and is built entirely of galvanised mild steel. Safety against foundering is provided for by subdivision into nine water tight compartments by means of steel bulkheads. The general arrangement of the vessel will be best understood by walking with us from fore to aft. The first three compartments give good accommodation to the crew, consisting of 12 hands. Immediately aft comes the cooking compartment with the usual culinary appliances, and here also is located the dynamo and engine for producing the electric light. The boiler room and coal bunkers come next in order, and contain one large locomotive boiler of Messrs. Yarrow and Co's. special design for forced draught. This boiler is fitted With the firm's patent water—tight ashpan arrangement, to prevent the fire being extinguished by any sudden influx of water from shot or damage, a very valuable addition to a fighting vessel or even to any merchant steamer. Abaft this is the engine room, which contains (1) the inverted triple expansion surface condensing engines, which are designed to give out about 1100 indicated horse—power, (2) the centrifugal pump for circulating the condensing water; (3) the fan engine, for producing forced draught; (4) the steam steering engine, by means of which the vessel can be steered from either fore or aft; and (5) two air compressing engines for charging torpedoes. The two engineers have their berths in a separate compartment next to the magazines.

The officers have excellent quarters further aft, containing a roomy saloon and pantry, and quite aft is the lazaretto or storeroom: The armament of the vessel consists of a 14 inch bow torpedo tube built into the cutwater, two 14 inch torpedo tubes mounted on a turntable aft for all round fire, and three quick firing guns on naval carriages in echelon. The official trial was attended by Major General Stewart, representing the Victorian Government, and by Mr. Pledge and Mr. Ellis on behalf of the Admiralty. Unfortunately the weather was most adverse; in fact, it blew a gale of wind, which must have reduced the speed by a full half knot, and it was the unanimous opinion of all present that in moderately fine weather the speed would have exceeded 23 knots per hour. The official trial consisted of a three hour's continuous full speed run in the estuary of the river Thames, during which six runs were made over the measured knot in the middle of the time, showing the mean speed to be 22.736 knots. The boat carried 20 tons.

EASTER MANOEUVRES

The Williamstown Chronicle 23 April 1892

Fine weather accompanied the Victorian Naval Forces on their annual Easter cruise. The order of starting for

the Heads was: Cerberus under the command of Captain Pelham the Nelson under the command of Captain Dennis; the Victoria (gunboat), Lieutenant Webb the Albert (gunboat), Sub Lieutenant Fry; the Gannet, Sub Lieutenant Gaunt; the Batman, Sub Lieutenant Miller; the Fawkner, Sub Lieutenant Aderley; and the Osprey, Sub Lieutenant Jawell, left Williamstown to work mimic havoc and destruction amongst the coast defences at the Heads and the torpedo fleet charged to defend them. The Cerberus carried Captain White, the naval commandant of the fleet, and it was noticed on arriving on the flag ship that, whether owing to the change of command or other circumstances, the vessels presented a far more ship shape and seamanlike appearance than when, during the last manoeuvres, she was made the subject of so much comment. About 10.15 the Cerberus got under steam and led the way down the Bay, with the Nelson in her wake, tugged by two boats, and the gunboats and hopper barges following in order of battle. On the way down the men were put through gun and other drills, and their efficiency in beating to quarters and in fire and deck practice was distinctly creditable to all in command. The anchor was let go off the quarantine station, and the gunboats taking up positions astern, and then preparations were made throughout the fleet to repeal the torpedo attack which was expected from the Swan Island fleet, in charge of Lieutenant Commander Hamilton. The night was very bright and clear, and all against the attacking party, but, notwithstanding these handicaps, Lieutenant Hamilton succeeded in working the direct destruction (on paper) with his fleet of four boats. His flotilla consisted of the Nepean, commanded by Chief Torpedo Officer Dann, the Lonsdale, Mr Blair, and the Gordon, Mr Ogilvie, whilst the Childers carried the pennant. About two hours after midnight, when Lieutenant Hamilton considered that in all probability the watch on the men of war would be some extend fatigued, a start was made from the Swan Island, and the four boats managed to get well under way without being notices. The Childers was sent full speed ahead past the pile light, then turned and headed for the Cerberus, but the noise of her engines and bright light betrayed her, and she was supposedly sunk by an 18 ton gun with great ease outside her torpedo range. Not a bit depressed by the untoward happening, she dodged round and engaged each vessel in the squadron, being detected and riddled by 6 pounder and Nordenfelt bullets, and accepting the situation with the greatest equanimity. The discomfiture of the Childers, was, however, only part of the deep laid scheme of Lieutenant Hamilton's to lull the warships into a sense of false security, and strategy was signally successful, for under cover of the fire from the ships two of the boats the Gordon and the Lonsdale crept up and blew the Victoria, Albert, and Nelson to atoms in the most leisurely manner possible. It was then held that enough blood had been shed for one night, and operations ceased for the night, leaving the honours distinctly in the hands of Lieutenant Hamilton and his men. On Saturday the day was begun by battle firing from the Nelson and gunboats, but the Cerberus was being energetically made spick and span in anticipation of the visit of the Governor, who was announced to arrive about midday. Shortly after 12 o'clock the smoke of the Lady Loch was seen coming down the West Channel, and a few minutes afterwards his Excellency was ascending the side of the Cerberus, to the inspiring strains of the National Anthem from the massed band on the lower deck.

