The Potential To Create A Naval, Or Maritime, Museum On Haulbowline Cork Harbour

Scoping Study

for

Irish Naval Service and
The Heritage Council of Ireland

by

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EXECUTIVE SUMMARY

1. Over the past few years the Irish Naval Service has assembled a small collection of objects and artefacts which is informally presented in the Martello Tower, in other buildings and around the site of the Naval Base on Haulbowline Island in Cork Harbour. The recent closure of Irish ISPAT and the reclamation of the site provides the potential to restore and adapt the historic storehouses, built 200 years ago adjacent to the site, for modern uses.

2. One possible use is for a maritime, or naval, museum. The Naval Service has identified Block 9, which they own, as a potential location and the Heritage Council of Ireland agreed to fund a Scoping Study to assess the potential. After a competitive tendering process a small specialist team was appointed comprising:

* Ian Parkin  Parkin Heritage and Tourism
* Allan Randall  Focused Learning (Education Consultant)
* Niall Phillips  Niall Phillips Ltd (Conservation Architects)
* Dennis Brennan  Brennan Design LLP (Interpretive/Museum Designers).

3. The study, which was managed jointly by Dr Hugh Maguire, Museums and Archives Officer, The Heritage Council for Ireland, Lt Cdr Barry O’Halloran, Staff Officer Operations, Defence Force Headquarters, Irish Naval Service and Lt Cdr Jim Shalloo, Assistant Provost Marshall, Irish Naval Service, has been undertaken through a combination of:

* extensive consultations
* background reading and desk research
* site appraisal
* visits to a number of other museums and heritage facilities.

Historical Context

4. Cork Harbour is one of the largest natural harbours in the world and has long been recognised as a strategic defensive asset protecting the City of Cork and, indeed, the western defences of the British Isles. The earliest fortifications were erected around 1550 and these were reinforced on a regular basis up to World War 1. A fort was first constructed on Haulbowline in 1603. Cromwell, however, was the first to recognise the potential of Cork Harbour as a victualling base for the Royal Navy. Subsequently Haulowline was leased to Lord Inchiquin of Rastellen in 1707 and he established the Water Club in 1720 which was the first sailing club in the world. It was not until the 1790s, however, that the concept was pursued and Haulbowline Island was chosen to be a military base shared by the Navy and the Army. The Admiralty Yard was built between 1806-22 including the six great storehouses. They were used until 1837 and then intermittently until 1864. The Jamestown and Macedonia arrived in 1847 with much-needed provisions during the Potato Famine.

5. The second phase of development was the creation of a dockyard which involved the reclamation of 35½ acres to create a nine acres basin, graving, dock and channel alongside the storehouses known as the East, or Church, Camber. This took place between 1865-95 and involved both contractors and prisoners from Spike Island. The dockyard subsequently
assumed great importance, employing 3000 men by 1914, and was home to a significant fleet of British and US naval ships and seaplanes during the First World War.

6. After the Treaty the dockyard was transferred to the Irish Government (Office of Public Works) in 1923 but the Royal Navy operated the base until 1938. The Irish Marine Service was established in 1939 which subsequently became the Irish Naval Service n 1946.

7. The eastern part of Haulbowline was leased to Irish Steel (ISPAT) in 1937 and operated until 2002. The complex has recently been demolished and the site is currently being reclaimed and decontaminated to enable a mixed use development to take place.

8. The story of Spike Island and Haulbowline go hand in hand. Spike was initially fortified around 1605 and again in 1779. An arsenal was subsequently constructed in 1810 but the impressive star-shaped fortification was used as a prison 1847-1883, subsequently during the War of Independence and again from the mid 1990's-2002. It was also used as a training base for the Naval Service in the 1970s and 1980s. More recently it has been considered as a site for a 'super prison' although its outstanding history and heritage suggests it should, with Cobh and Haulbowline, be seen as an important cultural, recreational and leisure asset within Cork Harbour.

9. The third unique piece of the jigsaw is the town of Cobh itself which initially grew as a civilian community serving Haulbowline and Spike Island but has its own remarkable story to tell. It was the premier emigration port of Ireland throughout the 19th century with as many as 2.5m people travelling to find a new life in North America and Australasia. The prisoners from Spike Island were also transported from Cobh until this practice ceased in 1850. It was the last (and first) port for the 'super liners' travelling between Europe and North America including the fateful journeys of the Titanic and Lusitania. The town inevitably suffered with the decline of the dockyard although this was mitigated to some extent by the establishment of Irish Steel and the Irish Naval Service. There has been a renaissance over the past 15 years following investment in the townscape and built fabric of the town, the development of Cobh Heritage Centre and the emerging cruise liner traffic. From the stunning cathedral the visitor can fully appreciate the scale and beauty of Cork Harbour and the intrinsic relationship between Cobh, Haulbowline, Spike Island, Fort Camden and Fort Carlisle.

Irish Naval Perspective

10. The Irish Navy, established in 1946, is based in Haulbowline. It has around 1100 personnel and operates eight coastal vessels on a variety of duties. The legacy of the dockyard represents a major national historic maritime asset. Over the past few years this has been increasingly recognised and a collection of artefacts and memorabilia has been brought together, indexed and informally displayed in the Martello Tower, other buildings and around the site. It comprises weapons, ships models, uniforms, compasses and sextants, technical equipment, communication equipment, flags etc as well as photographs, documents, training manuals, films and mementoes of international diplomacy.

11. The Naval Service hold an Annual Open Day and invite school parties and special interest groups to tour the base. They are happy to accommodate more regular tours but not unsupervised public access on to the base. It is within this context that they have promoted, and support, the concept of a museum and the use of Block 9 with access through the former Irish Steel site.

12. It is hard to assess the significance of what is essentially a randomly assembled collection: nevertheless, it is an excellent start. More significant, however, is the interest and enthusiasm...
of members of the Organisation of National Ex Service Men and Women (ONET) who hold an enormous memory archive which can be tapped. They have the ability to interpret the collection and bring it alive to visitors, including the general public, and can also offer memorabilia and time to work as volunteers and interpreters. They would be eager to see a museum, or heritage centre, developed in the short term and would be interested in becoming volunteer stewards and guides.

Planning Context

13. Haulbowline Island (including the ISPAT site) is currently unzoned although it has established use as an operational naval base and industrial site. The Naval Base is an Architectural Conservation Area and the Martello Tower and Storehouses are listed in the Record of Protected Structures. Normal conservation policies would apply to the use, development or modification of these structures. Any redevelopment of the ISPAT site will go through the normal planning process and is likely to require an Environmental Impact Statement. Issues related to traffic, access, parking, scale, density and design etc would all need to be evaluated.

14. Whilst the Naval Service is not subject to normal planning procedures any museum developed on Haulbowline will be subject to the policies of the Cork Area Strategic Plan, Cork County Development Plan, Midleton Local Plan and Cobh Town Plan. These documents emphasise:

* the unique environmental qualities of Cork Harbour

* the importance of conserving the built, natural and cultural heritage

* the importance of encouraging and sustaining tourism as an economic driver and maximising the undoubted potential of Cork Harbour

* the leisure and tourism potential of Spike Island

* the potential for the mixed use development of the Irish Steel site including high quality work places, apartments and cultural projects. This was reinforced by Micheál Martin, Minister for Enterprise, Trade and Employment (July 2006) who announced plans for the site which could include offices, apartments, marina, hotel, a maritime museum and a landmark building which could be a renowned feature for Cork as a whole

* the gradual relocation of the Port of Cork to Ringaskiddy creating a container terminal coupled with the comprehensive redevelopment of the docklands on the eastern side of Cork city.

15. It will be important that this study is used to:

* inform the evolving proposals for the ISPART site

* feed into the County Development Plan process.

The Authorities recognise the need for a strategic vision for Cork Harbour. To this end the Cork Harbour Forum has been created as a voluntary partnership between all relevant stakeholders and is being facilitated through an EU Interreg project by the Coastal and Marine Resources Centre and Cork County Council. The objective is to produce an Integrated Coastal Zone Management Plan which will, it is hoped, receive statutory support through the new County Development Plan.
Museological Context

16. Despite being an island nation dependent on the sea for food, transport and commerce there is no major cultural facility focused on Ireland’s rich coastline and coastal waters. Nor is there a museum dedicated to naval history past and present.

Davina Tully’s ‘Audit of Maritime Collections’ (2006) highlighted that there is an enormous maritime heritage resource comprising boats, artefacts, technical knowledge, expertise and memories which is largely in private ownership (many in pubs) only surviving because of the passion and interest of the owners. Very few collections are catalogued, curated or managed professionally. Only the National Museum of Ireland, 14 local authority museums and a few other collections such as the Chester Beatty Library have qualified curators. This was borne out by our visits to a range of museums and heritage centres around the country. The report made a series of important recommendations:

* there is a need for a modern, professionally-run national maritime museum plus several regional museums reflecting geographical differences
* there is a need for the safe storage for historic craft and large items of maritime archaeological material
* there needs to be a register of traditional boat builders
* a shipwreck interpretation centre should be developed
* an inventory of historic craft needs to be established
* floating exhibitions should be developed and toured.

17. Whilst Darina Tully’s report provides strategic guidance in relation to the conservation and presentation of Ireland’s maritime heritage, the Heritage Council is also anxious to raise standards of collections’ care, management and display in relation to all types of museum. It has established a Museums’ Standards Programme leading to accreditation which seeks a much more professional approach in terms of staffing, management and philosophy in the operation of museums and collections than currently exists. Any new maritime museum on Haulbowline must aspire to be an accredited museum and be developed and managed to the highest standard if it is to secure support at a national level and appropriate funding from EU and other sources.

18. The National Museum does not see Ireland’s maritime heritage as a priority in the foreseeable future focussing instead on enhancing its curation, conservation, management and presentation of the current collections and facilities. Any new displays are likely to be related to transport, science and technology and sport.

Appraisal of Block 9

19. The victualling yard was constructed between 1806-22 including the creation of fine new wharves on the north and east shores. The most prominent buildings were the six great storehouses built alongside the new wharves – three facing north (Nos 4, 6 & 8) and three aligned north : south and facing east (Nos 9, 10 & 11). These were accompanied by living quarters for the supply and medical officers and staff, houses for the Chief Surgeon and the Naval Storekeeper, coopers and other workshops, mast houses and a floating pond, stables, water storage tanks, slipways and hospital facilities. Storehouse no 11 was later converted and extended to provide a larger hospital.
20. Storehouse No. 9 is the northernmost structure of the three aligned north : south and now overlooks the Irish Steel (ISPAT) site. It is a rectangular block 46m x 10.5m on four floors : three main floors plus an attic floor with a lean-to along the entire western side of the ground floor. It therefore has a gross internal floor space of around 2000sqm. The architectural composition is severe and monumental with 13 regularly spaced, and identical, bays except for the fourth and tenth where the loading bays are positioned.

21. The building’s internal plan is very simple with two large open store room spaces, approximately 21m x 10.5m, one on each side of a fine central stone staircase at each floor level separated by a masonry cross wall. Internally the building has been sub-divided into thirteen structural bays (reflecting the external elevation) with the central core being one. Each bay is sub-divided into three giving a rectangular grid throughout the building 3.5m x 3.5m in size supported by cast iron columns. The roof structure comprises king post trusses giving a mansard section common in late C18 and early C19 buildings.

22. It is a fully integrated structure which is believed to be the earliest integrated cast iron framed building in Ireland (Rynne 2002). There were two hand-operated rope hoist mechanisms, one of which appears to be original and largely complete, with surviving cast iron external cranes to haul goods up to the upper floors. The changing fortunes of Haulbowline Island means that Storehouse No 9 remains almost completely unchanged and unaltered from its original design. It is, therefore, of very considerable architectural and historic significance. The building should be conserved and any new use should be introduced with a minimum of change to the built fabric. Where change is necessary it should, where possible, be reversible.

23. Storehouse No. 9 was originally constructed to a very high standard. Its current appearance reflects a prolonged lack of maintenance, and occasional vandalism, rather than inherent defects in its original construction. The built fabric is capable of comprehensive repair and conservation and its characteristics will allow its ready adaptation to a wide range of potential uses. It has especially attractive, interesting and historic spaces that are generous, flexible, well lit, environmentally stable and have a fine prospect across Cork Harbour.

24. The report assesses the potential to use the structure for various uses including offices/commercial, residential, hotel, industrial/workshops, storage and museum/visitor use. It concludes that museum use would be entirely appropriate and achievable, except for the display of large boats, but that this could be accommodated nearby. Various technical issues such as fire escape, fire protection, new services, voids and openings, loadings, environmental conditions and setting, access and parking would need to be taken into account. However, the conservation and reuse of Storehouse No 9 to provide a maritime, or naval, museum would be a very fitting use of the building and would be entirely commensurate with its historic importance. A programme of emergency repairs and clearance works should be put in hand as soon as possible to mitigate further decay whilst the building’s future is resolved.

Existing Collection And The Potential

25. The existing collection on Haulbowline has been assembled randomly and is unstructured and unmanaged (similar to many private collections across Ireland). There is now an inventory but each item needs to be catalogued and assessed as to its significance. Only then can its importance be evaluated.

26. There is a need to determine the key themes of the museum and then establish a collections’ policy which reflects the themes. This will identify the range of artefacts and elements required and provide a structured approach to their collection. What is clear is that there are
extensive collections and other resources available across Ireland that could be utilised based on formal loan agreements including:

* museums and heritage centres
* the resources of the Maritime College and Coastal and Maritime Resources Centre
* extensive collections of paintings, engravings, maps, documentary material, archives and artefacts
* the potential to include a coastal vessel (retired from service) which could be moved alongside Block 9 and be used as a training ship for the Naval Reserve who could act as guides and demonstrations for visitors
* providing a safe haven, and essential conservation, for vessels at risk across Ireland
* the enormous knowledge and expertise of the Naval Veterans, local historians and researchers.

What is clear is that with a Museum Development Plan and Collections Policy there are extensive collections available which could be used to develop a multi-faceted museum.

**Tourism Context and Market Potential**

27. Tourism in Ireland has seen constant growth over the past 30 years. An economic study found that in 2001 tourism contributed 5.4% to the national GDP, generated the equivalent of €4 billion in foreign exchange earnings and employed over 137,000 people. Despite problems after the threats of international terrorism and the war in Iraq the growth has continued up to the present day.

28. Whilst Cork has enjoyed significant investment in tourism infrastructure over the past few years (accommodation, food and drink, shipping and roads) it is recognised that it lacks an iconic attraction. A high quality cultural attraction within Cork Harbour would stimulate and contribute to the overall tourism infrastructure of Greater Cork bringing additional visitors to the City region in general, and Cobh and the outer harbour in particular.

29. The Cork/Kerry Region is one of the three most important tourism destinations in Ireland but, despite Cork being the second city and benefiting from major infrastructure investment in recent years, only 10% of visitors to the south west spend time in Cork and its environs. There is a view that Cork needs a significant attraction coupled with focused marketing to raise its image and profile.

30. The 2001 Census confirmed that Greater Cork has a population of around 250,000 of which the city has around 50%. Tourism data suggests that in 2003 Greater Cork attracted around 3m visitors (66% of whom went to Cork). 85% of these were day visitors and of the staying visitors 66% came from overseas. This generated €400m into the local economy and supported almost 3000 jobs. 70% of visitors came for holidays whilst 14% visited friends and relations and 11% came for business/conferences.

31. There were 1.1m visitors to attractions two thirds of whom came from outside the area. The two most popular attractions were Blaney Castle (297,000) and Fota Island and House (290,000) whilst Cobh Heritage Centre attracted 109,000. Festivals are an important part of the Cork tourism product whilst the cruise liner business brings upwards of 50,000 passengers and crew into Cobh each year.
32. If a package of attractions is developed around Cork Harbour including Haubowline (and ISPAT), Spike Island and Cobh linked by ferry services and tours it would not be unreasonable for a new maritime museum to attract as many as 100,000 visitors when fully operational.

Is There A Case For Developing A Maritime Museum?

33. Recent reports have highlighted there is no major cultural facility focused on Ireland’s rich coastline and coastal waters. Nor is there a museum dedicated to the naval history and maritime traditions past and present. The Audit of Maritime Collections (Davina Tulley 2006) argues for the need to establish a modern, professionally-run national maritime museum and a series of regional maritime museums around the country to reflect geographical variations. Cork Harbour has all the credentials to develop such a facility and in Storehouse No 9 it has, arguably, the earliest, and most complete, integrated cast iron framed building in Ireland. This building was specifically constructed for maritime purposes, is a listed structure ‘at risk’ and would be ideally suited following restoration to present the story of Ireland’s maritime heritage.

34. In essence, it should be a National Maritime Museum of international standard whilst also providing a regional facility that presents the unique culture and tradition of Cork Harbour and the south west.

It should be fully accessible, bilingual and include:

* boat displays
* an ‘Explore and Discover’ gallery
* traditional, yet modern and interactive, museum galleries
* a programme of themed temporary exhibitions
* visible and accessible store
* multi-purpose education, meeting and conference suite
* library, archive and resource centre
* retail and catering.

It should also provide external displays including vessels moored up on the quayside (including a modern coastal patrol vessel) and a boat collection representing different aspects of traditional coastal trades and crafts. The opportunity to store and conserve vessels at risk is also important.

35. The displays should cover a myriad of themes, including the key issues of today (such as climate change and sustaining fish stocks) and the wide-ranging story of the maritime heritage of a nation encompassing:

* the physical heritage
* the environmental, and natural heritage
* the cultural heritage.

In doing so it should cover a myriad of subjects including:
Cultural
* marine archaeology * tourism and recreation
* defence heritage * lighthouses
* Spike Island: defence and prison * navigation
* Christian heritage * Titanic and Lusitania
* emigration * shipwrecks
* fishing – inshore and modern day – crafts and tradition * boatbuilding
* the birth and development of sailing * island communities
* the modern Irish Navy * inland waterways
* trade * shipping and ports

Environmental and Physical
* marine eco-systems * geology and scenery
* foreshore and tidal margin eco-systems * seascapes
* sea level and climate change * Cork Harbour
* fisheries * water and air quality
* Marine birds and mammals

There is a huge diversity of subjects related to our maritime heritage and this needs to be addressed in a detailed Feasibility Study and Museum Development Plan which will enable a Collections Policy to be devised.

36. Above all it needs to be a dynamic living museum which is much more than its displays and collections with a vibrant events and activities programme taking place throughout opening hours. It must be managed to a high standard with professional museum staff supported by volunteers. It should have an innovative education service and provide outreach programmes into schools and local communities throughout Greater Cork.

37. Such a project will take a number of years to come to fruition but there are real opportunities to make a start in the short term:
* establishing, with the Naval Veterans, a naval heritage centre in one of the buildings on Haulbowline and developing a programme of oral history recordings
* developing and extending the tours currently promoted
* commissioning the production of education materials and marketing education visits (employing a part-time Education Officer to manage the programme). This could be a pilot project focused on the summer term 2007 and linked to local tour providers
* establishing a weekly programme of Sunday tours around the Naval Base through the summer months
* negotiating with local ferry companies to establish boat tours around Cork Harbour in the summer
* producing an attractive promotional leaflet on tours of the Naval Base
* producing an attractive publication on the history of Haulbowline to accompany the tours
* developing links in the short term with CRMC and the Maritime College who have skills and resources which could be used to benefit short and longer term initiatives.
Educational Potential

38. There is a huge potential to reflect national educational policy in the provision for formal
education and life long earning in the museum. The museum should have as the overarching
educational aim: to ensure that young people should have a greater understanding and appreciation of the vital role the sea plays in our lives.

This should be supported by three key objectives:

* to understand the scientific elements that underpin successful management and sustainability of Ireland’s maritime resources
* to have an understanding and knowledge of Ireland’s rich and important maritime history
* to appreciate the aesthetic and cultural value of Ireland’s seascape, built and natural environment.

The proposed ‘Explore and Discover’ galleries and educational programmes should promote best practice in museum learning with students being actively involved and motivated to learn.

39. The museum should provide a cross-curricula resource for teaching and learning through:

* a learning centre
* archive and resource centre
* ‘Explore and Discover’ galleries.

We envisage there should be a team of educators supported by seasonal workers and volunteers. A key part of the programme would be life-long learning with lectures and courses together with an outreach programme into schools and communities.

How Should This Be Created?

40. In the short term a Naval Heritage Centre could be established and managed by the Naval Veterans which could be visited by schools, the general public and special interest groups and on Open Days. However, this does not meet the needs articulated by the Heritage Council and in various reports for the creation of a high quality, professionally run and managed National Maritime Museum.

41. Such a facility requires significant funding (including start up funding) and, above all, a project champion. This suggest that it is most likely to succeed if it is either:

* championed by the Heritage Council and activated by the National Museum of Ireland or Cork County Council with public sector, private sector (through planning gain) and EU support
* championed by the Heritage Council involving the establishment of a charitable trust and company limited by guarantee initially underwritten by a benefactor with the objective of securing significant EU and other funding.

42. Creating a high quality facility of national standard in Haulbowline could only be done through an agreed and focused Collections Policy and loans from the reserve collections of National Museum, County and local museums. It will be important to establish partnerships with a range of museums providing a cross-flow of research, photographs, oral history material,
objects and artefacts. By this process we are essentially creating a series of networked maritime museums across Ireland which are entirely supportive and complementary and not wastefully duplicating.

Further, this partnership (or forum of maritime museums) could agree priorities for key themes and collections in different museums. Haulbowline has the potential to be more than a regional facility but this is entirely dependant on funding and commitment.

At a local level there also needs to be a partnership of attractions and facilities within Cork Harbour to maximise the heritage and tourism potential of the various cultural and natural heritage sites. This suggests a strong link with the Cork Harbour Forum and Cobh Tourism Association (ideally becoming members of both).

How Much Will It Cost?

43. We have developed an indicative estimate of the capital costs for the restoration and fit out of the building together with the design and implementation of interactive interpretive exhibitions and museum galleries. Taking into account inflation the museum is likely to cost around €20m (at February 2007 prices) excluding taxes, external works, access and parking, services, any docks works, fencing or object acquisition. This is not unrealistic in relation to the cost of other museums and cultural venues in recent years. These figures will be refined in the course of the proposed Feasibility Study when it is likely the proposals for the ISPAT site will be further advanced.

Conclusions And Next Steps

44. The report has reviewed the potential to develop a maritime, or naval, museum in Haulbowline. It concludes:

* nowhere adequately presents the story of Ireland’s outstanding maritime heritage and the National Museum has no plans to develop a facility in the foreseeable future

* The Heritage Council has advocated the development of a National Maritime Museum together with a number of regional maritime museums to reflect regional differences

* Cork Harbour has an outstanding natural, cultural and built maritime heritage and is an entirely appropriate location for the creation of a maritime museum

* Storehouse No 9, whilst in poor condition, is the earliest, and most complete, integrated cast iron framed building in Ireland but is capable of being restored and is eminently suitable for the creation of a maritime museum

* Storehouse No 9 overlooks, and is inextricably linked to, the ISPAT site which is the subject of redevelopment proposals. Minister Micheál Martin has suggested a mixed use development including a maritime museum

* the development of a high quality National Maritime Museum is likely to be expensive (at least €20m) and will require a powerful vision and project champion. It could be either public or voluntary sector led but requires a robust funding strategy and business plan to ensure long term sustainability

* there is a strong case for the Naval Service to establish a Naval Heritage Centre in the short term somewhere on the Naval Base developed and managed by Naval Veterans

* Storehouse No 9 requires urgent investment to make it wind and weather proof to stop further deterioration
* representation should be made to Cork County Council before 9 March to ensure a maritime museum is included in the preparation of the emerging County Development Plan

* this report should be widely circulated to raise awareness of the potential and to generate support at all levels. In particular, it needs to be presented to the Department for Enterprise, Trade and Employment to inform their deliberations for the future use of the Irish Steel site

* a number of initiatives can be instigated in the short term to start to realise the heritage potential of Haulbowline and its unique maritime heritage.

The key issues facing the project are:

* access

* integration with the proposed ISPAT site development and the whole Cork Harbour experience (including the potential opening up of Spike Island)

* capital funding

* visitor numbers and overall viability

* what sort of organisation should be established to take the project forward.

The study needs to influence:

* the Department of Enterprise in relation to the emerging proposals for the ISPAT site

* the County Development Plan to incorporate a maritime museum in Haulbowline

* the Cork Harbour Forum in relation to the importance of Haulbowline and the maritime heritage of Cork Harbour

* the Naval Service in relation to the current condition of Block 9.

**A detailed Feasibility Study and Business Plan** should be commissioned to address these issues and work up the proposals to the next stage.

What is clear is that there is a need for a high quality museum presenting the story of Ireland’s maritime heritage and Block 9 in Haulbowline has real potential to be the place where this can be developed.

We commend this report to you.

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Allan Randall  
Niall Phillips  
Dennis Brennan

19 February 2007
1. INTRODUCTION AND CONTEXT

101 Introduction

Over the past few years the Irish Naval Service has assembled a small collection of objects and artefacts which is informally presented in the Martello Tower, in other buildings and around the site of the Irish Naval Base on Haulbowline Island in Cork Harbour. The recent closure of Irish ISPAT and the reclamation of the site provides the opportunity for the comprehensive redevelopment of what is a 44 acre waterside site for a mix of commerce, residential, leisure and tourism uses. In particular, it provides the potential to restore and adapt the historic storehouses built 200 years ago, and adjacent to its site, for modern uses. One possible use is for a maritime, or naval, museum.

The Irish Naval Service has identified Block 9, which is in their ownership and overlooks the Irish ISPAT site adjacent to the quay, as a possible location for a museum and the Heritage Council of Ireland agreed to fund a Scoping Study to assess the potential.

102 Study Brief

The study brief seeks a preliminary assessment of:

* the potential of Haulbowline, and its appropriateness, for a display of maritime collections

* the specific benefits of using Block 9 and how the building may be adapted to become a museum housing historic maritime collections which are managed to the standards set out in the Heritage Council’s ‘Museum Standards Programme for Ireland’

* the nature and diversity of the existing collections and how they can be enhanced, or complemented, by other collections and maritime facilities in Cobh, Cork Harbour region and Ireland as a whole

* the potential role of the new facility complementing existing maritime collections in Greencastle and Dun Laoghaire and the other wide ranging maritime collections that exist across Ireland which were identified by Darina Tully’s ‘Audit of Maritime Collections’

* how such a facility could address the wider heritage potential of the site and Cork Harbour region

* the educational potential of the project.

