



Architectural  
Services  
Department



## **CLONDALKIN ROUND TOWER VISITORS' CENTRE**

**A visitors' centre at the Round Tower site,  
Clondalkin, Dublin 22**

### **DESIGN, CONSERVATION AND CONDITION REPORT**

**to be read as part of the documentation for a  
public consultation process under Part VIII of  
the Planning and Development Acts**

**May 2014**



South Dublin County Council's Architectural Services department is a Grade 2 conservation practice accredited by The Royal Institute of the Architects of Ireland

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**FUTURE EDITIONS OF THIS REPORT**

Other sections will be added to this Conservation Report, should the project proposal develop further in the future. These would include Cost Plan (budget costs), Monitoring and Maintenance (schedules and results of inspections and monitoring carried out), and possibly the following appendices: an asbestos report, a building fabric survey (including moisture profiling of timber, mould & infestations), a roof slate report, a preliminary health & safety plan, survey drawings, topographical and geotechnical survey reports, consultants' drawings, additional architectural drawings, and minutes of important meetings.

ISSUE SHEET			
Date	Distribution	Purpose	Notes
12.2.2014	SDCC internal + statutory bodies	Informal consultation	Pre-Part VIII and Minis. Consent consultations
20.5.2014	Public+statutory bodies	Public consultation under Part VIII	Also ministerial consent under National Monuments

## 1. Réamhrá (Introduction)

Tá sé ar intinn ag Comhairle Chontae Átha Cliath Theas ionad eolais a fhorbairt do chuairteoirí ar lathair stairiúl cloigtheach i sráidbhaile Chluain Dolcáin, d'fhonn stair áitiúil na háite móide iardheisceart Chontae Átha Cliath. Is léir ó iarsmaí nua-aimsithe gur mhair daoine i gCluain Dolcáin ón Ré cré-umha. Ar ball d'eascair áitreabh luath-mhainistreach Críostaí, a bunaíodh ag naomh Mochua nó Cronán, a d'éag sa bhliain 630. D'fhás an t-áitreabh seo i méid agus i gcáil nó gur dhein bunús an tsráidbhaile atá ann inniú.

Is iad na hiarsmaí atá fágtha den áitreabh úd, a threorodh ar ball forbairt an ionaid agus an tsráid bhaile ina thimpeall, ná an cloigtheach, eaglais Naomh Eoin agus fothrach eaglaise meánaoisí roimhe sin arís, na crosa, an t-umar baiste agus plean na sráideanna. Is sráid bhaile ar leith é Cluain Dolcáin sa mhéid go bhfuil a leagan amach slán ó na meán aoiseanna, agus ceann de na cloigthe is iomláine sa tír – laistigh de 10 gkiloméadar ó lár Bhaile Átha Cliath.

Is iomaí chúis atá le forbairt an áitreabh seo in aithréimniú Chluain Dolcáin: faillí in usáid na bhfoirgneamh ar an láthair, agus an meath atá orthu; an tábhacht ó thaobh na staire agus na hailtíreachta a bhaineann leo maraon le seasamh an ionaid i meon an phobaill mar aonad.

### 1.1 The project background

South Dublin County Council intends to develop a visitor's centre at the historic site of the round tower in Clondalkin village, to explain the history of the site and the area of south

west county Dublin. Previously discovered artefacts show that the Clondalkin area was first settled in the Bronze Age. Later the village became the centre of an early Christian monastic settlement founded by St. Mochua, also known as Cronan, who died AD 630. This settlement grew in size and fame and was the nucleus of the village as we know today. The round tower, the church of St. John, the fragmentary ruin of an earlier mediaeval church, the crosses, baptismal font and the street plan are the extant traces of this settlement, which would determine the future development of the site and the village around it. Clondalkin village is unique in having a largely undisturbed mediaeval town plan, and also one of the most complete and intact round towers in the country - less than 12 kilometres from Dublin city centre. The under-use of the buildings on the site and their deteriorating condition, the historical and architectural significance as well as the strategic position of this site both in the collective identity of the community and as part of the core of the emerging town centre, makes this proposed development an important element in the overall regeneration of Clondalkin.

The project proposes the repair and adaptation of the existing buildings, the design of one new building and the creation of new public spaces and public gardens, all of which are located on a site, which includes the Round Tower, to accommodate a visitors' centre for south county Dublin. No works are proposed to the round tower itself which is owned by the State. Responsibility for its maintenance is devolved by the Minister of Arts Heritage and the Gaeltacht to the Office of Public Works. This report addresses the design and conservation aspects of the project. It provides a comprehensive description of the site,

the proposals and their impacts. It should be read in conjunction with the drawings and archaeological report prepared by Valerie J. Keeley Ltd.) for South Dublin County Council, included in Appendix D to this report. The vision for the site can be summarised as follows:

- To create a vibrant, high quality and accessible urban quarter in the heart of Clondalkin village.
- To provide a centre for learning and appreciation of the history and culture of south west county Dublin.
- To contribute to the regeneration of Clondalkin village and to boost its economy.

### 1.2 The site

The village is a palimpsest of many layers built over a period of at least 1400 years<sup>1</sup>. The site for the proposed centre includes the round tower, the garden to the north and west of it, the three houses of Millview Terrace, the two houses of 15 and 16 Tower Road and their gardens. The area of the site for this project is 3100 sq.m., or 0.77 of an acre, or 0.3 hectares, as shown on the image on the next page. The ground slopes down from south to north by about 3 meters across the full length of the site. In terms of the proposed works, the site includes the area shown in the image: the tower in the south-eastern corner, the garden to the north of it, numbers 1, 2 and 3 Millview Terrace crossing from west to east and numbers 15 and 16 Tower Road from south to north along the north-eastern edge of the site.

<sup>1</sup> Although the round tower is the oldest extant structure in the village, its exact age and period of construction are still disputed.

In a wider sense the project considers the adjacent church, graveyard, Tower Road and mediaeval village plan as part of the urban precinct, although no works are proposed to them by this project. The site is situated at a key junction in the village, between the former mill buildings - now a modern commercial-retail district to the north, the historic precinct of the church of St. John's, the ruined mediaeval fragment of the previous church, the early Christian cross stones and stone baptismal font, the graveyard and the nineteenth century school building and almshouses along Tower Road, the Clondalkin leisure centre, former mill ponds, the Camac river, Corkagh Park with its historic buildings and amenities and the Camac caravan park and visitor's centre to the west.

The site is the last remaining substantial garden in the village. The round tower, the garden, the old houses, the church and graveyard are an important historical site and urban precinct which can act as a potential link to other historic sites, structures and amenities in and around Clondalkin, like Kilmahuddrick church (a.k.a. St. Cuthbert's), Ballymount castle, Deansrath house, Grange castle, Corkagh demesne, the Camac river and the Grand Canal.

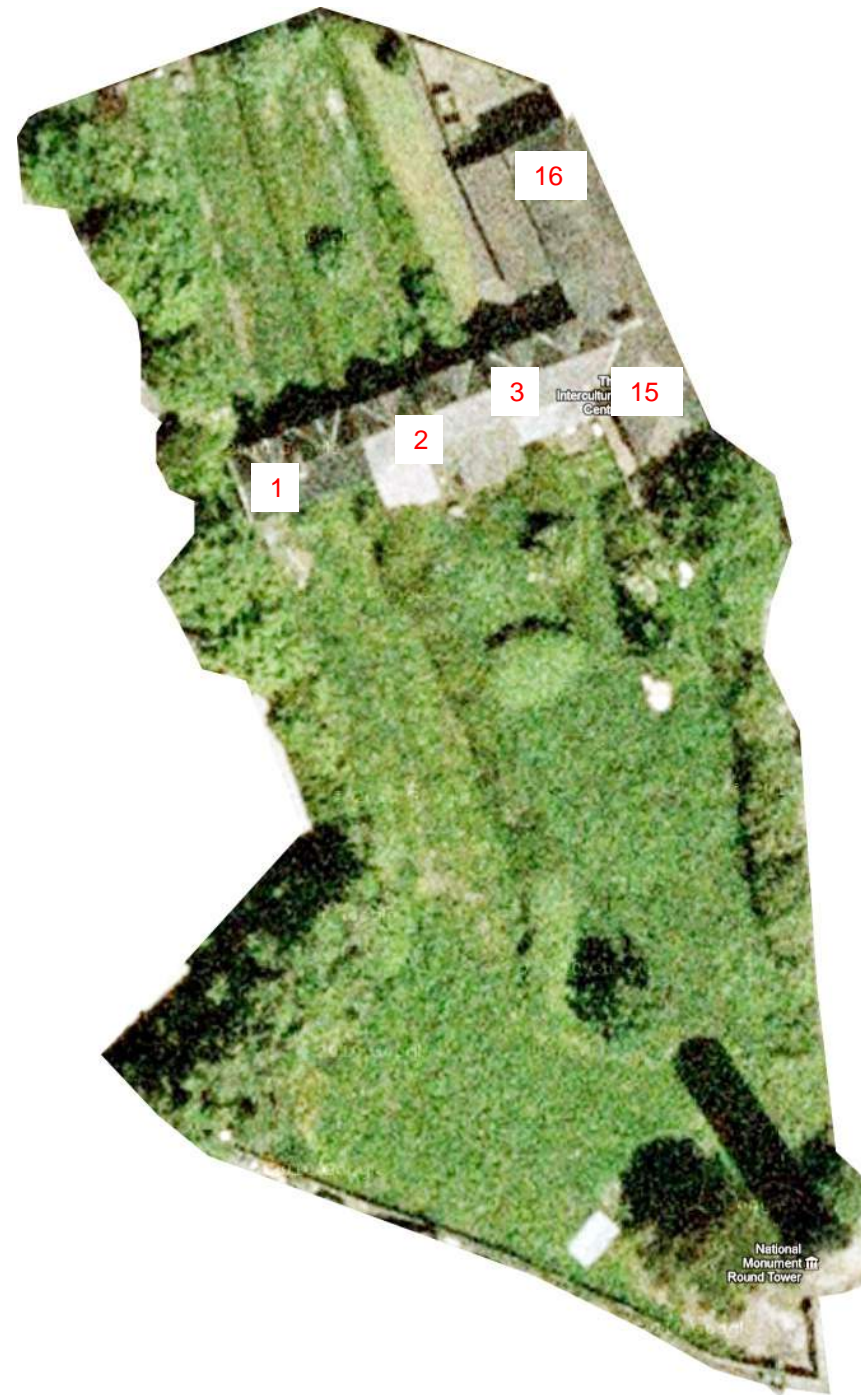


Fig. 1.1. An aerial view of the proposed development site. The round tower and entrance gate are in the south-eastern corner, 1, 2 and 3 Millview Terrace run west to east and numbers 15 and 16 Tower Road from south to north. North is up the page. A note on the numbering: both the National Inventory of Architectural Heritage (N.I.A.H.) and the Land Registry office number the houses on Millview Terrace in the opposite direction, 1 to 3 from east to west. The reason for this is not yet clear. (Source of this image: South Dublin County Council's OASIS database)

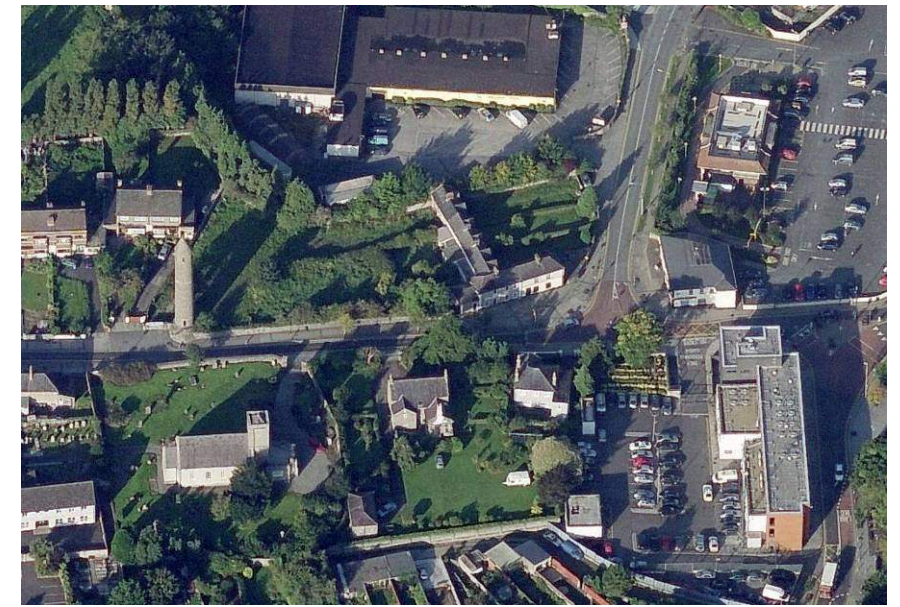


Fig.1.2. An aerial view of the proposed development site from the east

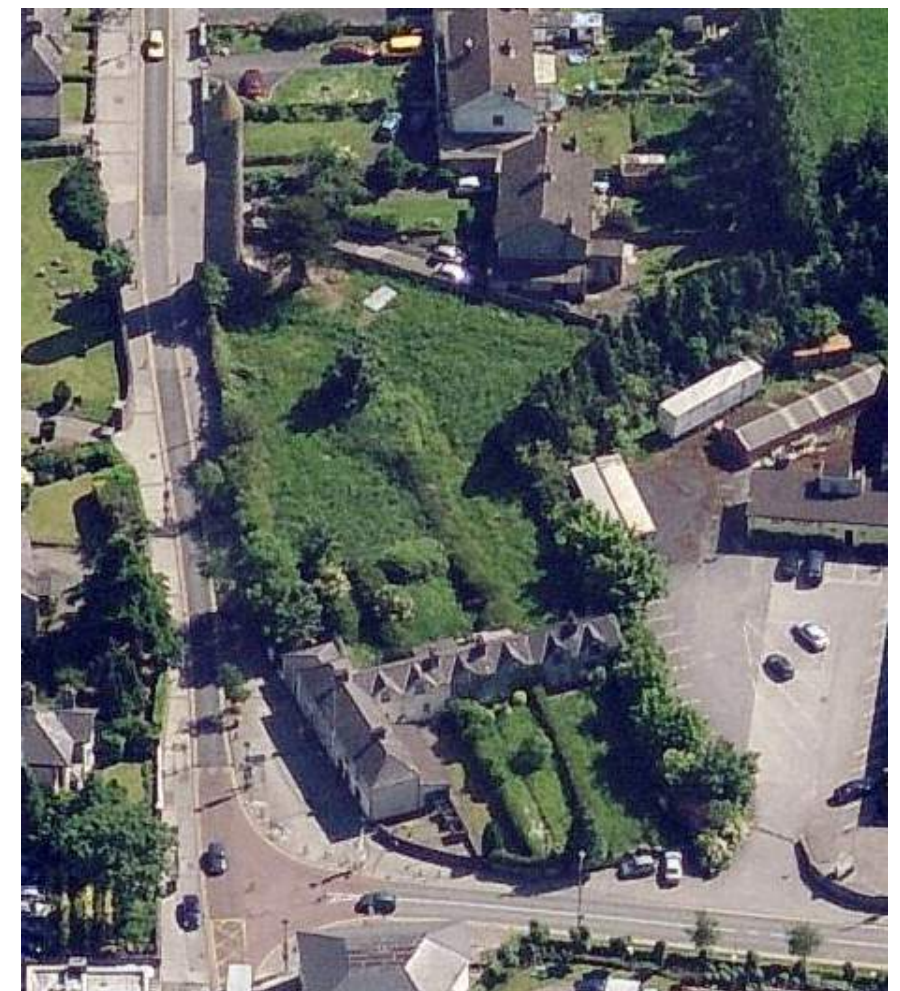


Fig.1.3. An aerial view of the proposed development site from the north. (Source: Screen shots from the website "bingmaps.com" on 4/2/2014)

The site is within walking distance of the Grand Canal to the north, the Camac and mill ponds to the west and the N7, Naas Road to the south. The site is well serviced by public transport; Dublin Bus provides regular services to the village, the LUAS tram serves Monastery Road and Red Cow to the east and there is a regular ARROW train service to Clondalkin station to the north of the village. The village is easily accessible by private car and coach from the N7 national route and the M50 motorway. Clondalkin has many hotels, pubs, cafes and restaurants within walking distance of the site that could cater for visitors. This project has great potential to bring new life, interest, investment and visitors to Clondalkin village and to provide a centre where visitors can learn about the history of the site, the village and south county Dublin.

The site is located in the historic core of Clondalkin village. It is in the townland of Clondalkin, the parish of Clondalkin and the barony of Uppercross. The Ordnance Survey grid reference for the round tower is 706903, 731400 and the map sheet number is 3326-09. The five houses are on the sheet number 3326-04. The site was on a country road until the end of the very early nineteenth century when the village extended to Tower Road and the area was gradually urbanised, the roads paved, a well and drinking water fountains were provided. The lands around the tower have since been developed with modern housing, office and commercial developments, mainly in the last fifty years.