The Herald Monday, February 27, 1893

THE WARSHIP CERBERUS. A GENERAL OVERHAUL RE-DECKING AND OTHER IMPROVEMENTS

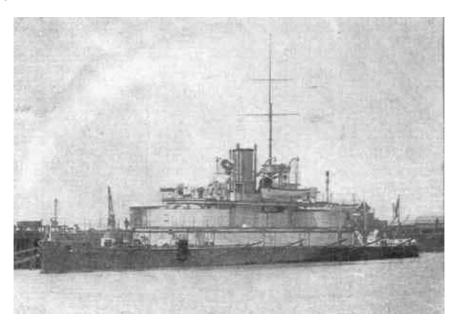
The Victorian warship Cerberus was recently taken alongside the Naval Pier, Williamstown, to be re-decked and to have other improvements affected.

The improvements which constitute a re-laying of the main deck and construction of a new flying deck together with a number of additions, and a general overhaul are nearly completed.

THE CERBERUS.

Weekly Times February 22 1896

"The old Cerberus, indeed! She is not as old as most people believe her to be. The idea of calling a vessel of her construction old." This was the way in which one of the courteous seamen appointed to conduct visitors over the vessel replied to an amateur man–of–warsman, who persisted in calling the vessel "old Cerberus." This naturally led one to seek for further information concerning her, and this week we present to our readers a photo engraving of the vessel taken about the time the above remarks were made.



The vessel was built at Jarrow in 1870, the same year in which the two Indian Marine Coast Defence Ships, the Abyssinia and Magdala, were constructed. The three vessels named were all built at different places, but on about the same lines, with the exception of the depth in the case of the Abyssinia, she being a foot lighter in draught than the other two.

The Cerberus is 225 feet long; 45 feet beam, with a mean draught of 15 feet 3 inches. The cost of constructing the hull was £99,331, and the machinery £18,225, or £117,556 in all. The vessel is armour–plated throughout, and her armament consists of four 10–inch 18–ton muzzle–loading rifled guns, four machine guns and two light guns under 15 cwt. Her boilers are capable of supplying steam up to 1370 indicated horse power, while her twin screws can force her through the water at the rate of 9.75 knots per hour. Her coal carrying capacity is 120 tons. She has ample accommodation for over 250 men, and in the event of hostilities would prove a most formidable opponent to an invader.

Monday Evening, April 6 1896

WITH THE FLEET

Easter Manoeuvres

The Herald April 6 1896

(From our Special reporter.) H.M.V.S. CERBERUS, Sunday.

Really Captain Neville, the Naval Commandant, is to be congratulated on being born under a lucky star. so far, at all events as weather is concerned. In England when there is any public outdoor celebration carried out, and the day should prove fine, and particularly if one or two glimpses of the gun should be observed, we are told that Queen's weather prevails. Here we happily have more favourable climatical conditions, although at Easter time anything may happen from a hot wind to a tornado. Ever since his advent the present Naval Commandant has not for any of his demonstrations, suffered the slightest inconvenience through of weather. This has led to, when the fleet "is on the job," the saying that everything will be sure to go smoothly, because "Neville's weather" may be depended upon. And so it has been throughout the Easter manoeuvers. Good Friday and Saturday were simply ideal days bright and cloudless, although not breezy enough to satisfy yachtmen.

Saturday on the Cerberus was a very busy day, both officers and men being busily engaged, not only from "early morn to dewy eve," but until late at night. They were "carrying on" all the time. Much of the day was occupied in target firing with the 6lb Nordenfeldt quick firing guns. Very good practice was obtained and Captain Neville was very much pleased with the proficiency displayed by the men, many of whom had been under training for but a very short time. There was also tube firing with the big 10–inch guns, and with this also most gratifying resluts were obtained.

In the eveing the Cerberus anchored off Queenscliff, and it had been arranged that there should be a special night attack on her by the only two torpedo boats in commission, the Countess of Hopetoun and the Childers. On board the flagship the search lights were kept flashing every quarter, and keen and experienced eyes, aided by powerful binoculars, were bought to bear upon every likely, and perhaps unlikely, point from which the "enemy" might be expected to approach. Notwithstanding all the vigilance exercised, however, the Countess of Hopetoun succeeded in getting within 100 yards of the Cerberus before she was observed. But when she was, the fun commenced. All the divisions were at quarters in a state of preparedness. There was a brisk fusilade, which lasted for some seconds. Then the flashlight disclosed the insidious little Childers just about the same moment as the lynx–eyed first lieutenant deacried her without the aid of glasses. The little craft made herself ******. and no more was seen of her.

The Cerberus remained at anchor off Queenscliff on Saturday night and until Sunday. It had been intended to send the ship's company ashore on Sunday morning, but the morning broke badly. The sky was overcast, and there was a strong northerly breeze blowing. This induced the Commandant to alter the arrangement, and service was held on board, the captain reading that prescribed for such occasions,

Happily there were no casualties of a serious character.

THIS AFTERNOON

Early last night the Cerberus left her anchorage off Queenscliff, and steamed a (sic) off St. Leonards, where the anchor was dropped for the night, and at 7 o'clock this morning steamed away and took up a position about eight miles north—east of the West Channel Pill Light. There targets were laid out for gun practice with the heavy and the quick firing Nordenfeldt guns. The ranges varied from 1000 to 2000 yards.

The firing was pronounced by the Commandant and other skilled officers on board to be very creditable indeed, and of such a character as would not have disgraced gunners of much greater experience than that gained by many members of the Naval Brigade, whose opportunities, owing to retrenchment. are unfortunately but too few. The officers of the ship made a careful selection of gunners from the permanent men and the Naval Brigade, and this has resulted in a blending of the two bodies in such a proportion as gave the former a slight preponderance. The object of the officers was to fuse as much as possible the two sections on board, and it must be admitted that the intention was successful to the highest degree. Everything went harmoniously as a skillfully played organ, not a discordant note being heard any time during the trip. True, there was "Ichiband", and that possibly had a pleasing and a soothing effect upon all on board, and had the effect of causing at all events the officers to look upon the shortcomings of Jack with a more tolerant eye than otherwise they might have done.