103 The Study Team

After a competitive tendering process a small specialist team were appointed comprising:

* Ian Parkin  Parkin Heritage and Tourism

* Allan Randall  Focused Learning (Education Consultant)

* Niall Phillips  Niall Phillips Architects Ltd (Conservation Architects)

* Dennis Brennan  Brennan Design LLP (Interpretive/Museum Designers).
104 Study Methodology

The study has been undertaken through a combination of:

* extensive consultations (see Appendix A)
* background reading and desk research (see Appendix B)
* site appraisal
* visits to a number of other museums and heritage facilities including Spike Island, Cobh Heritage Centre, Inishowen Maritime Museum and Planetarium, Greencastle, National Maritime Museum in Dun Laoghaire, National Folk Museum in Turlough Park, Castlebar, Kinsale Museum, Cork Heritage Centre etc.

105 Study Management

The study has been managed jointly by Dr. Hugh Maguire Museums and Archives Officer, The Heritage Council of Ireland, Lt. Cdr Barry O’Halloran Staff Officer Operations Defence Force Headquarters and Lt. Cdr Jim Shalloo Assistant Provost Marshal Irish Naval Service. We warmly acknowledge the advice and support provided by each of them but particularly Jim Shalloo who has provided enormous assistance locally in maximising our visits to Haulbowline.

We also thank the many other people who have given of their time, outstanding experience and enthusiastic support to help us prepare this initial report into the potential of developing a maritime museum in Block 9 on Haulbowline. We trust the report provides sufficient evidence of the outstanding potential that exists to enable the concept to be taken to the next stage with the commissioning of a detailed Feasibility Study.
2. STRATEGIC CONTEXT

201 Historical Overview

Cork Harbour is one of the largest natural harbours in the world. It has long been recognised as a strategic defensive asset protecting the City of Cork and, indeed, the south western approaches to the British Isles. The earliest fortifications were erected on the east side of the outer harbour around 1550 but a potential attack from the Spanish in 1600 led to Lord Mountjoy ordering the construction of a fort with keep 60 feet high on Haulbowline in 1603 and further defences on nearby Spike Island in 1605 (which was originally occupied by St Cathagin in 635 AD). Whilst pirates and marauders became more of a threat the fort was refortified in 1641 during the English Civil War and Cromwell was the first to recognise the benefit of Cork Harbour becoming a victualling base for the Royal Navy.

Subsequently, a military installation was established in Cobh and Haulbowline was leased by Lord Inchiquin of Rastellen in 1707. He subsequently established the Water Club in 1720 which was the first sailing club in the world.

Cork Harbour was an assembly point for the fleet in the British wars with France and America and the classic star shaped Fort Westmoreland was constructed by convict labour on Spike Island in 1792. It was around that time that the concept of a victualling base was resurrected. It was recognised that this would benefit from the arsenal being moved from Kinsale to Spike Island (which eventually happened around 1810). A report by Captain Schank and Mr Cockerell, undertaken in 1795, recommended that the victualling base would need to be large enough to supply two ships of the line, 10 frigates, 4 sloops and 3,000 men for 4 months.

Eventually an Order in Council was given on 18 June 1806 to erect a naval establishment. The development took place in two phases. Lord Inchiquin’s lease was terminated, the Martello Tower erected and the island divided between the Navy and the Board of Ordnance by a high wall. The Army facility included barrack, two storehouses, a gun carriage yard, workshops, dwellings and a school house served by a narrow gauge railway.

The Admiralty Yards, built between 1806-22 by Mrs Deane of Lapp’s Quay Cork, comprised six large storehouses, living quarters for the Fleet Surgeon and Naval Storekeeper, constabulary barrack and two large sheds/mast houses. At the same time (1810), barracks were erected on Spike Island and occupied by the 120th Squadron Royal Engineers, which became the headquarters of the South Irish Coast Defences.

Mrs Deane used to visit the site daily travelling by boat from her house in Lapp’s Quay. Her personal supervision of the work, particularly the construction of the water storage cisterns, is commemorated in an old ballad ‘The Town of Passage’:

But not forgetting Haulbowline Island
That was constructed by Mrs Deane
Herself the lady that stowed the water
To supply the vessels upon the Main

However, Haulbowline was only used for fifteen years and then intermittently until 1864. Two US naval ships, Jamestown and Macedonia, arrived in 1847 with much needed provisions during the Potato Famine.

This was not only the period of mass emigration to the New World but also the transportation of convicts including political prisoners and fenians. Spike Island became a prison between 1847 – 1883 and in 1850 there were as many as 2,000 prisoners.

The second phase of development came 50 years after the first. In 1857 John Francis Maguire MP for Cork petitioned Parliament to honour promises made in 1800 to develop Cork Harbour on a par with Portsmouth. After several years debate, the creation of a dockyard was approved in 1864 and an area of 35½ acres was reclaimed to the east of the island using
convict labour from Spike Island and local contractors. The dockyard comprises a 9 acre basin, graving dock 625 feet long (the largest in the country) and a channel alongside the storehouses known as the Church Camber. The construction took thirty years to complete. The whole Admiralty area was connected by a permanent broad gauge railway with steam locomotives and rolling stock.

The dockyard grew in importance and employed 3,000 men by 1914. Queenstown was, by then, the headquarters of the Queenstown Command of the British Navy and Admiral Sir Lewis Bayley brought the whole of Haulbowline under naval command. In addition to a signal station there were, at that time, 13no. 1200 ton sloops, trawlers, drifters, motor launches, submarines, mine sweepers and disguised merchant ships. The fleet grew with a further 4 destroyers and 6 sloops by 1917 together with 6 US destroyers and as many as 92 US naval ships and seaplanes. This was the height of Haulbowline’s importance with the dockyard, stores and hospital always busy.

After the Treaty the dockyard was transferred to the Irish Government (Office of Public Works) in 1923 but the Royal Navy operated the base until 1938 establishing the South Irish Flotilla for Coastal Protection. The Irish Marine Service was established in 1939, which became Marine and Coastwatching Depot in 1940 and subsequently the Irish Naval Service in 1946.

Part of the eastern side of the island was leased to Irish Steel in 1937 and operated until 2002. The complex has recently been demolished and the site is currently being reclaimed and decontaminated to allow a mixed use development to take place.

The story of Spike Island and Haulbowline go hand in hand. Spike continued to be a fortification and barracks but was a prison during the War of Independence. It was handed over to the Irish Army on 11 July 1938 and the fort was renamed Fort Mitchel. The Irish Army remained on the island until 1979 when it became a training base for the Naval Service until 1994. It then became a juvenile and general prison again until 2004. Spike Island is an integral part of the heritage of Cork Harbour. Whilst there are discussions about its possible use as a ‘super prison’ its outstanding history and heritage suggests it should, with Cobh and Haulbowline, be considered as an important cultural, recreational and leisure asset within Cork Harbour.

The third unique piece of the jigsaw is the town of Cobh itself which initially grew as the civilian community serving Haulbowline and Spike Island but has its own remarkable story to tell. Renamed Queenstown for 80 years after Queen Victoria visited in 1849 it became the premier
emigration port throughout the 19th century with as many as 2.5 million people leaving Ireland (1815-1970) to find a new life in North America and Australasia. The prisoners from Spike Island were also transported from Cobh until this practice ceased in 1856. Subsequently the ‘super liners’ travelling to and from New York used Cobh as the last (and first) stopping point including the fateful journeys of RMS TITANIC and the RMS LUSITANIA. At that time it was a busy town full of hotels and boarding houses with a rail link to Cork whilst continuing to service the dockyard and prison.

Inevitably the town suffered with the decline of the dockyard (although Irish Steel offered alternative jobs) and the subsequent decline in liner traffic. Over the last 15 years, however, Cobh has experienced a renaissance as cruise liners visit the town (benefiting from the purpose-built cruiser liner terminal) and it has become a visitor destination with the development of Cobh Heritage Centre. This has been augmented by townscape revitalisation. From the stunning cathedral the visitor can fully take in the scale and beauty of Cork Harbour and the intrinsic relationship between Cobh, Haulbowline, Spike Island, Fort Camden and Fort Carlisle.

202 Irish Naval Perspective

The Irish Navy, established in 1946, is based at the historic dockyard of Haulbowline. It has around 1,100 personnel (600 on shore) and operates eight coastal vessels (1 Helicopter Patrol (82m), 2 Large Patrol (80m), 3 Offshore Patrol (65m) and 2 Coastal Patrol (62m)) on a variety of duties including fishery protection, customs and drug control, environmental protection and monitoring, search and rescue and UN missions. It has been involved in a number of key incidents over its 60 year history including search and rescue in relation to the loss of an Aer Lingus plane (1969), the Fastnet Race (1979) and the Air India disaster in the mid Atlantic (1985).

Haulbowline has been a fortification since 1605 and the legacy of the dockyard 1805-94 represents a complex of major national historic maritime importance. Whilst awareness of this inheritance has increasingly been recognised nationally there seems to be a general ignorance of maritime issues and of the existence, role and function of the Irish Navy. The National Museum, for instance, has no plans to develop a maritime museum in the foreseeable future and discussions with them suggest that they do not see maritime heritage as important as, for instance, transport or agriculture. The Irish Navy, however, is anxious to raise its image and profile, emphasise its value and its potential for a meaningful career.

Over the past few years research has been undertaken by members of the Naval Service into the history and heritage of the Haulbowline complex and a collection of artefacts and memorabilia has been brought together and recently indexed (see Appendix G). Some of the collection has been informally displayed in the Martello Tower whilst the remainder is retained...
in Storehouse 4 and in various buildings across the site. None has been documented, accessioned, catalogued or, where necessary, conserved. It comprises weapons, ships models, uniforms, compasses and other directional equipment, technical and communication equipment, flags etc plus photographs, oral history transcripts, documents, training manuals and films and mementos of international diplomacy.

In addition to the collection the Naval Service holds an Annual Open Day and invites school parties and specialist interest groups to tour the base. They are happy to accommodate additional guided tours but are anxious that there is no unsupervised public access onto the base. Whilst they would support the establishment of a museum facility they envisage it being run and managed by others. Neither is there a guarantee of any funding. However, they are eager to fully participate in this Scoping Study and consider the findings.

Whilst the Naval Service’s collection is of value because there has been no clear vision for a museum, and no collections policy, it has been randomly assembled with no structure nor purpose. It is therefore difficult to assess its significance. However, it is an excellent start which can be built upon. More important, in some ways, is the Organisation of National Ex-Service Men & Women (ONET) who hold an enormous memory archive which can be tapped. Indeed, members have the ability to interpret the collection and bring it ‘alive’ to visitors and members of the general public. There is no doubt that if some kind of museum can be developed then they can offer not only memories but also memorabilia and the time to work as volunteers and interpreters. This is an extraordinary resource which is available now whatever the future holds. The Veterans would be eager to see a facility developed in the short term and would be interested in becoming volunteer stewards and guides.

203 Planning Context

Whilst the Naval Service is not subject to normal planning procedures any museum developed on Haulbowline will be subject to the policies of the Cork Area Strategic Plan, Cork County Development Plan, Midleton Local Plan and Cobh Town Plan.

Haulbowline Island (including the ISPAT site) is currently unzoned although it has established use as an operational naval base and industrial site. Planning permission was recently given for the development of a crematorium on Rocky Island.

The Naval Base (including the storehouses but not the area east of the ISPAT site) is an Architectural Conservation Area (known as the Haulbowline Conservation Area) and two structures are listed in the Record of Protected Structures:

- RPS 00578 Martello Tower
- RPS 00670 The range of 6no. storehouses (two of which – Blocks No. 11 and 12 – are in the ownership of the Department of Enterprise, Trade and Employment and
four – Blocks No. 4, 6, 8 and 9 – are in the ownership of the Ministry of Defence.

It is an objective to conserve and enhance the special character of Architectural Conservation Areas including their traditional building stock and material finishes, spaces, streetscape, landscape and setting.

Any redevelopment of the ISPAT site will go through the normal planning process. A mixed use development would be considered a ‘material contravention’ as it currently stands and it may be necessary to ‘rezone’ the area to aid its redevelopment. This will follow a set legal process with advertising and public consultation before it can be approved. There would be a need for an Environmental Impact Statement and issues of traffic, access, parking, scale, density, design etc would all need to be evaluated.

It is important that this study is used to:

* inform the evolving proposals for the ISPAT site
* feed into the County Development Plan process (a submission should be made by the Irish Naval Service and/or the Heritage Council by 9 March 2007)

The key principles in relation to the relevant plans are set down below:

**Cork Area Strategic Plan 2001 – 2020**

The Plan was adopted by Cork County Council and Cork City Council on 22 October 2001 to provide a vision, strategy and framework to enable the Greater Cork area to become a dynamic and progressive European City region, which is globally competitive, socially inclusive and culturally enriched. It seeks to build on:

* its success in ICT and pharmaceuticals
* its centres of learning with University College, Cork and the Institute of Technology
* its success as European City of Culture 2005
* its unique environmental qualities (including Cork Harbour).

Cork is a designated gateway city under the National Development Plan 2000 – 2006 and the plan covers the area comprising the 45 minute journey time to Cork. It focuses on key issues:

* realising and managing economic growth
* regenerating the city (and particularly the city centre and docklands)
* sustainable and balanced development around the city
* achieving sustainable development in the ring towns and rural areas
* creating an effective and environmentally sound transport system.

The plan seeks to:

* improve access to jobs, education, health, culture, leisure and other services through the provision of a high-quality public transport system
* locate housing in relation to employment opportunities and public transport routes
move to higher housing densities and a wider choice of house sizes reflecting the projected population structure

ensure areas of natural and cultural heritage are conserved and enhanced.

It is envisaged that the population will grow by 28% to 440,000, jobs will increase by 34% and households by 50% by 2020. It highlights the relocation of the port to Ringaskiddy, the retention of the Greater Cork green belt, the importance of protected and remote areas including the outer Cork Harbour. It proposes a Coastal Zone Management Plan.

It sets as a key goal 'to enhance the environmental quality and landscape setting of the Cork City Region, minimising impact on ecologically sensitive areas and on built heritage and cultural landscapes'.

The Plan envisages strengthening and improving Carrigaline town centre and creating a more balanced structure for the town. The port will gradually develop and consolidate in Ringaskiddy which will also strengthen the existing chemical industry base. Cobh will see extensive development to take advantage of its good rail connections, existing infrastructure and ability to expand with minimal environmental impact.

The Plan highlights the importance of tourism and seeks to increase tourist interest in the area through the development of new attractions and improved accommodation. The city should provide an improved ‘urban experience’ comprising culture, shopping and entertainment.

Cork Harbour is recognised as an under-appreciated resource with considerable scope to develop its tourism potential particularly as a premier leisure sailing destination including Cobh and Crosshaven. There is potential to enhance the special qualities of Cobh and develop the tourism and leisure potential of Spike Island including a vintage steam railway operation between Cork and Cobh.

Although there is no mention of Haulbowline the Cork Area Strategic Plan makes specific reference to the importance of Cork Harbour and the protection of the natural and built heritage and cultural landscapes. It highlights the significance of Cobh and identifies the tourism and leisure potential of Spike Island (the Plan was written before the proposal for a ‘super prison’). It also stresses the importance of improving the tourism offer and any proposals for a museum (in the context of the wider potential of Cork Harbour and, potentially, Spike Island) is closely consistent with the overall thrust of the document.

Cork County Development Plan (2003)

The Cork County Development Plan was approved in January 2003 and sets out the County Council’s planning policy for the period 2003-2009. It provides an overall strategy for the proper planning and sustainable development of County Cork.

The main planning goals that underpin the Strategy are to achieve:

* enhanced quality of life for all based on high quality residential, working and recreational environments and sustainable transportation patterns

* sustainable patterns of growth in urban and rural areas that are well balanced through the County together with efficient provision of social and physical infrastructure

* sustainable and balanced economic investment together with wise management of the County’s environmental and cultural assets

* responsible guardianship of the County so that it can be handed on to future generations in a healthy state.
The National Spatial Strategy has recognised ‘the importance of Cork and its potential to build on its substantial and established economic base to lever investment into the South West Region’.

The natural assets of the County, including its attractive coastline, varied landscapes and a rich natural heritage also enable the County to offer tourism as a very important economic activity.

The strategic planning principles in relation to the natural and built environment are as follows:

* the natural and built environment needs to be properly protected, managed and enhanced

* the conservation and enhancement of biodiversity, natural heritage, landscape and the built environment should be promoted as key elements of the long term economic growth and development of the County

* the protection of Cork’s physical heritage (including its archaeology and historic buildings) is a tangible representation of the past and a positive asset for future economic growth and regeneration

* the ‘polluter pays’ and the ‘precautionary approach’ should be adopted in environmental and heritage matters

* the long term economic, social and environmental well-being of Cork requires water and air quality to be of the highest possible standard.

Within these principles Cork Harbour is seen as a thriving mixed coastal zone in a distinctive landscape setting which, as well as being the focus for all major industrial development in the area, also fulfils important tourism and amenity roles. Cobh is identified as an important satellite town with significant residential development opportunities based on accessibility by rail, promotion of its distinctive character and scenic greenbelt/harbour setting. Carrigaline seeks targeted growth within its green belt setting maintaining its distinctiveness as a self-contained satellite town. Ringaskiddy is identified as a strategic industrial and port area taking advantage of the deep-water channel.

The policies related to environment and heritage in Cork Harbour can be summarised as follows:

* seek the conservation and wise management of areas and features of natural environmental value and raise awareness of their importance and the need to manage them for the benefit of future generations

* maintain the conservation value of proposed Natural Heritage Areas, Candidate Special Areas of Conservation and Special Protection Areas

* promote a better understanding of the unique landscape character of Cork Harbour and the degree of sensitivity it has to various kinds of development

* protect the visual and scenic amenities of the built and natural environment and preserve areas designated as ‘scenic landscape’

* preserve the character of all important views and prospects particularly sea views, coastal landscapes, views of historical and cultural significance (including buildings and townscapes) and views of natural beauty

* safeguard sites, features and objects of archaeological interest and raise awareness and improve practice in relation to archaeology in County Cork
The Potential To Create A Naval, Or Maritime, Museum On Haulbowline Cork Harbour Scoping Study

The County Development Plan is about to be reviewed and there is an opportunity for the Heritage Council and Naval Service to formally register an interest in the museum on Haulbowline by responding to the ‘Issues To Be Addressed’ Document on or before 9 March 2007.

Cork County Heritage Plan (2005 – 2010)

The National Heritage Plan (2002) sought ‘to ensure the protection of our heritage and to promote its enjoyment by all’. This was underpinned by the core precept that ‘heritage is communal and we all share a responsibility to protect it’. It recommended that Local Heritage Plans should be prepared under the guidance of a Local Heritage Forum comprising all interested parties.

The aim of the plan is ‘to secure benefits for local heritage and to increase awareness, appreciation and enjoyment of this heritage by all for the people of County Cork’. It goes on to set out a series of key objectives with actions. The objectives are:

* to raise awareness and promote appreciation and enjoyment of the heritage of County Cork
* to develop and encourage best practice in relation to the management and care of the heritage of County Cork and to deliver practical actions to achieve this (including seeking funding for the appointment of a County Museums Officer)
* to gather and disseminate information about heritage in County Cork.

This is the start of a long process of raising awareness and understanding of the importance of the built, natural and cultural heritage. The maritime museum project clearly makes a contribution to this overall strategy.

Midleton Local Area Plan (September 2005)

Cobh developed dramatically during the 19th century as a military base, transatlantic seaport, industrial dormitory town and as a tourist resort. Its town centre, with spectacular views over the western harbour, has attractive steep narrow streets and a fine ornate waterfront streetscape providing an outstanding architectural ambience and environmental quality which remains in excellent condition. The historic core of the town centre is designated as a Zone of Archaeological Importance.

The town has a population of around 10,000 but the Strategic Plan suggests it will grow by another 2-3000 by 2020.

The town has suffered with the closure of Irish Steel and the fertilizer plants and new areas for industry have been allocated to the north of the town. It is hoped to revitalise the town centre retail and commercial facilities and realise the tourism potential of the town.

Haulbowline is specifically identified in the Plan following the closure of Irish Steel. The island includes institutional uses associated with the dockyard, as well as industry and education. The western port is designated as an Architectural Conservation Area in which it is an objective to protect and enhance the special character of the area. The closure of Irish Steel offers the potential for major medium to high density mixed use redevelopment perhaps including high quality work places, apartments and cultural projects. This, of course, is currently the subject of a separate study.
The Local Area Plan does not draw out the heritage value of Haulbowline but the re-use of a storehouse as a new cultural facility would no doubt be welcomed as an adjunct to the redevelopment of the Irish Steel site.

**Cobh Town Plan**

This Plan produced in 2005 provides a planning framework for the town so that Cobh and its people can develop their potential within a sustainable context. The objective is to secure a balance between employment, housing, services and amenities in order to provide a basis for stable well integrated communities. It is consistent with the National Spatial Strategy and County Development Plan.

The Plan proposes that the town should take advantage of its unique setting within Cork Harbour, coupled with its history and heritage, to develop its tourism potential through product development and improved promotion, signage and interpretation. In particular, it mentions:

* developing the range of attractions, retail, entertainment, food and drink, accommodation and transport facilities
* ensuring the unique Victorian townscape qualities of the waterfront are retained and enhanced for pedestrians
* promoting the ferry link with Haulbowline and Little Island
* facilitating the growth of the cruise liner industry
* ensuring there is adequate parking and appropriate facilities for cycling
* seeking to increase the frequency of the rail service to Cork and promoting a vintage steam railway service during the holiday season as a tourist facility
* developing tourism and leisure facilities on Spike Island.

It proposes the preparation of a Tourism Development Scoping Study to put all of these elements into context. Whilst not mentioning any museum facility on Haulbowline it is clear that our proposal would be entirely consistent with the aspiration to enhance the tourism product of Cobh.

**Cork City Docklands Regeneration**

The City Council and Cork Harbour Commissioners have developed proposals to relocate the existing working port to Ringaskiddy (immediately to the east of the Maritime College of Ireland) and regenerate and redevelop the Docklands immediately to the east of the city centre. There is a North Docks Local Area Plan and a South Docks Local Plan is being prepared and planning applications are already being submitted. It is hoped to establish a cultural quarter as part of the development and mention has been made of a maritime museum. The aspiration is to create a premier destination for the city now the essential supporting infrastructure of hotels, retail, roads and transport nodes has been developed.

A study is being undertaken by Ernst Young investigating the viability of establishing a river cat service (or water taxi) from Cobh to the City Centre. Nevertheless the view was expressed that the Outer Harbour for Cobh, Haulbowline and Spike Island is too far from the city and access is not particularly good (whether it be by the N28, train or a ferry).

**Ringaskiddy Development**

The County Development Plan seeks to enhance and consolidate the Ringaskiddy area as a centre for the chemical and pharmaceutical industries. Significant areas of land have been zoned for industrial and port development coupled with the imminent upgrading of the N28
from the N25. The Cork – Swansea Ferry already operates from the ferry terminal in Ringaskiddy.

The development proposals have several implications:

* the visual appearance of the Ringaskiddy coastal strip will increasingly be industrial and not necessarily the attractive environment associated with heritage attractions

* an increase in commercial port traffic will increase activity in the river channel to the north and east of Block 9 which will provide life and activity

* the N28 from the city centre will become increasingly busy with industrial traffic to the port and industrial areas, commuters and people using the ferry

**ISPAT Site**

Proposals are being developed by the Department of Enterprise, Trade and Environment for the redevelopment of the Irish Steel site, following its reclamation and decontamination, for a multi-use development including apartments, offices, a marina and club house, hotel, maritime museum and a landmark building. The Irish Naval Service have indicated that they do not want public access beyond, or to the rear of, Block 9 and this means that should the Irish Steel site become the setting for any museum there will be a need to provide access, parking and servicing. This proposed redevelopment should be welcomed because it brings footfall to the area and is likely to improve the overall viability of any museum. Our study should seek to inform the overall development proposals.

**Spike Island**

There are aspirations to reuse Spike Island as a ‘super prison’ or, alternatively, to maximise its heritage and tourist potential. Alternative sites for the prison are currently being explored to the north of Cork. The potential to develop the tourism potential has been identified in the Cobh Town Plan and are being explored locally. It is our view that Spike Island, together with Cobh and Haulbowline, represents an outstanding heritage resource and its potential should be evaluated in more detail.

**Other Initiatives**

Other initiatives include:

* the opportunity to develop a ferry, or water taxi service, and tours around Cork Harbour

* the development of a water taxi link from the City Centre to Cobh

* the proposal by Cork County Council to conserve and restore Fort Camden over the next two years for heritage, leisure or tourism purposes. A Feasibility Study is to be commissioned imminently as the first steps

* the City Council is seeking to extend its boundary (the last boundary extension was 1965) which could mean it will have increasing influence on the planning and management of Cork Harbour.

**204 Stunning Location Which Needs Integrated Management**

As we have already explained Cork Harbour is a superb natural harbour, which has outstanding maritime, defence, cultural and natural heritage credentials. The whole is so much greater than the sum of the parts and has the potential to be a major destination. There are many competing demands on the harbour including the operational port and cruise liner terminal, industry, energy generation, recreation, leisure, tourism, nature and environment.
There is increasing recognition of the need for an Integrated Coastal Zone Management Plan, or Strategic Vision for Cork Harbour, which provides a framework for the long term sustainability of this unique resource. To this end the Cork Harbour Forum has been created as a voluntary partnership between all relevant stakeholders which has been funded through an EU Interreg project entitled Corepoint (Coastal Research and Policy Integration) http://corepoint.ucc.ie/. The project is being facilitated by the Coastal and Marine Resources Centre (based in Storehouse 4 on Haulbowline), University College Cork and the Planning Policy Unit of Cork County Council. Key aims include:

* promoting social and political responsibility for the coastal environment
* developing integrated coastal information management systems to improve awareness and aid management of the harbour
* using current best practice approaches and identifying models for sustaining Integrated Coastal Zone Management initiatives.

It is hoped that elements of the Integrated Coastal Zone Management Plan will receive statutory support through the new County Development Plan.

The maritime and defence heritage is of outstanding importance and needs to have a high profile in the plan. The potential to link Cobh, Haulbowline, Spike Island, Camden and Carlisle Forts as an integrated package of heritage facilities serviced by ferry, rail and road has enormous tourism potential.

The concept of heritage sustainability is promoted in the Policy Paper on Conserving Ireland’s Maritime Heritage prepared by the Heritage Council (April 2006) as a basis for assessing planning and development proposals in marine and coastal areas. It argues that this would broaden the scope of impact assessment to cover both natural and cultural components of the national heritage. This principle should be embodied in the Cork Harbour Integrated Coastal Zone Management Initiative.

The environmental and cultural quality of Cork Harbour is such that the concept of applying for World Heritage Site status was mooted in the Corepoint Workshops that took place during 2006. This would certainly raise the image and profile of the area as a destination but may also impose constraints which are unacceptable to commercial interests. Nevertheless a maritime museum could become a ‘gateway’ to explore the unique qualities of the harbour and World Heritage Site status could only benefit the popularity and viability of the museum.