South Dublin County Council owns numbers 1 and 2 Millview Terrace and numbers 15 and 16 Tower Road. It is in the final stages of acquiring number 3 Millview Terrace. In 2008 the

Council sought to develop a new museum on the site of the garden behind these houses and to the north of the Round Tower. The economic downturn postponed funding for this project. In recent years all the houses have remained empty with the exception of number 15 Tower Road, which is used as an intercultural centre. Following extensive liaison with local interest groups such as the Clondalkin Round Tower Heritage Group, Rally Round the Tower, the Clondalkin Historical Society, the local Chamber of Commerce and the local Tidy Towns Committee South Dublin County Council has identified the need to conserve and re-use these buildings and their setting. A scaled-down proposal from the larger 2008 project has been designed and is presented in this report. Several architectural drawings are included in an appendix to this report which explain the scope, scale and extent of the proposed project.

### 1.3 Project proposals

At the scale of the village, the project proposes to enhance and connect a series of existing public spaces in Clondalkin village which are presently closed off, separated or disconnected from one another, difficult to access or hidden in backlands locations, behind existing buildings and otherwise out of sight. The project would allow access to and through the site and the village in several directions, linking the historic village and the newer commercial district to the north and linking the urban centre with the large swathe of amenity and recreation facilities to the west - the Mill ponds, the leisure centre, and parkland along the Camac river to Corkagh Demesne and Camac caravan park, using existing routes and the public and cultural functions of the proposed

new use of the site to make connections within the site and as a draw to the site. The proposal hopes to underline the prominence of the Round Tower both by the physical response to the site and through the proposed use of the garden and five houses. The project proposes the refurbishment of the five houses, the demolition of existing rear extensions at numbers 16, 2 and 3, the interconnection of the houses by partially opening up the party walls between them, and the development of a new garden between the houses and the round tower. It is proposed to partly restore the front gardens of Millview Terrace as cottage gardens. A small extension is proposed behind the three houses on Millview Terrace, which would link the three houses and provide space for new stairs, toilets and other services. The extension would open out to the new garden and would provide information, exhibition and performance space. No works are proposed to the round tower itself by this project.

### 1.4 Consultations

A number of consultations have been undertaken as part of the design development process and will continue as the project develops. So far, there has been one presentation to the Clondalkin Local Area Committee of South Dublin County Council, several meetings with the Clondalkin Round Tower Heritage Group, initial consultations with the Office of Public Works who have responsibility for the Round Tower, and with the National Monuments Division and the Architectural Heritage Advisory Unit of the Department of Arts, Heritage and the Gaeltacht. Further consultation will be made as the project develops.

## 1.5 Statutory Consents and their Effects

### 1.5.1 The Planning and Development Acts

The project will require approval under Part VIII of the Planning and Development Act because the site, all five houses and the round tower are within the Clondalkin village Architectural Conservation Area (A.C.A.) and because the round tower and 1, 2 and 3 Millview Terrace are Protected Structures in the Record of Protected Structures (R.P.S.) of Schedule 2 of the south county Dublin Development Plan. The following records are in the Record of Protected Structures:-

- Clondalkin round tower, R.P.S.:- Map Ref. No. 138, Description: "Stone Round Tower, Church & Cross (RM)", Address: Tower Road, Clondalkin;
- Map Ref. No. 137: 1 Millview, Nangor Road, Clondalkin End Of Terrace Two Bay Single Storey House With Dormer Attic
- Map Ref. No. 137: 2 Millview, Nangor Road, Clondalkin Terraced Two Bay Single Storey House with Dormer Attic
- Map Ref. No. 137: 3 Millview, Nangor Road, Clondalkin End Of Terrace Two Bay Single Storey House With Dormer Attic



Fig. 1.4. An extract from the south Dublin Development Plan 2010-2016. The central area coloured blue is zoned to "protect, provide for and/or improve town centre facilities". The area coloured yellow is zoned to "provide for new residential communities in accordance with Approved Area Plans". The areas coloured green are zoned to preserve and provide for open space and recreational amenities". The Architectural Conservation Area is shown surrounded by a beaded red line. Part of the boundary of the Zone of Archaeological Potential is shown within the brown orange line.

Although the National Inventory of Architectural Heritage (N.I.A.H.) survey has no immediate statutory effect, planning authorities will have regard to it in considering a proposal. Numbers 1, 2 and 3 Millview Terrace are recorded in the

N.I.A.H. survey of south county Dublin, which was carried out in 2003. For some unknown reason the houses are numbered 1 to 3, from east to west which runs counter to the numbering system used by the most recent residents of numbers 1 and 3 who were consulted, and the numbers on the current ordnance survey maps. 15 and 16 Tower Road are not recorded in the N.I.A.H. survey.

Number 1, the westernmost house, is listed under Registry Number 11209023, as being of architectural special interest and is rated as being of regional importance. Number 2, the mid-terrace house, is listed under Registry Number 11209022 and is similar in all other categorisations. The same applies to number 3, the easternmost house, which is listed under Registry Number 11209021. The NIAH dates the construction of the houses to between 1800 and 1820. The effect of these statutory protections is as follows. Any proposals to develop the Protected Structures (1, 2, and 3 Millview Terrace, the round tower and their curtilage) would require formal planning consent, a consultation process under Part VIII of the Act, unless the proposals are for works for the maintenance, improvement or other alteration of the structure, which would not materially affect the external appearance of the structure or the character of the structure so as to render the appearance inconsistent with the character of the structure. (Source: Planning and Development Act, 2000. Section 4(1)(h).).

Also the carrying out of works to the exterior of a structure in the Architectural Conservation Area (numbers 15 and 16 Tower Road are not protected structures but are within in the A.C.A.) will be exempted development only if those works

would not materially affect the character of the area. This is in addition to the requirement under Section 4 (1) (h) of the Planning and Development Act 2000 that for works to be exempted, they must be consistent with the appearance of the structure itself and of neighbouring structures. Therefore, although development may be deemed to be exempted development elsewhere (i.e. outside the boundary of the A.C.A.) if the works to a structure in an A.C.A. would affect the character of the A.C.A. then formal consent may be required.

#### 1.5.2 The National Monuments Acts

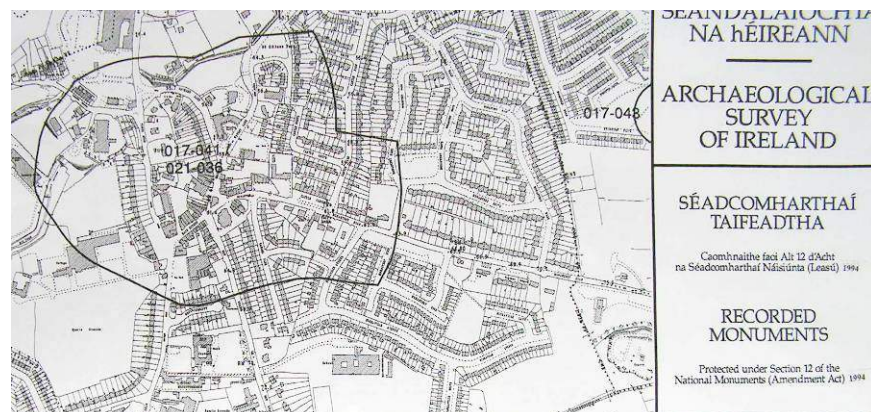


Fig.1.5. An extract from the R.M.P. which shows the Zone of Archaeological Potential around the village

In addition to the above statutory protections, the round tower and most of Clondalkin village are protected under the National Monuments Acts 1930-2004. The Round Tower is a “National Monument” and the site is within the “Zone of Archaeological Potential” established around Clondalkin village, both of which are subject to statutory protection in the Record of Monuments and Places, established under Section 12 of the National Monuments (Amendment) Act

1994. This is identified on the map and referred to in the Council's Record of Monuments and Places (R.M.P.) (Recorded Monument Reference No. DU017-041) under the County Development Plan 2010 - 2016 – Schedule 1, Record of Monuments and Places, referred to as a “Town”. Any proposals to develop and excavate the site would require a license, applied for by an archaeologist, predevelopment testing and supervision of all sub-surface site works by an archaeologist. Also the project will require Ministerial Consent under the 2004 National Monuments (Revision) Act. The following statutory designations apply:-

- Clondalkin village, RMP No. DU017-041, Description: "Town"
- Clondalkin village, Monument No. DU021-036, Townland or street name: "Clondalkin", Classification: "Town"
- Clondalkin round tower, Monument No. DU017-04106, Townland or street name: "Tower Road, Clondalkin", Classification: "Round Tower".

#### 1.6 The development and funding of the project

South Dublin County Council has expended considerable public monies in acquiring the houses at Millview Terrace. Funding for the proposed development project has been allocated in the approved 2014 budget. There may be limited funding capacity for the short term stabilisation works of the roof of number 2 Millview Terrace in the council's Village Initiative project. These works are specified in greater detail in section 10 of this report.

#### 1.7 The scope and purpose of this report

The purpose of this report is to explain the proposed conservation and re-use of the existing buildings, the design rationale behind the proposed new garden and new building, and to facilitate consultation with members of the public under Part VIII of the Planning and Development Acts, discussions with the Office of Public Works who act as guardians of the round tower, to obtain the necessary Ministerial Consents required by the National Monuments Acts, and to explain the purpose and rationale of this project to interested parties and potential funding agencies.

One particular aim of the report is to fully describe the site and its buildings, to describe their urban history, their condition and significance and to identify the causes of deterioration or problems, which presently affect the use of the buildings, their integrity and lifespan. The report identifies critical stabilisation works and future conservation and redevelopment works that are needed to stabilise the condition of the structures and to protect their heritage value and significance for future generations. These works will arrest the decay and will enable the buildings to be adapted for re-use. The report also describes the rationale behind the new use of the buildings and the impact of the proposed works on the significance of the buildings, the round tower and the site. The report describes the site, the proposals and their impacts. It should be read in conjunction with the architectural drawings and the archaeological report prepared by Valerie J. Keeley Ltd., which are attached as appendices to this report.

The report includes specifications and methodologies and an assessment of the impact of the works on the heritage value and significance of the structures and site. Planning compliance, budget costs, testing and monitoring (asbestos, mechanical and electrical) and procurement will be addressed in future editions of the report, if the initial planning stage is successful. Therefore the report is a live document which will be developed and revised at each stage of the project and which could ultimately be the building dossier for a completed development.

The report is based on research of the primary source historical documentation (photographs, drawings, maps, valuations, deeds, land registry and census data), and secondary source documentation (previous studies, reports, books, etc.) about the site and structures. The report is also based on the primary evidence – a survey and condition assessment of the site and of the buildings themselves. If the project is approved at Part VIII stage, a cost estimate will be refined following limited investigative opening up works to allow survey of primary structural elements, concealed material and for asbestos testing. Appropriate consents would be obtained in advance of any such works.

### 1.8 The layout of the report

This Design, Conservation and Condition Report is laid out as follows:-

- **The Historical Context:-** A discussion about the bedrock underlying Clondalkin, the quarries and brick manufacture once practiced in and around the village. A brief urban

history of the site and village is included. This provides an outline of the history of development of the site.

- **An assessment of the site and buildings:-** The report includes a description and assessment of significance of the buildings and structures on the site as they currently exist by applying the criteria of the National Inventory of Architectural Heritage (NIAH). A brief assessment of condition is also included for these buildings.
- **An assessment of buildings and structures adjacent to the site:-** There are a number of buildings and structures which directly bound the site and which will be impacted by the development. Their architectural importance is assessed here and the impact of the proposed development on them.
- **Statement of Significance:-** Following the assessment above, this summarises the principle architectural and cultural heritage significance the site and general area.
- **Description of Proposals:-** The overall urban design / master planning concepts are described first, followed by a brief description of the proposals for each building on the site and other structures, such as boundary walls. A brief landscape design statement and sustainability statement are also included.
- **Impact Assessment of proposals with mitigation measures outlined.**

### 1.9 Conservation Philosophy

The survey and recommendations of this report have been carried out in accordance with and guided by the Principles of the Venice and Burra charters, the latter produced in Australia in 1979 and amended in 1981, 1988, and 1999.

### 1.10 Executive Summary

The round tower is managed and maintained by the O.P.W. on behalf of its owner, the state. As stated previously, no works are proposed to the tower by this project. Therefore its condition is not considered in detail by this report.

15 and 16 Tower Road were built around the very late eighteenth century, or more probably the very early nineteenth century.<sup>2</sup> The low level of the granite cills in relation to the internal spaces and the footpath level outside would be typical of buildings of that period. These are simple small houses with few decorative details, so the date of construction has been estimated by the description of the houses, by reference to the Taylor map of 1816 and by their absence on the Rocque map of 1760. The date of construction of Millview Terrace is discussed in further detail in paragraphs 4.5 and 15.1.3 of this report. The three houses on the old Nangor Road were built slightly later, around the mid nineteenth century. All are good examples of small-scale residential buildings of their time. The interior of 1 Millview Terrace has been largely destroyed by fire damage and the other houses have been altered during their 180 or so years of use. Number 2 has been recently damaged by rainwater penetration through the breaches in its roof covering. The significance of these houses and of numbers 15 and 16 (the latter two are not Protected Structures but are within the Architectural Conservation Area) lies in their architectural form and detail, their group value as two terraces in the

<sup>2</sup> Thomas Seery and Son established the Clondalkin Paper Mill in 1801 on a site leased to them by William Caldbeck of Moyle Park. The houses may have been built shortly afterward.

village and their contribution to the social and historic development of the site. The condition of the buildings is variable: substantially sound in the case of numbers 3, 15 and 16, less so in numbers 1 and 2. However some of the best of the houses have deteriorated by long periods of disuse and lack of maintenance.

These problems are detailed in sections 7, 8 and 9 of this report. In summary they include:-

- Ingress of rain water from breaches in the roof covering, and from roof valleys where the lead lining has been stolen or removed (particularly in number 2 Millview)
- Failure and cracking of brickwork and of the mortar joints in some brick chimneys, and granite cills
- Failure of rainwater goods
- Structural cracking of walls, particularly the party wall between numbers 1 and 2.
- Some plant growth and biological staining
- Rot and deterioration in a number of trusses, rafters and joists, particularly in numbers 2 and 3 at the bearing ends
- Significant internal plaster failure, wetness and delamination in numbers 1 and 2.
- Some failure and partial collapse of lath and plaster ceilings
- Significant deterioration of fabric and structure at the junction with kitchen and toilet extensions from the 1950's
- Prolonged lack of ventilation
- Significant rot and decay of the timber floor structure of the first floor rooms, particularly in numbers 2 and 3.
- Obsolete mechanical and electrical installations requiring replacement.

### 1.11 Summary of Recommendations

The following actions are being considered to stabilise the structures:-

- Repair or re-cover the roofs with salvaged and new slate and repair and replace the rainwater goods
- Cut out and replace all decayed timber
- Repair of 1 window in 16 Tower Road and complete replacement of 11 windows in 15 and 16 Tower Road, partial replacement of about 12 windows in 1, 2 and 3 Millview Terrace and repair of the remainder.
- Re-pointing of the mortar joints of the stone boundary wall that separates the garden from Tower Road and the three front gardens with old Nangor Road
- Replacement of failed internal plasterwork
- Repair of elements of damaged internal lath and plaster ceilings
- Replacement of the existing aluminium windows (particularly those in house number 15)
- Removal of invasive plant growth, Buddleia etc. from wall tops and chimneys
- Demolition of the twentieth century extensions and annexes and making good the ground under them and the openings which connected to them
- Treatment of soiling and removal of black biofilm deposits
- Removal of iron fixtures embedded in masonry walls
- Monitor the recovery of the fabric over a number of years.

The works are scheduled as immediate, short term and long-term recommendations. The works are to be carried out under the guidance of a Conservation Architect Grade 2. These works would have an insignificant or minimal impact

on the characteristics of importance and are recommended for the long-term well being of the buildings.



Fig. 1.6. Number 1 Millview Terrace (right side) and number 2 (left side) viewed from the north with the round tower in the background.



Fig. 1.7. The backs of 1, 2 and 3 Millview Terrace (from left to right) and the hipped roof of 15 Tower Road on the right viewed from the south.

## 2. The Masterplan Framework and Wider Context

### 2.1 The Clondalkin Framework Plan

The proposed development of the round tower site fits into the existing approved framework plan<sup>3</sup> for Clondalkin and other local, county-wide and regional plans,<sup>4</sup> linking the village with the parks to the west and newer districts to the north. The project will establish and articulate the important buildings on the site, keeping any new buildings at or below the height of existing buildings so as not to impinge on them and on existing views. The project will improve views of and access to the round tower and appreciation of it.

This project proposes the conservation and re-use of five existing buildings; numbers 1, 2 and 3 Millview Terrace, Nangor Road, which are protected structures under the 2010-2016 South Dublin County Development Plan, and numbers 15 & 16 Tower Road. It also proposes the demolition of minor mid-to-late twentieth century extensions to the old buildings, the construction of a new building within the central portion of the site and the creation of a series of public landscaped spaces that will tie in the three main layers that compose the site: the medieval Round Tower, the existing houses and the new structures which will contain an exhibition area, education and display facilities, a café, shop, toilets and staff areas.