"Itchiband," it may be remarked, will be well known to those who have sailed in Chinese and Japanese waters. Out of 28 rounds fired from the heavy guns, there was only one which was bad, or, in other words, would have been ineffective had the ship been in action. All the others would have hit a moderately sized vessel, or at least, 97 per cent would have told. There was a strong breeze blowing from the north—west all the time the practice was proceeding, and the ship was steaming eight knots an hour. The practice on the quick firing guns was equally excellent. All the officers were highly pleased with the proficiency shown by the men, and attribute much of the success they gained to the big gun tube practice they had on Friday and Saturday.

The torpedo boats Countess of Hopetoun and Childers ran in last night to Swan Island, and left early this morning, and on arrival at the naval depot were put on the ships. The Cerberus reached Port Melbourne this afternoon, and anchored off the railway pier. She will steam either this eveing or tomorrow to Williamstown for overhaul.

1897

EASTER MANOEUVERS

With the Fleet

FROM OUR SPECIAL REPORTER The Herald April 17 1897

QUEENSCLIFF Saturday.

Happily, Good Friday, the first day of the Easter manoeuvers, so far as the naval forces were concerned, was characterised by splendid weather, The fleet this year comprised the turret ship Cerberus; the first class torpedo boats the Countess of Hopetoun and the Childers; and the second class torpedo boats the Nepean and the Lonsdale. Of course the general charge devolved on Captain Neville, the Naval Commandant, his staff, amongst others, consisting of Commander Kingsford, Leiuts. Colquhoun, Richardson, and Webb, Fleet Engineer Breaks being in charge of the engines. The Countess of Hopetoun was in charge of Leiut. Biddlecombe. Since the last Easter manoeuvers the Cerberus has been lighted from stem to stern with electric light, and the officers are very proud. In these days of retrenchment, that the whole of the work only cost £10. The explanation is that the whole of the work was done by regularly engaged hands, and it is no secret that besides being able to compound "Ichiband," Commander Kingsford is no mean mechanician. At all events, the result is most satisfactory and effective. Yesterday the members of the Naval Brigade told off for service with the fleet were all aboard by eight o'clock, and having breakfast, were shaken down to quarters. All preliminaries having been arranged, the Cerberus was got underway by 10 o'clock and progress was made down the bay. No time was lost in putting the ship's company through all manner of useful and necessary exercises. These included gunnery instruction and general practice in the extinguishment of fire. During the morning a most interesting experiment was tried. The supposition was that there was a man overboard. A buoy was **** over the side, and the alarm was raised. Within three minutes the life-boat was launched and the buoy recovered. The work was regarded by the officers as being most satisfactory and afforded them with much satisfaction. Tonight the two first class torpedo boats, the Countess of Hopetoun and the Childers, will go outside Port Phillip Heads, and will endeavour to enter without being observed by the Garrison Artillery at Point Nepean and Lonsdale. So far everything has gone well, and the officers are very much pleased with the behaviour of the Naval Brigade detailed for duty on the ships in commission.

The Argus Saturday, November 11, 1897

CAPTAIN NEVILLE'S SPEECH.

Captain Neville's little speech at the Mayor's dinner had more meat in it than almost any of the addresses. It is welcome intelligence, commandant, that our old and trusty friend the Cerberus is still a valuable fighting factor. She came to us in the early seventies -- a quarter of a century back -- but, says Captain Neville, she is good for any two sea-going hostile cruisers that could be sent against her, and if she were re-armed she would be good as against three.

The Cerberus has been jeered at because of her lack of speed, but running is not her role; she is essentially a harbour defence, a floating fort, and it is pleasant to have this testimony to her efficiency after her long career. She was a good investment truly. Captain Neville's other words are liable to be misunderstood, and were misunderstood by the Premier. In expressing his regret that he was not to be Illustrated Australian News. succeeded by an Imperial officer, Captain Neville, we presume, would intend no



slur upon qualified local officers. But the curse of local appointments is that they come to be permanent appointments, and the imperative rule of the Imperial service is that appointments should be held for stated periods only. Captain Neville does not remain with us. He passes on to some other sphere. It must be well for

us to do two things here— to keep in touch with the Imperial army and navy, and to give commands for limited periods only. The period rule applies to Lord Wolsley, to Lord Roberts, to the Duke of Connaught; and it cannot safely be ignored as regards colonial officers. The Imperial system was not adopted without reason, and, though we may disregard it if we choose, we should do so entirely at our own peril. It is an old experience, however, dating from the gods, that one—half of the prayer is granted, and the other whistled down the winds. The seconding system will come on for consideration for a while. In the meantime, that re—arming of the gallant old Cerberus should not be lost sight of.

APPOINTMENT OF COLONIAL OFFICER

The Williamstown Chronicle, 2 October 1897, p.2

In defence circles the promotion of Lieutenant Tickell, of the Victorian Navy to the rank of Commander, is regarded as a certainty of the near future. It is considered likely that on retirement of Captain Neville from the Navy, about November, the Government will, in accordance with an intimation given by the Minister of Defence some time ago, try the experiment of appointing a colonial officer as his successor. Lieutenant Tickell is at present in England undergoing a special course of naval study, and witnessed the great Jubilee Review at Spithead.