**205 Museological Context**

Despite being an island nation dependent on the sea for food, transport and commerce there is no major national cultural facility focused on Ireland’s rich coastline and coastal waters. Nor is there a museum dedicated to the naval history past and present. In order to assess the current situation we visited a number of museums and describe our findings below.

**National Folk Museum**

The National Museum has maritime collections in its store in Daingean Co. Offaly (55 miles west of Dublin) and a relatively small but high quality multimedia display on traditional maritime subjects in the National Folk Museum at Turlough Park, Castlebar, Co. Mayo, which attracts around 100,000 visitors per annum.

Fishing and maritime history, however, is only a small part of the museum but includes 31 vernacular boats, including wooden and skin currachs, coracles, cots, rafts and punts together with fishing equipment, basketry, netting, fishing rods, lobster and crab pots etc. There is a reserve collection together with extensive film, photographic collection and oral history.
The National Maritime Museum Dun Laoghaire

The National Maritime Museum (now called the Maritime Institute Museum) has been developed in Dun Laoghaire by the Irish Maritime Institute, which was founded in 1941 to persuade Government that Ireland is a maritime nation with a strong maritime heritage that needs to be protected (it is arguable as to how much progress has been made in 65 years!)

The Institute initially operated from the Sailors Reading Room and set out to collect historic boats, undertake research, hold lectures and undertake visits. The building was demolished to make way for a new ferry terminal and the Institute sought alternative premises. When the 1837 Church of Ireland Mariners Church closed and became available it was decided to lease the building and, using a FAAS scheme, a museum was opened in 1977. It has a significant and diverse collection (which has been catalogued by Dr Philip Smylie) covering a wide range of subject areas together with books, a picture store, library, archive, models and research area.

It is operated entirely voluntarily with an Honorary Manager, Honorary Curator, Trustees and a band of volunteers. It has opened at weekends May-October plus school parties and attracted around 5-6000 visitors but has suffered from deteriorating electrics, lack of sprinkler system, inadequate heating and environmental control and a deteriorating built fabric. As a result it was closed 2002-2004 to deal with the electrics etc. and, upon re-opening, the building has also been used for concerts. Current visitor numbers are very low: perhaps in the region of 1500-2000.

The Institute now owns the building and has secured a significant grant from the Office of Public Works to address the built fabric but further grants will be required to deal with the interior fabric, toilets, heating system, the provision of a lift and to upgrade the museum displays.

The aspiration is to create a Museum Trust and operate as an independent organisation that can seek grants from a variety of sources with a professional director and volunteers but there is still a long way to go.
Inishowen Maritime Museum and Planetarium Greencastle

Inishowen Maritime Museum and Planetarium is located in the old coastguard station in Greencastle Co. Donegal overlooking one of the busiest modern fishing fleets in Ireland with magnificent views over Lough Foyle and Co. Derry. Despite the new Greencastle-Magilligan (Northern Ireland) ferry service it is an isolated community and is identified as the most disadvantaged rural area in the country. The museum was established by the local community in the early 1990s and opened in 1994. It is a company limited by guarantee. The Mission Statement is ‘to provide and conserve the local maritime history and culture and to encourage a sense of responsibility for the local heritage through preservation and education’. Exhibits include a fully rigged Drontheim (Greencastle Yawl), curraghs, punts and a wide range of displays covering fishing, coastguards, WW1 and WW2, the Foyle pilots and the Irish Navy.

There is no Collections Policy and whilst the collection is catalogued it is not professionally managed or curated relying, instead, on a Government funded community enterprise scheme (POBAL) to cover its running costs including 2 FTE staff. The museum and planetarium (which is a valuable resource for schools) attracts around 6000 visitors per annum (also acting as a Tourist Information Centre) although there is also a community-based programme of events and activities, which doubles the user numbers.

The museum is a remarkable community initiative initially established as a community regeneration, heritage and tourism initiative. It has cleared a bank debt of €60,000 over the past four years and has received awards and grants from the EU and Government amounting to almost €1m. The objective is to bring the museum up to the standards required to be an accredited museum under the Heritage Council Museum Standards Programme for Ireland (see below). It aims to raise standards of collections care and services to the public introducing a professional ethic to all aspects of its activities and practices. However, it can never be sustainable with the low user numbers it currently attracts and is always going to be vulnerable to changing Government funding proposals. It is a classic regional maritime museum as described in Darina Tully’s report and deserves a much stronger financial foundation upon which to develop.
Kinsale Museum

**Kinsale Museum** was established nearly 40 years ago in the Old Market House (1590) in the centre of Kinsale. The museum has been established and run by two dedicated local people for almost 40 years. They generated the collection, restored the artefacts and also restored the building (which is owned by the Town Council) without grants. Further restoration work was undertaken 6/7 years ago by the Town Council who now also fund the running costs (including a part-time Curator). There is a Kinsale Regional Museum Committee with eight Trustees.

It is open all year round seven days a week 10am-5pm (11am-4pm Wednesday-Sunday in the winter) and attracts 7-10,000 visitors per annum. Admission is €2.50 (€1.50 for seniors, children and students). It is essentially a local museum dedicated to local crafts and collections related to the sea. It includes collections related to blacksmiths, agriculture, printing, lace and local shops as well as an extraordinary range of items related to boat building, shipping and shipwrecks. It includes shipwrights’ moulds, models, maritime prints and maps and shipwreck artefacts with a cannon. The original Town Charters of 1590, 1610, 1689 and 1721 are hung in the Council Chamber on the first floor together with a range of paintings. The inquest into the sinking of the Lusitania took place in this room and much more could be made of this event.

This is one of the many small museums with a significant maritime collection across the country reliant on local enthusiasts but with no long-term Development Strategy or succession planning.

Cork Heritage Centre

This facility is located on the estate of the Pike family who were Quakers and leading entrepreneurs in the city with transport, shipbuilding, maritime and trading interests. The estate was purchased by a nunnery who, in the late 1980’s, were anxious to create something for the local community which would generate jobs, attract visitors and bring economic benefits for the city.

The project sought to tell the story of the Pike family and maritime heritage. It attracted grants from Borde Failte and other sources and, using the FAAS programme, created a heritage centre. The maritime collection includes ships models, boat building, traditional crafts, tools, log books, photographs, a theatrical scene set depicting emigration, another on boat building...
and displays on shipwrecks, trading etc. There is a room for school groups and meetings and a large scale model of Cork Harbour. There is no curatorial or collections care or management and no intention to pursue museum registration.

They are now in their 16th year. The attraction is run by the Sisters with voluntary help and there is a charge of €10 (family), €5 (adults) and €2.50 (children). Visitor numbers have dropped drastically (probably no more than 2,000) and school parties are now the primary audience. There is no money for marketing or refurbishment and Sister Sato feels the space could be used more beneficially for an alternative use. They are likely to close at the end of 2007.

There are a lot of similarities with the other facilities visited relying on volunteers, low visitor numbers and no money for enhancement. It would be sensible to monitor the situation and if the facility is to close then it would be beneficial to take the maritime collection on permanent loan (subject to agreements already in place) for use in the proposed facility.

Cobh Museum

This museum is located in an attractive Presbyterian Church built c.1863 (and a listed building) overlooking Cork Harbour. It closed in the 1960’s and was donated to the County Council for cultural purposes. It was suggested that the town should have a museum: a Museum Committee was formed and the facility opened in 1973.

It operates through a Voluntary Museums Committee including a Voluntary Curator (who has held the post for 30 years) with paid staff under a similar community employment programme as the museum in Greencastle Co. Donegal. It opens Easter – end October Monday – Saturday 11:00am – 1:00pm and 2:00pm – 5:30pm and Sunday staffed by volunteers 2:30pm – 5:30pm. There is a charge of €1.50 (adults), €0.75 (children, students and senior citizens) and €3.75 (families). Visitor numbers are around 4,000 with around 10% local. During the winter the staff are cataloguing and updating the inventory. The facility suffers competition with Cobh Heritage Centre and the lack of toilets and basic visitor facilities.

There is an aspiration to become an accredited museum but to date they have been unsuccessful. There is concern that there are too many pressures on people’s time and it is increasingly difficult to attract and retain volunteers.
The museum is attractive, open, light and airy and pleasurable to be in but it clearly suffers from a lack of space both for the exhibits and storage. It focuses on maritime heritage with displays on the Titanic and Lusitania, models, harbour charts, artefacts, models and an impressive collection of paintings and prints.

The museum is involved in a Great Island Oral History Project and sees the potential of recording people’s memories of Cobh. However, it operates on a shoestring reliant on the Government community employment programme. There are concerns about the general condition of the building. It is too nice a facility to fail but if it were to close the collection would pass to the County Library Services. Again, the proposed maritime museum on Haulbowline would be an ideal beneficiary in such an eventuality. However, there is real opportunity for the two projects to support each other.

Cobh Heritage Centre

This visitor attraction, known as the Queenstown Story, was developed by the Cobh Heritage Trust in the entrance hall of Cobh Station. The Trust was registered in 1989 and with the assistance of Cork Kerry Tourism and Borde Failte EU structural funds raised £2.5m to develop the facility which opened on 1 March 1993. It is essentially a walk through theatrical scene set and graphic based exhibition with audio visual and interactive displays telling the story of Irish emigration through the 19th century and Cobh’s role as an embarkation port. It explains the change of name to Queenstown after Queen Victoria’s visit in 1849, its role as a blue riband town as ships vied to be the fastest to cross the Atlantic, its role in the tragedies of the Titanic and Lusitania and, through an audio visual, tells the story of the town, the hand over of Haulbowline and its role in sailing.

The stories are so powerful that it is well and truly on the tourism trail for visitors to Cork and is also latched in to the cruise liner market. It attracts over 100,000 visitors with a successful shop and café. There has not been significant reinvestment since it opened and there must be a question mark over its longevity and sustainability.

It is not a museum but sets out to communicate powerful human stories at the very place in which they happened. It is an essential part of the Cork Harbour story and it will be important that there is continued investment to sustain its quality. When seen in relation to the plans to revitalise the town and the potential linkage with Spike Island, Haulbowline, Fort Camden and the wider Cork Harbour there is a critical mass of attractions which could become a major draw for visitors. The opportunity to link this with a water taxi or steam railway ride from Cork only enhances the huge potential that exists.
The Ulster Folk and Transport Museum

The Ulster Folk and Transport Museum was established by Act Of Parliament in 1958 to illustrate the way of life and traditions of the people of Northern Ireland. It is located on the Cultra Estate in Hollywood to the east of Belfast on the south side of Belfast Lough. It is an open-air museum extending over 175 acres with many attractions and activities as well as extensive Folk and Transport Galleries. It has an excellent library and runs an extensive education service A series of new buildings are being created as part of the interpretation of a typical Ulster town of the 1900s.

It has a wide range of exhibitions including maritime collections on traditional skills and crafts together with a major exhibition on the Titanic, its construction, loss and legend using original material, vintage photographs, recordings, newsreel and music. There is also the development of the Titanic Quarter in Belfast with the Titanic Trail etc.

The museum is open throughout the year 10 – 6 Monday – Saturday and 11 – 6 Sunday (earlier closing in the winter) with an admission charge.

206 Museological Framework

The Heritage Council for Ireland has been campaigning for several years to raise awareness of the current status and condition of the maritime collections across Ireland. A recent study ‘Audit of Maritime Collections’ (2006) by Darina Tully highlighted that there is an enormous maritime heritage resource comprising boats, artefacts, technical knowledge, expertise and memories which is largely in private ownership (many in pubs) only surviving because of the passion and interest of the owners. Very few are catalogued, curated or managed professionally. Only the National Museum, 14 local authority museums and a few other collections such as the Chester Beatty Library and Glucksman Art Gallery have qualified curators. The study made a series of important recommendations:

* there is a need for a modern, professionally run national maritime museum (ideally with water access) plus several regional maritime museums to reflect geographical differences. Ideally it should include a national boat collection including as many of the different designs of coastal craft as possible and also covering inland waterways. County museums should be encouraged to display more of their maritime collections

* there is an urgent need for the safe storage for historic craft and large items of maritime archaeological material eg. ships’ timbers most of which are currently exposed to the elements and, inevitably, are deteriorating. This is required urgently and may require temporary premises whilst a suitable permanent facility is identified

* there needs to be a register of traditional boat builders who should be encouraged to:
  
  (a) ensure their tools and equipment are not lost eg. by a codicil in their will
  
  (b) ensure designs and patterns are not lost
  
  (c) their memories and systematically recorded
  
  (d) training courses can be run to ensure vernacular crafts are retained and passed on

* a shipwreck interpretation centre is developed in an appropriate location

* an inventory of historic craft is established

* an historic boat register is developed along the lines of the one created in the United Kingdom
floating exhibitions should be developed and travel around to events and festivals.

Whilst this provides strategic guidelines in relation to maritime heritage the Heritage Council is also anxious to raise the standards of collections care, management and display in relation to all types of museum. This is set out in the *Museums Standards Programme for Ireland (2004)* which recommends that museums should strive to seek accreditation and sets out the structure of the document that needs to be submitted for this purpose. In order to seek accreditation there needs to be a much more professional approach in terms of staffing, management and philosophy in the operation of museums and collections than currently exists.

In particular, it addresses:

* the preparation of a Mission Statement and policies for collections, disposal and loans
* management
* care of collections
* documenting of collections
* policies related to display
* education plan and policy
* visitor care and access.

There are clearly financial implications to address but if Ireland is to conserve, protect, maintain and manage its cultural heritage for the benefit of future generations then this issue needs to be addressed sooner rather than later.

It is also important to put the proposal into context with the plans and aspirations of the *National Museum of Ireland*. The focus of the museum for the foreseeable future is on enhanced management, conservation and presentation of existing collections. Whilst they have a relatively small display in Turlough Park and collections in store at Daingean there has been no emphasis on maritime heritage. The only exceptions have been the Conservation of the Asgard, the Bantry Bay boat and the Viking boat found in the Boyne. However, the constraints of space for collections, the lack of specialist curators and the implications of conservation have all meant that the priorities in relation to collections have been elsewhere. This is further exacerbated by the feeling that Irish people do not consider seafaring as part of their psyche. Any new galleries are likely to focus on transport, science and technology and sport.

The National Museum favour the display of reserve collections locally and regionally but quite rightly demand high standards of the loanee:

- the items to be borrowed must be in public ownership
- the facility must be open all year round
- it must have curatorial staff
- issues of health and safety and security must be adequately addressed
- the building must be environmentally controlled.

It should be the aim of any maritime museum to be in a position to meet the standards of the National Museum in this regard.
Indeed, any new maritime museum on Haulbowline must aspire to be an accredited museum and will need to be developed and managed to the highest standards if it is to secure support at a national level and appropriate funding from EU and other sources.

Conclusion

In this section we have put the concept of a maritime museum into context and drawn out the principles that need to be considered in reviewing the potential. We now turn to looking at Block 9 (original known as Storehouse No.9).
3. BLOCK 9

301 Introduction

We have undertaken a detailed appraisal of Block 9 and this is included as Appendix C. We have introduced the historical context of Cork Harbour and Haulbowline in Section 2 but summarise the specific context of Block 9 (or Storehouse No.9) as follows.

By the mid-C18 Haulbowline’s defensive and administrative importance had been reduced as other defensive batteries and fortifications were built elsewhere in the Harbour and the Revenue authorities moved to a new Customs Watch House in Cove. However, by the end of the C18 its potential importance as a victualling base for the English Navy was being mooted by Admiral Crosby as a replacement for the base at Kinsale. A survey carried out by Navy officials in 1795 recommended that a facility should be established in Haulbowline but it was not until June 1806 that the proposals were advanced when an Order-in-Council was approved. This gave directions for the subdivision of the island between the Board of Ordnance, who retained the western part of the island, approximately 10 acres, and the Navy who were given 21 acres on the west side of the island to establish a new base and victualling yard. Lord Inchiquin’s lease was terminated and a wall was built to sub-divide the Ordnance and Navy’s parts of the island most of which survives today.

Work began almost immediately on the construction of the victualling yard which included fine new wharves on the north and east shores of the island built using limestone quarried on site. The island was extended by 4.5 acres of reclaimed land in constructing the flat wharfage area. The most prominent buildings of the base were the six great storehouses built along the new wharves three facing north (Nos. 4, 6 & 8) and three aligned north : south and facing east (Nos. 9, 10 & 11). These were accompanied by living quarters for the supply and medical officers and staff, houses for the Chief Surgeon and the Naval Storekeeper, cooper’s and other workshops, mast houses and a floating pound, stables, water storage tanks, slipways and hospital facilities. Storehouse No. 11 was later converted and extended to provide for a larger hospital.

Storage of gunpowder and armaments remained the responsibility of the Board of Ordnance who constructed a magazine on nearby Rocky Island to hold 25,000 barrels of gunpowder. At the same time the Board built the Martello Tower, barracks, workshops including a smithy, a gun-carriage yard, more living accommodation and a schoolhouse on the west part of the island.

The exact chronology of the buildings constructed to form the victualling yard is not certain but they were all completed by 1822 when it was formally named the ‘Royal Alexandra Yard’. Storehouse No 9, which is the subject of this study, was therefore built in the period between 1806-22.

Over a century later parts of the Haulbowline complex were leased to various commercial companies during the 1930’s. One of these, Irish Steel Ltd, leased 10 acres immediately to the east of the west wall of the East (or Church) Camber and hence immediately in front of the range of the three great storehouses orientated north : south. The company developed specialist steel production on the site constructing new plant and filling in the main length of the East Camber.

The venture lasted, albeit precariously, until the late 1990’s when the steelworks eventually closed leaving a derelict and heavily polluted site blighting the future use of the earlier storehouses. During 2006 clearance of the steelworks site and its reclamation for development began and at the time of writing these reclamation works are nearing completion.

It is to be hoped that the future development of the steel works site, which is the responsibility of the Department of Enterprise, Trade and Employment, will take into account the setting of the important historic buildings of the Haulbowline victualling Storehouses Nos. 9, 10 & 11, potentially reinstating at least the northern part of the
East Camber and opening up the aspect of the storehouses to the east over the late C19 dockyard area.

302 General Description

Storehouse No. 9 is the northernmost building in the row of three that ran north to south on the east side of Haulbowline Island facing out across the ‘lower harbour’ of Cork. The Storehouse is a rectilinear block approximately 46m x 10.5m on four floors: three main floors plus an attic floor and with a later lean-to along the entire west side of the ground floor.

The architectural composition of the building’s main, long east elevation is severe and monumental with thirteen regularly spaced bays, identical except for the fourth and tenth bays where the loading bays are positioned. Each of the common bays has a semi-circular headed ground floor window set in a masonry panel delineated with a projecting ‘Venetian’ style rectangular section, flat, ashlar moulding with a simple keystone and segmental masonry to the arches.

The north and south side elevations are each of three bays with the parapet extended up to form a truncated gable to the mansard roof. There is no ground floor arcade detail and at parapet level the dormer windows are replaced with two blind masonry panels and a central window with the same masonry detail and design as those below.

The long west elevation is detailed exactly the same as the main east elevation but without the ground floor arcading and arched windows. The ground floor of the elevation is obscured by a later, long lean-to running the full length of the building which has a simple pitched roof, courséed rubble external walls and no window or door openings.

The building’s internal plan is very simple with two large open store room spaces approximately 21mx10.5m, one either side of a fine central stone staircase at each floor level, and separated by a masonry cross wall. The storerooms are linked on the upper floors by a set of double doors in the cross wall and across the landing of the stair which is accessed from the central door on the east elevation at ground level. The stair is a graceful but robust cantilevered stone staircase with semi-circular winders and straight flights set at right angles to the east external wall. The staircase landing runs across the width of the staircase against the external wall and links the main access doors to the two store rooms on each floor. The staircase has a simple wrought iron handrail and the stair case treads have chamfered soffits.

The Storehouse’s internal structure is one of the most interesting aspects of the building. Each half of the building comprises of six structural bays reflecting the external elevation design with the staircase occupying the central bay. Across the width of the building each bay is divided into three with two columns subdividing the span of the cross beams. This gives rectangular structural bays of approximately 3.5m by 3.5m. The masonry cross wall provides support for the secondary floor joists between bays 6 and 7 (central bay) and between bays 7 and 8 an extra column is added where the curved wall of the staircase turns off the gridline across the building forming a truncated space behind the stair in bay 7.

The ground and first floor structure (supporting the first and second floors) consists of slightly tapered cast iron columns regularly spaced on the grid lines and dividing the cross span in three. On the second floor the structure changes slightly and the cast iron cross beams are replaced by the tie beams of the main roof trusses.

The roof structure is comprised of large, raised king post trusses sitting on braced timber posts bearing on the main truss tie beams below. This gives the Storehouse a typical mansard section, common in late C18 and early C19 buildings, with the upper slopes being of lower pitch than the steeper side slopes facing the parapets.
The Storehouse structure (and that of Nos. 4, 6, 8, 10 & 11) is, thus, a fully integrated structure with the major part of the framing being cast iron and, given the date of its construction (probably about 1807), makes it the **earliest integrated cast iron framed building in Ireland** (Rynne 2002). It should be stressed that neither the structural frame nor the design of the building were fire-proofed. The first fireproofed industrial building in Ireland was Rennie’s tobacco warehouse at Custom House Docks in Dublin built in 1820-21. This was preceded by the fireproofed structures of Dytherinton Flax Mill (Shrewsbury UK 1797) and King Stanley Mill (Gloucestershire UK 1818). Even so the date and design of the structure of the Haulbowline warehouses gives them considerable historic architectural significance in addition to their wider interest.

No other major naval dockyard building complexes were constructed in Ireland and the nearest comparison are those built at Royal William Yard in Plymouth by Rennie begun in the late 1820’s and in the late 1830-40’s at Pembroke Dock in Milford Haven, West Wales.

Being industrial storage buildings the interior of the Mill has only a few surviving original elements of interest in addition to its structural frame and fine staircase. There are two **operated rope hoist mechanisms** of which only the southern survives intact and appears to be original. The north mechanism has mostly been removed but could be reconstructed. They were used in conjunction with the surviving cast iron external cranes to haul goods up to the upper floors. There are also a number of **stone slabs** with raised curved edges at locations on the upper floors. Similar slabs at the dock buildings in Pembroke Dock were used to house slop pails but they may also have been used to provide a fireproof base for braziers.

### 303 Historic Integrity

The fluctuating fortunes of Haulbowline Island and the changing strategic and political issues facing the British Navy meant that little investment was made in the dock buildings once they had been completed and for most of their life they have been little used. This has had the very significant advantage that they have survived from their first construction between 1806-22 almost completely unchanged and unaltered from their original design. This particularly relates to Storehouse No. 9. Their condition is commented on below.

### 304 Floor Area

The gross internal floor area of the building is as follows:

<table>
<thead>
<tr>
<th>Floor Area</th>
<th>Size</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ground Floor</td>
<td>565 sqm</td>
</tr>
<tr>
<td>First Floor</td>
<td>483 sqm</td>
</tr>
<tr>
<td>Second Floor</td>
<td>483 sqm</td>
</tr>
<tr>
<td>Attic Floor</td>
<td>483 sqm</td>
</tr>
<tr>
<td><strong>TOTAL GROSS INTERNAL FLOORSPACE</strong></td>
<td><strong>2,014 sqm</strong></td>
</tr>
</tbody>
</table>

### 305 Statement of Significance

In considering the future of the Haulbowline great storehouses, and the constraints that will act on their future development, their significance needs to be clearly identified and understood so that it can be properly taken into account:

* the use and strategic significance of Haulbowline as a fortification and naval base was recognised well before the C16 century and the remains of the earliest known defensive structure on the island, the fort built in 1605 after the Spanish attempt at invasion in 1600, still survives in part
between its defensive duties Haulbowline became the home of the ‘Water Club’ now part of the Royal Cork Yacht Club which was the first in the world

the storehouses and dock buildings built between 1806-22 form the only major purpose built C19 dockyard in Ireland and, internationally, have few direct parallels other than Royal William Yard and Pembroke Dock in the United Kingdom

the architecture of the buildings is one of the earliest examples of the ‘functional’ style of architecture that gradually emerged through the C19 & C20. Unlike most other early designed industrial buildings of a similar date it retained only a reduction of classical elements such as the arched ground floor arcade and otherwise abandoned almost all of the ‘classical’ devices such as pediments commonly used at the beginning of the C19

the structure of the building is the earliest integrated metal frame building in Ireland and is, hence, one of the earliest in the world. It remains almost completely unchanged from its original design and has remained unmodernised throughout its life

the buildings of Haulbowline are the first and only home base of the Irish Naval Service since its establishment

Haulbowline Island, its buildings and structures and its great storehouses, have been recorded in many maps, paintings and drawings from the C15 onwards. The extent of these representations indicate its considerable, visual, topographic and social importance to Cork and its harbour.

The great storehouses, and Block 9 in particular, as it has been so little changed, are thus of very considerable architectural and historic significance. There should, therefore, be a presumption for their preservation and any new use identified should be introduced with a minimum of change to its historic fabric. Where change is necessary it should be, where possible, reversible. Where repairs are undertaken these should be in materials, detail, techniques and construction to match the original.

306 Current Condition

Storehouse No. 9 was originally constructed to a very high standard with simple robust materials, substantial structural redundancy in its fabric and frame and uncomplicated constructional details. It appears to be currently in very poor condition but this relates to a prolonged lack of maintenance, exacerbated by occasional targeted vandalism, rather than through any inherent defects in its original construction.

Despite its poor appearance and condition the building’s fabric is capable of comprehensive repair and conservation and its characteristics will allow its ready adaptation to a wide range of potential new uses with especially attractive, interesting and historic spaces that are generous, flexible, well lit, environmentally stable, and have a very fine prospect across Cork
Harbour. The condition of the storehouse and the works necessary to bring its fabric back into good repair are set out in Appendix C.

307 Re-Using Block 9

The design and construction of Block 9 has given it a range of advantages in allowing it to be adapted to new uses. These can be summarised as follows:

* large open plan spaces with a reasonably generous regular column grid
* a relatively shallow plan allowing good distribution of daylighting to the central areas of the building
* good levels of fenestration and a north to south orientation allowing good natural daylighting levels, well distributed and with a minimum of solar gain
* regularly spaced, frequent opening windows along both long elevations allowing excellent natural cross ventilation
* stable environmental conditions
* good floor to ceiling heights with a minimum of 2.65m
* robust external fabric construction
* floor construction designed for high levels of static loading
* internal spaces with considerable character and visual interest and an impressive external appearance
* a good aspect and views over Cork Harbour (subject to the nature and form of the proposed development on the Irish Steel site).