The overall design of the site, in terms of proposed use, form, layout and its access points has evolved from an integrated future strategy assigned for the area of Clondalkin Town Centre, including connections with the hinterland of Clondalkin and its open space network, which is described under policy TDL 4. Policy TDL 4: Clondalkin Town Centre:-

“It is the policy of the Council to facilitate & encourage the development of Clondalkin as a ‘Town Centre’ and the expansion of the Town Centre area northwards, and to provide for an integrated cultural and heritage/residential/commercial development of lands at the Round Tower. In the implementation of this policy, it is an objective of the Council to prepare an Urban Design Framework for the development of lands and sites in and around the town centre, to protect and strengthen the role of the town as a strong urban retail centre, to conserve the historic village core, to address the issue of underdevelopment and lack of cohesiveness in the urban area, and to promote and facilitate the Dublin Transportation Office’s proposals, including the Luas (Light Rail Transit) system, Quality Bus Corridors and traffic calming / management as they relate to Clondalkin.”



Fig. 2.1. An extract from the Clondalkin Framework plan (South Dublin County Council 2008). The concept is: the grey zone refers to the historic town centre of Clondalkin, the yellow zone represents the emerging new commercial zone, the green zone refers to the open parklands and recreational facilities along the Camac river and the red circle outlines the civic or administrative centre which connects with all three character areas.

<sup>3</sup> The Clondalkin Framework Plan, South Dublin County Council, April 2011

<sup>4</sup> Regional Planning Guidelines for the Greater Dublin Area 2010-2022, Dublin Regional Authority, (2010)  
A Platform for Change 2000-2016, Dublin Transportation Office (2001)

## 2.2 The Macro Scale

The overall development complies with the set policies for the site and the area within the current South Dublin County Council Development Plan 2010-2016: creating an open space & recreational amenities around the round tower and providing an integrated cultural and heritage related development. The layout of the complex, the connection between the existing buildings and the proposed new building, along with the proposed entrances to the existing Tower Road boundary wall will open up this underused site to create a public garden and a new pedestrian path that will link the existing historic retail centre of Clondalkin village to its religious and medieval core, the park, mill pond, leisure centre and the existing commercial district and to the longer-term proposal to develop a high density mixed use centre to the north of Clondalkin.

This pedestrian flow will tie in the different zones that compose Clondalkin village, increasing the level of appreciation of its historic, architectural and environmental qualities, such as the medieval core, the round tower, the mill ponds, the open green parks, the local commercial centre and the proposed future, multi-use high density centre to the north. The proposed development and associated routes will also improve pedestrian access to the village from the outlying housing estates.

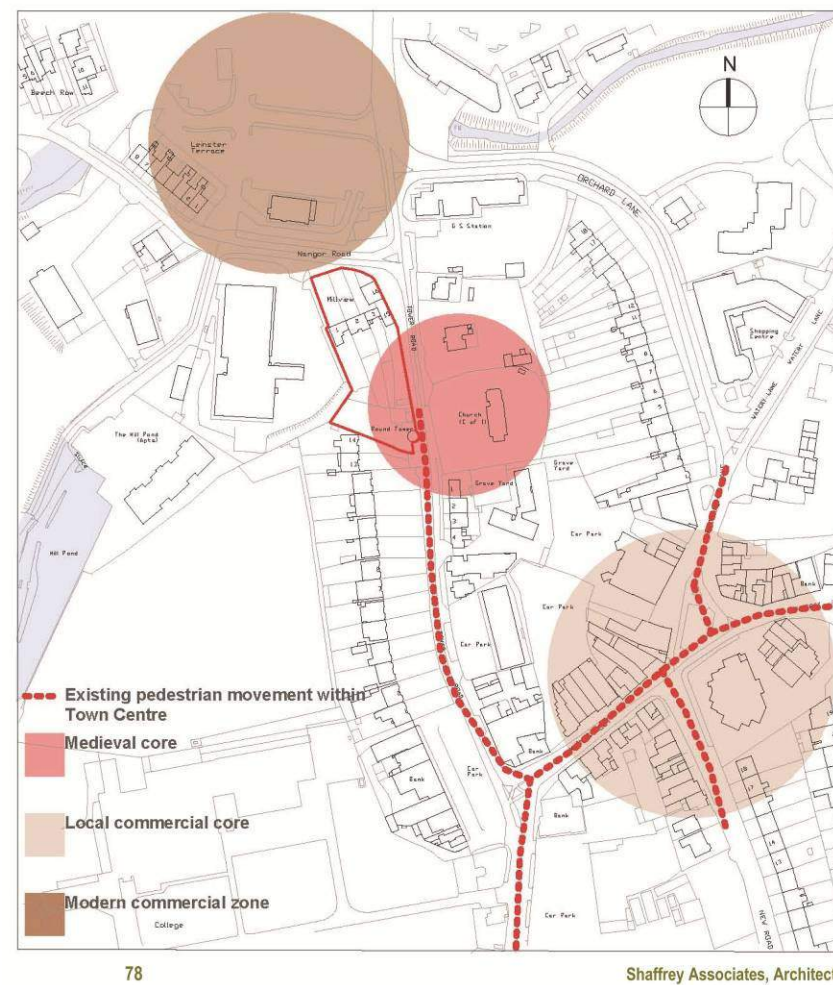


Fig. 2.2. Map of Clondalkin Town Centre showing the existing town centre composition and the popular pedestrian routes. At present the existing Main Street (to the south, shown with a pale brown colour) and the large commercial “Mill” shopping centre to the north of Clondalkin village (shown with a dark brown colour) form two gravity poles set on an approximate north-south axis. (Source: from pg. 82 of the report “Round Tower Site, Clondalkin-Design and Conservation Report” commissioned by South Dublin County Council from Shaffrey Associates Architects, 2008.)

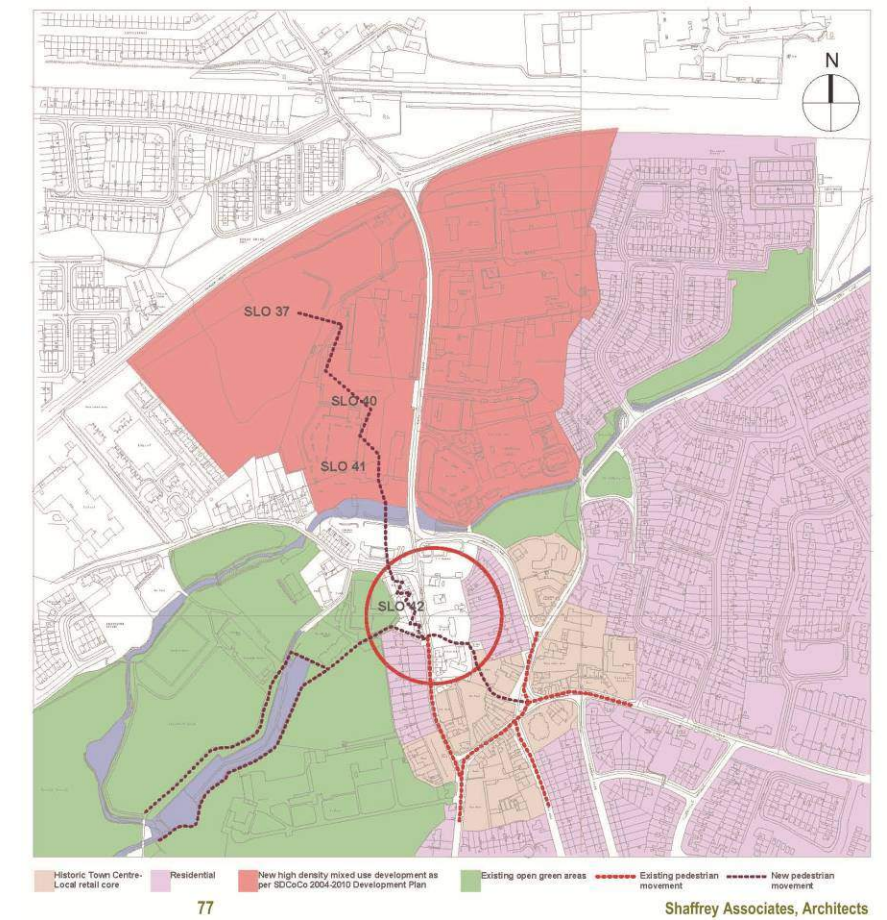


Fig. 2.3. A larger scale map of the wider Clondalkin area which shows the proposed new linkage points and pedestrian routes that would branch out from the Round Tower Visitors’ Centre to the four existing zones in the town along with the longer term proposal to develop a higher density mixed use development to the north of the round tower site. (Source: from pg. 81 of the report “Round Tower Site, Clondalkin-Design and Conservation Report” commissioned by South Dublin County Council from Shaffrey Associates Architects, 2008.)

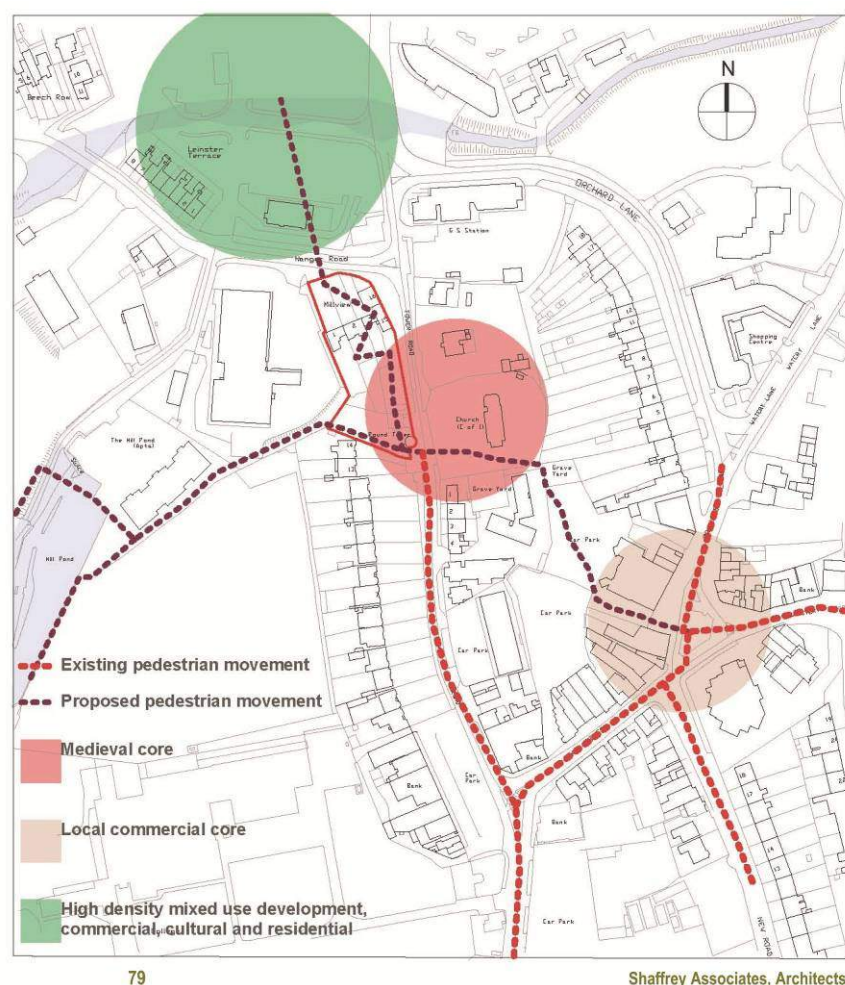


Fig. 2.4. The proposed project would cross the existing north-south route between the two retail centres (Main Street and the Mill shopping centre) with the new proposed east-west path between the cultural and historical cores of the village (the historic market place, round tower site, the mill ponds and onward to Corkagh. (Source: from pg. 83 of the report “Round Tower Site, Clondalkin-Design and Conservation Report” commissioned by South Dublin County Council from Shaffrey Associates Architects, 2008.)

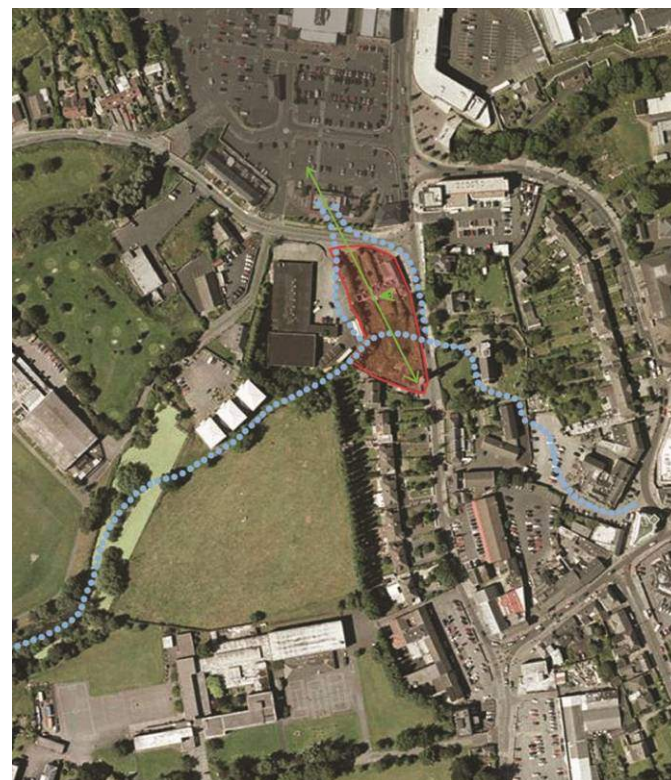


Fig. 2.5. An aerial view of the village which shows the possible improvements to pedestrian circulation described in the maps above (Source: from pg. 7 of the report “Round Tower Site, Clondalkin-Design and Conservation Report” commissioned by South Dublin County Council from Shaffrey Associates Architects, 2008.)

Clondalkin Park has been obscured from the town centre by late twentieth century house developments and access to it is only through a small pocket of residential apartments and via the existing Leisure and Community centre grounds off Nangor Road. Therefore the park is presently in a back land situation, is invisible from the village and access to it is confined to one quiet lane, of which many people and visitors are probably unaware. The proposed development of the round tower site will assist in opening up access to this area for everyone to Clondalkin Park from a point that is in the heart of the town centre.

### 2.3 The Micro Scale

The proposed visitors’ centre will create a complex of buildings and gardens within this underused site. The arrangement, position and design of the new structure is determined by the site’s topography and the scale and location of the existing structures. The project will create a cultural core that will be enlivened by new public gardens and pedestrian paths that will infiltrate the site and the complex creating new access points to the park. Clondalkin round tower is a prominent focal point in the village and surrounding area. It can be seen from several distant vantage points and from most of the approach roads to the village. It was always intended to be an axis, to guide people and visiting pilgrims who approached the village from afar. The project will enhance the setting of the rounds tower and will provide another vantage point of the tower from the north, which has not been available to members of the public. The project will also allow the tower to be seen in the context of the church site, similar to the sketch on the cover of this report.

The project proposes a clear distinction between the new and old buildings, and a strong engagement between the two to provide an overall coherence for the completed complex. The existing buildings, due to the small scale of their interior spaces, will accommodate more intimate exhibition and study spaces. The new buildings are designed to accommodate the larger volume spaces – stairs, exhibition and café spaces, using the sloping topography of the site to conceal the size and scale of these new buildings

## 2.4 The link between the round tower and the church

The historic connection between the round tower and the church site has been diminished by the high western boundary wall of the church site, and by the vehicular traffic on Tower Road. In the longer term pedestrianisation of part of Tower Road between the church site and the round tower site is being considered by South Dublin County Council, so that the historic connection between the round tower and the site of the medieval church and its artefacts can be partly re-established - partly, because the previous church was orientated east-west, perpendicular to the present church of St. John's, and because it was closer to the round tower and its door, which once faced the western gable. This is considered further later in the report. South Dublin County Council's Roads and Transportation department have already realised much of the infrastructure that would allow this: the construction of the ring road around the western fringe of Clondalkin village, the connection of the eastern end of Monastery Road with the M50 motorway and the N7 national route and most recently, the widening of part of old Nangor Road and construction of footpaths on both sides to allow safer pedestrian access to the village from the west, are all complete. This pedestrianisation still requires more research and modelling of existing traffic flows and is therefore not proposed as part of this project.

## 2.5 The cycle network

South Dublin County Council has already developed a network of cycle routes around the county with the National Transportation Authority. Many sections which impact on this

project are already built: these include the "greenway" along the Grand Canal from Lucan which passes to the north of Clondalkin. A north-south route is proposed to connect the canal with the village and the river Dodder to the south. This has the potential to bring more visitors to the proposed development site and to improve its accessibility.

## 2.6 Future development and management of the project

A number of models for development and management of the proposed development have been considered by South Dublin County Council. The proposed visitors' centre and the restoration of the five houses will be designed and developed by South Dublin County Council's Architectural Services department, a Grade 2 conservation accredited practice. The proposed public garden will be designed and developed by specialists within the council's Parks and Landscape Services department and by the council's Public Realm Officer. The buildings and public garden will be maintained by the council. The proposed visitors' centre will be run by the council, with the café and shop each managed by a franchise, following competitive procurement. The council is open to considering more recent developments, such as that by the National Monuments engaging with visitors and working with local community initiative schemes, such as the recently launched "Friends of Irish Heritage".