VICTORIANS IN CONTROL

The Footscray Chronicle, 16 April 1898

Since the last annual cruise of the Cerberus, a number of changes have been made in the staff. Undoubtedly the most important is that the fleet is now entirely controlled by officers of the Victorian navy. The Imperial has wholly replaced by the colonial services. The naval commandant (Captain Neville) and Commander Kingsford both Imperial officers, have returned to England, and Commander Tickell, who was on the Majestic, of the Channel Squadron, during the Jubilee demonstration, is now in charge. Associated with him on the Cerberus are Lieutenant Webb, of the Naval brigade, Fleet Engineer Breaks, Staff Surgeon Stewart, Engineers Forsyth, M'Cowan and Spence, Assistant Paymaster Treacy, Chief Gunner Drewitt, Gunners Hayes, Blair, White, Stone and Hearne, and Warrant Officer Temple.

NAVAL INSPECTION WITH HIS EXCELLENCY ON BOARD H.M.V.S. CERBERUS

The Footscray Chronicle, 2 July 1898, p.3

His Excellency the Administrator of the Government on Saturday afternoon paid an official visit to the naval depot at Williamstown, and also to the Cerberus. Sir John Maddern, who was accompanied by his private secretary, Colonel Campbell, was meet at the Port Melbourne Pier, and taken across the bay in the Gordon launch to the naval depot where His Excellency was received by Captain Tickell, naval commandant, Fleet engineer Breaks, Lieutenant Richardson and Paymaster Treacy. An inspection was made of the depot and the torpedo boats Countess of Hopetoun, Nepean, and Childers, and the commandant, with the assistance of his lieutenants, explained how the torpedoes are managed in active warfare. In reply to a question put by His Excellency to Captain Tickell as to the time that would be required to prepare for an enemy, the commandant said that he could man all the vessels and have every thing in proper fighting trim is less than five hours. The party than proceeded to the Cerberus which was lying off the dock pier. The Naval Brigade were on the warship, and when His Excellency stepped on board the band played the National Anthem. The turret guns were worked as in action, and a general survey of the ship made. The uselessness of thick armour against shells fired at close quarters or a torpedo attack was explained to the visiting party when the conning tower was being examined. The iron casing of the tower is 10 inches thick. "What would a man's chances be inside during a fight?" someone asked an officer. "He would be all right if the tower was not hit," was the reply. "If a big shell struck it fair, there wouldn't be much of him left." Here Sir John Maddern remembered as a case in point a gruesome incident of the war between Chile and Peru. One of the Peruvian vessel, the Huascar, was a turret ship like the Cerberus. An Admiral directed operations from its conning tower during an engagement. Presently the tower was shattered by a shell, and all that could be found of the admiral thereafter was a piece of one of his boots.

Years have passed since the government was first asked to get four breech loading guns for turrets of the Cerberus to replace the muzzleloaders now on the vessels; but upon this request as upon another for an increase of the Naval Brigade, nothing is yet done. In connection with the inspection of the blue jackets on the Cerberus, it was stated that there should be an addition of at least 100 to their number. The present force is an irreducible minimum. There would be absolutely no reserve to fall back upon in case of a fight. When men fell there would be none to take their place. Much of what we have at present in the shape of naval equipment is good of its kind but there is not enough of it, and in time of need an insufficiency might be as nothing at all. At the conclusion of the inspection Sir john Maddern complemented Captain Tickell upon the efficiency and perfect order of the vessel and the depot, and remarked that the visit was most instructive, as well as pleasant.

SECOND DAMAGED GUN.

November 30 1898 (see separate publication – "The Damaged Guns".)

WITH THE FLEET

THE CERBERUS FIGHTING

SPLENDID EXHIBITION OF SHOOTING

HMVS CERBERUS

Monday Afternoon

The Williamstown Chronicle, 3 April 1899

Half-past five this morning heard the watchers calling out "Shake a leg," & a few minutes after, the officers & crew of the Cerberus were ready for the last day's work. Manoeuvres of various sorts, all useful & indispensable, precede the bugle call to action. Then, in a trice, the boat was animated indeed. Everything on deck disappeared or was made fast, & in 28 minutes the Cerberus was stripped to the waist, & had her two-ounce gloves on. A target had been dropped in the middle of the Bay, & we got to leeward about 1000 yards, & then began to spar for an opening. The sun blazed in the eyes of the Commander in the conning tower, & worried Lieutenant Colquhoun on the flying deck, but the open mouthed stern featured gunners got right down to their work, & presently there was shooting which no navy in the world need have been ashamed of. Quick-firers, 14 pounders, & turret 25 tons (sic) chattered, & squeaked & roared till the gulls gave us a parting cry, & we had the bay to ourselves & our devil-dealing shells. From the first the target had a bad time. We opened on it at 1500 yards, & got up as far as 2000 yards, & all the while we kept peppering its red & white stripes & riddling its flags. The 400lb shells of the big guns chased each other in the race to reach it, & whirled in demonic fury on the way. The quick-firers ripped & tore, & finally the 14 pounder came with wonderful precision, & carried away the colours & splinters the uprights of the target. Then the officers expressed a judgement. The firing had been too good & a new target would be necessary next time the men went shooting. Altogether it was a remarkable exhibition, & if the target had been a ship, we would have had triumphant marches through the city.

A few minor exercises followed, & we came to anchor alongside Williamstown in the afternoon. The commander of Etna, an Italian warship, paid us his compliments, & we returned them. The we came off, keen in our appreciation of war game, & looking forward confidently but with dread, to the day when the target will hit back.