308 Use Options

The characteristics outlined in 307 mean that Block 9 is capable of being repaired and converted to a range of new uses each with a varying degree of compatibility with the original building fabric. The primary potential uses include:

**Office/Commercial**

The open plan spaces of the building, good floor to ceiling heights, its good daylighting and stable environment make the building ideally suitable for office conversion: particularly open plan office space. The creative design of a new office use avoiding suspended ceilings and air-conditioning could fit very comfortably within the historic fabric of the building. Interestingly the Coastal and Maritime Resources Centre have successfully adapted the ground floor of Block 4 as their offices which proves the point.

The major changes necessary would include the provision of new staircases and a lift. This would necessitate the removal of some sections of floor, the comprehensive re-servicing to a high standard, which would require provision of horizontal and vertical services distribution routes involving creation of a floor, or ceiling void, and vertical ducts, and the fire-proofing of floors which would all require alterations to the buildings fabric. However, almost any new use would require the same, or a greater extent, of fabric alteration.
Residential

The same characteristics would make the building eminently suitable for residential conversion and similar changes to its built fabric would be required.

However, residential use would necessitate more cellular division of the main store spaces resulting in the loss of their visual appearance and extent. More vertical duct provision would be necessary and more stringent construction regulations particularly on fire escape and fire-proofing would necessitate a greater extent of fabric alteration.

Hotel

The factors relating to hotel use are similar to those for general residential use but the use would require even greater levels of sub-division of the original spaces and higher levels of servicing.

Industrial Space/Workshops

Although Block 9 was built for a semi-industrial use current standards for industrial workspace would require major changes to the buildings fabric in addition to the provision of stairs, lifts and vertical circulation. The costs associated with conversion to industrial/workspace use would be very similar to those for office use in the context of the building but rental values would be significantly lower making industrial use less likely to be economically viable.

Storage Units

The building could be re-used for storage purposes and there is considerable demand for self-store units. This use would avoid the need to install additional staircases although it would still require the installation of a lift suitable for goods. The spaces would probably need to be sub-divided for any self-storage use but the sub-divisions could be lightweight and easily removable. The servicing of self-storage space would be minimal and have little impact of the building fabric.

Although not a very inspiring use for such an important historic building this would probably be a viable solution to the building’s future and one that could be achieved with a low budget.

Museum and Visitor Use

The use of Block 9 as a museum could be ideal and the buildings characteristics could be used to create excellent display spaces and supporting facilities. The alterations necessary would be similar to those required for office use and the public use of the building would require the installation of additional staircases and a lift.

The main display and exhibition spaces would allow the store rooms to be kept open and not extensively sub-divided and the historic character of the building would be an asset to any museum use.

Floor loadings are unlikely to be a problem for most of the display areas and would probably only need upgrading for archival and document storage spaces or library facilities.

Higher levels of environmental control would be necessary than for office use but the detailing of the windows and the timber linings to their internal jambs would allow the easy and sensitive fitting of secondary glazing to help control both UV penetration and thermal and environmental control and also help with increased security. Some air-conditioning may be necessary where objects of particular sensitivity are displayed but careful location of these areas where the impact of servicing can be minimised will mitigate the extent of any necessary fabric alterations.

The size of exhibits would, of necessity, be limited to the size of the external openings and the floor to ceiling heights will be a constraint on the overall dimensions of any individual exhibit.
A Preferred Museum Use

The focus of this study is to identify the potential for the creation of a new maritime museum for the Irish Naval Service and other maritime traditions (merchant navy, fishing craft etc) and to appraise the suitability of Block 9 for such a use. In the sections above (explained in more detail in Appendix C) we have highlighted some of the main problems that will have to be resolved for a range of new uses and indicate that a museum use is likely to have a considerable advantage over most other uses with the possible exception of an office use. The key technical issues that would need to be resolved and taken into account for a new museum use are described below.

Fire Escape

In public use the existing staircase of Block 9 will not be sufficient to provide adequate escape compliant with the current regulations. In particular escape distances to the existing staircase are well in excess of the 18m maximum allowed for a single direction of escape. In addition, any public building with occupancy of more than 50 at any one time has to provide at least two escape routes.

As a consequence a new museum use will require the building to have two new staircases positioned so that the maximum distance to them from any part of the building in one direction is less than 18m. Wherever these staircases are located sections of original floor will have to be removed and, unless the stairs can be located so as to use the existing external door openings, the alteration of some windows to provide new doors may be necessary. Given the presumption that the building should be brought into a viable and sensitive new use this level of alteration should be acceptable. Two options are illustrated on the plans overleaf.

Fire Protection

The building has no fire protection between floors and any new use will require the upgrading of the fire performance of the floors to provide a minimum of one hour fire resistance. This can be achieved by either providing a new soffit below the secondary floor joists or providing a raised floor construction above the existing floors. Of these approaches the latter is the least visually intrusive but alters the floor levels relative to existing window and door sills and the staircase.

Given the fact that any new use is very likely to require the provision of voids or ducts for the horizontal distribution of services this may be an inevitable consequence of re-use and the issue will be how to mitigate its impact. If a ceiling soffit is the preferred solution then this should be designed so as to leave the columns and principal cross beams visible.

New Services Installations

The building has no services at present and any new use will require extensive re-servicing the main impact of which will be the need to provide horizontal and vertical distribution routes and visible heat emitters and light fittings.

Museum use will require high levels of environmental control and stability. Whilst contained local environmental conditions can be provided for very sensitive objects the main exhibition areas and public spaces will still require a high level of control. This is likely to involve the installation of secondary glazing to windows, UV light filters, window blinds, security provision, and the use of techniques such as underfloor heating which provide flexible efficient well-distributed heat without local temperature high spots.

Museum use, however, requires much lower levels of wet servicing and more concentrated sanitary provision than other uses such as residential and so the disadvantage of increased environmental servicing is offset by lower servicing requirements elsewhere.
313 Vertical Voids And New External Openings

Museum use may require the housing of larger objects which do not fit into the existing spaces and floor to ceiling heights and may require enlarged external openings to install them.

In particular housing small boats with their masts would require much higher floor to ceiling heights than the building has at present and may need the removal of sections of floor to create adequate voids. If floor sections are to be removed this may be controversial as large sections of floor will also have to be removed to allow the construction of the main stairs and lift. Removal of limited additional sections of floor may be acceptable but any areas should be located in the central third of the building plan and the structural integrity of the retained structure will need careful engineering. This has been achieved successfully in similar buildings in Chatham and Portsmouth.

As far as possible the removal of additional sections of flooring over and above that required for the lift and stairs should be avoided or at least minimised. Creation of large internal atrium spaces is unlikely to be acceptable due the extent to which the building’s historic fabric would have to be altered.

Large new external openings suitable to bring large objects into the building will also be undesirable and will not be acceptable in the main east elevation. If new openings are unavoidable they should, by preference, be located in the rear or west wall. The largest existing opening is 3m x 1.8m.

314 Structural Floor Loadings

The existing floors were designed for high loadings and they should, therefore, be adequate for most levels of museum loading. However, the structural performance of the floors in fire conditions is likely to be poor without some fire-protection (as described above) and fire insulation will be necessary although this could be incorporated in a ceiling soffit or raised floor which will also serve other purposes.

Some areas of floor may need local strengthening such as the archive and library areas where very high dead loadings may be necessary. Strengthening in these areas can be achieved within any ceiling or floor voids that have to be created for other purposes such as services distribution and fire protection.

315 Insulation And Thermal Performance

Fabric insulation to improve environmental performance will be limited if the character of the building is to be maintained. For example, the internal face of the external walls is exposed unplastered masonry. However, the problem can be mitigated by the provision of high levels of insulation to the roof and the use of secondary glazing to the windows.

316 Setting, Access And Parking

Block 9 overlooks, and faces onto, the Irish ISPAT site. Because the Naval Service does not want any unescorted access through the Naval Base there can be no public access to the rear (except for servicing or by prior agreement). Some form of boundary fence with gates will need to be erected to the north of Block 9 to the quayside. For Block 9 to function as a museum, however, there will be a need for access, parking and service deliveries. We have assumed, therefore, that the building becomes, to all intents and purposes, part of the ISPAT redevelopment.

Vehicular and pedestrian access will need to come through the site. The overall development should respect the historic and architectural significance of the three historic storehouses and, as we have previously hinted, recreating the East Camber would provide not only an attractive
aesthetic setting for the buildings but also allow a coastal vessel and other vessels, including ferries and harbour tour boats, to moor up.

The network of pedestrian walkways through the development will need to service the storehouses whilst staff and visitor car and coach parking, drop-off facilities and deliveries need to be integrated into the development.

It would not be unreasonable, by arrangement, for museum deliveries of collections etc. to be made through the Naval Base to the rear of the building.

These principles need to be communicated to the team in the Department of Enterprise, Trade and Development who are working up proposals for the site.

317  Potential Capital Costs

Whatever the future of Block 9 its repair and conservation will have a significant cost that can be justified by the historic and architectural importance of the building. The alteration costs for any new use, when added to the repair costs, will inevitably be higher than equivalent new build costs for most of the uses outlined above but such increased costs are, again, justified by the historic value of the building. For some uses the building’s unique character will add to its sales value, or its appeal to users, thereby offsetting the effect of higher capital costs through better revenue generation. We discuss the potential capital cost in Section 10.

318  Summary And Conclusions

Block 9 is a unique and almost entirely original early C19 naval industrial building of considerable national and international historic and architectural value. Its preservation and re-use should be a priority.

The building is in poor condition but no major collapse, or structural failure, has occurred and its deterioration relates to a failure in long term maintenance rather than from any inherent defect in its construction. It is constructed of robust materials with long life spans, and once repaired, with adequate maintenance it will perform considerably better than most forms of modern construction. A programme of emergency repairs and clearance works should be put in hand as soon as possible to mitigate further decay whilst the building’s future is resolved.

The building is suitable for a wide range of new uses and for museum use in particular. It has good and stable internal environmental conditions which can be enhanced by new service installations. The extent and nature of the alterations required to achieve the preferred new use should be acceptable in the context of the building’s importance and if sensitively designed and specified.

The redevelopment of the adjacent Irish ISPAT site should take account of the great storehouses and especially those facing across the original East Camber to the dockyard. If possible the East Camber should be reinstated, possibly to provide for floating exhibits to any maritime museum and the aspect from, and views of, the three Storehouses (Nos. 9, 10 and 11) should be protected and enhanced by any new development.

Conservation and re-use of the No.9 Storehouse to provide a new national maritime or naval museum would be a very fitting use for the building and would be entirely commensurate with its historic importance.
4. ASSESSMENT OF THE EXISTING COLLECTION AND THE POTENTIAL

401 Existing Collection

As we have discussed in 202 the current collection comprises weapons, ships models, uniforms, oral history transcripts, compasses, technical equipment, communication equipment and flags as well as photographs, documents, training manuals, films and memorabilia from the first 60 years of the Irish Navy's activities. In addition, there is the extensive memory bank of the Veterans, which needs to be recorded.

At present the existing collection is unstructured and unmanaged (similar to many private collections across Ireland). Further, the buildings in which the collection is stored (particularly the Martello Tower) are damp and not conducive in their current condition for storing museum collections. The first task is to professionally catalogue each item and understand its significance. Only then can we consider how it can be used.

402 But What Is The Potential?

The potential needs to be put into context. We need to determine the key themes of a maritime or naval museum. Is there a sufficient story to concentrate solely on the naval heritage past and present? Should it be widened to cover other maritime subjects including defence, trade and commerce, emigration, recreation and the marine environment? The Policy Paper on 'Conserving Ireland’s Maritime Heritage' (Heritage Council April 2006) suggests this would be appropriate.

Having determined the themes of any proposed museum it is then possible to write a clear Collections Policy. This will identify the range of artefacts and elements required and provide a structured approach to collecting. What is clear is that there are extensive collections and other resources available including:

* the wide ranging maritime collections located across Ireland (including the National Museum store in Daingean Co. Offaly) which have potential to be utilised on formal loan agreements

* the extensive resources of the Maritime College (including computer simulation programmes)

* the knowledge, expertise and resources of the Coastal and Maritime Resources Centre

* the extensive collection of paintings, engravings and maps as well as documentary material, archives and artefacts which are owned by the Port of Cork Company, Crawford Art Gallery, Cobh Museum, Kinsale Museum and by private collectors which draw together the historical strands to tell the story of the harbour from the 17th century to the present day. They say a ‘picture tells a thousands words’ and these images illustrate the sheer majesty of the ships of the day, the extensive development of Spike Island and Haulbowline and the scenic beauty of the harbour. They are an outstanding resource which can be utilised, with appropriate safeguards, and acknowledgement in any museum

* the potential to include a coastal vessel (retired from service) which could be moored alongside Block 9 and be used as a training ship for the Naval Reserve who could act as guides and demonstrators for visitors

* providing a safe haven, and essential conservation, for vessels ‘at risk’ across Ireland

* the knowledge and expertise of the Naval Veterans who could be interpreters and guides for visitors in the museum
local historians and researchers who have enormous knowledge and expertise to contribute. This includes people like Michael Martin, who operates Titanic Tours, Tom O’Neill who worked for some years on Spike Island, Profession Dermot Keogh together with the museum, library and archive staff and other professional officers in the local authorities who have built up a body of knowledge and expertise on all aspects of Cork Harbour and its remarkable story.

403 Conclusion

What is clear is that although the current collections are fragmented and limited if a professionally planned, developed and managed maritime museum was to be established with a clear Collections Policy and Museum Development Plan then there are extensive collections available across Ireland which could be used to develop a multi-faceted maritime museum.

The Naval Collection in the Martello Tower
5. TOURISM CONTEXT AND MARKET POTENTIAL

501 Introduction

Tourism can be defined as ‘the activities of persons travelling to, and staying in, places outside their usual environment for leisure, business and other purposes.’ This includes holidays, visiting friends and relations, education tourism (not full time education) and business tourism. Day visitors travel outside their immediate environment for a variety of purposes but do not stay overnight. The vast majority of visits are made by day visitors (over 90%).

Tourism in Ireland has seen constant growth over the past 30 years. Between 1999-2003 the number of tourists arriving in Ireland grew by almost 5% to 6.4m. They mainly comprise British, North American and European tourists. At the same time domestic overnight trips reached 6.66m in 2003. An economic study indicated that tourism contributed 5.4% to the national GDP, generated some €4 billion in foreign exchange earnings and employed over 137,000 people.

Failte Ireland is the National Tourism Development Authority which was established in 2003 to provide strategic and practical support to develop and sustain Ireland as a high quality and competitive destination. Its mission is broadly:

‘to increase the contribution of tourism to the economy by facilitating the development of a competitive and profitable tourism industry’

A National Development Plan is to be published in Spring 2007 which will set out the key priorities for tourism development over the next few years.

Tourism Ireland was established in 2000 to market the island of Ireland overseas as a tourism destination. It has three roles:

* undertake destination marketing programmes to stimulate demand to visit Ireland
* to formulate and support business linkages between the tourist industry and the travel trade in target markets
* to be the voice for overseas tourists and their travel trade in Ireland.

The overall objective is to increase visitor numbers and revenue to Ireland and support Northern Ireland in realising its tourism potential. Despite problems after threats of international terrorism and the war in Iraq it has helped increase visitor numbers to 7.2% by 2003.

The emphasis will continue to be on targeting Great Britain, North America (USA and Canada), France and Germany which represented 84% of total overseas visitors in 2003. In addition they will seek to develop segments within these markets including golf, sailing, countryside and city tourism and to increase the regional distribution of visitors across Ireland.

502 Tourism Performance

The Dublin region holds the greatest appeal for tourists with half of all overseas visitors spending at least one night in the region in 2005. This appeal is strongest amongst holidaymakers with 60% staying overnight in Dublin in 2005. The South West, including Cork and Kerry, is the second most appealing destination amongst holidaymakers with 1 in 5 of all visitors and a third of all holidaymakers as indicated below.
Areas Visited | Overseas Visitors ('000s) | Share % | Holidaymakers ('000s) | Share %
---|---|---|---|---
Dublin | 3,937 | 49% | 2,132 | 62%
Northern Ireland | 1,700 | 21% | 1,172 | 8%
South West (Cork/Kerry) | 1,717 | 21% | 857 | 34%
West | 1,235 | 15% | 671 | 25%
Shannon | 1,002 | 12% | 578 | 19%
South East | 943 | 12% | 356 | 17%
Midlands East | 843 | 10% | 287 | 10%
North West | 489 | 6% | 264 | 8%

Source: Tourism Ireland Facts and Figures 2005

The number of tourist visits to the south west is summarised below:

<table>
<thead>
<tr>
<th>From ('000s)</th>
<th>2001</th>
<th>2002</th>
<th>2003</th>
<th>2004</th>
<th>2005</th>
</tr>
</thead>
<tbody>
<tr>
<td>Britain</td>
<td>645</td>
<td>728</td>
<td>638</td>
<td>647</td>
<td>669</td>
</tr>
<tr>
<td>Mainland Europe</td>
<td>412</td>
<td>447</td>
<td>399</td>
<td>425</td>
<td>523</td>
</tr>
<tr>
<td>North America</td>
<td>396</td>
<td>357</td>
<td>382</td>
<td>401</td>
<td>421</td>
</tr>
<tr>
<td>Other</td>
<td>85</td>
<td>67</td>
<td>87</td>
<td>105</td>
<td>104</td>
</tr>
<tr>
<td>Total Overseas Tourists</td>
<td>1,538</td>
<td>1,599</td>
<td>1,516</td>
<td>1,578</td>
<td>1,717</td>
</tr>
<tr>
<td>Domestic Tourism</td>
<td>1,234</td>
<td>1,315</td>
<td>1,287</td>
<td>1,428</td>
<td>1,525</td>
</tr>
<tr>
<td>Northern Ireland</td>
<td>35</td>
<td>46</td>
<td>47</td>
<td>51</td>
<td>46</td>
</tr>
<tr>
<td>Total Tourists</td>
<td>2,807</td>
<td>2,960</td>
<td>2,850</td>
<td>3,057</td>
<td>3,288</td>
</tr>
</tbody>
</table>

Source: Failte Ireland South West 2005

This excludes day visits which, in relation to Greater Cork, is over 85% of all visitors but will be much less the further one travels west.

Despite the Cork/Kerry Region being one of the three most important tourism destinations in Ireland only 10% of staying visitors to the South West spend time in Cork and its environs. There is a view that Cork needs a significant attraction coupled with focused marketing to raise its image and profile.

503 Volume And Value Of Tourism

The Cork Metropolitan area has a population of around 250,000 and Cork City 123,000 (Source. Census 2001). Tourism data is somewhat dated but is adequate for the purpose of this Scoping Study. We know that in 2003 some 3m people visited Metropolitan Cork. This is broken down as follows:

<table>
<thead>
<tr>
<th>Category</th>
<th>Cork City ('000)</th>
<th>Metropolitan Cork ('000)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overseas tourists</td>
<td>210</td>
<td>78</td>
</tr>
<tr>
<td>Domestic tourists</td>
<td>91</td>
<td>53</td>
</tr>
<tr>
<td>Day visitors</td>
<td>1,767</td>
<td>807</td>
</tr>
<tr>
<td>TOTAL</td>
<td>2,068</td>
<td>938</td>
</tr>
</tbody>
</table>

Source: An Economic Assessment of the contribution of tourism to Cork City and its Hinterland (Moloney and O’Sullivan 2004)
This generates some €400m into the local economy which supports almost 3,000 jobs.

The majority of visitors come for holidays (70%) whilst 14% visit friends and relations, 11% come for business/conferences and 5% come to study.

We know that there were around 1.1m visits to cultural sites and attractions in 2003 two thirds of whom came from outside the area. The key attractions and their attendances are summarised below:

<table>
<thead>
<tr>
<th>Attraction</th>
<th>Attendance</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>Blarney Castle</td>
<td>297,000</td>
<td>Metropolitan Cork</td>
</tr>
<tr>
<td>Fota Island and House</td>
<td>290,000</td>
<td>Metropolitan Cork</td>
</tr>
<tr>
<td>Crawford Gallery</td>
<td>200,000</td>
<td>City</td>
</tr>
<tr>
<td>Cobh Heritage Centre</td>
<td>109,000</td>
<td>Metropolitan Cork</td>
</tr>
<tr>
<td>Midleton Distillery</td>
<td>100,000</td>
<td>Metropolitan Cork</td>
</tr>
<tr>
<td>Cork City Prison</td>
<td>50,000</td>
<td>City</td>
</tr>
<tr>
<td>Vision Centre</td>
<td>40,000</td>
<td>City</td>
</tr>
<tr>
<td>Fitzgerald’s Park Museum</td>
<td>26,000</td>
<td>City</td>
</tr>
<tr>
<td>Bessborough (Cork Heritage Centre)</td>
<td>8,000</td>
<td>City</td>
</tr>
<tr>
<td>Butter market</td>
<td>4,500</td>
<td>City</td>
</tr>
</tbody>
</table>

Source: An Economic Assessment of the contribution of tourism to Cork City and its Hinterland (Moloney and O’Sullivan 2004)

Festivals, such as Cork Week, the Cobh Maritime Festival and the Ocean to City Race, are an important part of the Cork tourism product attracting over 100,000 attendees for the 8 festivals held in 2002: 30% of visitors came from outside the area.

The other key market is the growing cruise liner business. In 2003 there were 31 liners using the purpose built Cobh Cruise Liner Terminal with 22,973 passengers and 11,520 crew and it is estimated that as many as 65 came during 2006. A significant proportion of the passengers travel out of the area by coach to the Dingle etc but many visit Cork or stay locally.

503 What Does This Tell Us?

We know that visits to heritage sites and attractions are an integral part of the tourist itinerary. We also know that Cobh Heritage Centre already attracts over 100,000 visits per annum and Fota Island just to the north of Great Island three times that number. Cobh attracts a significant number of cruise liners which generates upwards of 50,000 passengers and crew. Cobh is increasingly an attraction in its own right with its stunning position overlooking the harbour, attractive resort townscape, wonderful cathedral and maritime heritage.

The potential of the Maritime Museum is in this wider context as part of Cork Harbour’s maritime heritage. When linked with Cobh, Spike Island and the two outer fortifications with a ferry service it becomes an outstanding tourism product. It is always difficult to project visitor numbers, particularly at an early stage, but a high quality museum effectively promoted and marketed as part of Cork Harbour’s maritime heritage could attract anything between 50-100,000 visitors when fully operational. This is comparable with Turlough Park in Castlebar and not unreasonable in the context of Cobh Heritage Centre or the visitor numbers to attractions in the city.

We now move on to consider the case for this museum.
6. IS THERE A CASE TO CREATE A MARITIME MUSEUM?

601 Introduction

In this section we look at the potential to create a museum, the size and type of museum that should be considered, the subject matter and whether there are any other options.

602 A Maritime Museum Is Urgently Required

All the evidence suggests that there is enormous potential to develop a maritime museum in Cork Harbour:

* Cork Harbour is one of the largest and most spectacular deep water harbours in Western Europe

* it contains a range of defence fortifications developed over 400 years including the only purpose-built 19th century dockyard in Ireland and is the home of the Irish Naval Service

* it contains a rich cultural heritage including the first yacht club in the world which still operates today in Crosshaven, the premier emigration port in Ireland during the 19th and 20th centuries, an historic prison and the last stopping point of the Titanic

* it has outstanding natural heritage and scenic beauty

* the County Council and the Coastal and Maritime Resources Centre have come together to establish the Cork Harbour Forum and are facilitating the production of an Integrated Coastal Zone Management Plan by involving all relevant stakeholders in which the maritime and cultural heritage has a major part of play

* the key agencies recognise that Cork needs an iconic attraction and an integrated approach to tourism development and management of Cork Harbour could offer this

* Micheál Martin, Minister of Enterprise, Trade and Employment, has identified in a press statement (Friday 28 July 2006) that a maritime museum could be a key element of the redevelopment of the Irish Steel site

* there is real value in developing a museum ‘in partnership’ with the Coast and Maritime Resources Centre and the National Maritime College of Ireland which are located in the vicinity

* Storehouse No.9 is one of the earliest, and most complete, integrated cast iron framed buildings in Ireland but is a listed building ‘at risk’ and would be ideally suited to tell the story of Ireland’s maritime heritage.

Despite being an island nation dependent on the sea for food, transport and commerce there is no major national cultural facility focused on Ireland’s rich coastline and coastal waters. Nor is there a museum dedicated to the naval history and maritime traditions past and present. As the policy paper on Conserving Ireland’s Maritime Heritage says…. ‘Ireland’s maritime heritage is of inestimable value to the nation’ but it seems to go largely unrecognised and appreciated. It argues for the concept of ‘heritage sustainability’ to be accepted and proposes measures for the recording, conservation and presentation of the most important elements of our maritime heritage. This includes crafts and traditions, boats, skills and people’s memories.

The Audit of Maritime Collections (Darina Tully 2006) argues for the need to establish a modern professionally run national maritime museum and a series of regional maritime museums around the country to reflect geographical variations. It goes further and recommends the establishment of safe storage facilities for historic craft ‘at risk’.
From our research, visits and consultations it is clear that there is an outstanding diverse and rich maritime heritage held in a myriad of ownerships but primarily in private collections largely unrecorded, uncatalogued and unconserved. There is a need to change this situation and establish a high quality, professionally managed and operated new facility with supporting infrastructure which becomes the focus for the presentation, care and conservation of the most important elements of the nation’s maritime collection.

Whilst there are many collections around the country all, except the National Museum and ten County Museums, operate on a shoestring primarily reliant on volunteers with minimal footfall and resources sufficient only to ‘tick over’. Few have the experience, knowledge, expertise or resources to buy in the help needed to access funding in order to develop and grow.

Whilst Greencastle and Dun Laoghaire have aspirations for further development and museum accreditation it will be some time (and a lot of hard work) before they can achieve more than ‘regional’ status. Indeed, it could be argued that, with help, they could fulfil the concept of regional museums in their own particular area. Finally, it is clear that a maritime museum is not a priority for the National Museum in the foreseeable future in any other location.

At Haulbowline we have the opportunity to create a major museum in an outstanding historic maritime structure (one of the earliest and most important of its kind in Ireland). We have 2000 sqm. of space in an historic maritime environment which is about to be regenerated. Further, at this point in time it is the only ‘option’ for a significant maritime museum ‘on the table’. There seems no doubt that the concept of establishing a maritime, or naval, museum on Haulbowline is entirely valid and worth pursuing.

603 So What Is It?

In essence it should be a National Maritime Museum of international standard whilst also providing a regional facility in that it presents the unique culture and tradition of Cork Harbour and the south west coast. It should be fully accessible and bilingual and include:

* boat displays
* an Explore and Discover Gallery
* traditional, yet modern and interactive, museum galleries
* temporary exhibitions area (with regularly changing exhibitions)
* visible and accessible store
* multi-purpose education, meeting and conference suite
* library, archive and resource centre
* retail and catering.