### 3. The bedrock underlying Clondalkin, the quarries, the stone and other building materials used.

#### 3.1 Local bricks and brickworks

It is generally well-known that the round tower itself, most of the boundary walls and many of the older buildings in Clondalkin village are built from locally quarried calp limestone. It is perhaps less well known that there were once several brick manufacturers in the Clondalkin area, although tragically at the time of preparing this report no bricks are being manufactured in Ireland at all.

The walls of the houses at 1, 2 and 3 Millview Terrace and 15 and 16 Tower Road are mainly built from pale yellow bricks, which are almost certainly of local origin. The bricks are regular-sized, kiln-fired bricks with a coarse surface texture and a fairly even yellow-pinkish colour with little variation between them in terms of size, colour and texture. Although the houses were rendered externally and plastered internally, a few bricks are exposed to view in several locations in the five houses, often where the plaster covering the walls has been damaged or was inadequately applied in the first place - under stairs, where chases or penetrations were made for services and ducts, the gable walls in attics, etc. These bricks accord with the description and dimensions recorded in historical texts, such as that by George Kinahan<sup>5</sup> which dates from the late nineteenth century. It includes the following comment on brick making in Clondalkin:-

<sup>5</sup> Kinahan, G.H. Economic Geology of Ireland, (1889, Royal Geological Society of Ireland) page 375.

*“The bricks made here are the old county Dublin stock-bricks and are 9 x 4½ x 3 (inches). They were extensively used formerly in all the old buildings in Dublin and the best old streets were built of them; price about 45s per 1000.... The bricks were principally made at the Fox and Geese, Ashfield and near Red Cow. They were formerly made at Cloverhill, Ninth Lock, Grand Canal and are still made by Flood and a few others, but from want of proper care they have much deteriorated in quality; colour brownish-yellow; about 350 go to the ton”.*



Fig. 3.1. The brick reveals at the back door of the house of 1 Millview Terrace. These were exposed after the building was damaged by fire; a charred door frame is visible on the left side of the photograph

#### 3.2 The calp limestone

With the exceptions of the granite intrusions in the south, calp limestone is the bedrock of much of county Dublin. It was quarried extensively, and continues to be at Belgard today. Its quality is very variable, from occasional good quality dimension stone used in fine ashlar work to poor quality mudstone suitable only for rubble walling, hardcore rubble or for burning to make lime for mortar and agricultural use. The rusticated base of the old library at Trinity College Dublin (see Fig. 3.8, finished 1732, Thomas Burgh, architect) and the plinth of Clondalkin library (see Fig. 3.7, finished 1911, T. J. Byrne, architect) are unusually good examples of the former and most of the limestone boundary walls around Dublin of the latter; that at the “Museum” LUAS stop at Collins (formerly Royal) Barracks being particularly representative.

Calp limestone often has easily detectable bedding planes and rich veins of chert - a black mineral interspersed with white veins of calcite and beds of mud. The mud eventually washes out leaving cavities in the stone. When compared mineralogically with the grey blue evenness of texture and colour of carboniferous Irish Blue limestone which is quarried from the central plains of Ireland, calp limestone has higher quantities of impurities like silicates and aluminates. Therefore historically it was often burnt to make hydraulic limes of variable quality for mortars and for improving acid soils for agriculture<sup>6</sup>. Calp limestone is generally a hard

<sup>6</sup> Carrig Conservation International Ltd. and McMahon, Mary, “South Dublin County Industrial Heritage Survey, Desktop Study” (South Dublin County Council, The Heritage Council, November 2012)

stone and is difficult for masons to cut or shape. In addition to Clondalkin, it was also quarried at Rathgar, Donnybrook (the Dublin Bus garage site), Lucan, Rathfarnham and Clondalkin. George Kinahan recorded that the calp in the library at Trinity College was quarried at Palmerstown. George Wilkinson recorded that the best quality was quarried at Lucan and Palmerstown. On page 37 of his text<sup>7</sup> is the following description:-

*“The calp limestone is so called from a name accidentally given to the very extensive beds of impure limestone and shale which prevail in the counties of Dublin, Meath, Longford, Donegal, Sligo, etc. It differs from the ordinary carboniferous limestone in being generally of a dark colour (though sometimes of a pale, ashy appearance), and in its alternating with beds of clay or shale; and it commonly contains a large proportion of silex, which renders it hard, and brittle in fracture, and frequently very difficult to work. It produces large, flat-bedded stones, which, however are seldom of much thickness ..... it occupies a low, comparatively level surface from which circumstances of quarrying of it is often attended with difficulties, from the quantity of water with which the quarries become filled”.*

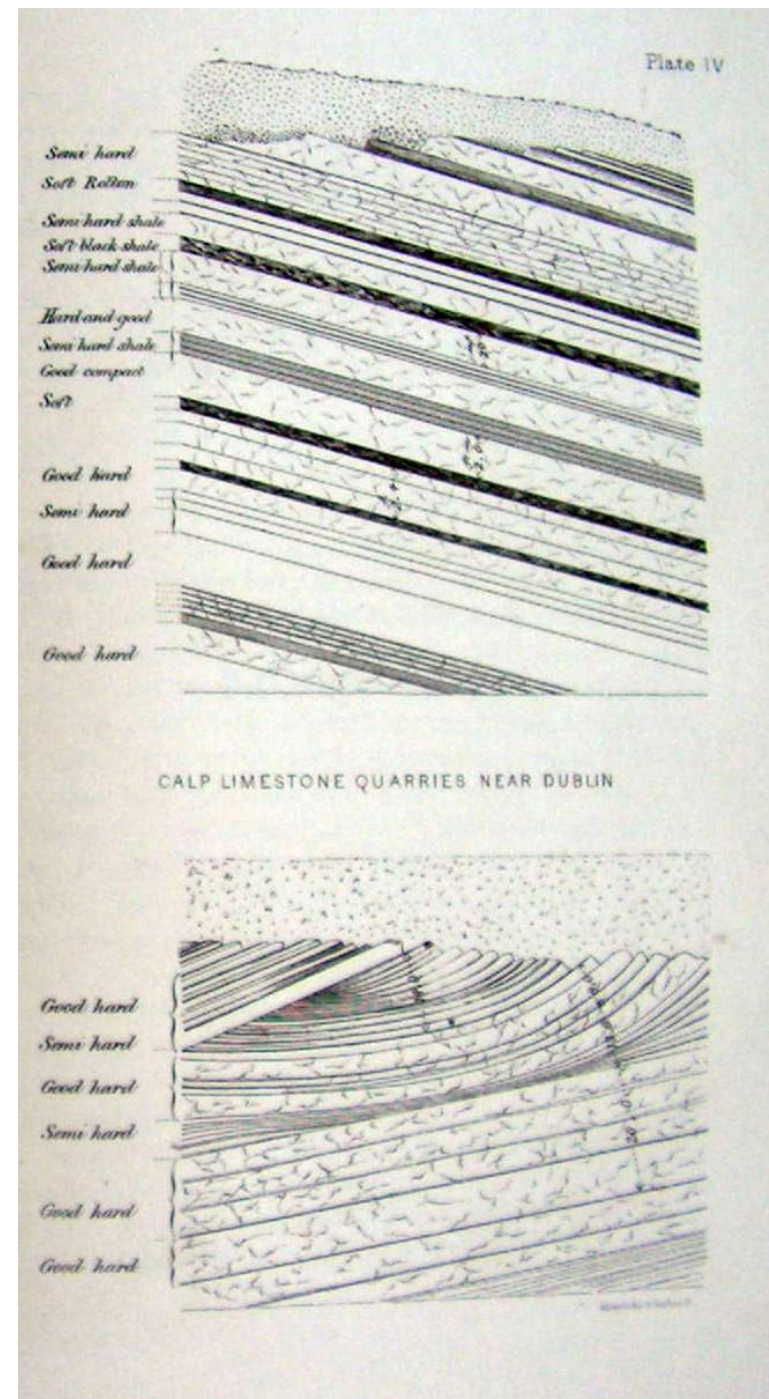


Fig. 3.2. A diagram of calp limestone quarries, copied from Wilkinson G. “Practical Geology and ancient architecture of Ireland” (1845, William Corey Jr. & Co., Dublin) (Plate IV, between pages 38 and 39)

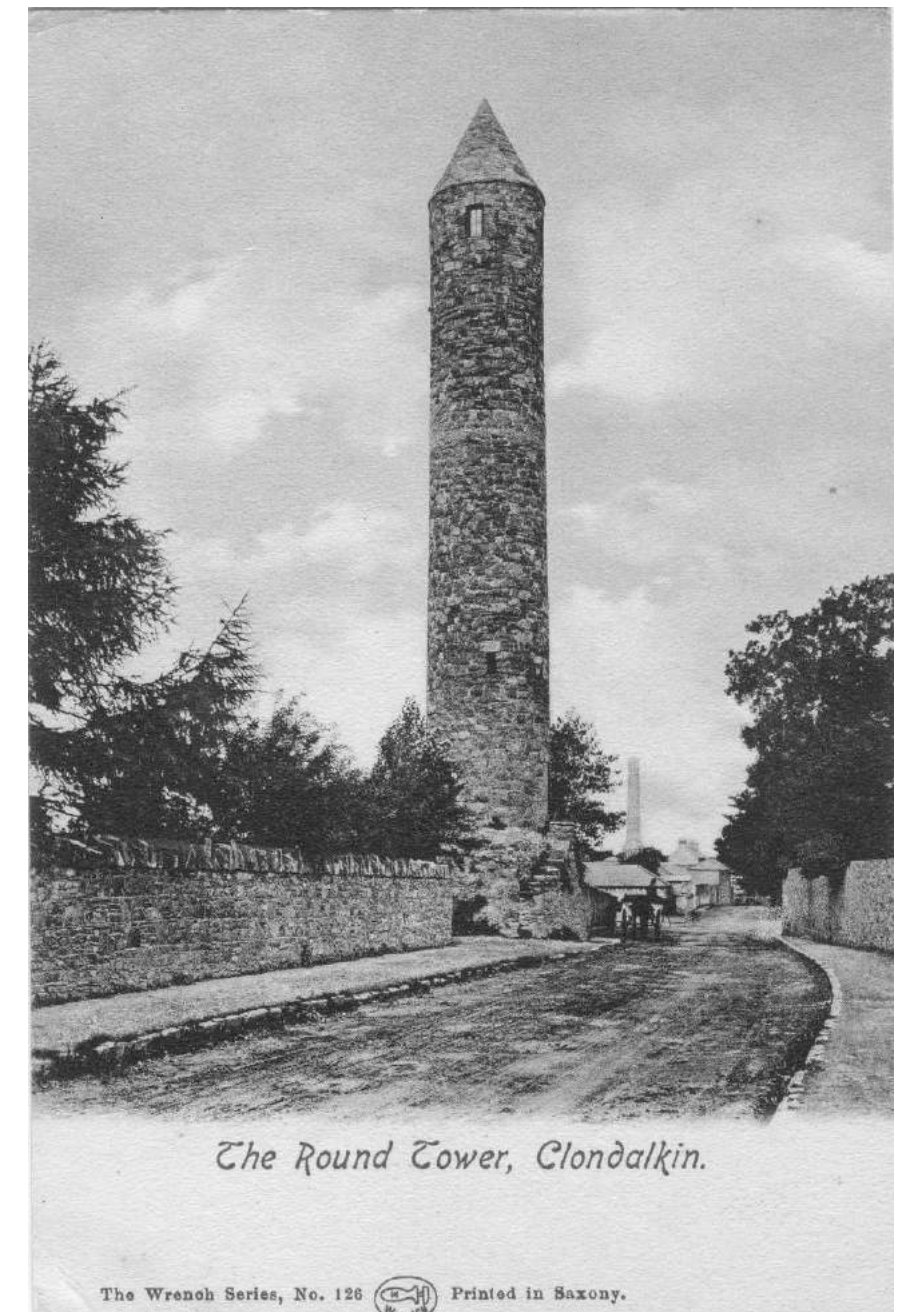


Fig. 3.3. The Round Tower, Clondalkin, (Source: South Dublin Libraries Local Studies Section) A postcard view of Church Terrace and Roundtower Road. The photograph shows the texture of the calp limestone of the boundary wall and the round tower. The same wall is shown as a drawing on Fig. 3.12 B a few pages further.

<sup>7</sup> Wilkinson G. 1845 Practical Geology and ancient architecture of Ireland Dublin. William Corey Jr. & Co.

From examination of the old maps of the area much of the stone quarried locally seems to have been taken from the ground around Knockmeenagh Lane, to the east and south-east of the village.<sup>8</sup> The origins of the name “Knockmeenagh” Lane, suggests that quarrying has been carried out there since ancient times.<sup>9</sup> Knockmeenagh Lane is described as “Green Road” on Duncan’ map (1821) and on the Longfield map of 1782 from the National Library of Ireland, reproduced on page 44, Figure 4.39.

Many maps graphically and textually record the existence of quarries, lime kilns, gravel pits and brickfields, from Rocque’s map of 1760 onward. The first and third editions of the ordnance survey maps (Figure 3.9 on the following page) show several quarries concentrated around the area to the south-east of Clondalkin village, on either side of Knockmeenagh Lane. At least one published text refers to quarries at Clondalkin<sup>10</sup> although it is puzzling that neither Wilkinson nor Kinahan specifically mention it. The former existence of the quarries is still evident today in the sudden changes in ground level and strange large hillocks of grass and weed covered debris, which mysteriously and suddenly appear if you walk around this part of Clondalkin.

<sup>8</sup> However, the round tower may have been built from calp quarried to the west of it: pg. 26 “St. Mochua and the Round Tower”, Williams, J. South Dublin Libraries

<sup>9</sup> The etymology of Knockmeenagh Lane is given as follows:- “Luegmeenagh Lane is applied to Knockmeenach Lane in a deed of 24th Mar. 1790 and in two others. Lueg seems to represent the word liag (a flag or flat stone) : if so, production of flags by the quarry” (Ua Broin, Liam. “Clondalkin Co. Dublin and its Neighbourhood.”, Journal of The Royal Society of Antiquaries of Ireland 74 (1944): 191-218., pg. 193. An alternative is “cnoc mianach” the hill of minerals or material - road metal? (“From Generation to Generation, Clondalkin Village Parish and Neighbourhood”, Byrne, R.H., Graham, A, Dublin, 1989, page 87)

<sup>10</sup> P Pavia, S. and Bolton, J., Jason “Stone Monuments Decay Study” (Duchas) and, Pavia, S. and Bolton, J. “Stone, Brick and Mortar, Historical Use, Decay and Conservation of Building Materials in Ireland” (Wordwell, 2000). The former book records that calp limestone was quarried at Clondalkin.

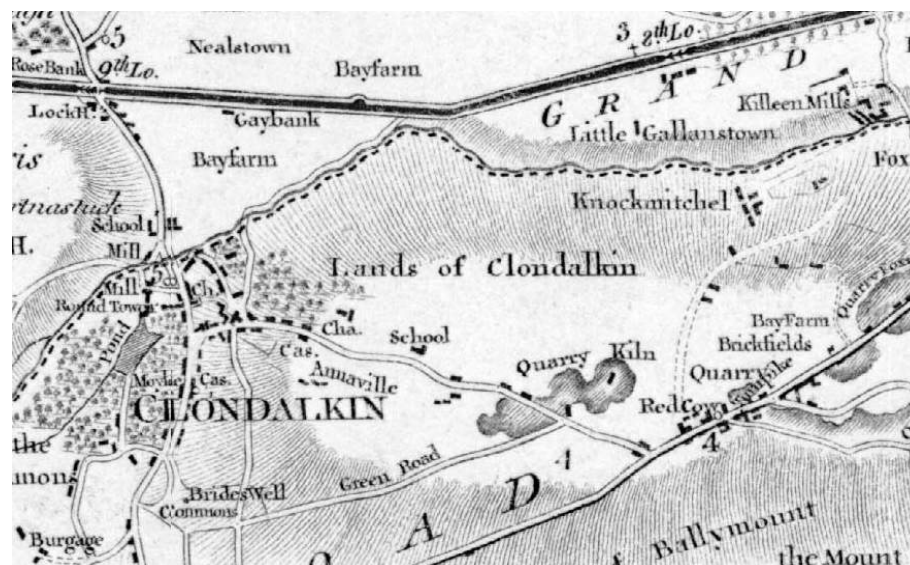


Fig. 3.4. An extract from Taylor’s map of south county Dublin, published 1816. Note the references to “Quarry” “Kiln” and “Brickfields” at the east end of Knockmeenagh Lane, recorded as “Green Road”.