DEATH OF J. PRIDEAUX

The Williamstown Chronicle, 24 November 1899

Last Wednesday, Mr J. Prideaux died at his late residence, 76 Electra street, after a lengthy illness, at the age of 64. Mr Prideaux was a late gunner of the Imperial Royal Navy and Permanent Naval Forces, Victoria, and had for the last two years retired upon a pension. After passing through his apprenticeship in the old country, he came out to the colony in the early sixties and, for many years, carried out the duties of gunner and drill instructor aboard H.M.S. Nelson, in which position he won approbation of his superiors and the respect of the men. He, with all the others, was then transferred to H.M.V.S. Cerberus, where he fulfilled similar duties until he reached the age of sixty, at which time he retired on the customary pension, which pension expires with his death. The deceased gentleman leaves a widow and a large family. The remains were interred in the local cemetery on Thursday afternoon, the funeral being conducted by Mr Thos. Lonsdale. The procession was augmented by the officers and members of the U.A.O.D. Trafalgar Lodge, No. 16, No. 12 district and also by officers and men of the Naval forces.

H.M.V.S. CERBERUS – AN INTERESTING VISIT

Interview with Captain Tickle by Theocritus

Williamstown Chronicle March 24 1900

IN NEED OF UPGRADE

H.M.V.S. Cerberus has this week been floated out of the Alfred Graving Dock, Williamstown, she is having, for the past fortnight been there docked undergoing her customary bi—annual overhauling. I waited upon Commandant Tickle whilst the vessel lay in dock, and through that gentleman's courtesy, as also his subordinate officers, was put in possession of some highly important facts and figures anent the long—proposed and urgently—needed rectifications requisite to bring this vessel, in many respects obsolete in armament at present, up to modern fighting pitch. I secured some considerable and important correspondence that has recently passed between the commandant and the Minister of Defence on the subject, and have pleasure in placing the same at service of the public since I consider such essentially a public matter, the man in the street unfortunately being but little cognisant of such things, whereas he should surely be letter perfect in matters pertaining more or less to the future defence of the country of which he forms a unit. Probably there is no better and more enthusiastic authority upon such matters than the above official, commandant Tickle having his whole heart and soul in the subject upon which he is so competent to speak.

It may not be inappropriate and uninteresting to here briefly describe the cardinal characteristics of this well–known Victorian bull–dog, I having exhaustively inspected her ... lock, stock and barrel, from imbibing the ozone from her watch–tower to spoiling a suit of clothes crawling about with lighted candle between her two bottoms. Altogether the visit was exceptionally interesting, and should prove similarly so to most of the Chronicle readers, more especially now when the atmosphere is rife with wars and rumors of wars.

The excellent condition of the vessel is surprising to novices and authorities alike. Her hull is almost as perfect as upon the day she was built, and this is the case with almost every portion of the vessel. As but few know, the vessel is provided with two bottoms, separated by a space of from three to four feet under water, thus presenting a considerably lessened target for the fire of the enemy. Both bottoms are in a state of surprising preservation.

The Cerberus is classed as a turret coast defence ship, with maximum speed at building of 9.75 knots, though at different times during the stay in Australian waters she has exceeded 10 knots. Her two sister ships, the Abyssinia and the Magdala, are at present stationed with the Indian squadron. They are, and have been from their building fitted with breech-loading armament.

In the armament of the Cerberus, and in other respects, there is plenty of room to spare for improvement before Victorians can sleep peacefully upon their pillows during the long expected sea invasion, with the consciousness that the Cerberus is fighting their battles for them, and fighting them in modern style. At present she carries four 10 inch muzzle–loading guns placed within the two revolving turrets, four 14 pounders, two 6 pounders, quick firers, and four barrelled machine guns. The first–named altogether obsolete, the rest comparatively modern. It is of the muzzle–loaders, and their suggested modern substitutes we wish to treat.

They are contained within two revolving turrets, which without doubt form by far the most interesting portion of the vessel. Each turret with its contents weigh 260 tons yet by the manipulation of a small engine, or if that fail, even by hand, this prodigious mass is caused to revolve smoothly and easily upon its 26 rollers, each of which weighs 56lbs, in one minute. The object, of course, is to admit of the guns being pointed in any direction. The turrets themselves are built of 11 inches of solid iron, backed by 10 inches of bolted oak, with a space between this and the inner iron wall to prevent damage to the guns within by splinters from the oak.

The guns themselves are 18 tons each in weight, have a hitting distance of 4,800 yards and fire one shot every

three minutes, the projectile containing 400 4 oz bullets, and requiring 46lbs powder. Each gun requires 12 men to work it, which is one of the disadvantages, as will be seen by the detailed comparison below. The power is hydraulic. They are valued at £ 10,000 but in these days of quick–firing breech–loaders are literally worthless from the point of comparison. It is in these guns rectification is mainly essential, a small outlay £ 5,000 being further necessary for the purposes of new steam steering gear, the present being hydraulic driven, and in dangerously exposed part or (sic) the vessel. The new gear would be built below the water line. The same fact applies to the electric light installation which, if damaged by an enemy's shell, at present extremely probable, would throw the whole vessel into complete darkness. This would also be provided for in the above sum.

The improvement in the armament would require four 6 inch quick-firing breech-loading guns to replace the four 10 inch M.L. turret guns, the estimated cost of which when placed in position is £ 20,000, made up as follows:-

four 6 inch Q.F. guns, £ 10,000; mountings, £ 7,500, packing and delivering, £ 600; altering gun fittings to suit turrets £ 500; erection on board, £ 1,400 – Total £ 20,000.