Our initial thinking suggests that the ground floor should include:

* entrance, foyer, information and orientation and retail area
* cafeteria
* temporary exhibition area
* boat gallery
* accessible museum store in the lean-to at the rear of the building
The first floor should contain an Explore and Discovery Gallery with a wide range of interactive hands-on activities investigating a series of concepts such as seamanship, navigation, engineering, survival, weather, eco-systems, storytelling and the like. This would be supported by enablers who will interact with visitors.

The second floor would contain objects and artefacts in a series of attractive object-based displays which look at the diverse range of interpretive subjects identified below.

The third floor would be the focus for education including 2/3 meeting rooms each capable of servicing a class or group of 30 (or partitioned to create a conference space of up to 100) coupled with toilets, a library/archive/resource room, essential staff and administration accommodation and a space for volunteers.

It should also provide external displays including vessels moored up on the quayside (including a modern coastal patrol vessel) and a boat collection representing different aspects of traditional coastal trades and crafts. The opportunity to store and conserve vessels at risk is also important.

604 What Themes Should It Cover?

Our research suggests that whilst the naval heritage story spans 400 years and has an important modern naval dimension which covers many key issues of today (in particular climate change and sustaining fishing stocks) there is an opportunity to present a much wider story of the maritime heritage of a nation encompassing:

* the physical heritage
* the environmental, and natural, heritage
* the cultural heritage.

In so doing it should cover a myriad of subjects including:

Cultural

* marine archaeology
* defence heritage
* Spike Island : defence and prison
* Christian heritage
* emigration
* fishing – inshore and modern day – crafts and tradition
* the birth and development of sailing
* the modern Irish Navy
* trade
* tourism and recreation
* lighthouses
* navigation
* Titanic and Lusitania
* shipwrecks
* traditional boat building techniques (including links with local boat builders like Meithal Mara)
* island communities
* inland waterways
* shipping and ports
Potential Layout of the Museum
Environmental and Physical

* marine eco-systems
* foreshore and tidal margin eco-systems
* sea level and climate change
* fisheries
* Marine birds and mammals

* geology and scenery
* seascapes
* Cork Harbour
* water and air quality

Some of the themes will inevitably overlap: Titanic and Lusitania also relate to emigration and marine archaeology whilst defence heritage and the modern Irish Navy come together. Furthermore, the story can be anchored in the physical geography of Cork Harbour.

What this indicates is that there is a huge diversity of subjects related to our maritime heritage: probably too many to be accommodated in 2000sqm. The whole issue of the subject matter of the museum needs to be addressed in a detailed Feasibility Study which will enable a Collections Policy to be devised.

605 The Wider Visitor Experience Adds Value

High quality museums are much more than displays and collections. They offer different activities throughout the day and week and over the weekend which could include:

* workshops and taster sessions
* ‘meet the expert’ sessions eg. developing links with a traditional boat builders like Meithal Mara in Elizabeth Quay, Cork
* handling sessions
* role play and dressing-up sessions
* guided tours of the museum
* guided tours of the Naval Base
* boat trips around the Harbour
* becoming a ‘gateway’ to Spike Island offering guides/interpreters and an audio tour
* visit to a coastal vessel and other boats stored in the East Camber
* visit to a boathouse to see the historic boat collection.

A detailed Feasibility Study will develop a Vision and Development Strategy for the museum which will put flesh on the bones of all these opportunities. The fact that there are already tours of the Naval Base on an on-going basis, the Naval Veterans are keen to become involved in the development of the museum and we have received enormous support from the Maritime College, Coastal and Marine Resources Centre and local schools suggests that things are already ‘on the way’.

606 The Need For Professional Staff

For this new facility to set a standard and meet the requirements of the Museum Standards Programme For Ireland (2004) (as has been achieved by the Hunt Museum, the National
Gallery of Ireland and the Chester Beatty Library) it is important that the museum is properly funded from the beginning with an appropriate number of curatorial and interpretive staff, administration and a manager. We have discussed the educational potential of the project in Chapter 7 and envisage the appointment of at least one Education Officer together with paid sessional educational assistants. We feel that custodians should be interpretive ‘enablers’ and interact with visitors rather than be ‘security orientated’ and should play an important role in creating a high quality visitor experience.

607 The Role Of Volunteers

Experience suggests that volunteers are increasingly used and valued in museums. We have already talked about the role of the Naval Veterans but other members of the community are likely to be prepared to support the project in a variety of ways from administration to cataloguing, oral history and role play. This can greatly enhance the quality of the museum at the end of the day and reach out to, and positively involve, the local community.

608 Reaching New Audiences

It will be important that the museum seeks to attract traditional non-users of museums and cultural sites. The concept of ‘audience development’ should be embedded in the philosophy of the facility. This should include outreach programmes taking ‘the museum into communities’ and working with people who would not usually visit facilities like this.

609 Making A Start

Our analysis suggests that there is a real case to develop a major museum facility. This takes time and money and, with the ‘best will in the world’, it is likely to be several years before such a facility could open. This can be dispiriting for local people and volunteers. We believe there are real opportunities to make a start in the short term. This could include:

* establishing, with the Naval Veterans, a naval heritage centre in one of the buildings on Haulbowline and developing a programme of oral history recordings
* developing and extending the tours currently promoted
* commissioning the production of education materials and marketing the education visits (employing a part-time Education Officer to manage the programme). This could be a pilot project focused on the summer term 2007 and linked to local tour providers
* establishing a weekly programme of Sunday tours around the Naval Base through the summer months
* negotiating with local ferry companies to establish boat tours around Cork Harbour in the summer
* producing an attractive promotional leaflet on tours of the Naval Base
* producing an attractive publication on the history of Haulbowline to accompany the tours
* developing close links in the short term with CRMC who are already involved in aspects of maritime heritage in Cork Harbour and have skills and resources which could be used. For instance, the deployment of a sediment camera in the Harbour could be a valuable educational tool. Similarly building links with the Maritime College and the Centre of Marine Archaeology in Coleraine could also bring benefits.
It should be an aim that Haulbowline becomes a centre of excellence for maritime activities.

610 Conclusion

In this section we have proposed the establishment of a Maritime Museum. We now move on to consider the educational potential.
SECOND FLOOR

SECOND FLOOR TRADITIONAL DISPLAYS GALLERY 1

SECOND FLOOR TRADITIONAL DISPLAYS GALLERY 2
7. THE EDUCATIONAL AND INTERPRETIVE POTENTIAL

701 Introduction

'Ireland’s marine and coastal environments, their natural attributes and resources have contributed immensely to Ireland’s cultural development through the ages. The legacies of vibrant coastal communities abound in towns and villages around our shores.'

Policy Paper on Conserving Ireland’s Maritime Heritage- The Heritage Council

There is a need for the public and young people to be better informed of the importance of the sea in the context of recreation, employment, food supply and the economy in general. Many issues concerning the sustainable use and development of maritime resources are being debated today. These include climate change, declining fish stocks and pollution and these issues involve everyone at a personal, community and national level. The adage of ‘Think Global and Act Local’ has never been more relevant than today. Greater understanding through education, both formal and informal, will help to increase support for measures to protect the marine environment.

The Heritage Council believe that the principle of heritage sustainability should apply to the protection of Ireland’s marine and maritime heritage including its fisheries, wildlife habitats, flora and fauna, seascapes, wrecks, coastal monuments and other features of archaeological interest. See appendix 1

Awareness of the maritime environment and heritage should be instilled in all young people through the education system. An appreciation of the importance of the sea and Ireland’s maritime heritage would lead to greater understanding and appreciation of the vital role the sea plays in our lives.

The education provision at a National Maritime Museum at Haulbowline should be central to promoting and delivering education programmes, events and activities at a national level. Providing a resource that draws together all the elements in Ireland’s maritime heritage that is accessible and engaging to all learners, both formal and informal, should be a key element in the development of the museum education programme.

702 A Policy Framework For Education, Community, Outreach (ECO)

Based on this document we have devised a learning strategy that considers the museum both as a learning and social space which is primarily concerned with facilitating participation and engagement with a wide range of audiences. The learning on offer will range from playful exploration to academic scholarship and supports lifelong learning which has diverse learning styles to meet a range of learning needs. Programmes that engage the public in oral history projects, or through research by volunteers or local history societies, will enrich the museum and its collections. These activities can be offered on-site and through outreach off-site and by secondary resources such as the internet.

The museum education programme will continually develop and evaluate its programmes and seek effective partnerships with other relevant organisations. Staff professional development and training will be a key element in developing a quality service that can operate efficiently at maximum capacity. The education staff will be multi-functional and embrace the roles of interpreter, curator, teacher, facilitator and researcher to provide an effective service which will encourage engagement and participation.

Education today has a wider context than previously thought and is concerned with not only education but social equality, cultural diversity and lifelong learning within a learning society. Cultural institutions such as the proposed Maritime Museum are important providers of learning along side formal learning institutions and they have a responsibility to share their resources with like minded partners and develop an organisational culture and practice that provides learning and outreach as a central focus for all its activities.
The ECO framework is characterised by a triangular relationship constructed around:

* the cultural resource
* the service action
* the public.

The Education Service will embrace the aims and objectives of the ECO framework through its collections and resources, its ‘hands on’ Discovery Centre, outreach and community projects, archives and research facilities and its access to all learners, formal and informal, academic and playful.

703 Haulbowline And The Wider Context

The location of the Museum at Haulbowline has many advantages for developing a quality education service. Cork Harbour and its islands have been a key element in Ireland’s maritime history from the earliest times. It has been an important factor in the country’s economic growth. The Naval Service is based at Haulbowline along with the Coastal and Marine Resources Centre. Nearby is the National Maritime College of Ireland and the historic port of Cobh.

The history of the harbour contains many elements in Ireland’s history from the arrival of the Norsemen, the Norman invaders to the development of a strategic mercantile and naval port and point of embarkation for 2.5 million Irish emigrants in the nineteenth century. The Titanic and Lusitania are further tragic stories in the history of the harbour. Cobh Heritage Centre local museums and guided heritage walks are already contributing to the maritime story and the museum would act as a focus for continued development of maritime activities and experiences in the harbour and surrounding region.

Haulbowline is a wonderful place to tell the story of Ireland’s maritime heritage with its historic buildings, continuing use as a naval centre and the potential of Block 9 to provide a building that not only provides space and facilities for a museum education service and facilities but is also an integral part of the nation’s maritime heritage.

The resources available through which to present these stories include:

* physical - Cork Harbour and its islands, the seascape, water quality and seabed
* environmental - marine ecosystems, foreshore and tidal margin ecosystems, sea level and climate change, fisheries, marine birds and mammals in the harbour etc
* cultural - maritime archaeology in the harbour and islands, the early settlers, Vikings, Normans and English rule, the built environment including coastal defences, forts, Martello Towers, Haulbowline naval buildings, Spike Island and fortifications, dockyards, harbours, slipways and liner terminal together with
  - the Armada, French incursions and the Napoleonic Wars
  - the Potato Famine and the mass emigrations to the New World
  - traditional craft and vessels including sailing club craft
  - Royal Cork Yacht Club
  - oral and traditional literature of the area
  - Cobh and its maritime traditions
Titanic and Lusitanian connections
- monuments and memorial.

704 Why Is Learning About Ireland’s Maritime Heritage Important?

The Education Role of a Maritime Museum

An appreciation of the importance of the sea and Ireland’s maritime heritage to ensure young people have a greater understanding and appreciation of the vital role the sea plays in our lives should be the overarching aim of an education service at the Maritime Museum.

This aim is supported by three key objectives:

* to understand the scientific elements that underpin successful management and sustainability of Ireland’s marine resources
* to have an understanding and knowledge of Ireland’s rich and important maritime history
* to appreciate the aesthetic and cultural value of Ireland’s seascape, built and natural environment.

‘The future casts its shadow before it’

The education role of a maritime museum is not just an appreciation and understanding of the past but also the significance for the future, of what we do as individuals and organisations today. The most vital decisions of today relate to ensuring a sustainable future and to ensure that ‘development is within the capacity of the environment to support it without suffering lasting damage or depletion’ (DoE 1995a)

Promoting Science and Technology in Education

The education service and its programmes and activities should support the development of science and technology based learning as part of a knowledge based economy. A Task Force appointed by the Government in 1998 set out a range of recommendations aimed at addressing the declining level of participation in physical sciences. At first level a revised Curriculum was introduced in 2003 with the following objectives:

* developing a scientific approach to problem solving which emphasises understanding and constructive thinking
* encouraging children to explore, develop and apply scientific ideas and concepts through designing and making activities
* foster children’s natural curiosity to develop individual enquiry and creative action.

A Marine Heritage Explore and Discovery Centre would support these objectives through an interactive ‘hands on’ experiential learning environment which offers opportunities for problem solving and decision making in the context of Ireland’s maritime heritage.

The Marine Irish Digital Atlas (MIDA) is being developed by the Coastal and Marine Research Centre at Haulbowline and is a potential resource for primary and secondary education as well as for Higher Education students and could also be accessible through the museum.

Maritime Heritage and the Irish Education System

A maritime museum can play a significant part in providing a context and purpose for learning at all levels and across all subjects that support the aims and objectives of the Irish Education
There are opportunities to engage learners in meaningful and worthwhile activities which enhance, enrich and extend the learning opportunities offered by educational institutions. The links to the Irish Naval Service, the Maritime College and the Coastal and Maritime Resource Centre at Haulbowline also offer opportunities to promote vocational as well as academic learning. Schools consulted during the course of the study were very interested in opportunities to learn outside the classroom and the Naval Base already provides a programme of school visits.

Most significant are those aspects of learning relating to sustainable development, which are cross-curricular, and require decision making and problem solving skills. The museum can emphasise the development of thinking skills in all its activities through engaging, 'hands on' experiential learning that is motivating and enjoyable.

**A Strategy For Learning In The Maritime Museum**

* Innovotive, audience-focused approaches must be developed to engage learners*

The Strategy should focus on an active approach to learning that is informal, enjoyable and memorable and meets the needs of learners and national priorities.

Learning needs to reflect a philosophy that:

* is relevant to all learning activity across the entire organisation
* enables progression
* captures the potentially life-changing nature of learning in a museum environment
* is accessible and offers choice
* encourages people to reflect on their lifestyles and values.

The Museum can be a leader in maritime museum learning engaging and inspiring people to understand and empathise with the maritime heritage and natural world.

Best practice in museum education suggests that it is important to provide learners with opportunities to:

* engage in dialogue and ask questions
* use a variety of senses
* develop their own learning experiences and draw their own conclusions
* relate new learning to their prior experience or knowledge
* encounter, observe and investigate real, authentic objects or archive material and experience the excitement of learning by doing
* explore and discover as independent learners.

**Learning staff and volunteers should facilitate the learning process by:**

* taking the learner’s agenda as the starting point for the encounter
* encouraging a suitable selection of learning experiences by the learner
* guiding learners to develop questions and ideas that are new or challenging to them.
* supporting learners in consolidating their understanding
* enabling differentiated learning outcomes for learners with differing agendas and varying abilities
* promoting the social nature of learning.

Research into learning in museums has shown the importance informal learning and promoting thinking skills:

**Informal learning**

* works through and is driven by conversation/discussion
* involves exploring and enlarging experience
* can take place in any setting
* has purpose.

**Critical thinking**

* critical thinking is deciding rationally what to or what not to believe
* it is purposeful, reasoned and goal directed
* it is the kind of thinking involved in problem solving and decision-making
* asks pertinent questions
* assesses statements and arguments
* is able to admit a lack of understanding or information
* has a sense of curiosity
* is interested in finding new solutions
* is able to clearly define a set of criteria for analysing ideas
* is willing to examine beliefs, assumptions, and opinions and weigh them against facts
* listens carefully to others and is able to give feedback
* sees that critical thinking is a lifelong process of self-assessment
* suspends judgment until all facts have been gathered and considered
* looks for evidence to support assumption and beliefs
* is able to adjust opinions when new facts are found
* looks for proof
* examines problems closely
* is able to reject information that is incorrect or irrelevant.
Conclusion

The Maritime Museum Explore and Discovery galleries and the programmes of an Education Service should promote best practice in museum learning. It is important that students should not be passive observers but be actively engaged and motivated to learn.

706 Maritime Heritage In The Subject Based Curriculum

Subject areas for the educational elements of the museum and Discovery Centre are likely to cover the following themes:

Science and technology

* climate change
* sustainable fishing
* life in the sea
* biodiversity conservation
* waste disposal risks
* water quality
* ships and boats
* science in ships

Geography

* impact of farming and recreation
* seascapes
* water cycle
* continental shelf
* leisure and tourism
* trade and commerce/trading routes
* fishing

Geology

* rocks and geomorphology
* coastal erosion
* quarrying and marine aggregates

Citizenship

* legal requirements
* civic responsibility

History

* military history
* maritime history
* social history
* evidence based investigations

Language and Literature (in English and Irish)

* myth and legend
* maritime literature
* folklore
Maths
* navigation

Vocational
* seamanship
* navigation

Art and Design
* seascapes
* scrimshaw
* observational/marine life

What this indicates is that the museum has the potential to offer a wide range of learning opportunities.

707 What Is Required To Deliver Such A Programme?
We envisage that the learning elements of the museum could consist of the following elements:

Learning Centre
This would consist of:
* the administrative and teaching staff office
* a workshop area suitable for formal presentations, activity sessions and group work,
* resource storage and equipment for investigations and practical work
* multi-media equipment and computer workstations for individual study
* library of relevant material and loan boxes for local schools and organisations,
* handling collections and display and promotion materials for ‘road show’ events.

Archive
Storage and access facilities for documents, maps and charts, images with provision for digital collections including workstations for individual research, copying facilities and electronic links to other marine archives which could be managed by volunteers under the direction of an Education Officer. An important element should be an oral history archive collected and managed by trained volunteers to capture the lives and stories of local people involved in maritime activities.

Explore and Discover Galleries
These are exemplified by the aim of giving learners (and all visitors):
* a wide range of high-quality experiences relevant to maritime heritage outside the classroom
* hands on practical learning activities
* exciting and challenging activities in a safe and supportive environment
opportunities for developing higher level thinking skills
opportunities to carry out investigations based on real evidence
a real context and purpose for learning
opportunities to meet and work with ‘experts’ in maritime heritage
exposure to cultural activities including story telling, performance, music and art
opportunities which are an important part of out-of-school and summer holiday activities.

Elements Of The Discovery Gallery

The Explore and Discovery Gallery should be modular with a series of interactive hands on activities supported, when possible, by a volunteer ‘explainer’ who will facilitate learning. The modules:

* seamanship - ropes, rigging, knots and splices
* navigation - maps, charts, compasses and the stars
* engineer - paddles, oars, sails, engines and propellers
* SOS - survival at sea – fire, flood and abandon ship
* weather centre - weather forecasting
* marine architect - floating and sinking
* marine biologist - ecosystem, food webs and sustainability
* Irish Navy - National Maritime Surveillance
* life below decks - hammocks, messes and naval tradition
* story telling - myths and legends
* ships log – where, when, who, what and why.

Visitors will be invited to carry out a range of tasks to become a ‘Maritime Expert’.

Key Features

Practical and interactive modules could include:

* virtual bridge
* survival training equipment
* chartroom
* planetarium
* aquarium.
Modules to explain the role of the Irish Navy Today could include:

* fishery protection
* coastal defence force
* trawler monitoring
* environmental surveys
* search and rescue.

There are opportunities to develop links with other organisations based at Haulbowline including:

* MIDA – Coastal and Marine Resources Centre
* trawler monitoring
* weather station
* Organisation of National Ex-Service Men & Women (ONET).

This can easily be developed to include:

* on-board visit to Irish Defence Force Coastal Patrol Vessel
* island tour taking in key historical features and architecture
* boat trip around harbour and Spike Island

709 The Importance Of Volunteers

Practical learning and interactive experiences demand a high level of support and the Naval Veterans have indicated a willingness to take on the role of volunteers in the museum. This will require an induction programme, training and support from museum staff. It would be essential to designate a staff member to manage the volunteer rotas and training.

710 Outreach And The Heritage In Schools Scheme

The Education Centre has the opportunity to work through the ‘Heritage in Schools’ Scheme to support outreach activities in the region offering loan boxes, study material, expert speakers and school, or site, based learning activities linked to the school curriculum. There will be a demand for learning materials And Continuing Professional Development from education establishments and it will require a resource development programme managed in-house by external contractors. (See Appendix E)

711 What Can We Learn From Elsewhere?

There are examples of good practice from maritime museums and centres in the UK which are relevant to the project. These include:

National Maritime Museum Greenwich

* Planetarium Shows
* Storytelling with the ship’s cat
* Inspiration art
* Tales from the sea chest
* Armada Day
* Marine Environment Study Day
* Stormy Waters creative writing: Leading Lives –famous sailors
* Underwater technology
* Empire and trade

**HMS Belfast**

* Kip in a Ship: sleepovers
* WW2: War in the Atlantic
* Explore the ship

**SS Great Britain**

* Steer the ship
* Haul up the anchor
* Audio tours based on original diaries
* Brunel: engineering hero
* Victorians at sea
* Investigate artefacts and original documents from passengers
* Cabot’s voyage of discovery

**National Museum of Wales and the British Geological Survey**
The Outer Bristol Channel Marine Habitat Study

* Sea bed video
* Interactive CD: explore the seabed
* Seabed geology.

Naval and maritime museums in the Baltic tend to include ships of all kinds:

* **Aalborg** - submarine and fishery protection vessel
* **Ebeltoft** - the frigate *Jylland* (1860) which was the last major wooden ship of war built in Denmark
* **Helsingor** - museum archives, library, painting and photo collection
  - special exhibitions
  - permanent galleries
* **Gothenburg** - major collection of ships moored at one of the quays in the harbour of Gothenburg
  - museum devoted to all aspects of civilian shipping covering shipping, shipbuilding and the fishing industry of Gothenburg. Library and aquarium

Interestingly the websites make no reference to educational programmes or services.
The Way Forward

The opening of a Maritime Museum may be some way off but there are opportunities to build on current activities including current school visits to Haulbowline and the Naval Base, the Cobh Heritage Centre and guided walks programmes available in Cobh that could be developed for schools. Partnership with the Veterans Association could lead to the initial development of an archive and an oral history recording project which would ensure that stories and lives of veterans and local people with maritime connections could be captured before they are lost. These archives could be used to support an outreach programme that would take these stories to new audiences and build up a ground swell of support for the museum. There are also important partnerships to be developed with the National Maritime College of Ireland (NMCI) and the Coastal Marine Resources Centre that could initiate events and programmes for enhancing school formal and informal learning programmes in the region. The Royal Cork Yacht Club is also a potential partner with its close association with Haulbowline and Cobh. Its recent publication provides extensive material on the early development of the club.

It would be possible and advantageous to develop a learning resource pack to support teaching about Ireland’s maritime heritage across the Curriculum. This programme could be developed in conjunction with the Heritage in Schools Scheme and the speakers’ panel extended to include more maritime heritage experts. Schools consulted would welcome such a resource that could include loan boxes to support evidence based investigations in history and science and other consultees from the Naval Base, the National Maritime College of Ireland (NMCI) and the Coastal Marine Resources Centre were enthusiastic in their support of a maritime museum and discovery centre.

Conclusion

Haulbowline is extremely well positioned to become a National Maritime Museum and to provide an exemplary Education Service. It is sited in one of the world’s largest harbours and is adjacent to Cobh and its important maritime history. The close proximity of the Naval Service, the Coastal and Maritime Resource Centre, Spike Island and the wealth of architecture and monuments linked to Ireland’s maritime heritage make it the obvious choice for a Maritime Heritage Education Centre.

Our future well being is dependent on the citizens of today and tomorrow understanding the need for sustainable development and the consequences if we fail to take action now. Climate change and over fishing are two key areas of concern and alongside the need to conserve the maritime heritage of Ireland it is essential that we ensure that all groups in society understand the issues involved and how they can play their part.

The Maritime Heritage Education Centre can engage and involve individuals and communities in working together on a common mission to ensure the past and future maritime heritage of Ireland are secure and available to future generations.
8. HOW SHOULD IT BE CREATED?

801 Introduction

In this section we discuss the logistical consequences of our findings, managerial and organisational issues and the way forward.

802 What Sort Of Organisation Is Required?

Early on in this study we were excited by the enthusiasm of the Naval Veterans and the potential to create something akin to a naval heritage centre run and managed by the Veterans with technical curatorial support. Such a facility could be developed somewhere on the Naval Base where the Veterans could collect, manage and present a naval collection. It would be an ideal venue to establish an oral history archive of the memories of servicemen which could be digitised and held as a multimedia computer database.

At the same time the Veterans could be encouraged to take courses in local history and communication with the objective of leading guided tours around the Naval Base and, indeed, the wider Cork Harbour.

The Naval Heritage Centre could also be the base for educational visits in the short term potentially with the appointment of a part time Education Officer.

This is something that could be established immediately and could maximise the value of the existing collection and the enthusiasm of the Veterans without prejudicing the wider vision. However, it would not meet the wider need as articulated by the Heritage Council, various reports and publications and discussed at various seminars in recent years. That is to say the creation of a high quality professionally run and managed National Maritime Museum.

803 Creating A High Quality Museum

All the research points to the need to raise standards of museological care and presentation across the country and, in particular, to create a facility which adequately presents the maritime heritage of Ireland.

To do this requires significant funding and, above all, a project champion. It will take several years to develop the vision, concept and development plan, secure the funding, restore the building, appoint the staff and establish and operate the museum. It also requires substantial ‘start-up’ funding to do this from Day 1 and this suggests that it is most likely to succeed if it is either:

* championed by the Heritage Council and activated by the National Museum or Cork County Council with public sector, private sector and EU support

* championed by the Heritage Council but involving the establishment of a charitable trust and company limited by guarantee initially underwritten by a benefactor with the objective of securing significant EU and other funding.

That is to say it needs to be either public or voluntary sector led but with backing locally and nationally. The opportunity to obtain ‘planning gain’ from the development of the Irish Steel site should also be maximised. The role of volunteers will be crucial to support the professional staff.

A key principle of such a museum is that it should be accredited and this means establishing a professional museum structure supported by a robust Business Plan. The type of organisation required and how the project should be taken forward will be a key aspect of a detailed Feasibility Study which is the essential next stage of the process.
804 Conclusion

At this point in time we have only ‘scratched the surface’ on the type of organisation required. This is an essential aspect of the next stage.