There is a great variety of detail and artistic style in the use of calp limestone in Clondalkin village. The school building and almshouses on that part of Tower Road known as Church Terrace, built 1879 or 1880, are faced with it. These buildings replaced the houses with hipped thatched roofs (described as “Dispensary and Lying In Hospital” on the 1<sup>st</sup> edition O.S. map) and shown on many of the early nineteenth century drawings and prints. The designed, formal geometry of the later buildings with their straight sharp edges, slate roofs and classical detailing contrast with the humpy, rounded vernacular of the thatch houses with tiny window and door openings, pleasingly misaligned with the road edge which they replaced. The front facades of the newer almshouses and school house buildings are of squared, snecked rubble masonry executed in calp, except the quoin stones which are finished smooth. The window and door openings of the almshouses are large, lined with brick, fair faced.



Fig. 3.5. The school building, Church Terrace, viewed from the south (built circa 1880), photographed April 2013. The window opening was formerly a door. All the timber windows have been replaced with uPVC. The wall in the left foreground has been reduced and was once rendered. Part of the wall is shown on Fig. 3.12 A on the following pages.



Fig. 3.6. A photograph of the almshouses with their brick lined openings on the left. A corner of the school building is shown on the right.



Fig. 3.7 A close up view of the front façade of Clondalkin library (1911). The rock-faced calp limestone contrasts well with the granite cill above.



Fig. 3.8. The old library, Trinity College Dublin (1732). The unusually fine ashlar calp rusticated base and a granite doorset.

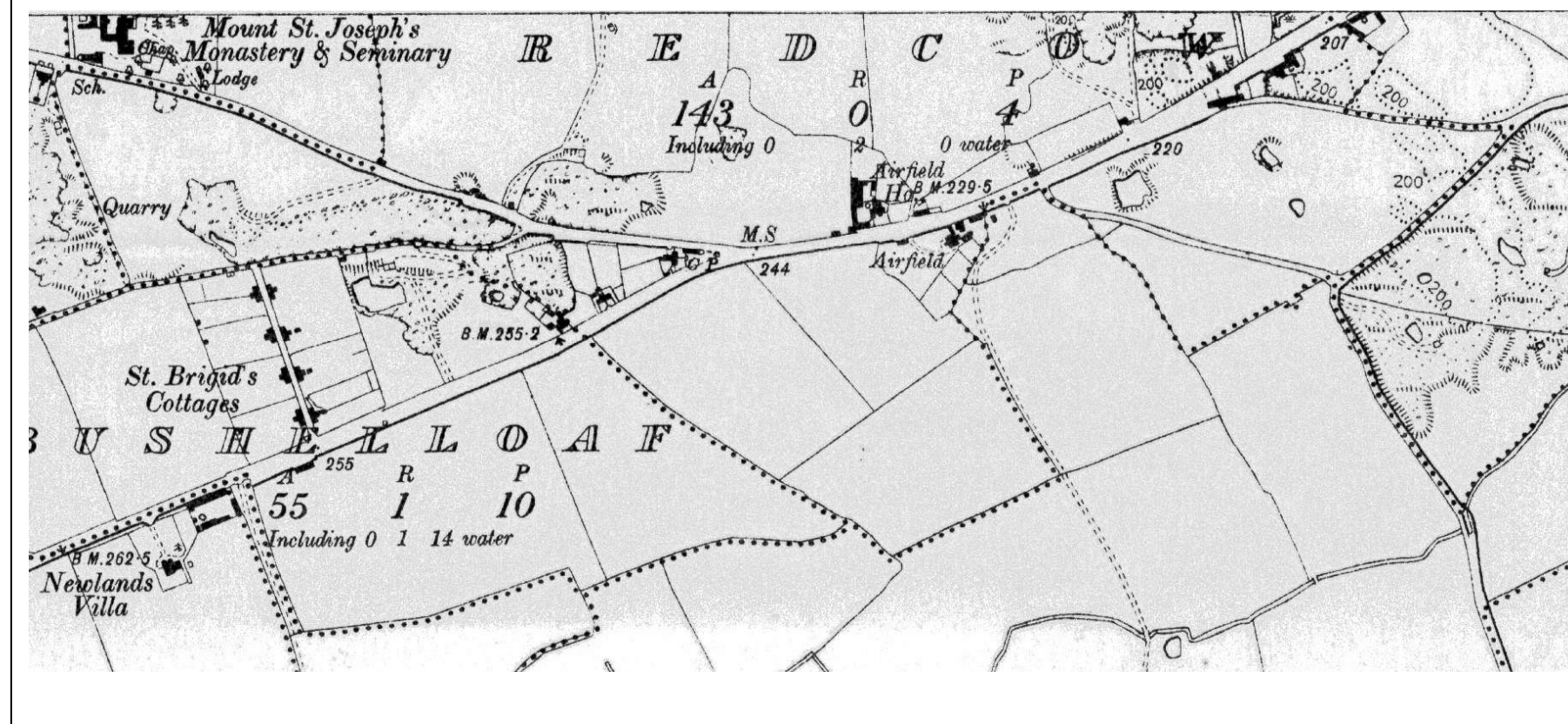
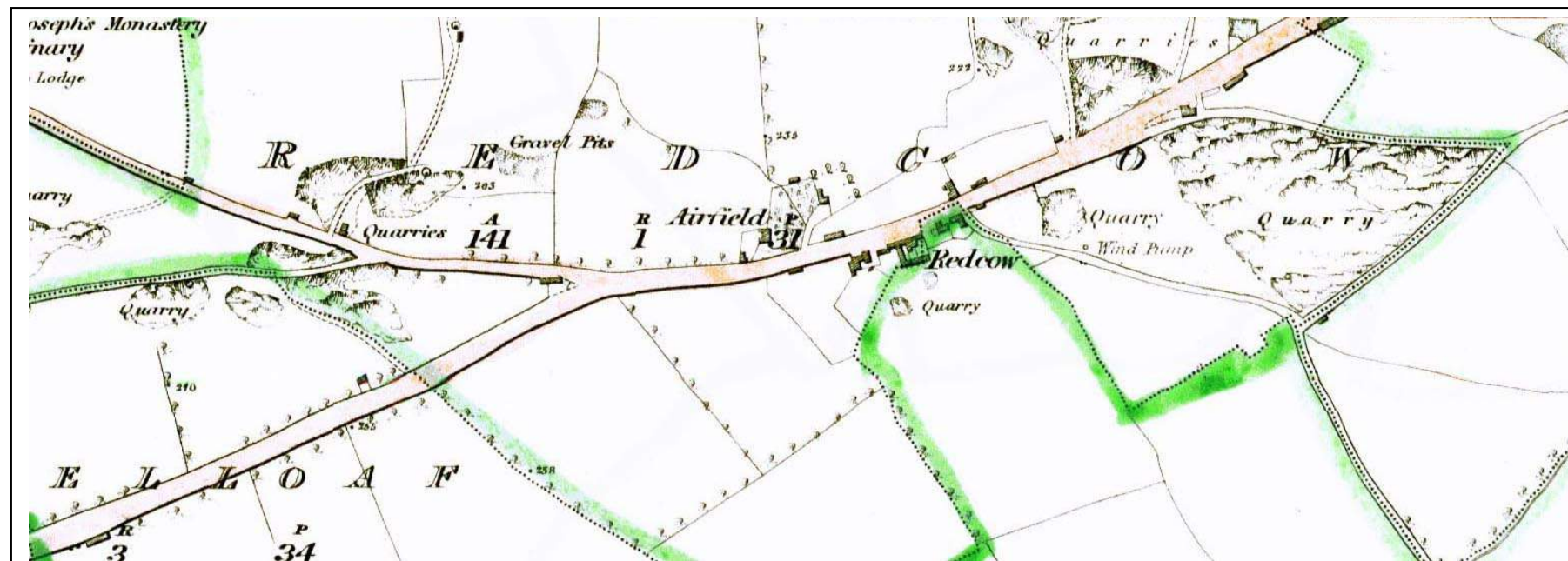


Figure 3.9. Extracts from the 1<sup>st</sup> edition Ordnance Survey (Sheet 21, published 1843) and 3<sup>rd</sup> edition (Sheet No. 21, published 1911) which show the Knockmeenagh Lane area to the south-east of Clondalkin village. The extent and number of quarries and gravel pits is evident. Both Rocque's map (1760) and Duncan's map (1821) show quarries at the end of the lane. Duncan's map describes "Quarries" further east, just beyond Red Cow and Turnpike.

### 3.3 The boundary walls around the village

At a glance the many boundary walls, which still exist in and around Clondalkin village today might be loosely described as random rubble jointed calp with a crenellated coping of calp stones bedded on edge. However closer examination reveals a huge variety of detail in these, from coursed to uncoursed walls, copings of evenly-sized cut stone or of jagged uncut stone, soldier coping, alternate projecting coping or flush coping, with variable projections beyond the face of the wall or flush with the wall and with different finishes: lime-washed, wet dash, or ruled or lined lime mortar. There are many other variations in the village that are too numerous to show in this report, for example further west along Nangor Road, on Boot Road, Watery Lane and Knockmeenagh Lane. The variety, beauty and durability of these walls is a testament to the artistry and skill of their masons and to the local tradition which sustained them.

The generic, crenellated copings on many of the walls in Ireland and are distinguished from one another by names such as “cock and hen”, “cow and calf”, “king and queen”, “coxcomb” and other local distinctive names. The soldier coping with indented face on the boundary wall on Orchard Road (Fig. 3.13, C) is bedded on edge, perpendicular to the natural bedding planes of the calp and rests on a horizontal band of bricks which are on a random rubble wall of small pieces of calp, since rendered with a dash and bordered with sand and cement bands. Also the most striated stones were selected for the coping with their contrasting bands of chert and calcite, which gives a beautiful effect. The wall on both sides of the bridge over the river Camac on Nangor Road

and beyond (Fig. 3.13, A) is of calp, finished with a half barrel-type coping of granite with a slight projection. A beautifully curved, cut-granite coping is also used at the gate lodge of Moyle Park to make an opening in the massive crenellated coping of the rest of the wall (Fig. 3.13, B). Elsewhere the coping has been removed from most of this wall and its height reduced where suburban houses were developed in the former estates along Tower Road and Boot Road from the 1950's onward. The wall is now finished with a variety of sand and cement dashes of different aggregate and painted in different colours, but is otherwise the same calp limestone wall underneath. The restoration of this wall by removal of modern finishes and reconstruction of a new crenellated coping would greatly improve this approach to the village from the south, but it would be difficult to get the agreement of all the home-owners. Also the restoration of the wall would make it more durable; the previous removal of the coping and its replacement with cast in situ cappings of sand and cement has caused damage to the wall in places: water has got into the core of the wall and weeds have colonised the wall tops causing individual stones to dislodge.



Fig. 3.10. Part of the former boundary wall of Moyle Park estate along Convent Road. The wall has had its coping removed, been reduced in height, punctured to give access to driveways, and in places rendered.

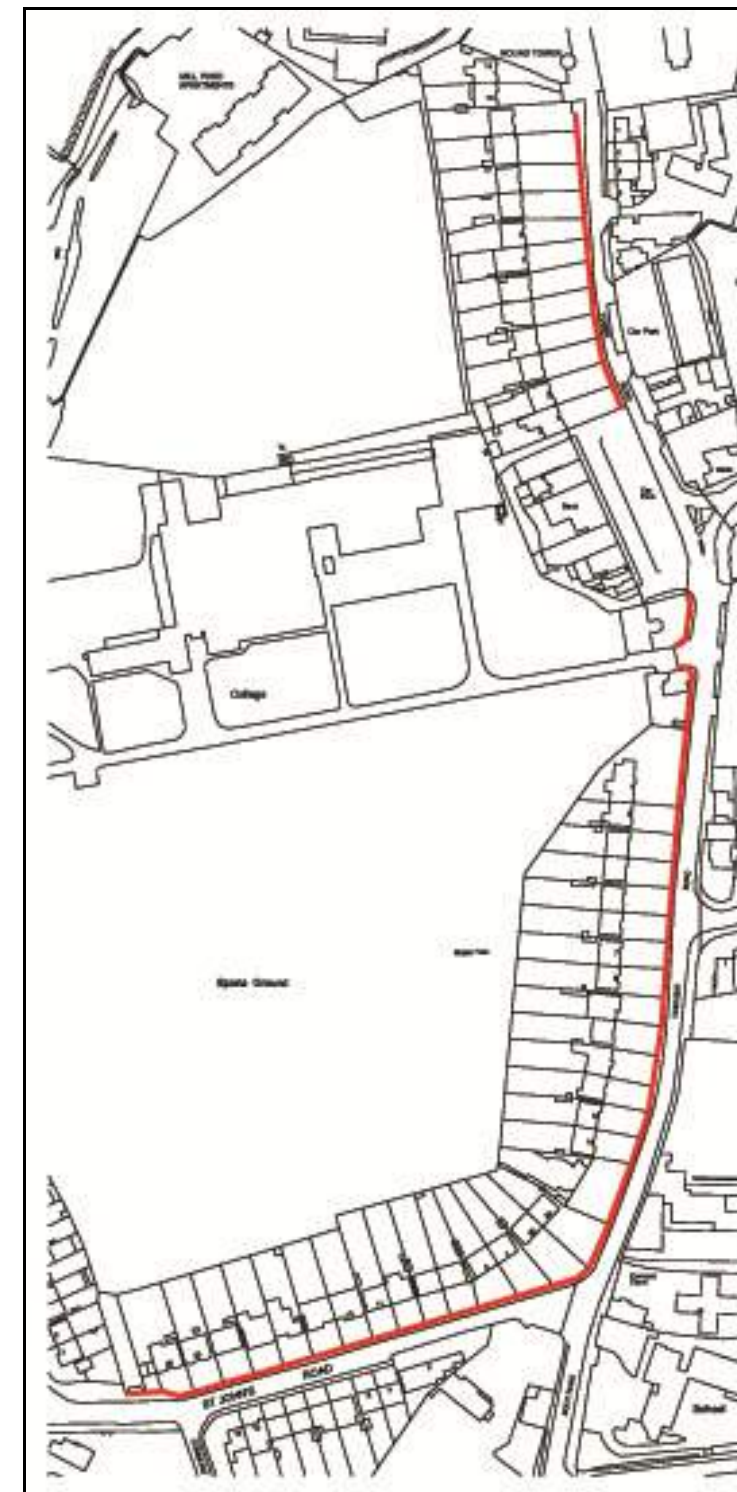


Fig. 3.11. The extent of the boundary wall of calp limestone boundary wall, most of it from the former Moyle Park estate, which still runs, albeit in modified forms, to the south of the round tower along Tower Road, Convent Road and St. John's Road.

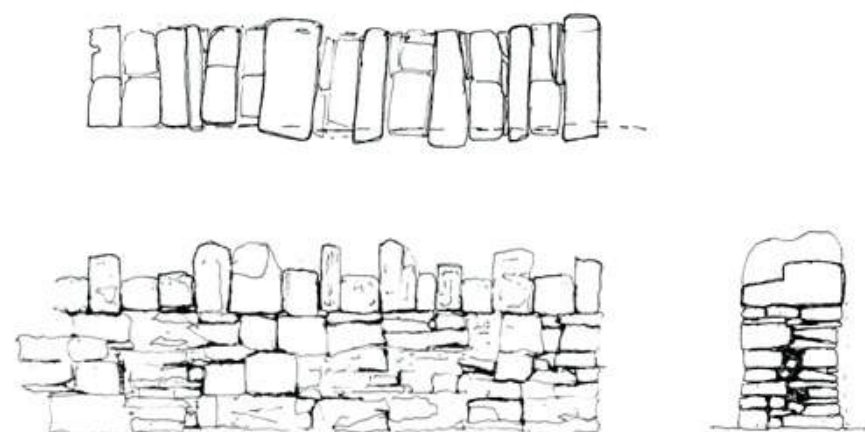


Fig. 3.12 A



Fig. 3.12 C

Figure 3.12 some of the boundary walls around the village, plan, section and elevation.