They would also enable staff at present employed to work the old–time guns to be more profitably employed elsewhere.

The further and more obvious advantages of modern armament over ancient may be seen at a glance by the following comparative table of range, power of the 10inch M.L.R. and 6inch Q.F. Guns, which we shall class respectively as Nos 1 and 2:—

	No. 1 (10 inch RML)	No. 2 (6 inch Gun)
Distance	4,800 yards	10,000 yards
Number of rounds fired in four minutes	one	eight
Charges of powder	70 lbs black powder	25 lbs smokeless cordite
Penetration of wrought iron at 1,000 yards	11.7 inches	14.5 inches
Weight of metal fired in four minutes	400 lbs	816 lbs
Burster charges of shells	46 lbs, powder	131 lbs, 12 ozs, lyddite

Thus will be seen by the veriest novice in such matters the almost immeasurable advantages that would accrue from £ 25,000 worth of improvements, which would give us a thoroughly modern fighting vessel, competent to combat vessels of the same class. The figures speak for themselves, perhaps more conclusively than any further arguments we can use had we the space to do so.

AN UNIQUE ENTERTAINMENT ABOARD H.M.V.S. CERBERUS

The Footscray Advertiser, 14 April 1900, p.3

TWENTY NINE years ago last Monday H.M.V.S, Cerberus made her appearance at the port of Melbourne from England, the voyage across being prolonged and not devoid of adventures. To suitably celebrate the occasion, and at the same time augment the deplenished funds of the Melbourne Hospital, a characteristic entertainment was last Monday evening arranged by Captain Tickell, the naval commandant proved interesting and at the same time highly instructive to a large number of people, amongst them being His Excellency the lieutenant Governor and Lady Hadden and suite, the Mayor and Mayoress of Melbourne, and

other distinguished personages.

The visitors were conveyed in a launch from Port Melbourne pier to the vessel. The night was eminently suited to such an occasion, facilitating the carrying out of several novel features, such as a boat race, in which four crews took part and after a hotly contested battle the crew of the commandant's boat were declared the winners. A feature of the evening was a sham torpedo attack, carried out in the most approved warlike style, to the great interest and enjoyment of the company. Another item was the exploding of a submarine mine, which caused a report that was heard for many miles the other side of the metropolis, and was quite a novelty to land lubbers. The programme was not exclusively one of war, the sensational item being interspersed by impromptu vocal and other selections by a minstrel troupe aboard. After a plentiful supply of refreshments had been done full justice to the visitors left the vessel at 10.15 and returned to Melbourne, thoroughly satisfied with the evening's novel entertainment. As the tickets were somewhat expensive it is anticipated that the funds of the charitable institution in question will be considerably augmented.

ANNUAL OVERHAUL

The Williamstown Chronicle, 13 July 1901, p.2

The Cerberus, La Trobe, and the lightship left the dock yesterday after their annual overhaul.

Shipping people have been complaining that the Cerberus interfered with the fairway to the piers – hence her removal.

NAVAL MANOEUVRES Another Torpedo Attack

St Leonards. Monday *The Herald*, March 31 1902

On Sunday evening the Cerberus weighed anchor again and moved down to St. Leonard's Point, another torpedo attack being expected. The firing of a gun during breakfast, shortly after 7, announced the fact that one torpedo boat had been discovered. Her torpedo missed the ship by about 70 yards. Another boat fired a torpedo shortly afterwards from near the pier at St. Leonards and this fell short.

Three torpedoes had been fired when Commander Richardson came aboard in his usual cheery mood, shortly before 9 o'clock. A few minutes afterwards the Lonsdale discharged a torpedo which travelled to within a few yards of the ships side, and her Holme light was burning almost under the noses of those who stood on board. It was a splendid shot, and it was really hard luck that Commander Richardson could not on this occasion claim the credit of sinking the Cerberus.

NAVAL MANOEUVRES

The weekly Times April 24 1905

Captain Creswell, who occupies the dual positions of Commandant of the Victorian Naval Forces and Naval Director of the Federal Forces, was in command of the Easter naval manoeuvres in Victoria for the first time. The vessels that took part were the torpedo boats Countess of Hopetoun and Childers.

The training of the men of the Naval Brigade was carried on under strict service conditions.

Probably, owing to the new conditions under which the members of the Naval Brigade are enrolled, the ship's company was 50 men short of her complement.



photo courtesy of the Newspaper Collection, State Library of Victoria.

At the same time the number was only five less than was expected. A familiar figure among the officers was that of Commander Richardson, who two or three years ago was retrenched from the service in which he had been such an enthusiastic officer, and who has in consequence been absent during the last two Easter cruises.

MOBILISATION SHEET

The Williamstown Chronicle, 20 March 1909

The mobilisation sheet of the Williamstown Torpedo Depot shows the following as the disposition of the officers and men of the Permanent Naval Forces during Easter:— Cerberus—Captain F. Tickell (State commandant) Staff Paymaster A. M. Treacy, Engineer Lieutenant W.G. Robertson, Surgeon W. A. James, Chief Gunner R. Kearns, Gunner G. Stone, and Bandmaster W. Underwood. Countess of Hopetoun—Lieutenant H. J. Feakes (in command of torpedo flotilla), Engineer Lieutenant S. Johnson, Artificer Engineer C. Allard and Gunner F. Young. Childers — Sub Lieutenant S. Keightley, Engineer Lieutenant J. W. Owen and J. White. Torpedo boats Nepean, Lonsdale and Gordon's commands to be arranged later. Swan Island depot — Staff Surgeon H. P. Sloggett, Surgeon W. D. Yuille, Engineer Lieutenant J. Spence, Engineer sub Lieutenant Cresswell and Gunner J. A. Bates. Williamstown Depot — Chief Gunner J. Blair. With respect to the proposed examination of shipping service the following have been appointed:— Fort Nepean — Lieutenant O. Burford (chief examining officer); examiner steamers — station (Point Lonsdale) — Chief Gunner E. Hayes.