Examples of the rich collection of paintings that exist of Cork Harbour
9. RELATIONSHIP WITH OTHER MARITIME MUSEUMS

901 Introduction

In this section we consider the relationship between this maritime museum and others across Ireland.

902 Creating A Hierarchy Of Maritime Museums

The Assessment of Maritime Collections proposed a national maritime museum and a number of regional museums which can draw out geographical differences. At a local level there are many other smaller collections which are relevant and locally distinctive reflecting the specific character of the communities in which they are situated.

Creating a high quality facility of national standard in Haulbowline could only be done through an agreed and focused Collections Policy and loans from the reserve collections of National Museum, County and local museums. It will be important to establish partnerships with a range of museums providing a cross-flow of research, photographs, oral history material, objects and artefacts. By this process we are, in fact, creating a series of networked maritime museums across Ireland which are entirely supportive and complementary and not wastefully duplicating.

Further, this partnership (or forum of maritime museums) could agree priorities for key themes and collections in different museums. Haulbowline has the potential to be more than a regional facility but this is entirely dependant on funding and commitment.

At a local level there also needs to be a partnership of attractions and facilities within Cork Harbour to maximise the heritage and tourism potential of the various cultural and natural heritage sites. This suggests a strong link with the Cork Harbour Forum and Cobh Tourism Association (ideally becoming members of both).

903 Conclusion

A new museum in Haulbowline cannot operate in isolation. It needs to have a working relationship with other maritime museums both locally and across Ireland. However, it could set standards of collections management and curatorial care and have a significant influence on ensuring all the recommendations of the Darina Tully report are implemented. We now review the potential financial implications of the project.
10. POTENTIAL FUNDING IMPLICATIONS

1001 Introduction

In this Scoping Study it is only possible to generate an initial estimate of the capital cost to create a National Maritime Museum. This should be refined together with an Initial Business Plan at the next stage.

1002 Initial Capital Projections

We have developed an indicative estimate of the capital costs for the restoration and fit out of the building (using current rates supplied by Gardiner and Theobald Dublin) together with an estimate for the design and implementation of interactive interpretive exhibitions and museum galleries based on many years experience of the industry.

We set these down in Table 10.1 below.

Table 10.1 : Outline Cost Plan (as at February 2007)

<table>
<thead>
<tr>
<th>Element</th>
<th>Area/Rate (€)</th>
<th>Cost (€)</th>
<th>Cost (€)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acquisition</td>
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<td>NIL</td>
<td></td>
</tr>
<tr>
<td>Construction costs</td>
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<tr>
<td>Repairs and alternations</td>
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<tr>
<td>Building Fit Out</td>
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<td></td>
</tr>
<tr>
<td>Kitchen, Servery and Café</td>
<td>Item</td>
<td>105,000</td>
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<tr>
<td>Shop/Reception</td>
<td>Item</td>
<td>90,000</td>
<td></td>
</tr>
<tr>
<td>Visible/Accessible Museum Store</td>
<td>Item</td>
<td>200,000</td>
<td></td>
</tr>
<tr>
<td>Temporary Exhibition Area</td>
<td>Item</td>
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<tr>
<td>Conference &amp; Education Space</td>
<td>Item</td>
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<tr>
<td>Library &amp; Administration</td>
<td>Item</td>
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<td>Sundries</td>
<td>Item</td>
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<td>Building Construction Sub Total</td>
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<tr>
<td>Professional fees @ 16%</td>
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<td>Sub Total</td>
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<tr>
<td>Contingency @ 20%</td>
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<td>Sub Total</td>
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<td>Inflation (3 years @ 4.85% pa to mid-contract)</td>
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<td>Building TOTAL</td>
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<td>Ground floor boat display</td>
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<td>First floor discovery gallery</td>
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<td>Element</td>
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<tr>
<td>Museum Fit Out Sub Total</td>
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<tr>
<td>Professional fees (including research,</td>
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<tr>
<td>storyline, design and project management @</td>
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<tr>
<td>25%)</td>
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<td>Museum Sub Total</td>
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<td>Contingency @ 20%</td>
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<td>Sub Total</td>
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<td>Inflation (4 years @ 4.85% pa to mid</td>
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<td>MUSEUM TOTAL</td>
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<tr>
<td>TOTAL INDICATIVE PROJECT COST</td>
<td></td>
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<td>€20,194,210</td>
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</table>

This figure (based on February 2007 prices) excludes:

* taxes
* external works
* access and parking
* dock works eg. recreating the East Camber
* fencing
* object acquisition
* promotion and marketing
* any site decontamination
* incoming services.

This figure will be refined in the Feasibility Study when it is likely the proposals for the ISPAT site will be further advanced. However, the costs should be seen in the context of other similar kinds of project such as:

* National Folk Museum c. €15m
* Galway City Museum c. €9m (excluding museum displays)
* extension to the National Museum c. €23m
* Maritime Museum Falmouth UK c. €30m.

Taking into account inflation the order of magnitude costs of €20m is not unreasonable.

1003 How Could This Be Funded?

A project of this magnitude will require a plural funding strategy including government, national, regional and local agencies, EU Convergence Funding, private sector (including the
potential for planning gain from the ISPAT site) and possibly a benefactor. The Office of Public Buildings and Works could, for instance, fund the restoration of Block 9. This clearly requires further detailed investigation and negotiation at the next stage.

1004 Conclusion

We have indicated that the potential capital cost of a project to create a National Maritime Museum is a minimum of €20m excluding a number of issues that are impossible to assess at this stage. The financial implications require future evaluation and refinement which will be undertaken in the Feasibility Study.
11. CONCLUSIONS AND NEXT STEPS

1101 Introduction

The report has reviewed the potential to develop a maritime, or naval, museum in Haulbowline. It concludes:

* nowhere adequately presents the story of Ireland’s outstanding maritime heritage and the National Museum has no plans to develop a facility in the foreseeable future

* The Heritage Council has advocated the development of a National Maritime Museum together with a number of regional maritime museums to reflect regional differences

* Cork Harbour has an outstanding natural, cultural and built maritime heritage and is an entirely appropriate location for the creation of a maritime museum

* Storehouse No 9, whilst in poor condition, is the earliest, and most complete, integrated cast iron framed building in Ireland but is capable of being restored and is eminently suitable for the creation of a maritime museum

* Storehouse No 9 overlooks, and is inextricably linked to, the ISPAT site which is the subject of redevelopment proposals. Minister Micheál Martin has suggested a mixed use development including a maritime museum

* the development of a high quality National Maritime Museum is likely to be expensive (at least €20m) and will require a powerful vision and project champion. It could be either public or voluntary sector led but requires a robust funding strategy and business plan to ensure long term sustainability

* there is a strong case for the Naval Service to establish a Naval Heritage Centre in the short term somewhere on the Naval Base developed and managed by Naval Veterans : it is important that the current collection is catalogued and evaluated as to its significance

* Storehouse No 9 requires urgent investment to make it wind and weather proof to stop further deterioration

* representation should be made to Cork County Council before 9 March to ensure a maritime museum is included in the preparation of the emerging County Development Plan

* this report should be widely circulated to raise awareness of the potential and to generate support at all levels. In particular, it needs to be presented to the Department for Enterprise, Trade and Employment to inform their deliberations for the future use of the Irish Steel site

* a number of initiatives can be instigated in the short term to start to realise the heritage potential of Haulbowline and its unique maritime heritage.

The key issues facing the project are:

* access

* integration with the proposed ISPAT site development and the whole Cork Harbour experience (including the potential opening up of Spike Island)

* capital funding

* visitor numbers and overall viability
* what sort of organisation should be established to take the project forward.

The study needs to influence:

* the Department of Enterprise in relation to the emerging proposals for the ISPAT site
* the County Development Plan to incorporate a maritime museum in Haulbowline
* the Cork Harbour Forum in relation to the importance of Haulbowline and the maritime heritage of Cork Harbour
* the Naval Service in relation to the current condition of Block 9.

A detailed Feasibility Study and Business Plan should be commissioned to address these issues and work up the proposals to the next stage.

1102 Conclusion

What is clear is that there is a need for a high quality museum presenting the story of Ireland's maritime heritage and Block 9 in Haulbowline has real potential to be the place where this can be developed.

We commend this report to you.
Appendices
Appendix A

List of Consultees
APPENDIX A : LIST OF CONSULTEES

Commodore Frank Lynch  
Flag Officer  
Commanding Naval Service

Lt. Cdr. Barry O’Halloran  
Staff Officer Operations Defence Service Headquarters  
Irish Naval Service

Lt. Cdr. Jim Shalloo  
Assistant Provost Marshal  
Irish Naval Service

Hugh Maguire  
Museums and Archives Officer  
Heritage Council for Ireland

Isabell Smyth  
Communications Officer  
Heritage Council for Ireland

Darina Tully  
Researcher. Author of ‘Audit of Maritime Collections’

Hal Sisk  
Owner. Yachting Historian/Lecturer

Marie Keene  
Tourism Officer Cork  
Failte Ireland

Dermot Burns  
Archivist  
Royal Cork Yacht Club

Tom O’Neill  
Historian. Lecturer. Guide  
Former Head of Maintenance Spike Island Prison

Donal Lynch  
Yachtsman. Regatta Organiser. Lecturer

Fergal Gough  
Community and Enterprise Development Officer  
Cork County Council

Patricia Griffin  
Senior Executive Planner - Forward Planning Unit  
Cork County Council

Sharon Casey  
Heritage Officer  
Cork County Council

Martin Ryan  
Conservation Officer  
Cork County Council

Eugene Gillan  
Curator  
Kinsale Museum

John Marsworth  
Chairman  
Cobh Chamber of Commerce

Michael Martins  
Author and Creator of Titanic Trail

Dr Philib Smylie  
Hon. Curator  
National Maritime Museum Dun Laoghaire

Noel Vaughan  
Museum Team  
National Maritime Museum Dun Laoghaire

Owen Ganley  
Executive Council  
Irish Maritime Institute
<table>
<thead>
<tr>
<th>Name</th>
<th>Position</th>
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<tbody>
<tr>
<td>Ruth Delany</td>
<td>Author. Expert on Ireland’s Inland Waterways</td>
</tr>
<tr>
<td>Dr Séamus MacPhilib</td>
<td>Senior Curator – National Museum of Ireland – Country Life</td>
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<td></td>
<td>Turlough Park Castlebar Co. Mayo</td>
</tr>
<tr>
<td>Charlie McCann</td>
<td>Trustee - Innishowen Maritime Museum and Planetarium</td>
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<td>Greencastle Co. Donegal</td>
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<tr>
<td>Gemma Havlin</td>
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<tr>
<td>Pat Ledwidge</td>
<td>Director of Services and Docklands</td>
</tr>
<tr>
<td></td>
<td>Cork City Council</td>
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<tr>
<td>Evelyn Mitchell</td>
<td>Senior Executive Planner - Docklands</td>
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<td>Cork City Council</td>
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<tr>
<td>Sister Sato</td>
<td>Cork (Blackrock) Heritage Centre</td>
</tr>
<tr>
<td>Val Cummins</td>
<td>Director - Coastal and Marine Resources Centre</td>
</tr>
<tr>
<td>Jeremy Gault</td>
<td>Deputy Director CRMC - Project Manager Corepoint</td>
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<tr>
<td>Cathal O’Mahoney</td>
<td>Research Scientist - Coastal and Marine Resources Centre</td>
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<tr>
<td>Heather Bird</td>
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<td>Margaret McAuliffe</td>
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<td>Cora Fynn</td>
<td>Assistant - Cobh Museum</td>
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<td>Raghnall O’Floinn</td>
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<tr>
<td>Damien O’Brien</td>
<td>Product Marketing Officer Cultural Tourism and Heritage</td>
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<td>Daire Brunicardi</td>
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<td>Master Mariner</td>
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<tr>
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<td>Principal - Carrigaline Community School Carrigaline</td>
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<td>Organisation of National Ex-Service Men &amp; Women (ONET)</td>
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<td>Shaun McDermot Deeney</td>
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<td>Jeremy McHeath</td>
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<td>Mike Domknall</td>
<td>Allan Randall</td>
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<tr>
<td>Jack Gilmartin</td>
<td>Bill Stewart</td>
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<tr>
<td>Tom Hume</td>
<td>Jim McSweeney</td>
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<tr>
<td>Sean Kavanagh</td>
<td>Basil Switzer</td>
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</tbody>
</table>

The Potential To Create A Naval, Or Maritime, Museum On Haulbowline Cork Harbour Scoping Study
Final Report (February 2007)
Appendix B

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Appendix C

Structural Appraisal Of Block 9
C1 Introduction and History

Introduction And Historical Context

Cork Harbour is the most important safe deep-water anchorage on the south coast of Ireland and its relationship to the approaches to the English Channel and Irish Sea from the North Atlantic and the Bay of Biscay has, from the earliest times, given it significant strategic importance both for commerce and war. Norsemen came in the C9 & C10 followed by the Normans in the C12 and French plans for invasion in the early C16 led to Edward VI ordering works for the protection of the Harbour. The Spanish landing in 1600, which was eventually resolved at the Battle of Kinsale, nevertheless left the English fearing further invasion and resulted in the construction in 1602-05 of defensive forts at Blackrock and on the island of Haulbowline.

Haulbowline Island was particularly important because, lying in the main stream of the Harbour south of the ‘Great Island’ and the settlement of Cove, it controlled the passage to Cork itself. The fort was constructed at the top of the rocky outcrop that formed the highest point on the island looking down over the passage up the river towards Cork and across towards Cove. As the threat of invasion declined for most of the C17 Haulbowline and its fort’s main task was to provide a base for the Revenue authorities. The fort itself fell into disuse never housing a garrison of more than forty men. The remains of the fort can be made out today amongst the later buildings that have surrounded it.

In 1707 the island was leased by Lord Inchiquin who, with a group of wealthy friends, used it as the base for a new activity known as ‘manoeuvring’ small sailing boats in the manner of warships. The activity had probably originated in Holland where the term ‘yacht’ was used for the small highly manoeuvrable shallow water sailing boats that plied up and down the Dutch coast. In 1720 Lord Inchiquin and his friends formalised their sailing pastime by establishing the ‘Water Club’. This became the first sailing club in the world and which survives and flourishes today as the Royal Cork Yacht Club. The ‘Water Club’ used the old Haulbowline fort as its headquarters for over forty years moving eventually over the water to Cove where a new clubhouse was built in the C19.

By the mid-C18 Haulbowline’s defensive and administrative importance had been reduced as other defensive batteries and fortifications were built elsewhere in the Harbour and the Revenue authorities moved to a new Customs Watch House in Cove. However, by the end of the C18 its potential importance as a victualling base for the English Navy being was mooted by Admiral Crosby as a replacement for the base at Kinsale. A survey carried out by Navy officials in 1795 recommended that a facility should be established in Haulbowline but it was not until June 1806 that the proposals were advanced when an Order-in-Council was approved. This gave directions for the subdivision of the island between the Board of Ordnance, who retained the western part of the island, approximately 10 acres, and the Navy who were given 21 acres on the west side of the island to establish a new base and victualling yard. Lord Inchiquin’s lease was terminated and a wall was built to sub-divide the Ordnance and Navy’s parts of the island most of which survives today.

Work began almost immediately on the construction of the victualling yard which included fine new wharves on the north and east shores of the island built using limestone quarried on site. The island was extended by 4.5 acres of reclaimed land in constructing the flat wharfage area. The most prominent buildings of the base were the six great storehouses built along the new wharves three facing north (Nos. 4, 6 & 8) and three aligned north : south and facing east (Nos. 9, 10 & 11). These were accompanied by living quarters for the supply and medical officers and staff, houses for the Chief Surgeon and the Naval Storekeeper, cooper’s and other workshops, mast houses and a floating pound, stables, water storage tanks, slipways and hospital facilities. Storehouse No. 11 was later converted and extended to provide for a larger hospital.
Storage of gunpowder and armaments remained the responsibility of the Board of Ordnance who constructed a magazine on nearby Rocky Island to hold 25,000 barrels of gunpowder. At the same time the Board built the Martello Tower, barracks, workshops including a smithy, a gun-carriage yard, more living accommodation and a schoolhouse on the west part of the island.

The exact chronology of the buildings constructed to form the victualling yard is not certain but they were all completed by 1822 when it was formally named the ‘Royal Alexandra Yard’. Storehouse No 9, which is the subject of this study, was therefore built in the period between 1806-22.

Within fifteen years the Haulbowline base was no longer being used by the Navy and it was mothballed until the years of the Great Famine in the mid-1840’s when it became used as a relief depot and stores.

The Crimean War in 1853 highlighted again the need for the base and it was fully reopened but its lack of dockyard facilities limited its use. Local efforts to bring this deficiency to the attention of the Government, whose promises to invest to bring the Haulbowline base and Cork Harbour defences up to the standard of Portsmouth, Milford Haven and other English naval ports had not been met, led to the decision to construct a new dockyard alongside the victualling yard in 1865.

This was not completed until 1887 and did not become operational until 1894. It involved a major land reclamation effort to the east of the island doubling its area from 31 acres to 64 acres and was carried out by contractors using prison labour from the prison on neighbouring Spike Island. Spike Island was connected to Haulbowline by a temporary bridge and causeway used for over 25 years during the dockyard construction until it was finally removed in 1893 and the Spike Island prison closed. The construction of the Dockyard meant that the row of three 1806/22 storehouses and their wharves no longer faced open water but a wide channel, known as the East Camber, was left between their wharves and the new dockyard for the access and loading of ships.

Haulbowline was a busy place during the First World War. It was subsequently transferred to the Irish government in 1923 and, although the Admiralty continued to operate the facilities as of the Treaty Ports, the Royal Navy’s ships had been withdrawn. Their place was taken by the Irish ‘Coastal Patrol Service’ but this was disbanded in 1925 and the Haulbowline base closed until the Second World War when a new ‘Marine Service’, now known as the ‘Naval Service’, was established. The Naval Service continues to use Haulbowline as its main base.

Over a century later parts of the Haulbowline complex were leased to various commercial companies during the 1930’s. One of these, Irish Steel Ltd, leased 10 acres immediately to the east of the west wall of the East (or Church) Camber and hence immediately in front of the range of the three great storehouses orientated north : south. The company developed specialist steel production on the site constructing new plant and filling in the main length of the East Camber.

The venture lasted, albeit precariously, until the late 1990’s when the steelworks eventually closed leaving a derelict and heavily polluted site blighting the future use of the earlier storehouses. During 2006 clearance of the steelworks site and its reclamation for development began and at the time of writing these reclamation works are nearing completion.

It is to be hoped that the future development of the steel works site, which is the responsibility of the Department of Enterprise, Trade and Employment, will take into account the setting of the important historic buildings of the Haulbowline victualling Storehouses Nos. 9, 10 & 11, potentially reinstating at least the northern part of the East Camber and opening up the aspect of the storehouses to the east over the late C19 dockyard area.
C2  General Description

Storehouse No. 9 is one of the six great storehouses built when Haulbowline was transformed into a naval victualling yard between 1806-22. It is the northernmost storehouse in the row of three that ran north to south on the east side of Haulbowline Island facing out across the ‘lower harbour’ of Cork. The Storehouse is a rectilinear block approximately 46m x 10.5m on four floors : three main floors plus an attic floor and with a later lean-to along the entire west side of the ground floor.

The architectural composition of the Storehouse’s main, long east elevation is severe and monumental with thirteen regularly spaced bays, identical except for the fourth and tenth bays where the loading bays are positioned. Each of the common bays has a semi-circular headed ground floor window set in a masonry panel delineated with a projecting ‘Venetian’ style rectangular section, flat, ashlar moulding with a simple keystone and segmental masonry to the arches. The ashlar is tooled with a simple fluted chiselled dressing.

The adjacent bays of the arched panels are linked along the entire length of the building only interrupted by the loading bays with a low masonry plinth course and by a longitudinal string course at the springing point of the masonry arches. The masonry between the plinth course and the string course is of regularly coursed dressed large blocks compared with the irregularly coursed smaller, more roughly dressed rubble used for the walling above. This connection of the bays and the change in the masonry creates the effect of the building having a long ground floor loggia or arcaded plinth.

The first and second floor windows to each bay above the ground floor arched windows are rectangular with dressed stone cills, jambs and heads with a simple keystone and have the same simple rectangular flat masonry dressings. Above the second floor windows is a horizontal continuous projecting moulded parapet string course broken only in the two loading door bays and a parapet with a coping above. The dormer windows to the attic floor are set behind the parapet above the parapet gutters and with the same spacing as the main bays below.

The central bay of the elevation has the same masonry arched panel detail on the ground floor as all the other common bays but its window is replaced by a pair of double doors which give access to the central stair. The doors are accessed by two stone steps the dimension of the second step and its detail correlating with the plinth course each side. Apart from the steps and door the central bay is not differentiated in any way unlike many neo-classical designs where a central pediment or similar device would be used. All six of the great storehouses are exactly the same except for No. 6 Storehouse which has a central clock tower.

The window joinery consists of arched headed sashes on the ground floor, sixteen pane sashes to the first floor and twelve pane sashes to the second floor. The dormers have twelve pane sashes.

The two loading door bays (4 &10) are both formed as a vertical ‘slot’ the height of the building to the parapet string course level, framed by substantial vertical square section ashlar masonry jambs and head and above which is a projecting flat masonry hood supported by stone brackets. This masonry hood breaks the horizontal string course and gives some shelter to the timber loading bay doors below. The loading bays to each floor have double doors separated at floor level by a substantial horizontal beam and these are recessed from the masonry jambs visually filling in the full height of the slot with a timber panel.

The corner masonry is formed by larger dressed quoin stones.

The north and south side elevations are each of three bays with the parapet extended up to form a truncated gable to the mansard roof. There is no ground floor arcade detail and at parapet level the dormer windows are replaced with two blind masonry panels and a central window with the same masonry detail and design as those below.
The long west elevation is detailed exactly the same as the main east elevation but without the
ground floor arcading and arched windows. The ground floor of the elevation is obscured by a
later, long lean-to running the full length of the building which has a simple pitched roof,
coursed rubble external walls and no window or door openings.

The building’s internal plan is very simple with two large open store room spaces
approximately 21mx10.5m, one either side of a fine central stone staircase at each floor level,
and separated by a masonry cross wall. The storerooms are linked on the upper floors by a
set of double doors in the cross wall and across the landing of the stair which is accessed
from the central door on the east elevation at ground level. The stair is a graceful but robust
cantilevered stone staircase with semi-circular winders and straight flights set at right angles
to the east external wall. The staircase landing runs across the width of the staircase against
the external wall and links the main access doors to the two store rooms on each floor. The
staircase has a simple wrought iron handrail and the stair case treads have chamfered soffits.

The Storehouse’s internal structure is one of the most interesting aspects of the building.
Each half of the building comprises of six structural bays reflecting the external elevation
design with the staircase occupying the central bay. Across the width of the building each bay
is divided into three with two columns subdividing the span of the cross beams. This gives
rectangular structural bays of approximately 3.5m by 3.5m. The masonry cross wall provides
support for the secondary floor joists between bays 6 and 7 (central bay) and between bays 7
and 8 an extra column is added where the curved wall of the staircase turns off the gridline
across the building forming a truncated space behind the stair in bay 7.

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and 8 an extra column is added where the curved wall of the staircase turns off the gridline
across the building forming a truncated space behind the stair in bay 7.

The ground and first floor structure (supporting the first and second floors) consists of slightly
tapered cast iron columns regularly spaced on the grid lines and dividing the cross span in
three. The columns are raised on stone plinths on the ground floor and connect through the
first floor directly to the columns above with a bolted collar with interlocking housings for the
cross beams. Spanning between these collars and external walls at first and second floor level
are cast iron cross beams with an inverted ‘T’ section and the upper flange ‘fish-backed’
reflecting the calculated changing loads and stresses along the beam profile. The cross
beams have integral sockets in their castings to support and provide housings for the
secondary floor joists. Running between the column heads longitudinally along the building at
right angles to the cross beams are wrought iron tie rods or tensioning bars to prevent lateral
movement of the column heads and in doing so preventing the secondary floor joists falling
out of the sockets in the cross beams.

On the second floor the structure changes slightly and the cast iron cross beams are replaced
by the tie beams of the main roof trusses. The cast iron columns have simpler circular heads
supporting a cast iron sleeve or shaped channel in which the main truss tie beams sit. The
secondary joists are then notched over the top of the main truss tie beam. The tie beams are
very substantial timbers spanning in one piece across the width of the building making them
over 11m long.

The roof structure is comprised of large, raised king post trusses sitting on braced timber
posts bearing on the main truss tie beams below. This gives the Storehouse a typical
mansard section, common in late C18 and early C19 buildings, with the upper slopes being of
lower pitch than the steeper side slopes facing the parapets.

The Storehouse structure (and that of Nos. 4, 6, 8, 10 & 11) is, thus, a fully integrated
structure with the major part of the framing being cast iron and, given the date of its
construction (probably about 1807), makes it the earliest integrated cast iron framed
building in Ireland (Rynne 2002). It should be stressed that neither the structural frame nor
the design of the building were fire-proofed. The first fireproofed industrial building in Ireland
was Rennie’s tobacco warehouse at Custom House Docks in Dublin built in 1820-21. This was
preceeded by the fireproofed structures of Dytherinton Flax Mill (Shrewsbury UK 1797) and
King Stanley Mill (Gloucestershire UK 1818). Even so the date and design of the structure of
the Haulbowline warehouses gives them considerable historic architectural significance in
addition to their wider interest.
No other major naval dockyard building complexes were constructed in Ireland and the nearest comparison are those built at Royal William Yard in Plymouth by Rennie began in the late 1820’s and in the late 1830-40’s at Pembroke Dock in Milford Haven, West Wales.

Being industrial storage buildings the interior of the Mill has only a few surviving original elements of interest in addition to its structural frame and fine staircase. There are two operated rope hoist mechanisms of which only the southern survives intact and appears to be original. The north mechanism has mostly been removed but could be rebuilt. They were used in conjunction with the surviving cast iron external cranes to haul goods up to the upper floors. There are also a number of stone slabs with raised curved edges at locations on the upper floors. Similar slabs at the dock buildings in Pembroke Dock were used to house slop pails but they may also have been used to provide a fireproof base for braziers.

C3 Historic Integrity

The fluctuating fortunes of Haulbowline Island and the changing strategic and political issues facing the British Navy meant that little investment was made in the dock buildings once they had been completed and for most of their life they have been little used. This has had the very significant advantage that they have survived from their first construction between 1806-22 almost completely unchanged and unaltered from their original design. This particularly relates to Storehouse No. 9. Their condition is commented on below.