A. Tower Road, east side, outside the old school. Coursed random rubble with massive coping. The wall was built in the late nineteenth century and has been reduced in height since. The wall is clearly shown in the famous Livingstone / Fr. Browne photograph

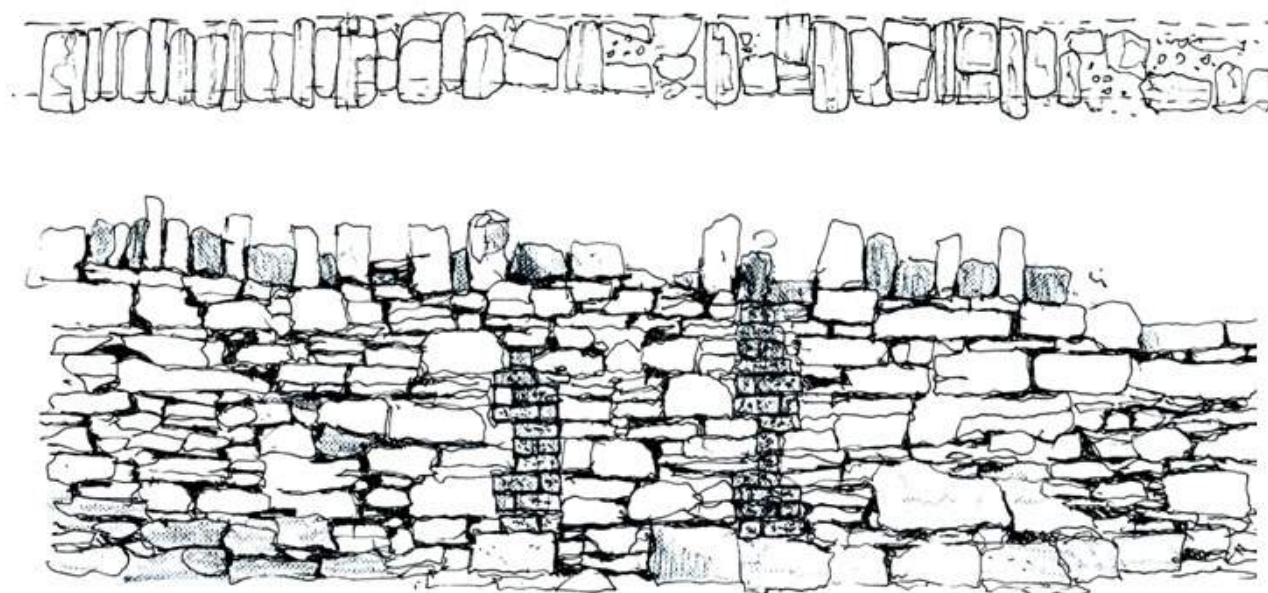


Fig. 3.12 B

B. Tower Road, west side, beside and to the north of the round tower. Random rubble, un-coursed calp limestone with brick lining to former openings, since sealed. Some of the wall was limewashed; traces still remain. The wall was originally built in the early nineteenth century, much altered since. The coping has been damaged by trees being blown against it and by. The wall is bulging and leaning in places where adjacent trees sway against it during windy weather. Some of the crenellated coping stones are loose or missing, and in the latter, the core of the wall is exposed and has been colonised by weeds and shrubs. The mortar joints are severely eroded. It is proposed to do conservation and restoration works to this wall as part of the project.

C. Watery Lane, west side, part of the boundary to Áras Chrónán. Part coursed, random rubble with projecting crenellated coping.

NOTE. All walls are shown to scale  
All walls surveyed and drawn by the author

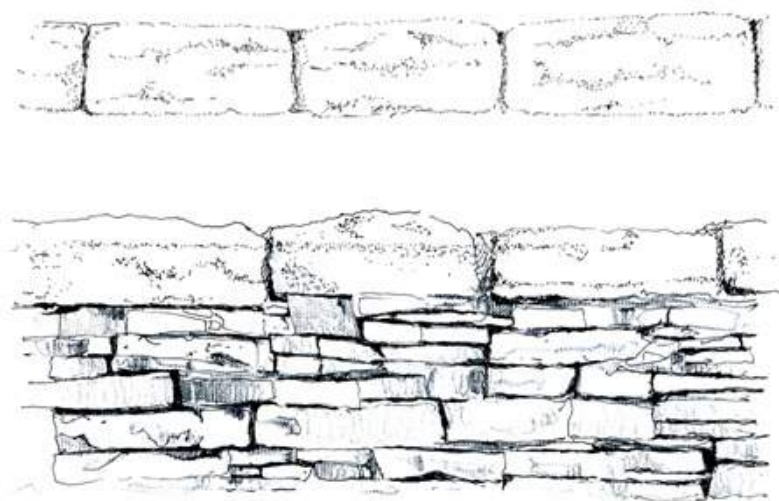


Fig. 3.13 A

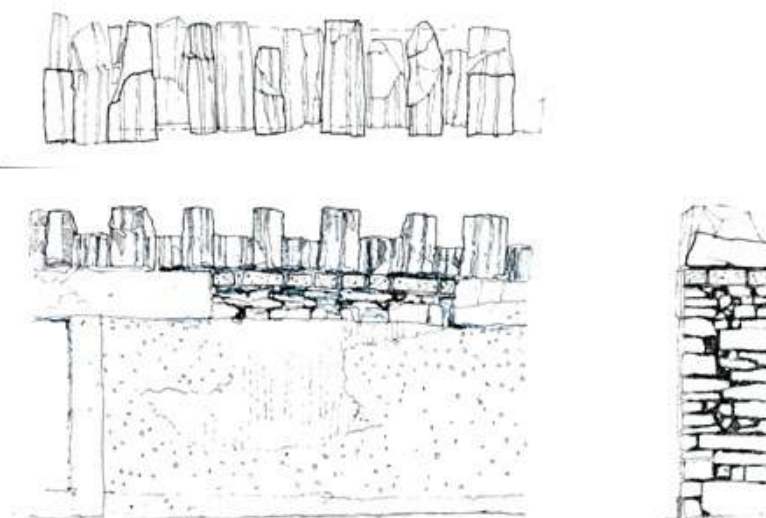


Fig. 3.13 C

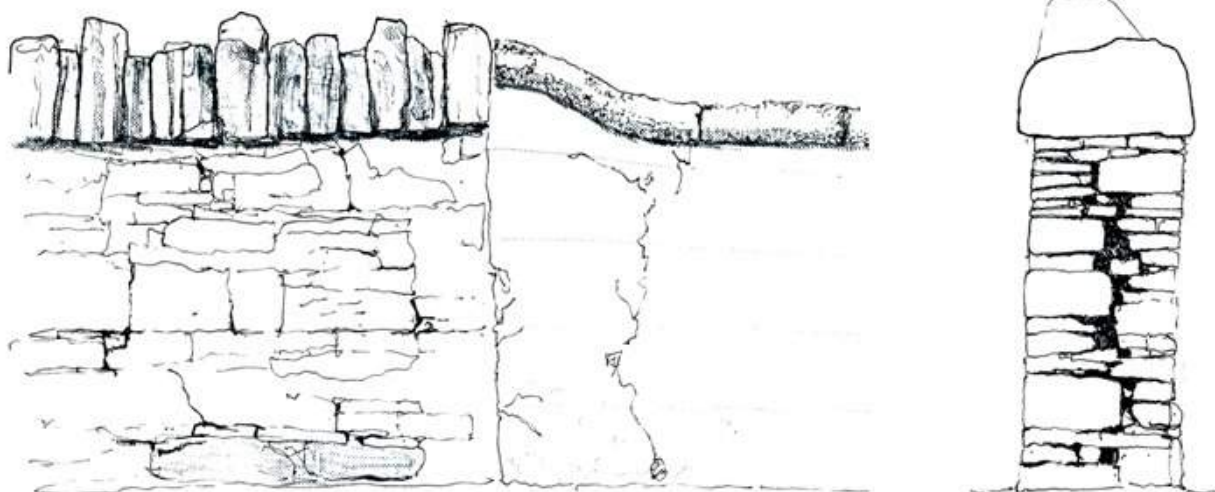


Fig. 3.13 B

Figure 3.13 Boundary walls around the village

A. (old) Nangor Road, south side, on and either side of the bridge over the river Camac. Un-coursed random rubble calp limestone with half-barrell coping of granite. The wall probably dates from the late nineteenth century. Generally good condition.

B. Convent Road, west side, beside the Moyle Park gatelodge. Random rubble, coursed calp limestone with a projecting massive coping. The opening at the gate lodge is made by a ruled lime render on the wall and a granite coping

C. Orchard Lane, north end, part of the rere boundary to Áras Chrónán. Coursed, random rubble with projecting crenellated coping made from selected calp with extreme bedding planes. The coping rests on a single course of bricks. Subsequently wet dashed and bordered with sand and cement

NOTE: All walls are shown to scale  
All walls surveyed and drawn by the author

3.4 The boundary wall to the north of the round tower, along the east side of the proposed development site

A rubble calp limestone boundary wall borders the eastern edge of the existing garden, running from the northern side of the round tower and terminating at the gate pier to the south of number 15 Tower Road. Partly built during the first half of the nineteenth century, it was extended during the second half. However the wall incorporates some older built fabric, pre-existing fragments of wall and facades of buildings. The extensive trees and shrubbery which once surrounded the round tower were cleared during the second half of the nineteenth century. The wall is an important part of the fabric of Church Terrace and Tower Road. A consideration of its construction and alteration over time reveals some of the changes to the wider area. The wall is protected by statute because it is within the curtilage of the round tower and number 3 Millview Terrace, which are Protected Structures. Parts of the wall are shown in Figures 3.3 and 3.12 B above and Figures 3.14 to 3.20 below.

The wall is approximately 1.8 meters in height, varying slightly along its length, is built from uncoursed random rubble Dublin calp limestone with some brickwork used to line a former door or gate opening, and topped with a projecting coping of alternate stones, which are generally of the same width and crenallated on top. Although it appears to be a single boundary wall, it is in fact made up of several walls built during different periods. There is at least one blocked up previous door or gate, several complete vertical joints, fragments of a plaster render near the base of the tower and subtle differences in the work and detail along its

length. This variation in the wall's finish and vertical joints are analysed against a sketched overlay of the first ordnance survey map in the following pages.<sup>11</sup>

The northern half of the wall probably dates from the first half of the nineteenth century. This half of the wall is clearly marked by a clean vertical joint beside the hipped roof extension to number 15 Tower Road (this building is described as a "Dispensary" on the 2<sup>nd</sup> edition O.S. map). The second half of the wall which is located to the southern end, nearer to the tower, was probably constructed in the second half of the nineteenth century as part of the boundary wall to Moyle Park House, which was located to the southwest of the tower. Examination of the drawings from the early nineteenth century and first and second edition ordnance survey maps shows that the cottages which once existed to the south and north of the round tower were cleared and their gardens were absorbed into the estate of Moyle Park House (since demolished) during the mid to late nineteenth century.

Much of the boundary wall is in poor condition; many of the mortar joints have severely eroded back into the joint, much of the coping has loosened and fallen away in places, leaving the core of the wall vulnerable to colonisation by weeds and shrubs. In places the wall is surprisingly thin with a high ratio of height to wall thickness and is leaning or bulging outward where nearby trees have moved against it during high winds, and have gradually pushed it outward.

<sup>11</sup> Figures 3.18, 3.19 and 3.20 are all taken from the report "Round Tower Site, Clondalkin – Design and Conservation Report" commissioned by South Dublin County Council from Shaffrey Associates Architects (January 2009)

The proposed repairs to the wall as part of this project include the removal of vegetation growing from the wall and immediately behind it, the restoration of the coping and missing pinning stones using salvaged material from the adjacent long grass where possible, re-jointing of the wall and re-pointing where necessary. It is proposed to re-open the brick-lined, blocked up opening to the north of the round tower, which would allow passage between the round tower site and the site of the church in the future. It is also proposed to replace the existing modern gate to the south of the round tower with a new gate or salvaged old one, built within the existing piers of concrete block work. It is proposed to render the existing piers with a lime render.

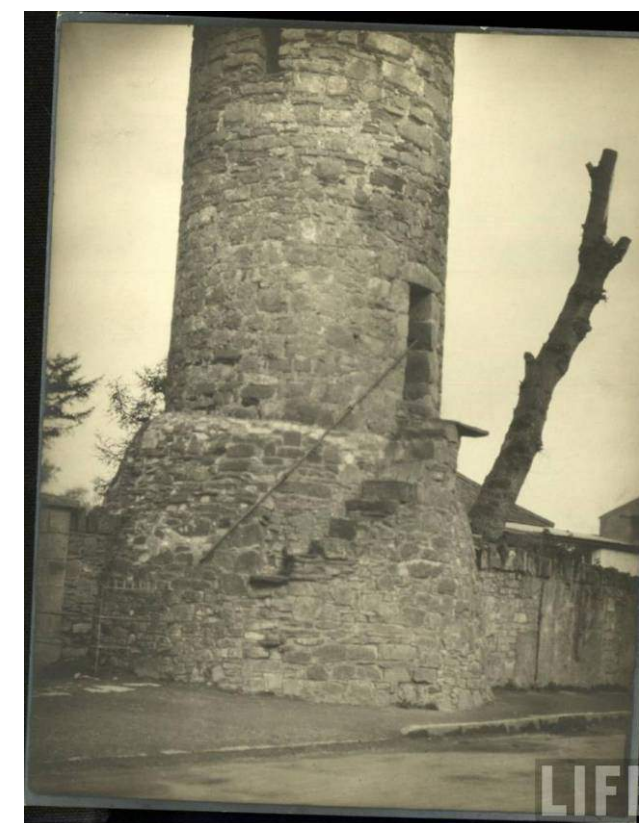


Fig. 3.14. A photograph of the base of the tower, not dated. Note the stub of wall to the north of the tower and the pier of the gate to the south of the tower. (Source: Image donated courtesy of Peter Ging, architect)

Three views of the boundary wall to the north of the round tower:



Fig. 3.15. "Clondalkin Tower, Co. Dublin", a watercolour view of the round tower from the north by William Roe, dating from the early nineteenth century. Note the same stub of wall (shown on Fig. 3.14 and on the map, Fig. 4.88, pg. 67), the gate and thatched house to the north of the tower. As explained in Fig. 3.18 below, much of this part of the future boundary wall was only built later in the century but appears to incorporate fabric from the house, stub wall and former gate. (Source: copied from page 148 of "The Watercolours of Ireland, Works on Paper in Pencil, Pastel and Paint, c. 1600-1914", by Anne Crookshank and the Knight of Glin, Barrie and Jenkins, London. The original watercolour is in the collections of the National Library of Ireland.)

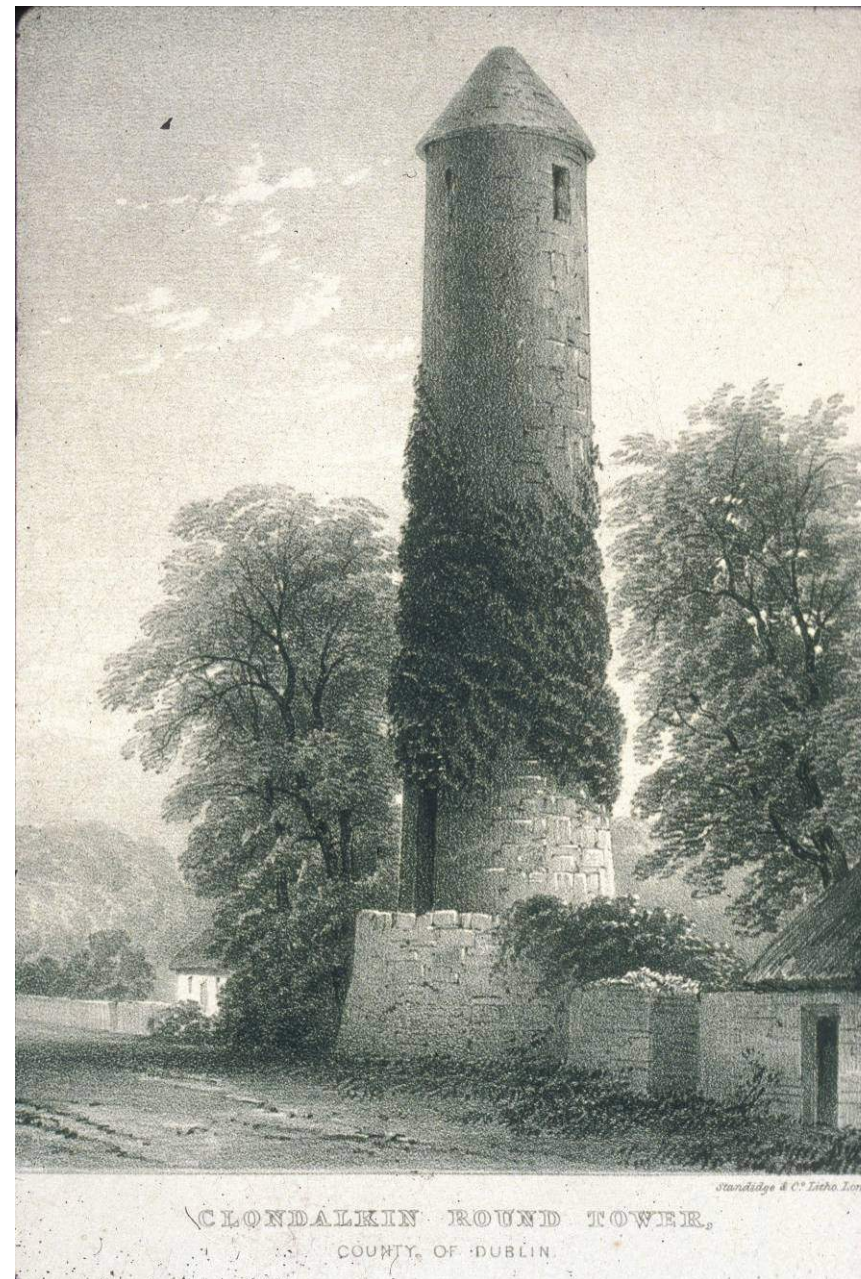


Fig. 3.16 Print of Clondalkin Round Tower. Note the stub of wall and opening in the wall just to the north of the tower and another at the entrance to the house on the right foreground. (Source: South Dublin Libraries, Local Studies Collection)



Fig. 3.17 Clondalkin Round Tower with Bicycle, 1905. This early twentieth century view shows that the field behind the wall has been cleared of trees and the wall has been levelled and topped with a new coping. (Source: South Dublin Libraries, Local Studies Collection)



Fig. 3.18. An extract from page 39 of the report “Round Tower Site, Clondalkin – Design and Conservation Report” “commissioned by South Dublin County Council from Shaffrey Associates, Architects (2008). This page is the first of three, reproduced in this report. The report gives a comprehensive description of the walls around the site and tries to establish their dates of construction and subsequent alterations, where possible, by close examination of the wall itself, by comparison of the current and older drawings and photographs with each other and by reference to the old maps. The wall outside the former almshouses, dated above to 1870’s but has been recently lowered and modified.