WORK ON THE CERBERUS

excerpt from The Argus April 12 1909

"Life on the Cerberus is tame after the stirring experiences of the torpedo-boats, but the necessary routine of exercise, drill, and gun practice is not neglected while the more attractive game is being played. Captain Tickell had his gunners at target practice for nearly the whole of Saturday, with good results. The Nordenfelt and six-pounder Q.F. guns were used. The big turret-guns, like the ship's engines, are out of action, for the floating fortress is without steam. The Cerberus was towed laboriously from Williamstown to where she is now anchored, about ten miles from Queenscliff. The weight of the ship rendered clean steering with the hand-gear impossible, and she yawed and sheered til her wake looked, as one of the surgeons aboard put it, "like a pulse-chart." The greater part of Friday was occupied in towing her to her moorings. Interest in the career of the old ship has been stimulated on board by the presence of Captain Panter, who brought her out from England in 1871. She was built essentially as a harbour-ship, and was hard to handle in a sea. The trip occupied 182 days, and the average speed was about 4 knots. She was then built up with temporary bulwarks for the trip. Captain Panter, in speaking of his experiences, said: - "She steered something like she has been steering today. I remember that the top-hamper built on to her was only bolted on, and the water used to come underneath it and flood my cabin. I had to stand on a block of wood to dress myself, for that was the only dry spot in the cabin." The purchase of the Cerberus by Victoria at that time was something greater proportionately than the purchase of a "Dreadnought" would be today."

END OF THE GAME

Excerpt from The Argus April 13 1909

"When the Countess of Hopetoun and the Childers berthed at Portsea at 4 o'clock this morning, the naval manoeuvres were at an end except for a little target practice from the Cerberus, with 6-pounder Q.F. guns. This was over before half-past 10, and the order to weigh anchor was given. Thirty-one men of the naval forces took the bars of the big capstan on the lower deck and a piper sat on the bars. The heavy anchor came up slowly to the tune of "There Was an Old Woman Tossed Up in a Blanket" as the piper and his flute revolved with the capstan. The march was quickened when "Yankee Doodle" thrilled out and soon the anchor was "catted". A tow line from the tug "Alacrity" had been made fast, and before 11 o'clock the Cerberus, no longer a flagship lying sedately at her moorings, was being hauled back to her berth at Williamstown. Lieutenant Burford was in charge. Captain Tickell (the naval commandant) had transferred his flag to the Childers, in which he returned to the naval depot, weather conditions having forced him to cancel a projected inspection of the western shores of the bay. The commandant this morning expressed his pleasure at the way in which the work of the branch of the forces had been carried out."

THE OLD CERBERUS

DECIDING HER FATE

The Herald June 8 1926

"Here an old hulk lies the good ship Cerberus. The darling of her crew."

Fifty-six years have passed since the old warrior glided down the ways at Jarrow-on-Tyne, and by dint of sailing and steaming made the long voyage to Melbourne. Her low freeboard – for she was only a floating gun platform – made life unpleasant for those on board of her in any sort of a seaway. Her immense weight of 3340 tons, for she was a solid mass of iron, made her little more than an immenses flatiron, which waddled heavily along.

But she was heavily armed and heavily armoured, and since she represented Victoria's sole means of naval defence, she was rapturously welcomed on her arrival.

Those were the days when there were alaurms (sic) and excursions and rumors of war and Russian scares. Her arrival in Port Phillip was the event of the year. Her fighting strength was comparable in those days to two modern battleships, and Victorians slept quietly in their beds.

AGED AND DECREPIT

Now she lies in the "knacker's yard" at Williamstown, aged and decrepit, disembowelled, almost dead, at once useless and useful.

Useless to have her idle on your hands, but her stout iron shell is as sound as ever and as a sheer hulk or store ship she would pay for her keep.

There is talk also that her old bones may serve as a breakwater for one of the bayside resorts. Indeed, even now her fate is being decided, while she lies there, quietly dreaming of the old days when she was the pride of the fleet.

Mounted on her massive turrets —— ten inches of solid iron, the like of which is not made nowadays — she still displays her teeth, four 18—ton muzzle—loaders, relics of a day that is gone. They are solidly built, imposing, fit to adorn a park or local reserve.

They are there for any, shire council or municipality to take, which is willing to pay for the cost of their removal. Historical relics in their way, up which generations of small boys may yet clamber and peer, awe—inspired, down their 10—inch muzzles.

CRADLE OF THE FLEET

Aptly named, the old ship prowled around the bay for half a century, a watch dog with fearful barks from her 18 ton muzzle loaders, a veritable "Old Ironside." She was the cradle of the fleet – the nursery where two generations of sailors learned their art and craft, and though she no longer finds a place in the Navy List, her name survives as tender to Flinders Naval Depot.

By the peculiar service anachronism, though a mere motor launch, Cerberus carries on her books the names of the entire ships' compliment of the Depot. Thus as in the past she remains the nursery of the Navy, and her name appears in letters of gold on the caps of the 1200 bluejackets now being trained to take their place in the new fleet.

OLD SHIPS NEVER DIE

Whatever may happen to her she may live in the memory of Victorians. Old ships like old soldiers never die. When they sold her out of the navy, the engineers at Newport railway shops secured some of her metal – best Low Moor iron from Yorkshire.