C4 Floor Area

The gross internal floor area of the building is as follows:

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<th>Floor Area</th>
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<tr>
<td>Ground Floor</td>
<td>565 sqm</td>
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<td>First Floor</td>
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<tr>
<td>Second Floor</td>
<td>483 sqm</td>
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<tr>
<td>Attic Floor</td>
<td>483 sqm</td>
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<tr>
<td><strong>TOTAL GROSS INTERNAL FLOORSPACE</strong></td>
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C5 Statement Of Significance

In considering the future of the Haulbowline great storehouses, and the constraints that will act on their future development, their significance needs to be clearly identified and understood so that it can be properly taken into account:

* the use and strategic significance of Haulbowline as a fortification and naval base was recognised well before the C16 century and the remains of the earliest known defensive structure on the island, the fort built in 1605 after the Spanish attempt at invasion in 1600, still survives in part

* between its defensive duties Haulbowline became the home of the ‘Water Club’ now part of the Royal Cork Yacht Club which was the first in the world

* the storehouses and dock buildings built between 1806-22 form the only major purpose built C19 dockyard in Ireland and, internationally, have few direct parallels other than Royal William Yard and Pembroke Dock in the United Kingdom

* the architecture of the buildings is one of the earliest examples of the ‘functional’ style of architecture that gradually emerged through the C19 & C20. Unlike most other early designed industrial buildings of a similar date it retained only a reduction of classical
elements such as the arched ground floor arcade and otherwise abandoned almost all of the ‘classical’ devices such as pediments commonly used at the beginning of the C19

* the structure of the building is the earliest integrated metal frame building in Ireland and is, hence, one of the earliest in the world. It remains almost completely unchanged from its original design and has remained unmodernised throughout its life

* the buildings of Haulbowline are the first and only home base of the Irish Naval Service since its establishment

* Haulbowline Island, its buildings and structures and its great storehouses, have been recorded in many maps, paintings and drawings from the C15 onwards. The extent of these representations indicate its considerable, visual, topographic and social importance to Cork and its harbour.

The great storehouses, and Block 9 in particular, as it has been so little changed, are thus of very considerable architectural and historic significance. There should, therefore, be a presumption for their preservation and any new use identified should be introduced with a minimum of change to its historic fabric. Where change is necessary it should be, where possible, reversible. Where repairs are undertaken these should be in materials, detail, techniques and construction to match the original.

C6 Current Condition

Storehouse No. 9 was originally constructed to a very high standard with simple robust materials, substantial structural redundancy in its fabric and frame and uncomplicated constructional details. It appears to be currently in very poor condition but this relates to a prolonged lack of maintenance, exacerbated by occasional targeted vandalism, rather than through any inherent defects in its original construction.

Despite its poor appearance and condition the building’s fabric is capable of comprehensive repair and conservation and its characteristics will allow its ready adaptation to a wide range of potential new uses with especially attractive, interesting and historic spaces that are generous, flexible, well lit, environmentally stable, and have a very fine prospect across Cork Harbour. The condition of the storehouse and the works necessary to bring its fabric back into good repair are set out below.

Extensive repairs are highlighted and, as noted above, these should be completed in materials, sections and sizes and construction methods to match the original.

C7 External Walls

Condition

The external walls of Storehouse No.9 are of substantial masonry construction and show no major defects such as differential settlement, collapse, excessive lean or distortion or similar problems. The external masonry exhibits no significant cracking or structural movement. Local repairs are needed to dressed masonry that has suffered from erosion and frost damage and where repair is necessary to maintain weatherproofing. Lintols are not visible but some remedial works are necessary particularly at second floor level immediately below failed roof gutters. Masonry is stained where rainwater down pipes are missing and some frost damage is evident. Pointing is poor throughout and masonry needs general cleaning. Coping stones are being dislodged by vegetation growth and will need re-setting with new damp proof courses and re-pointing.

Urgent Remedial Works

None essential
Remedial Works

Local repairs, lintol repairs and replacement, cleaning and removal of vegetation, coping repair and replacement, approximately 80% repointing. Rebuild parapets as necessary.

C8 Roof Structure, Coverings and Rainwater Goods

Condition

The roof coverings are in poor condition due to the widespread failure of fixings. The graduated stone slates, however, are in good condition and are capable of reuse with a relatively small supplement of replacement slates. (There are a substantial number of good quality reclaimed slates stored on the upper floor of the building and these should be retained to supplement the existing). Rainwater goods are in very poor condition and need complete replacement.

The lead parapet gutters are full of debris and vegetation and have failed along their entire length allowing extensive and damaging water penetration on both east and west elevations. This water penetration is causing wet rot and decay in the feet of the principle trusses of the roof, secondary rafters, wall plates and other timber roof structure. It is also causing decay to the main cross beam ends which serve as the ties to the main roof trusses where they are embedded in the external walls at second floor level and at all floor levels to the edge joists set directly against the external masonry and spanning between the cast iron main beams.

At present the damage caused by the failure of the parapet gutters has not progressed to the point where catastrophic failure has occurred with the loss of the building’s structural integrity. However, without urgent remedial action this continued decay will accelerate rapidly, increasing repair costs and leading to significant loss of fabric and eventual major failure of the building structure.

The parapet gutters will need complete renewal with new timber gutter boards and supporting structures and completely new leadwork.

Urgent Remedial Works

Clean out vegetation and debris from parapet gutters, provide temporary new linings to gutters discharging to temporary down pipes. Treat all timber adjacent to gutters for wet and dry rot. Remove loose and slipped slates and provide temporary covering to roof.

Remedial Works

Strip and carefully salvage existing slates and store for re-use. Remove old battens. Repair roof structures allowing for replacement of all timber secondary structure below the lower purlin level (dormer cill level) along both sides of the roof. Investigate and repair existing principal truss and tie beam ends as necessary using galvanised mild steel plates. Treat all timbers. Construct new timber gutters and linings and lay new leadwork gutters to LSA standards. Renew gutter boxes and outlets to downpipes. Renew all downpipes in cast iron. Re-build dormer window structures to original details including new leadwork roofs and cheeks. Insulate roof, provide breathable membranes, re-batten and re-lay existing graduated stone slates at existing spacing assuming 75% retention of original slates and 25% replacement to match. Renew all flashings to parapets. Provide roof harness system and new lightning protection system.

C9 Internal Structure And Floors

Condition

The building’s main internal structure is robust and is in generally good condition except the edge joists along the external walls which are suffering from the effects of rainwater penetration from the failed roof gutters. The main cast iron column and flanged cross-beam
frame shows no major movement or structural failure. All beam bearing ends should, however, be checked and any longitudinal embedded wall plates inspected and repaired, or replaced, as necessary. The stone plinths to the ground floor cast iron columns appear to be in good condition and show no significant movement but should be checked and underpinned as necessary.

Locally areas of joist replacement will be necessary particularly to the second floor where general rainwater penetration has led to decay. An allowance of 10% secondary floor joist replacement should be adequate. At the top floor level the main cross beam is provided as the tie beam, or lower chord, of the principal roof trusses and due to the failure of the gutters the beam ends are likely to require extensive repair (see above). Connections between secondary floor joists and the main cross beams appear to be generally sound but should be checked as part of any remedial works and repairs effected as necessary.

The ground floor is a stone slab floor laid directly onto the levelled sub-soil and has no damp course. The slabs vary in condition and approximately 15-20% will need replacement. As part of a programme of works the slabs should be carefully taken up, the existing sub-floor excavated to levels and a new concrete floor slab cast with a dpm and insulation. The new concrete slab should be cast at a level to allow the original stones to be re-laid at the original level. If possible the slabs should be marked, recorded and relaid in their original positions.

The upper floors have timber floor boards laid directly on to the secondary floor joists. Water retaining debris, pigeon and bird droppings and rubbish are causing extensive damage to the floor boards and large areas will need replacement.

Urgent Remedial Works

Clear away all debris and rubbish and clear off all floors. Remove debris from building. Take up any damaged areas of flooring and provide temporary flooring to make safe areas of decay.

Following clearance and inspection allow for any necessary temporary propping.

Remedial Works

Check and repair all main cross-beam ends. Repair any horizontal timber wall plates. Repair and replace all edge joists. Repair and replace approximately 10% of secondary floor joists. Check connections between secondary joists and main beams and secure and strengthen as necessary. Allow for underpinning 25% of ground floor column plinths. Take up and replace all floor boarding. Treat all floor timber.

Take up ground floor slabs and relay on new concrete slab with insulation and dpm.

According to the building’s use some floor strengthening may be necessary. It is also likely that fire protection works to the upper floors will be required either with the installation of a fire-rated ceiling soffit below, or a fire rated floating floor above, the existing joists. Any void created will allow for the horizontal distribution of services.

C10 External Joinery

Condition

Most of the building’s original external joinery survives. It varies in condition but most is capable of repair needing easing, adjusting, re-glazing and redecoration. Ironmongery is in poor condition.

The dormer window joinery is in poor condition and replacement to match the original is likely to be more cost effective than repair. Sills are in poor condition and need renewal.
Ground, first and second floor window and door joinery is in reasonable condition given the lack of maintenance and most is capable of economic repair. External doors have been mechanically damaged and need extensive repair.

Approximately 75% of the glazing survives with only 25% needing renewal.

The external joinery needs complete re-decoration and renewal of ironmongery.

All the windows to the ground first and second floor have deep joinery internal reveals and sills. These are generally in good condition needing only local repair.

**Urgent Remedial Works**

Secure all loose glass and timber sections. Temporarily seal windows to prevent pigeon access leaving ventilation

**Remedial Works**

Repair all external sills, window sashes, internal joinery linings. Ease adjust and make good. Re-decorate all joinery. Repair external doors, replace ironmongery and re-decorate.

**C11 Internal Masonry and Partitions**

**Condition**

The internal masonry is exposed and without plaster finishes. It is in good condition needing only local re-pointing (10-12%) and re-decoration. The central internal masonry cross wall at each floor level and the masonry walls to the original staircase are in good structural condition and require only minor local repair and some re-pointing.

Internal partitions are limited to the first floor and are poor quality later studwork and timber partitions. These are likely to be removed as part of any programme of refurbishment.

**Urgent Remedial Works**

None required

**Remedial Works**

Local re-pointing and redecoration in lime wash.

**C12 Internal Joinery and Fittings**

**Condition**

Internal joinery is limited to the doors giving access to the staircase landings and the pairs of double doors in the central cross wall on each floor. The internal joinery is in poor condition and needs repair and re-decoration.

**Urgent Remedial Works**

None required

**Remedial Works**

Repair all internal joinery, refurbish or replace ironmongery as necessary and re-decorate.
C13 Internal Finishes
Condition
The building's internal finishes are very simple with un-plastered walls, no ceiling soffits other than the underside of the floor boards to the floor above and either bare timber floor boards or stone floor slabs. Their decorative condition is poor.

Urgent Remedial Works
None required

Remedial Works
Minor repairs and re-decorations (See also above)

C14 Staircase
Condition
The building's main stair is a stone semi circular staircase with the stone treads cantilevered out from the enclosing masonry wall structure. The stair has a simple wrought iron handrail with square section wrought iron balusters. The masonry of the stair is in good condition with no major structural failure evident. Nosings are heavily worn and chipped and some failure of the handrail baluster fixings is evident with spalling of the stonework where the metal work has corroded blowing off adjacent areas of the stone treads. The wrought iron handrail is in reasonable condition although it does not comply with contemporary legislation. Given the building is likely to require additional new staircases when it is brought back into a new use (see below) repairs to the original stair can be kept to a minimum and, for example, the stair treads could be left with their worn nosings and the metal handrail and balusters can be simply repaired without the additional of extra rails and vertical balusters to comply with current regulations.

The stair landings are stone and are in good condition needing only minor repair and re-pointing.

Urgent Remedial Works
None required

Remedial Works
Minor local repairs to masonry and metal handrails. Re-decorate.

C15 Fittings
The building has a limited number of original external and internal fittings which, as far as possible, should be retained. These include:

* two external cast iron rope cranes at second floor level of north and south loading bay doors

* the surviving internal crane winding mechanism and the remains of another both at second floor level adjacent to the loading bay doors

* a number of stone rimmed slop slabs (see floor plans)

These fittings are in fair condition and could be made serviceable although they would not comply with current legislation.
Urgent Remedial Works

None required

Remedial Works

Minor repairs to conserve, re-decorate and clean.

C16 External and Internal Decorations

Condition

The external and internal decorations throughout are in very poor condition and need complete renewal as part of any scheme of works.

Urgent Remedial Works

None required

Remedial Works

Complete external and internal re-decoration required.

C17 Mechanical and Electrical Services Installations

Condition

All incoming and building mechanical and electrical services are in very poor condition and will need complete replacement and upgrading as part of any scheme of works to bring the building back into use. New above and below ground drainage installations will be required.

Urgent Remedial Works

Ensure all mains services connections are terminated and safe

Remedial Works

Allow for complete renewal of incoming mains, below ground storm and foul drainage, internal mechanical and electrical services installations and above ground drainage.

C18 Re-Using Block 9

The design and construction of Block 9 has given it a range of advantages in allowing it to be adapted to new uses. These can be summarised as follows:

* large open plan spaces with a reasonably generous regular column grid
* a relatively shallow plan allowing good distribution of daylighting to the central areas of the building
* good levels of fenestration and a north to south orientation allowing good natural daylighting levels, well distributed and with a minimum of solar gain
* regularly spaced, frequent opening windows along both long elevations allowing excellent natural cross ventilation
* stable environmental conditions
* good floor to ceiling heights with a minimum of 2.65m
* robust external fabric construction
* floor construction designed for high levels of static loading
* internal spaces with considerable character and visual interest and an impressive external appearance
* a good aspect and views over Cork Harbour (subject to the nature and form of the proposed development on the Irish Steel site).

C19 Use Options

The characteristics outlined in 307 mean that Block 9 is capable of being repaired and converted to a range of new uses each with a varying degree of compatibility with the original building fabric. The primary potential uses include:

Office/Commercial

The open plan spaces of the building, good floor to ceiling heights, its good daylighting and stable environment make the building ideally suitable for office conversion: particularly open plan office space. The creative design of a new office use avoiding suspended ceilings and air-conditioning could fit very comfortably within the historic fabric of the building. Interestingly the Coastal and Marine Resources Centre have successfully adapted the ground floor of Block 4 as their offices which proves the point.

The major changes necessary would include the provision of new staircases and a lift. This would necessitate the removal of some sections of floor, the comprehensive re-servicing to a high standard, which would require provision of horizontal and vertical services distribution routes involving creation of a floor, or ceiling void, and vertical ducts, and the fire-proofing of floors which would all require alterations to the buildings fabric. However, almost any new use would require the same, or a greater extent, of fabric alteration.

Residential

The same characteristics would make the building eminently suitable for residential conversion and similar changes to its built fabric would be required.

However, residential use would necessitate more cellular division of the main store spaces resulting in the loss of their visual appearance and extent. More vertical duct provision would be necessary and more stringent construction regulations particularly on fire escape and fire-proofing would necessitate a greater extent of fabric alteration.

Hotel

The factors relating to hotel use are similar to those for general residential use but the use would require even greater levels of sub-division of the original spaces and higher levels of servicing.

Industrial Space/Workshops

Although Block 9 was built for a semi-industrial use current standards for industrial workspace would require major changes to the buildings fabric in addition to the provision of stairs, lifts and vertical circulation. The costs associated with conversion to industrial/workspace use would be very similar to those for office use in the context of the building but rental values would be significantly lower making industrial use less likely to be economically viable.
Storage Units

The building could be re-used for storage purposes and there is considerable demand for self-store units. This use would avoid the need to install additional staircases although it would still require the installation of a lift suitable for goods. The spaces would probably need to be subdivided for any self-storage use but the sub-divisions could be lightweight and easily removable. The servicing of self-storage space would be minimal and have little impact of the building fabric.

Although not a very inspiring use for such an important historic building this would probably be a viable solution to the building’s future and one that could be achieved with a low budget.

Museum and Visitor Use

The use of Block 9 as a museum could be ideal and the buildings characteristics could be used to create excellent display spaces and supporting facilities. The alterations necessary would be similar to those required for office use and the public use of the building would require the installation of additional staircases and a lift.

The main display and exhibition spaces would allow the store rooms to be kept open and not extensively sub-divided and the historic character of the building would be an asset to any museum use.

Floor loadings are unlikely to be a problem for most of the display areas and would probably only need upgrading for archival and document storage spaces or library facilities.

Higher levels of environmental control would be necessary than for office use but the detailing of the windows and the timber linings to their internal jambs would allow the easy and sensitive fitting of secondary glazing to help control both UV penetration and thermal and environmental control and also help with increased security. Some air-conditioning may be necessary where objects of particular sensitivity are displayed but careful location of these areas where the impact of servicing can be minimised will mitigate the extent of any necessary fabric alterations.

The size of exhibits would, of necessity, be limited to the size of the external openings and the floor to ceiling heights will be a constraint on the overall dimensions of any individual exhibit.

C20 A Preferred Museum Use

The focus of this study is to identify the potential for the creation of a new maritime museum for the Irish Naval Service and other maritime traditions (merchant navy, fishing craft etc) and to appraise the suitability of Block 9 for such a use. In the sections above (explained in more detail in Appendix C) we have highlighted some of the main problems that will have to be resolved for a range of new uses and indicate that a museum use is likely to have a considerable advantage over most other uses with the possible exception of an office use. The key technical issues that would need to be resolved and taken into account for a new museum use are described below.

C21 Fire Escape

In public use the existing staircase of Block 9 will not be sufficient to provide adequate escape compliant with the current regulations. In particular escape distances to the existing staircase are well in excess of the 18m maximum allowed for a single direction of escape. In addition, any public building with occupancy of more than 50 at any one time has to provide at least two escape routes.

As a consequence a new museum use will require the building to have two new staircases positioned so that the maximum distance to them from any part of the building in one direction
is less than 18m. Wherever these staircases are located sections of original floor will have to be removed and, unless the stairs can be located so as to use the existing external door openings, the alteration of some windows to provide new doors may be necessary. Given the presumption that the building should be brought into a viable and sensitive new use this level of alteration should be acceptable. Two options are illustrated on the plans overleaf.

**C22 Fire Protection**

The building has no fire protection between floors and any new use will require the upgrading of the fire performance of the floors to provide a minimum of one hour fire resistance. This can be achieved by either providing a new soffit below the secondary floor joists or providing a raised floor construction above the existing floors. Of these approaches the latter is the least visually intrusive but alters the floor levels relative to existing window and door sills and the staircase.

Given the fact that any new use is very likely to require the provision of voids or ducts for the horizontal distribution of services this may be an inevitable consequence of re-use and the issue will be how to mitigate its impact. If a ceiling soffit is the preferred solution then this should be designed so as to leave the columns and principal cross beams visible.

**C23 New Services Installations**

The building has no services at present and any new use will require extensive re-servicing the main impact of which will be the need to provide horizontal and vertical distribution routes and visible heat emitters and light fittings.

Museum use will require high levels of environmental control and stability. Whilst contained local environmental conditions can be provided for very sensitive objects the main exhibition areas and public spaces will still require a high level of control. This is likely to involve the installation of secondary glazing to windows, UV light filters, window blinds, security provision, and the use of techniques such as underfloor heating which provide flexible efficient well-distributed heat without local temperature high spots.

Museum use, however, requires much lower levels of wet servicing and more concentrated sanitary provision than other uses such as residential and so the disadvantage of increased environmental servicing is offset by lower servicing requirements elsewhere.

**C24 Vertical Voids And New External Openings**

Museum use may require the housing of larger objects which do not fit into the existing spaces and floor to ceiling heights and may require enlarged external openings to install them.

In particular housing small boats with their masts would require much higher floor to ceiling heights than the building has at present and may need the removal of sections of floor to create adequate voids. If floor sections are to be removed this may be controversial as large sections of floor will also have to be removed to allow the construction of the main stairs and lift. Removal of limited additional sections of floor may be acceptable but any areas should be located in the central third of the building plan and the structural integrity of the retained structure will need careful engineering. This has been achieved successfully in similar buildings in Chatham and Portsmouth.

As far as possible the removal of additional sections of flooring over and above that required for the lift and stairs should be avoided or at least minimised. Creation of large internal atrium spaces is unlikely to be acceptable due the extent to which the building's historic fabric would have to be altered.
Large new external openings suitable to bring large objects into the building will also be undesirable and will not be acceptable in the main east elevation. If new openings are unavoidable they should, by preference, be located in the rear or west wall. The largest existing opening is 3m x 1.8m.

**C25 Structural Floor Loadings**

The existing floors were designed for high loadings and they should, therefore, be adequate for most levels of museum loading. However, the structural performance of the floors in fire conditions is likely to be poor without some fire-protection (as described above) and fire insulation will be necessary although this could be incorporated in a ceiling soffit or raised floor which will also serve other purposes.

Some areas of floor may need local strengthening such as the archive and library areas where very high dead loadings may be necessary. Strengthening in these areas can be achieved within any ceiling or floor voids that have to be created for other purposes such as services distribution and fire protection.

**C26 Insulation And Thermal Performance**

Fabric insulation to improve environmental performance will be limited if the character of the building is to be maintained. For example, the internal face of the external walls is exposed unplastered masonry. However, the problem can be mitigated by the provision of high levels of insulation to the roof and the use of secondary glazing to the windows.

**C27 Potential Capital Cost**

Whatever the future of Block 9 its repair and conservation will have a significant cost that can be justified by the historic and architectural importance of the building. The alteration costs for any new use, when added to the repair costs, will inevitably be higher than equivalent new build costs for most of the uses outlined above but such increased costs are, again, justified by the historic value of the building. For some uses the building’s unique character will add to its sales value, or its appeal to users, thereby offsetting the effect of higher capital costs through better revenue generation. We discuss the potential capital cost in Section 10.

**C28 Summary And Conclusions**

Block 9 is a unique and almost entirely original early C19 naval industrial building of considerable national and international historic and architectural value. Its preservation and re-use should be a priority.

The building is in poor condition but no major collapse, or structural failure, has occurred and its deterioration relates to a failure in long term maintenance rather than from any inherent defect in its construction. It is constructed of robust materials with long life spans, and once repaired, with adequate maintenance it will perform considerably better than most forms of modern construction. A programme of emergency repairs and clearance works should be put in hand as soon as possible to mitigate further decay whilst the building’s future is resolved.

The building is suitable for a wide range of new uses and for museum use in particular. It has good and stable internal environmental conditions which can be enhanced by new service installations. The extent and nature of the alterations required to achieve the preferred new use should be acceptable in the context of the building’s importance and if sensitively designed and specified.
The redevelopment of the adjacent Irish ISPAT site should take account of the great storehouses and especially those facing across the original East Camber to the dockyard. If possible the East Camber should be reinstated, possibly to provide for floating exhibits to any maritime museum and the aspect from, and views of, the three Storehouses (Nos. 9, 10 and 11) should be protected and enhanced by any new development.

Conservation and re-use of the No.9 Storehouse to provide a new national maritime or naval museum would be a very fitting use for the building and would be entirely commensurate with its historic importance.
Appendix D

Major Components Of Ireland’s Maritime Heritage
APPENDIX D : MAJOR COMPONENTS OF IRELAND’S MARITIME HERITAGE
(As described in the Policy Paper on Conserving Ireland’s Maritime Heritage)

A. PHYSICAL

Seascapes

Estuaries, bays, lagoons and the seabed of significant scenic, ecological, geological and scientific interest.

Water Quality

Clean beaches, sea food safe to eat, diverse and productive ecosystems, and healthy populations of sea birds and mammals.

B. ENVIRONMENTAL

Biodiversity

The huge variety of plants and animals from lichens to seaweeds, from insects to birds and mammals that characterise maritime ecosystems

Climate Change

Temperature, wind, rain and related phenomena such as ocean currents, salinity and coastal topography are experiencing relatively rapid changes which can be expected to alter the nature and stability of the coastline and marine ecosystems.

Offshore activity

In the last decade there has been an unprecedented increase in activity in Ireland’s offshore waters.

* seabed surveys
* cold water coral
* deepwater fish species
* energy extraction (wind farms).

Fisheries

Sea fisheries are important sources of food and employment and a vital part of the maritime heritage. Sustainability of fish stocks is a long established objective of fishery management. Management measures include:

* total allowable catches
* selective fishing gear
* fleet and vessel size.

Negative impacts of fisheries are:

* stocks being exploited beyond recovery levels
* damage to sea bottom by trawling
* by-catch of non target species (birds, mammals and fish).

**Cultured Species**

Fish farming and culturing and harvesting of shellfish has a long tradition in Ireland. Coastal fisheries are extremely depleted and aquaculture will help coastal communities and traditional skills survive.

**C CULTURAL**

**Maritime Archaeology**

These relate to historical events and activities including:
* promontory forts
* burial grounds
* middens
* landing places
* fortifications
* fish traps
* wrecks
* submerged sites.

**Built and Vernacular Maritime Heritage**

These include ports, harbours, boatyards, piers, boat slips, lighthouses, coastguard buildings; military buildings, kelp kilns, curragh pens, fishing weirs and seaweed emplacements.

**Traditional And Other Boats Of Heritage Value**

Ireland has a rich history of traditional boat building which is represented by a huge number of surviving vessels that played an important role in Ireland’s maritime history. There are 70 known types of Irish workboats 12 of which are skin boats (traditional boats of Ireland)

**Islands**

The Irish Islands Federation has 33 member islands with populations from 1-900. Many important elements of Ireland’s heritage are found on the islands including:
* folklore
* spiritual life
* art and literature
* military forts
* coastguards
* lighthouses
* archaeological sites.

**Recreation and Tourism**

Ireland’s coast and inshore waters provide a wide range of recreational activities that support tourism including:

* sea bathing
* picnicking
* whale watching
* sailing
* boating
* rock climbing
* diving
* kayaking.
Appendix E

The Heritage In Schools Scheme
APPENDIX E : HERITAGE IN SCHOOLS

Overview

The Heritage in Schools Scheme offers a panel of heritage specialists who will, at the request of a teacher, visit a primary school to work directly with the children. Specialists are listed in a Heritage Directory which is updated annually and sent to all primary schools in the country. The Directory lists the heritage specialists in alphabetical order by county and each description contains a key to assist schools in choosing a heritage specialist which matches their particular requirements e.g. field trips. The Directory has been printed on recycled paper to ensure it is environmentally friendly. The booking form is included in the directory. The visit is part-funded by the school and the remaining fee plus expenses are funded by the Heritage Council.

The Scheme

The Directory lists a total of 126 heritage specialists. Their areas of expertise range from bats to whales, from Vikings to the history of bread, from story telling to traditional dance and from charcoal making to military heritage. Specialists usually conduct their visits in, or close to, their own county although many are prepared to travel. As one teacher pointed out 'children's lives revolve around their locality' so the specialists' knowledge of local heritage enhances the young people's appreciation of their surroundings. All of the specialists have been trained to communicate effectively with children and their spontaneity and enthusiasm for their subject makes the visit a very appealing educational experience for both pupils and teachers.