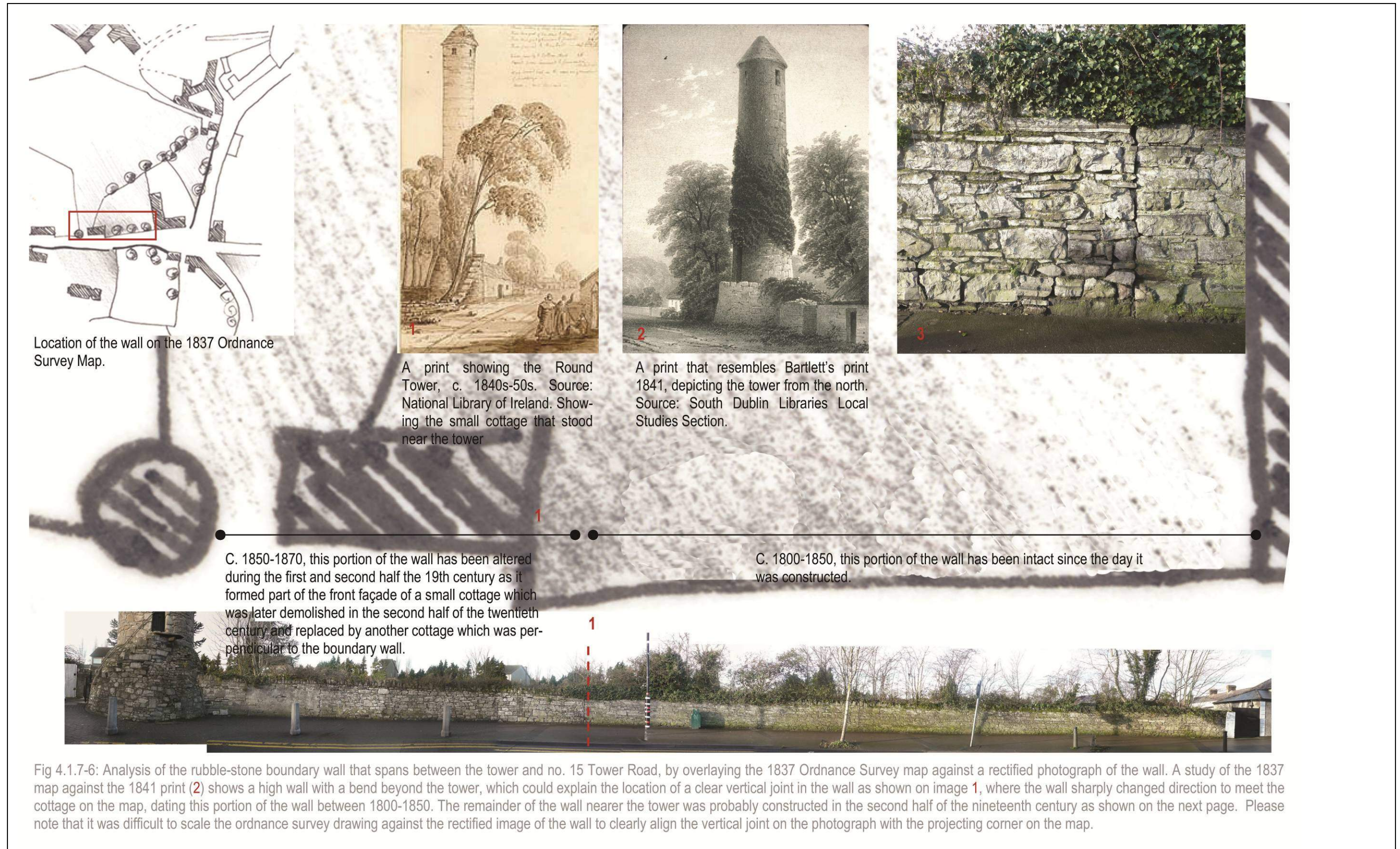


Fig. 3.19. An extract from page 40 of the report "Round Tower Site, Clondalkin – Design and Conservation Report" "commissioned by South Dublin County Council from Shaffrey Associates, Architects (2008). The southern half of the wall nearer to the round tower was probably constructed in the second half of the nineteenth century as part of the boundary to Moyle Park House. However it incorporated some much older wall and building fabric as noted above.

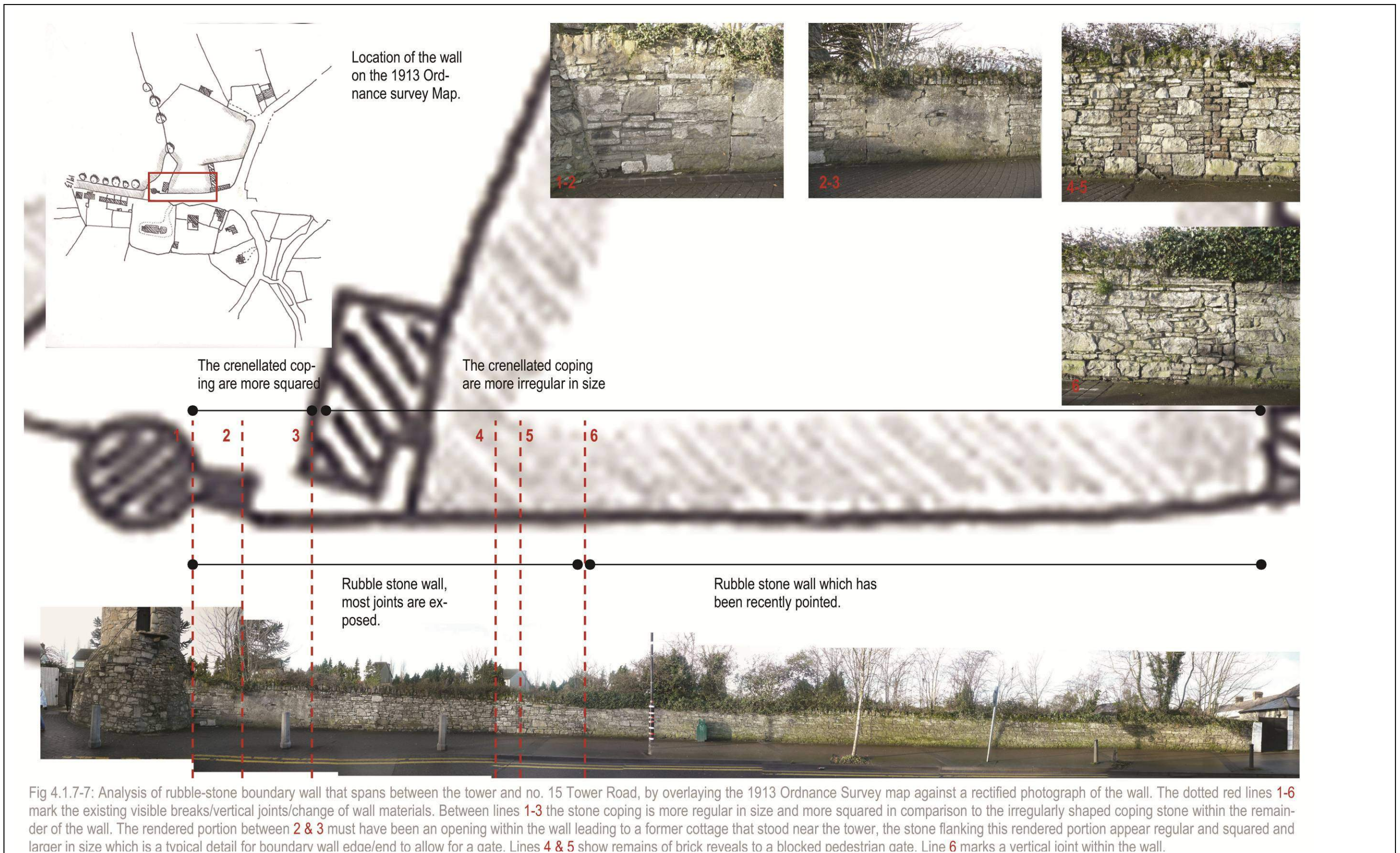


Fig. 3.20. An extract from page 41 of the report "Round Tower Site, Clondalkin – Design and Conservation Report" "commissioned by South Dublin County Council from Shaffrey Associates, Architects (January 2009). The northern half of the wall was probably built during the first half of the nineteenth century – the section which is to the right of the clean vertical joint on image 6 above. It is more consistent in construction with fewer breaks and vertical joints.

#### 4. The urban history of Clondalkin village and of the site of the round tower

*“Clondalkin, though a small place, displays a bewildering complexity of plan, which indicates great antiquity and former importance ..... Clondalkin is now the bustling centre of a considerable extent of suburban sprawl”.*<sup>12</sup>

##### 4.1 The Slighe, the esker, the river Camac and the monastic settlement

The history of the development of Clondalkin is described thoroughly in the report by Bríd Kirby & Graeme Laidlaw of Valerie J. Keeley Archaeologists. The purpose of this section of this report is to elaborate slightly on that, to support it by way of including maps, photographs and drawings and to focus on the urban development of the village and site.

Clondalkin is located on the southern bank of the River Camac, also spelt Camma and Cammock. Historically, rivers and waterways have always attracted human settlements, for their source of water, food, transport, and also for their association with religious ritual. Where rivers were crossed by roads or routes the crossing could become significant.

There is evidence that the site of the village and surrounding area been occupied at the time of the Middle Stone Age - a small flint spear head was found during the construction of the dual carriageway at Belgard Road, Bronze Age<sup>13</sup>

<sup>12</sup> Both quotations are from “The new neighbourhood of Dublin”, Joseph Hone, Maurice Craig, and Michael Fewer (Dublin, AandA.Farmer, 2002), pgs. 114-117

<sup>13</sup> Archaeological evidence of settlement of Watery Lane during the Bronze Age (“The Medieval Parish Churches of South-West County Dublin”, Ní Mharcaigh, Máirín, Proceedings of the Royal Irish Academy, Vol. 97C, No.5 (1997), pg.254

standing stones were found at the present site of Cheeverstown estate and raths appeared later<sup>14</sup>. The intersection of the ancient Slí Mhór, going west out of Dublin through what are today Drimnagh, Newcastle, Naas and beyond to Galway bay, and its ford or crossing over the river Camac may have been a factor in these traces of early settlement and in the choice of site for the monastery much later. It is suggested that there may also have been another intersection at the future site of the village - the Slí Dhála Meic Umhóir, an ancient route which extended southward to Munster crossed an esker at Clondalkin which extended from Lucan to Templeogue. An esker is a long sand bank left by the receding ice glaciers which is raised above the ground on either side. The *Slí* was a route, track or way, one of several *Slighe* (plural) which were gradually formed across Ireland. These intersections would have compounded the importance of the place that would become Clondalkin.<sup>15</sup> Several *Slighe* converged on the future site of Dublin city, long before the Vikings would establish their *longphort* there; the confluence of the Liffey, Camac, Poddle, Stein, Dodder, Bradogue and Tolka rivers at the site of the future city and the access to Dublin bay, Britain and the continent had already made it a destination of importance.

Christianity probably filtered into Ireland from Roman Britain or Gaul (most of modern France) by the 4<sup>th</sup> century. Early in

<sup>14</sup> From Generation to Generation, Clondalkin, Village Parish and Neighbourhood”, R. H. Byrne & A. Rynne, page 1

<sup>15</sup> “Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin” by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists (May 2008), page 10 refers to Ó Lochlainn (1940, 471), Ó Lochlainn, C. 1940 ‘Roadways in Ancient Ireland’, in Feil-Sgribhinn Eoin MacNeill. Also Joe Williams notes in his excellent text “St. Mochua and the Round Tower” that there was an esker which extended from Templeogue to Lucan, passing through Clondalkin, which adds another layer of meaning and significance to the village.

the 5<sup>th</sup> century it was given an impetus by the arrival of missionaries from Europe such as St. Patrick who preached mainly in the northern part of the country and Ibar and Declan who preached in the south. However paganism and its traces remained in Irish Christianity. The administration of this early church was trusted to bishops who ruled a number of diocese based on small Gaelic kingdoms. Around 550 A.D. monasticism arrived and changed Irish Christianity. This particular form of Christianity originated in the desert of Egypt and spread quickly across Europe. Its ideals of seclusion and devotion took root in Ireland and monastic settlements were quickly established throughout the island. Abbots replaced the bishops as the ecclesiastical rulers. A golden age of scholarship and craftsmanship flourished; the Book of Kells, the chalices of Ardagh and Derrynaflan were made during this period. Students and laypeople came in large numbers to these centres of learning and many emigrated to Britain and Europe to found more institutions.

The origin of the name Clondalkin does not give much information about the village’s origins. It is given as “Dolcan’s Meadow” or possibly “Thorny Meadow” by Bunachar Logainmneacha na hÉireann (the Placenames Database of Ireland) from *cluain*, meadow or pasture.<sup>16</sup> The development of Clondalkin village is generally considered to have followed the outline of the enclosure built around the monastic site or settlement founded in the late sixth or early seventh century by St. Mochua, or Crónán as he was also known. Only the eastern and southern parts of the enclosure are evident in the modern village plan (Orchard Road and Main Street) - in the absence of archaeological evidence to date, it has been

<sup>16</sup> Source: the website “logainm.ie”

suggested that the river Camac may have formed part of the western part of the enclosure.<sup>17</sup> Future archaeological excavations will confirm or disprove this. Early Christian ecclesiastical settlements were nearly always surrounded by such large enclosures, varying from 30 meters to 400 meters in diameter, often oval or circular in plan and built in the form of a stone wall, ditch, or earthen bank. Today they survive usually in the form of an earthwork outline, often only visible from the air, a field boundary, or a curved road in a village or town. The enclosure usually contained an early church, (built from timber at first), a burial ground, and an abbot's house. This sacred precinct was separated from the domestic quarters of the laypeople and community of monks with their workshops, and guests' quarters where special honoured guests were received, entertained and their (sometimes large) retinues accommodated. Recent excavations near the curved eastern boundary wall of the graveyard at St. John's Church did not find any traces that would suggest an inner enclosure, as might be expected. The round tower is roughly at the centre of the oval enclosure and its door faced the western gable of the former church of St. Mochua nearby, as was often the case.<sup>18</sup> The present church of St. John's<sup>19</sup> built 1789 and modified and extended in 1834 is orientated north-south, perpendicular to the previous late mediaeval church, demolished 1787, of which a fragment of the gable wall survives and which is shown in some of the drawings

<sup>17</sup> "Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin" by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists (May 2008), page 10

<sup>18</sup> "ibid, page 9 reads as follows: "However, the spatial relationships between towers, churches and high crosses (where present) were carefully formulated. The siting and orientation of towers within the monastic enclosure was determined by the location of the church. Generally, the tower was placed to the southwest, or more frequently the southwest, of the church entrance, with the tower doorway facing the west door of the church (Lalor 1999, 74)"

<sup>19</sup> The reason for its dedication to St. John is not known

and engravings and maps. Archaeological excavations of the proposed development site, which extended down to the undisturbed subsoil have to date discovered no evidence of the monastic settlement or garden.<sup>20</sup> One reason for this may be that the monastery was attacked and burned in 1071 and again in 1077 or possibly the area around the tower may have been cleared during the construction of the buttress around the round tower, the precise date of which is unknown, but it was there in 1725 (Molyneaux's print shown on Figure 4.21, page 35) and thus pre-dates the explosions at the gunpowder mills at Corkagh.

The settlement at Clondalkin was developed as part of a network of religious houses and monasteries that were interconnected by the ancient Slighe and eskers. The monastery of Clondalkin most probably controlled the nearby religious houses of Kilmahuddrick, Kilmactalway and Kilbride (between Baldonnel and Kilcarbery). St. Mochua's influence spread beyond Clondalkin to county Kildare<sup>21</sup> (Tea Lane churchyard Kildrought, Co. Kildare, Balraheen Church, now a disused churchyard south of Maynooth, and Timahoe (Tigh Mochua). Therefore the monastery at Clondalkin was not developed in isolation, but was part of a wider interconnected network of monastic settlements.

<sup>20</sup> "Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin" by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists, dated May 2008, page 34.