"Its the best iron in the world." they say, and they use it for making working parts of locomotives – the old

END OF CERBERUS

SUNK AT BLACK ROCK. BREAKWATER FOR SMALL CRAFT.

The Argus September 3 1926

Yesterday morning the hulk of the old iron-clad Cerberus was towed from her berth at the Williamstown pier, where everything of value had been removed from her, and sunk off the Black Rock jetty to form a breakwater for the yachts and fishing boats. Although the ultimate fate of the Cerberus was decided some time ago, when the Black Rock Yacht Club purchased it for £ 150 and resold it for the same amount to the municipal council under an agreement



that it should be used as a breakwater, the date of the final move was indefinite. This was because the vice-president of the Marine Board (Mr. George Kermode), under whose direction the vessel was sunk, did not wish to carry out the somewhat difficult task until the opportunity afforded by perfect weather conditions presented itself. For this reason the sight of the strange flotilla that appeared off Half Moon Bay shortly after 9 o'clock took residents somewhat by surprise. The word, however, was passed round swiftly, and soon the cliffs were throughd by interested spectators, who saw approaching the grey, squat hull, towed by the tugs Agnes and Minah, and preceded by the Plover and a motor-boat to mark the mooring. By 10 o'clock what was left of the Cerberus had been towed and coaxed by the tugs to within 400 yards of the jetty, where her bow was made fast to the existing breakwater, and the stern was slowly swung into position and secured to a temporary mooring. The operation had been timed for high water, when there is a depth of 15ft. on the bank selected for the breakwater, and it was estimated that the Cerberus was drawing nearly 14ft. Immediately the hull was made fast three seacocks were opened, and the flooding of the vessel began. Dingys put off from the jetty, and the harbour master's motor-boat took off a large crowd of excited small boys who swarmed over the decks and down below to watch the rising water. The Cerberus sank almost imperceptibly, going down slightly by the stern. There was a large amount of scrap iron and odds and ends of useless gear, and visitors took away weighty bolts and nuts as souvenirs, after peeping into the turrets to inspect the heavy rusting guns.

LAST BERTH OF CERBERUS.

Adventurous Voyage Recalled

The Argus October 5 1926

In the Sandringham Town Hall last night the Black Rock Yacht Club held a commemorative smoke night in honour of the final berthing yesterday of H.M.A.S. Cerberus at Half-moon Bay, Black Rock. The first naval member (Rear Admiral Napier) was unable to be present, and Mr. Gullettm M.H.R. spoke in his stead.

The history of the old ironclad monitor, from the time of her departure, under Lieutenant Paynter, from Plymouth on October 29, 1870, till her arrival in Port Phillip Bay at noon on Sunday, April 9, 1871, was related graphically by the mayor of Sandringham (Councillor J. M. Ramsay). At the beginning of the voyage the compass was 66 degrees out of bearing, and the two shot rooms had been placed on the same side of the vessel, giving her a decided list. The Cerberus put to sea and in the Downs met with a terrific storm, during

which the whole of the crew of 25 men was kept pumping continuously. She was wholly unmanageable, and scarcely made headway at the rate of a knot and a half an hour. She rolled 45 degrees on either beam, and at Gibraltar Lieutenant Paynter was informed that he should not allow her to roll more than 10 degrees before he cut the masts. He took the risk. After a protracted trip the Cerberus anchored off Sandridge and the impression she created was recalled by a quotation from a newspaper of the day, which said that great disappointment was expressed at her appearance. "She looked like a gasometer fitted with masts and yards, and had evidently been sent to sea on an experimental cruise." Her appearance was very different from what Victorians had been led to expect from descriptions and photographs previously received.

BOATMAN OF THE BAY

The Williamstown Chronicle, 21 January 1933, p.1

The oldest Williamstown boatman is Mr. Fred. Wade, who recalls the names of those who have departed. They included Messrs. George Sheldrick, W. Symons, Bill Lennie, J. Eldershaw, Jack Gillett, George Nickels, Ted Brennan, Dan. Norman and Duncan Smith. Nickels, Wade and Brennan were employed rowing or sailing their boats to the lightship to meet incoming vessels for provedoring. Lennie and Smith were boatmen for the "Age" and "Argus" reporters (Messrs. H. Dunn and G. Hughes). Don. Norman had the first motor boat on the Bay, and Wade and he did the trip at $8\frac{1}{2}$ knots. She was named the Ariel, and was built by the late Clem. Blunt.

Many old residents will remember the watermen's shed, which was at the shore end of the Gem pier. Boatmen waited there till midnight to take off any ship captains or others to their vessels in the stream, after the last train had arrived from Melbourne.

Close by, the two water police boats were moored. Many a net was hung out on the flagstaff at the Customs House, after a night raid on poachers by the water police.

Many members of the H.M.V.S. Nelson and Cerberus crews lived in Williamstown in the eighties, and the boats left the old Stevedore pier every morning for the ships and returned at about 4 o'clock in the afternoon, mooring there for the night, after the men had gone to their various homes. A large number of the crew lived in the vicinity of Dover road and John Street.

RESEARCH

We are indebted to the Newspaper	Section of the	State Library	of Victoria	for allowing	the use	of many
images from their collection.						

Many thanks to my fellow researchers for finding so many excellent articles.

Shirley Joy

Stoker Cherylle Thurling (Victorian Navy)

Frank Noonan

Also a special thank—you to Stoker Cherylle Thurling (Victorian Navy), without whose typing the results of the research would not be able to be made available.

John Rogers