The Visit

The nature of visits is as varied as the range of topics offered. The flexible and informed nature of the scheme facilitates a wide range of approaches to practical heritage education and the exact content of the visit can be planned by teacher and specialist together.

While many visits include a field trip, weather permitting, some are exclusively classroom based as they may involve art, appearances of characters from history or slide shows. Some specialists conduct a mixture of indoor and outdoor activities.

All visits aim to give children and teachers a first hand experience of their heritage whether by handling a medieval sword or shield, by learning to spin wool, by making prehistoric musical instruments or by learning to listen out for common birds. As one teacher said 'A child trying on a coat of mail is worth more than ten books'.

The Scheme Expands

The scheme, a collaborative programme funded by the Heritage Council and administered by the Irish National Teachers' Organisation (INTO), began in 1999 as a pilot project and is now established nationwide. It has grown steadily since its inception and schools in every county now participate. The number of visits nationwide has grown from 187 (2000) to over 1050 (2005). The number of schools availing of more than one visit has also increased.

The scheme is extremely well regarded and supported among teachers who have had school visits and the general feeling is that 'once you've used the scheme you'll continue'. Disadvantaged schools have a high level of participation and many specialists are very willing to work with special needs schools and pupils and teachers in the schools have given very positive feedback on visits.

Educational Value

The value of the Heritage in Schools Scheme is in the richness and depth of knowledge it makes available to children. Its expansion is well timed in concurrence with the phased introduction of the new Social, Environment and Scientific Education (SESE) Curriculum. The scheme supports the stated aims and objectives of the SESE Curriculum and provides an additional educational tool for teachers.

The primary aim of the scheme is to raise awareness of the natural and built heritage among children, teachers and parents. The scheme hopes to establish a real and vibrant understanding of heritage in our primary schools, to encourage children and teachers to leave the classroom and enjoy a first hand experience of their local heritage and to open children's eyes to the world around them.
Appendix F

Visiting Museums For Learning
APPENDIX F : VISITING MUSEUMS FOR LEARNING

Planning

Pre-visit resource more valuable than a post visit resource

Issues teachers consider when planning visits:

* Curriculum fit
* perceived value of experience
* entry costs
* enjoyment
* transportation costs

Teacher perception of field-trip planning and implementation –Visitor studies today 2003

Guided tours

An American study showed that these are 75% teacher led and focused, lecture orientated and structured by the guide asking questions and then moving on to next area. Students were not observed making decisions or working collaboratively even when tours were initiated with thought provoking open-ended questions. These questions were seldom revisited in the tour.

Key outcomes of study

* tours focused on facts and stories rather than big ideas or concepts
* vocabulary was often too advanced for audience
* little sensitivity to individual or cultural differences
* closed or factual questions used.

Investigation of guided school tours at a Museum of Natural History
Journal of research in science teaching 2003

Worksheets

Two models suggested:

* the survey agenda worksheet
* the concept agenda worksheet

These two models can be compared using the distinguishing characteristics of:

<table>
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<th>Survey</th>
<th>Concept</th>
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</thead>
<tbody>
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<td>Task density</td>
<td>More questions</td>
<td>Few questions</td>
</tr>
<tr>
<td>Orientation cues</td>
<td>Yes</td>
<td>Not always</td>
</tr>
<tr>
<td>Site specifics</td>
<td>Questions are label/exhibit specific</td>
<td>Questions can be answered using a variety of exhibits</td>
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<tr>
<td>Information source</td>
<td>Primarily labels</td>
<td>More object based</td>
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<tr>
<td>Level of choice</td>
<td>Few</td>
<td>Some student choice incorporated in questions</td>
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<tr>
<td>Cognitive level</td>
<td>Less likely to use higher order questions</td>
<td>More likely to use higher order questions</td>
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</tbody>
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Teachers, Museums, Worksheets James Kisiel
Worksheets Increase Student’s Exposure To The Curriculum During Museum Visits
This paper covered Kisiel’s ideas bit also looked at intervention by learning supporters/teacher/explainer. The paper reviewed the use of a ‘chaperones guide’ with questions linked to curriculum goals.

The worksheets:

* contained open-ended questions
* connected to specific school curricula
* emphasised unique experience of being in a museum

Marianne Mortenson
Research on students and museums

The museum environment for learning is most effective when students:

* construct personal meaning
* have genuine choices
* encounter challenging tasks
* control their own learning
* collaborate with others
* feel positive about their work.

J Griffin 2004

Improving Worksheets

Five areas to consider when preparing a worksheet:

* practicalities eg. are large numbers of children going to be at the same exhibit?
* questioning techniques using:
  - memory questions
  - convergent questions
  - divergent questions
  - judgemental questions
* variety of content and approach
* developing a sense of the whole not fragmented facts
* Curriculum context.

Gail Durbin English Heritage
Core thinking skills to consider in preparing gallery guides

<table>
<thead>
<tr>
<th>Focusing skills</th>
<th>Directing one’s attention</th>
<th>Defining problems</th>
<th>Setting goals</th>
</tr>
</thead>
<tbody>
<tr>
<td>Information gathering skills</td>
<td>Acquiring relevant data</td>
<td>Observing</td>
<td>Questioning</td>
</tr>
<tr>
<td>Remembering skills</td>
<td>Storing and retrieving information</td>
<td>Encoding</td>
<td>Recalling</td>
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<tr>
<td>Organising skills</td>
<td>Comparing</td>
<td>Classifying</td>
<td>Ordering</td>
</tr>
<tr>
<td>Analysing skills</td>
<td>Clarifying</td>
<td>Identifying attributes and components</td>
<td>Identifying relationships and patterns</td>
</tr>
<tr>
<td>Generating skills</td>
<td>Inferring</td>
<td>Predicting</td>
<td>Elaborating / representing</td>
</tr>
<tr>
<td>Integrating skills</td>
<td>Connecting and combining</td>
<td>Summarising</td>
<td>Restructuring</td>
</tr>
<tr>
<td>Evaluating skills</td>
<td>Establishing criteria</td>
<td>Verifying</td>
<td>Identifying errors</td>
</tr>
</tbody>
</table>

Source: Teaching Children To Think : J Langrehr

Thinking behaviours that gallery guides should develop:

- **Attending**: Focuses on the task at hand; is not easily distracted
- **Persistence**: Keeps on trying; does not give up easily
- **Deliberativeness**: Shows less impulsivity; thinks before acting
- **Flexibility**: Open to alternatives; sees many possibilities
- **Precision**: Uses words carefully; checks for accuracy; attends to details
- **Inquisitiveness**: Asks questions; enjoys problem solving; is curious
- **Fluency**: Can generate many different ideas
- **Originality**: Enjoys making and doing original things
- **Empathy**: Listens to others with sensitivity and understanding
- **Metacognition**: Puts into words his/her own thinking; self-reflects
- **Elaboration**: Build's on other people's thinking; offers added thoughts and suggestions
- **Risking**: Willing to take on new challenges; not afraid of making mistakes

Thinking behaviours -Tahoma

The Explore And Discover Gallery Guide To Thinking Skills

‘The Seven Deadly Skills’ which are essential for active, purposeful and effective learning:

* problem solving
* decision-making
* investigation
* invention
* inductive reasoning
* deductive reasoning
* experimental enquiry

**Explore and Discover Gallery Rationale**

* there must be a reason for doing the task
* large numbers of children should not be in same place at same time
* is it clear where the answer can be found? need clear orientation
* is it clear what kind of answer is required?
* make sure children do not spend more time looking at the sheet than the exhibit!
* better to have less content and time to do it properly, than rush everywhere and not cover much in depth.
* need to encourage discussion with peers and teachers
* need facility for follow-up in the classroom
* curricula content; science, geog, literacy, numeracy?
* encourage pair or small group working
* encourage discussion and conversation
* encourage the development of thinking skills.

**Learning Process Strategies for Explore and Discover Gallery**

* detective theme
* enquiry
* challenges
* they are scientists / archaeologists/explorers etc trying to find out something
* they are writing a booklet about…… for a defined audience
* mock challenge – ‘You are…… and your task is…………….’
* mission ‘possible’! Your task is to……………!
* design a postcard
* photo snap-shot
* fact file creation
* find out facts
* task cards
* interview with……
* given a description, they have to find that animal / exhibit
* create new label for the museum
* animals are characters in a story
* newspaper reporter – gathering info for story. Provide story ideas
* what would an exhibit tell you if it could talk? (What their life was like before they dies, how they died, what they have seen through glass in last couple of hundred years)
* newspaper stories – wrecks, heroism
* tasks that are possible in a range of contexts and galleries
* ‘Top Trumps’, ‘Happy Families’ card game creation
* helping blind visitors
* touring exhibition – only room for ten exhibits…….
* climate change – polar bears and melting ice
* design-a- ‘ bird / mammal using information and parts from other known animals – link to habitats
* dinner menus for different marine mammals / fish / birds
* catch a ……………. ? Understanding the animal to think about how you might catch it
* colour and camouflage – bird gallery? – could be linked with the design your own idea – led through tasks looking at different parts etc
* save the whale . Look at what adaptations make other mammals able to survive in today’s world
* design an android that can carry out human functions and operate independently in a hostile environment – marine rescue robots
* given a scenario – controversial issues – fishing quotas .. a scenario that stimulates discussion / research
* valuation – how do we value the heritage content?
* designing museum of the future
* card collecting games
* Greek and Latin roots (Literacy Strategy).

Our intention is that students should not be passive observers but actively engaged and motivated to learn.
Appendix G

Inventory Of The Existing Naval Service Collection
APPENDIX G : INVENTORY OF THE EXISTING NAVAL SERVICE COLLECTION

ARTEFACTS STORED IN THE MARTELLO TOWER

1. Training Hedgehog
2. Insert For Depth Charge (Training)
3. Insert For Depth Charge
4. Explosive Charge For Depth Charge
5. Firing Mechanism For Depth Charge
6. Bow Stabilising Prop For Torpedo
7. Gyroscope For Torpedo
8. Cutters For Mine Sweepers Paravane Wire
9. Cutters For Mine Sweepers Paravane Wire
10. Cutters For Mine Sweepers Paravane Wire
11. Cutters For Mine Sweepers Paravane Wire
12. Wire Measures
13. Wire Measures
14. Search Light (Corvette)
15. Officers Cap Badge (Plaque)
16. D Finder
17. Antenna (Direction Finder)
18. Instruction Plate For 4" Gun
19. Model Of Corvette Cliona
20. Plate Of Makers Of Corvette (724)
21. RCYC Plate
22. Same As 18
23. Inclinometer
24. Same As 20 (725)
25. Pot Belly Stove
26. Walker Log
27. Deflector
28. Gauges
29. Compass Card
30. Liffy Dockyard Plate (171)
31. 4" Gun Sight
32. Depth And Roll Recorder
33. Ships Name Plate Le Cliona
34. Ships Binnacle
35. Engine Room Telegraph
36. Depth Recorder
37. Battenburg
38. Name Plate Le Macha
39. Star Globe
40. Star Globe
41. Course Indicator
42. Shrapnel Shell
43. Binoculars
44. Course Corrector
45. Depth & Roll Recorder Case
46. MTB Model
47. Bilge Pump
48. Model Of Haulbowline
49. Cocking Handle For 20mm Oerlikon Gun
50. Cocking Handle For 20mm Oerlikon Gun
51. Magazine 20mm Oerlikon
52. Rachet For 20mm Oerlikon
53. Timber Training Rounds Full Set (10)
54. 4 Inch Shells
55. 4 Inch Shells
56. Fold Away Wash Basin Mine Sweeper
57. Le Deirdre Model
58. Le Deirdre Name Plate
59. Typewriter Imperial
60. Ships Plaque Le Deirdre
61. Ships Plaque Le Maeve
62. Ships Plaque Le Macha
63. Ist WW Torpedo + 4 Cradles
64. Brass Fog Horns
65. Training Gun Sight
66. Gas Mask Respirator
67. Mustard Gas Equipment
68. Mustard Gas Equipment
69. Anti Gas Ointment
70. Anti Gas Ointment
<p>| 71.  | Spanner Wrench No 4                      |
| 72.  | Practice Rounds Bofor Gun               |
| 73.  | Tampion For 4 Inch Gun                 |
| 74.  | Hair Clippers                          |
| 75.  | Gun Sight                              |
| 76.  | Shrapnel Shell                         |
| 77.  | Range Deflection                       |
| 78.  | Brass Bell (No Name)                   |
| 79.  | Rammer 4 Inch Gun                      |
| 80.  | Chernkiff Log                          |
| 81.  | Bell HMS Oxlip (Le Maev)               |
| 82.  | Name Plate HMS Oulston (Le Grainne)    |
| 83.  | Name Plate Le Fola                     |
| 84.  | Bell Le Muirchu                        |
| 85.  | 4&quot; Brass Plate                        |
| 86.  | Towed Asdic Repeater Target            |
| 87.  | Foghorn Corvette                       |
| 88.  | General McHardy Brass Bell             |
| 89.  | Steering Instructor                    |
| 90.  | Gyro Gun Sight                         |
| 91.  | Training Model                         |
| 92.  | Rammer                                 |
| 93.  | Eddie Quinn’s Gallery                  |
| 94.  | Table                                  |
| 95.  | Red Duster &amp; Pennant                   |
| 96.  | White Nav Light (Mast)                 |
| 97.  | White Nav Light (Mast)                 |
| 98.  | STB Light                              |
| 99.  | White Nav Light (Mast)                 |
| 100. | Port Light                             |
| 101. | White Nav Light (Mast)                 |
| 102. | Oerlikon Gun                           |
| 103. | Oerlikon Gun                           |
| 104. | Lamps Navigation (Mast)                |
| 105. | Lamps Navigation (Mast)                |
| 106. | Name Plate HMS Oulston                |
| 107. | Crest H.M.S. Swallow                   |
| 108. | Spike Island                           |
| 109. | Gun Sight 2                            |
| 110. | Life Belt Le Fola                      |
| 111. | Life Belt Le Grainne                   |
| 112. | Sir Cecil Romer Life Belt              |
| 113. | David F Life Belt                      |
| 114. | Dunmore East Picture                   |
| 115. | Le Fola Life Belt                      |
| 116. | Magazines In Box } + Ratchet           |
| 117. | Magazines In Box } 1 Box               |
| 118. | Magazines In Box }                    |
| 119. | Gyro Sight Bofor                       |
| 120. | Range Deflector                        |
| 121. | Box Of Training Ammo 20mm              |
| 122. | Breach Block Cover *                   |
| 123. | Breach Block Cover                     |
| 124. | Station Pointer + Box                  |
| 125. | Station Pointer + Box                  |
| 126. | Station Pointer + Box                  |
| 127. | Station Pointer + Box                  |
| 128. | Station Pointer + Box                  |
| 129. | Station Pointer + Box                  |
| 130. | Station Pointer + Box                  |
| 131. | Station Pointer + Box                  |
| 132. | Station Pointer + Box                  |
| 133. | Station Pointer + Box                  |
| 134. | Station Pointer + Box                  |
| 135. | Echo Sounder                           |
| 136. | Lead Swinger                           |
| 137. | Fire Nozzle                            |
| 138. | Wooden Dipstick                        |
| 139. | Co Plotter                             |
| 140. | Ships Siren                            |
| 141. | Photo Stand                            |
| 142. | Photo Stand                            |
| 143. | Course Plotter                         |
| 144. | Ammo Box                               |
| 145. | Stretcher                              |
| 146. | Gun Sights                             |
| 147. | Empty Shell Casings                    |
| 148. | Bofor Sights                           |
| 149. | Telescopic Sight                       |
| 150. | Engine Indicator                       |</p>
<table>
<thead>
<tr>
<th>Number</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>151.</td>
<td>Aircraft Training Sights</td>
</tr>
<tr>
<td>152.</td>
<td>Sight Testing Instrument (Training)</td>
</tr>
<tr>
<td>153.</td>
<td>Gyro For Torpedo</td>
</tr>
<tr>
<td>154.</td>
<td>Sextant Part (With Leather Case)</td>
</tr>
<tr>
<td>155.</td>
<td>Sextant Part (With Leather Case)</td>
</tr>
<tr>
<td>156.</td>
<td>Sextant Part (With Leather Case)</td>
</tr>
<tr>
<td>157.</td>
<td>Anti Gas Ointment</td>
</tr>
<tr>
<td>158.</td>
<td>Anti Gas Ointment</td>
</tr>
<tr>
<td>159.</td>
<td>Range Indicator</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>160.</td>
<td>Misc Radio Parts Box</td>
</tr>
<tr>
<td>161.</td>
<td>Bearing Compass</td>
</tr>
<tr>
<td>162.</td>
<td>Bearing Compass</td>
</tr>
<tr>
<td>163.</td>
<td>Magnified Sight</td>
</tr>
<tr>
<td>164.</td>
<td>Assorted Shells</td>
</tr>
<tr>
<td>165.</td>
<td>Cross Cut Saw</td>
</tr>
<tr>
<td>166.</td>
<td>Cross Cut Saw</td>
</tr>
<tr>
<td>167.</td>
<td>Gun Sights</td>
</tr>
<tr>
<td>168.</td>
<td>Gun Sights</td>
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**ARTEFACTS STORED IN BLOCK 4**

<table>
<thead>
<tr>
<th>Number</th>
<th>Description</th>
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<tbody>
<tr>
<td>1.</td>
<td>Main Log Wyndham</td>
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<tr>
<td>2.</td>
<td>Boxing Time Out Bell</td>
</tr>
<tr>
<td>3.</td>
<td>Oil Can</td>
</tr>
<tr>
<td>4.</td>
<td>Crank Deflection Gauge</td>
</tr>
<tr>
<td>5.</td>
<td>Gun Micrometer</td>
</tr>
<tr>
<td>6.</td>
<td>See 16 Below</td>
</tr>
<tr>
<td>7.</td>
<td>See 16 Below</td>
</tr>
<tr>
<td>8.</td>
<td>Sounding Tube</td>
</tr>
<tr>
<td>9.</td>
<td>MTB Navigation Light</td>
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<tr>
<td>10.</td>
<td>MTB Navigation Light</td>
</tr>
<tr>
<td>11.</td>
<td>Direction Finder</td>
</tr>
<tr>
<td>12.</td>
<td>Gauge</td>
</tr>
<tr>
<td>13.</td>
<td>Gauge</td>
</tr>
<tr>
<td>14.</td>
<td>Gauge</td>
</tr>
<tr>
<td>15.</td>
<td>Wooden Filing Tray</td>
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<tr>
<td>16.</td>
<td>Stop Watches (17 In Plastic Bag)</td>
</tr>
<tr>
<td>17.</td>
<td>Sight Distance Meter</td>
</tr>
<tr>
<td>18.</td>
<td>Field Phone</td>
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<tr>
<td>19.</td>
<td>Pair Of Water Skis</td>
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<tr>
<td>20.</td>
<td>Minesweeper Table (HME Blackstone)</td>
</tr>
<tr>
<td>21.</td>
<td>Pack Of 10 Woodbines (Sealed)</td>
</tr>
<tr>
<td>22.</td>
<td>Net Gauges</td>
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<tr>
<td>23.</td>
<td>Hand Drill</td>
</tr>
<tr>
<td>24.</td>
<td>Singer Sewing Machine</td>
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<tr>
<td>25.</td>
<td>Telephone Bell</td>
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<td>26.</td>
<td>Divers Pump</td>
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<td>27.</td>
<td>Trolley</td>
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<td>28.</td>
<td>Trolley</td>
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<td>29.</td>
<td>Trolley</td>
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<td>30.</td>
<td>Range Finder</td>
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<td>31.</td>
<td>Range Finder</td>
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<td>32.</td>
<td>Range Finder</td>
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<tr>
<td>33.</td>
<td>Range Finder</td>
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<tr>
<td>34.</td>
<td>Name Plate Le Grainne</td>
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<td>35.</td>
<td>Typewriter</td>
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<td>36.</td>
<td>Le Deirdre Sailing Board</td>
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<td>37.</td>
<td>Weighing Scales</td>
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<td>42.</td>
<td>Full Set Of Weights For Above</td>
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<tr>
<td>43.</td>
<td>Wooden Box Of Stencils And Ink</td>
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<tr>
<td>44.</td>
<td>Wooden Box Of Stencils (Red)</td>
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<td>Wooden Box Of Stencils (Blue)</td>
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<td>46.</td>
<td>Assorted Moulds</td>
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<td>47.</td>
<td>Patterns</td>
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<td>Patterns</td>
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<td>49.</td>
<td>Le Macha Football Cup 1954</td>
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<td>Propeller Patterns 4</td>
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<td>52.</td>
<td>BSA Bicycle</td>
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<td>53.</td>
<td>Hand Trolley</td>
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<td>Cameras Assorted In Cardboard Box</td>
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<td>Overhead Projector</td>
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<td>56.</td>
<td>Fog Horn</td>
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<td>No.</td>
<td>Item Description</td>
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<td>57.</td>
<td>Overhead Projector</td>
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<td>Tape Recorder</td>
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<td>Books</td>
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<td>Photographs In Box</td>
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<td>John Adams Log Book</td>
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<td>Fishery Conviction Book</td>
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<td>Distance Meter</td>
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<td>70.</td>
<td>Calculator</td>
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<td>71.</td>
<td>Minesweeper Slides (3)</td>
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<td>72.</td>
<td>Mesh Gauge (5)</td>
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<td>73.</td>
<td>Slides Rules (7)</td>
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<td>Calibrating Devise (3)</td>
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<td>Bearing Slide Rule</td>
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<td>Avro Multi Meter</td>
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<td>Station Pointer</td>
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<td>79.</td>
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<td>Lord Kelvin Azimuth Mirror</td>
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<td>81.</td>
<td>Brass Wall Clock</td>
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<td>84.</td>
<td>Sextants (2)</td>
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<td>Azimuth Mirror</td>
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<td>Multimeter</td>
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<td>Sextants (4 In Boxes)</td>
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<td>Main Engine Deflector Gauge</td>
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<td>95.</td>
<td>Compass</td>
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<td>Telegraph</td>
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<td>97.</td>
<td>Navigation Light (White)</td>
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<td>98.</td>
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<td>Barometer</td>
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<td>Signal Lamp</td>
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<td>101.</td>
<td>Barometer</td>
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<td>102.</td>
<td>Barometer</td>
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<td>103.</td>
<td>Marine Distance Meter</td>
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<td>104.</td>
<td>Hand Barometer (In Case)</td>
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<td>105.</td>
<td>Hand Barometer (In Case)</td>
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<tr>
<td>106.</td>
<td>Wall Clocks (2)</td>
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<tr>
<td>107.</td>
<td>Compass</td>
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<tr>
<td>108.</td>
<td>Wood Planes (2)</td>
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<tr>
<td>109.</td>
<td>Hand Saw (With Spare Blades)</td>
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<td>110.</td>
<td>Gauge In Box</td>
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<td>111.</td>
<td>Slide Rules (2)</td>
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<td>112.</td>
<td>Navigation Light (Dark Glass)</td>
</tr>
<tr>
<td>113.</td>
<td>Navigation Light (All Round)</td>
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Appendix H

Boats in the National Museum of Ireland
Folk Life Division Collection (2006)
### APPENDIX H: BOATS IN THE NATIONAL MUSEUM OF IRELAND FOLK LIFE DIVISION COLLECTION (2006)

<table>
<thead>
<tr>
<th>Currachs</th>
<th>Length cms x width</th>
</tr>
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<tbody>
<tr>
<td>1. F2000:604. Racing Currach, Galway</td>
<td>920 x 1.1 (Daingean)</td>
</tr>
<tr>
<td>2. F1931:171. Tory Is</td>
<td>345 x 1.6 (Turlough)</td>
</tr>
<tr>
<td>3. F1928:421. Inis Oírr, Aran Is</td>
<td>590 x 1.6 (Turlough)</td>
</tr>
<tr>
<td>4. F1928:420. Inis Oírr, Aran Is</td>
<td>470 x 1.6 (Turlough)</td>
</tr>
<tr>
<td>5. F1952:126 Sheephaven. Donegal</td>
<td>460 x 1.6 (Turlough)</td>
</tr>
<tr>
<td>6. F1968:223 Inis Meáin, Aran Is(Turlough)</td>
<td></td>
</tr>
<tr>
<td>7. F1992:130 Galway</td>
<td>600 x 1.2 (Daingean)</td>
</tr>
<tr>
<td>8. F2000:60 Fibreglass, Achill</td>
<td>550 x 1.4 (On display, Vienna)</td>
</tr>
<tr>
<td>9. F1999:351. Sheephaven, Donegal</td>
<td>480 x 1.25 (On display, Vienna)</td>
</tr>
<tr>
<td>12. F1932:126. Sheephaven, Donegal</td>
<td>250 (Turlough)</td>
</tr>
<tr>
<td>13. Replica Belderrig Currach (Turlough)</td>
<td></td>
</tr>
<tr>
<td>14. F2004: Carraroe currach (On display, Vienna)</td>
<td></td>
</tr>
<tr>
<td>15. F2004 Paddling currach (On display, Vienna)</td>
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**CORACLES**

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<thead>
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<tr>
<td>16. F1928:764 Coracle (Turlough)</td>
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<tr>
<td>17. No reg no. Coracle. (Turlough)</td>
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<tr>
<td>18. F1931:129 Welsh Coracle (Turlough)</td>
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**COTS**

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<tbody>
<tr>
<td>19. F1968:352 Lough Erne Cot</td>
<td>630 x 120 (Daingean)</td>
</tr>
<tr>
<td>20. F1972:496 Barrow Cot*</td>
<td>320 x 100 (Daingean)</td>
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<tr>
<td>21. F1965:116 Rosslare Cot.* (Daingean)</td>
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<tr>
<td>22. F1971:121. Suir Cot * (Turlough)</td>
<td>440 x 136</td>
</tr>
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<td>23. Moy cot (Turlough)</td>
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**OTHER**

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<tr>
<td>24. Waterford Prong</td>
<td>536 x 160 (Daingean)</td>
</tr>
<tr>
<td>25. Mussel Boat, Boyne Estuary</td>
<td>510 (Daingean)</td>
</tr>
<tr>
<td>26. Lough Derravaragh Turf Boat. (Daingean)</td>
<td></td>
</tr>
<tr>
<td>27. Gleoiteog sailing boat, Galway. (Daingean)</td>
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<tr>
<td>28. Rush raft, River Suck. (Turlough)</td>
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<tr>
<td>29. Replica reed raft. (Daingean)</td>
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<tr>
<td>30. Shooting punt. (Daingean)</td>
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<tr>
<td>31. Moy cobble (Turlough)</td>
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* With line drawings