<sup>21</sup> Joe Williams, "St. Mochua and the Round Tower", pages 16-20

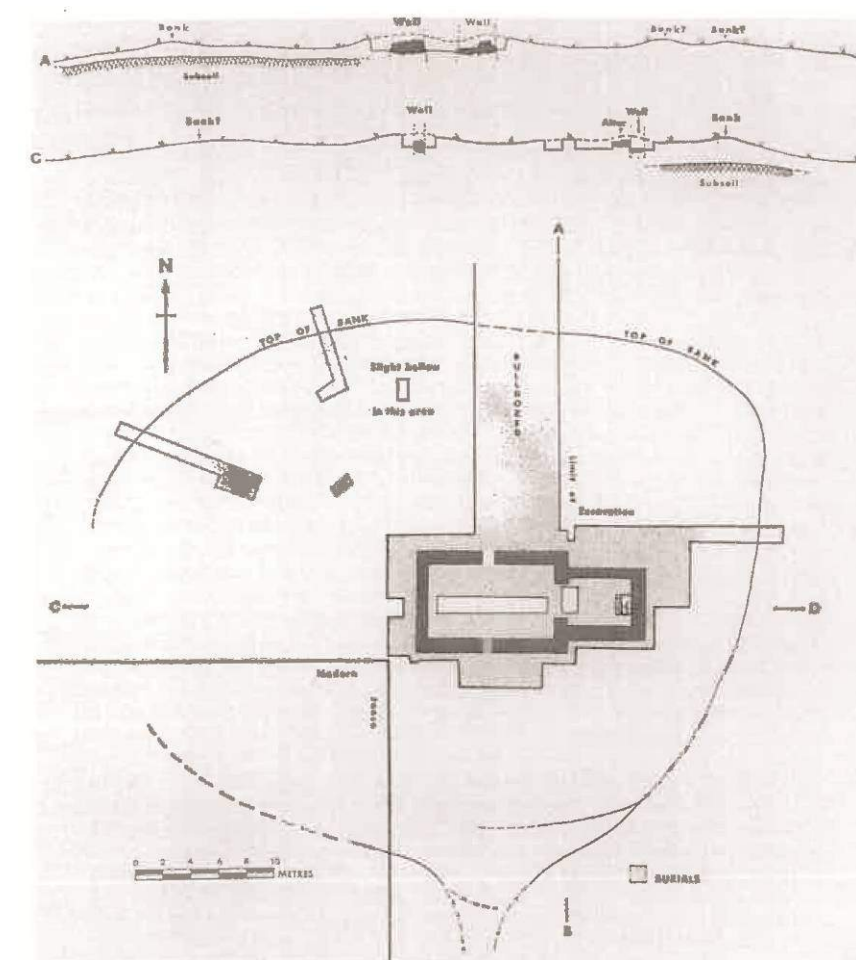


Fig. 2 Clondalkin, Co. Dublin: church-site; plan and sections.

Fig. 4.1. A plan view of the small mediaeval church and enclosure which were discovered accidentally and excavated in 1964 at the former "Chapell Field" along the east side of Watery Lane, Clondalkin. The church was built about 300 metres to the north-east of the round tower which makes it unlikely to have been part of the monastic enclosure; Etienne Rynne, archaeologist concluded that it was probably a parish church. Refer also the Fig. 4.2 on the following page. (Source: Page 31 of the Journal of the Royal Society of Antiquarians of Ireland, Vol.97, 1967. The journals are freely available to read in hard copy format and electronically via the "JSTOR" database in the Local Studies section of Tallaght library)

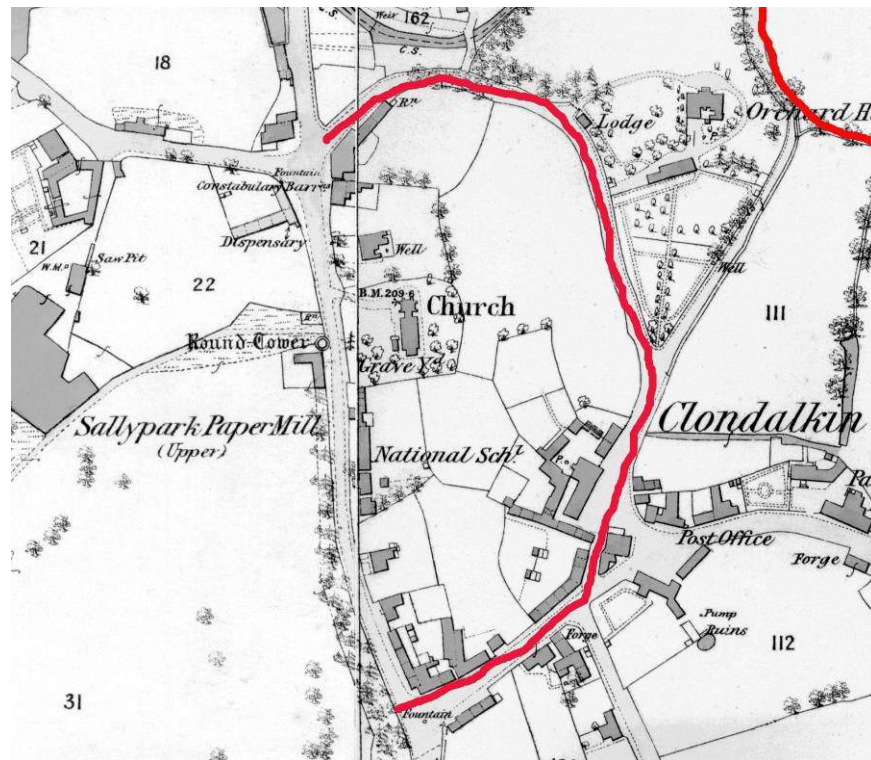


Fig. 4.2. Clondalkin village, from the 25" to 1 mile scale map from the early twentieth century. The oval-shaped enclosure of the early Christian monastic site with the tower & church roughly at its centre is shown with a red line. Part of the church enclosure at Watery Lane, excavated in 1964 is shown in the top right corner.



Fig. 4.3. Saggart, west county Dublin from the first edition ordnance survey map. The oval-shaped enclosure of the early Christian site is evident in the existing boundary of the graveyard, still there today.



Fig. 4.4. The remains of an early Christian site near Shrule, Co. Mayo. (Source: pg. 8 of "Irish Field Monuments", The Office of Public works, Dublin, published by the Stationery Office, 3rd edition 1991)



Fig. 4.5. Lusk, north Co. Dublin. The enclosure of the early Christian site is clear in the modern plan of the village. The round tower was incorporated into the tower of the nineteenth century church (Source: pg. 9 of "Irish Field Monuments", The Office of Public works, Dublin, published by the Stationery Office, 3rd edition 1991)

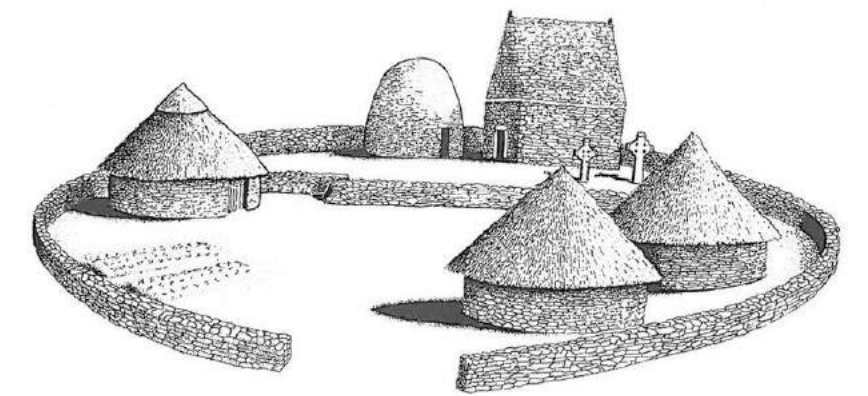


Fig. 4.6. A diagram or reconstruction of a typical 10<sup>th</sup> century early Christian Irish monastery. Note the separation of the sacred precinct from the more domestic functional part of the settlement (Source: pg. 23 of "Guide to the Irish National Heritage Park, Ferrycarrig, Wexford", Edward Culleton, B.A., Ph.D., 1987, The Wexford Heritage Trust, 1990, first published 1987)



Fig. 4.7. Nendrum monastery, Mahoe Island, Strangford Lough. (Source: pg. 6 of "St. Mochua and the Round Tower" by Joe Williams (South Dublin Libraries, 2006) this was in turn taken from "The Modern Traveller to the Early Irish Church", Four Courts Press)

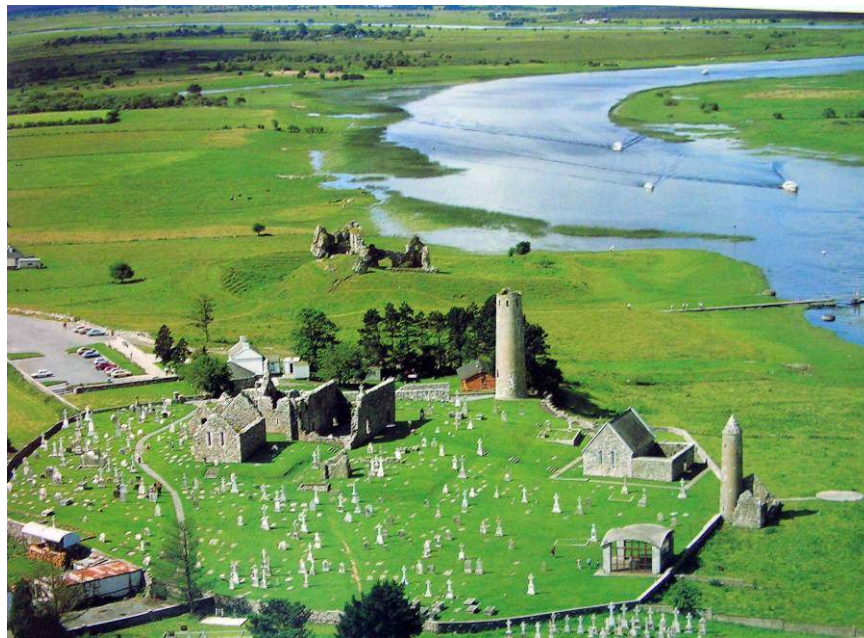


Fig. 4.8. Clonmacnoise, county Offaly (“Ancient Ireland, From Prehistory to the Middle Ages”, Harbison, P., O’Brien, J., (Weidenfeld & Nicolson, London, 1996, page 63)

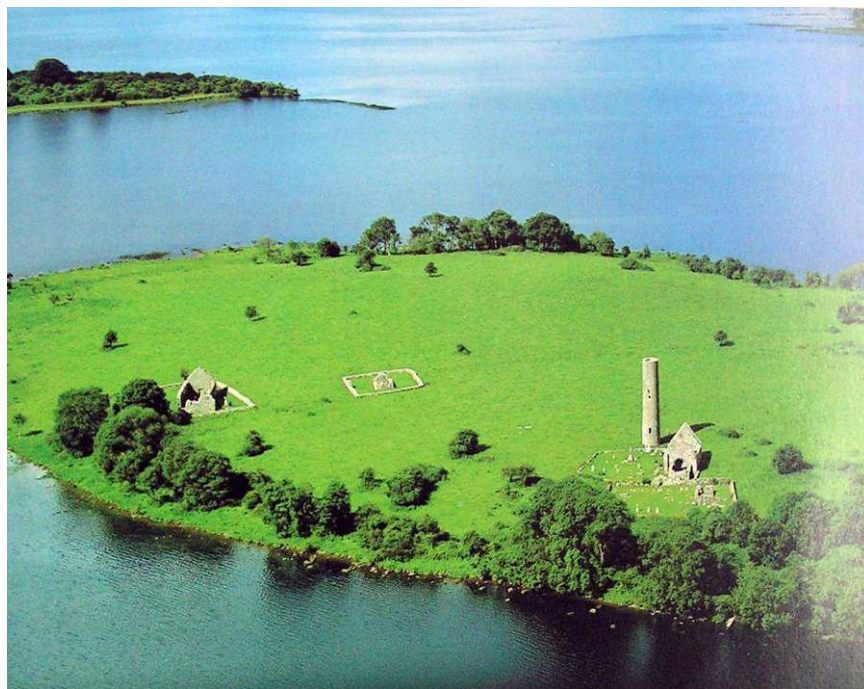


Fig. 4.9. Iniscealtra, Lough Derg, river Shannon (“Ancient Ireland, From Prehistory to the Middle Ages”, Harbison, P., O’Brien, J.) page 61



Fig 4.10. Inishmurray, off county Sligo (“Ancient Ireland, From Prehistory to the Middle Ages”, Harbison, P., O’Brien, J.), page 74

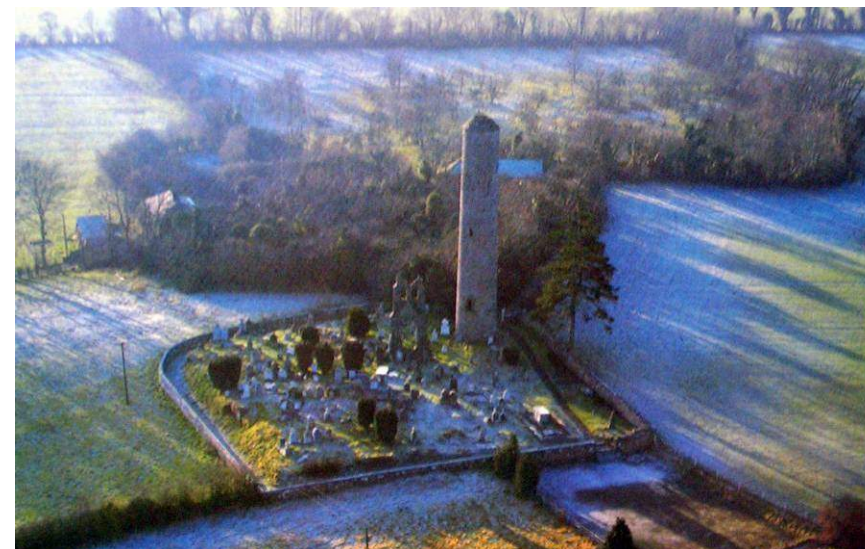


Fig. 4.11. The round tower at Donaghmore, Co. Meath (“Ancient Ireland, From Prehistory to the Middle Ages”, Harbison, P., O’Brien, J.), page 100. Note the bell cote & tower

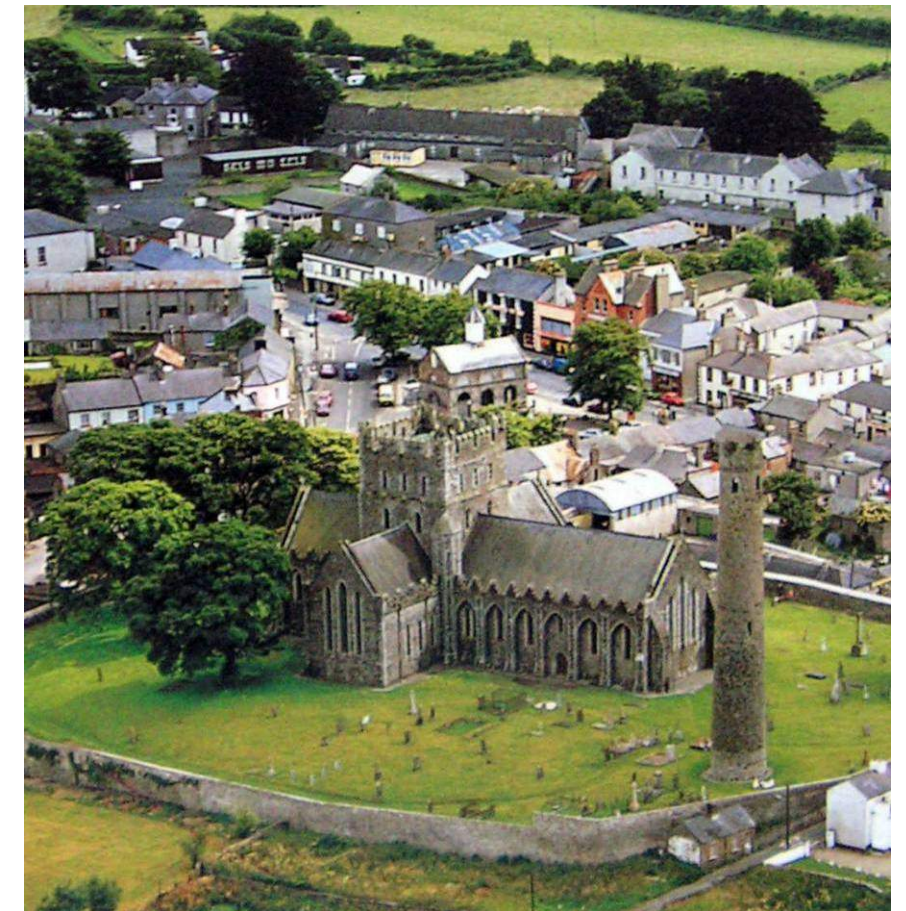


Fig. 4.12. The round tower and cathedral at Kildare (“Ancient Ireland, From Prehistory to the Middle Ages”, Harbison, P., O’Brien, J.), page 105. Note the enclosure

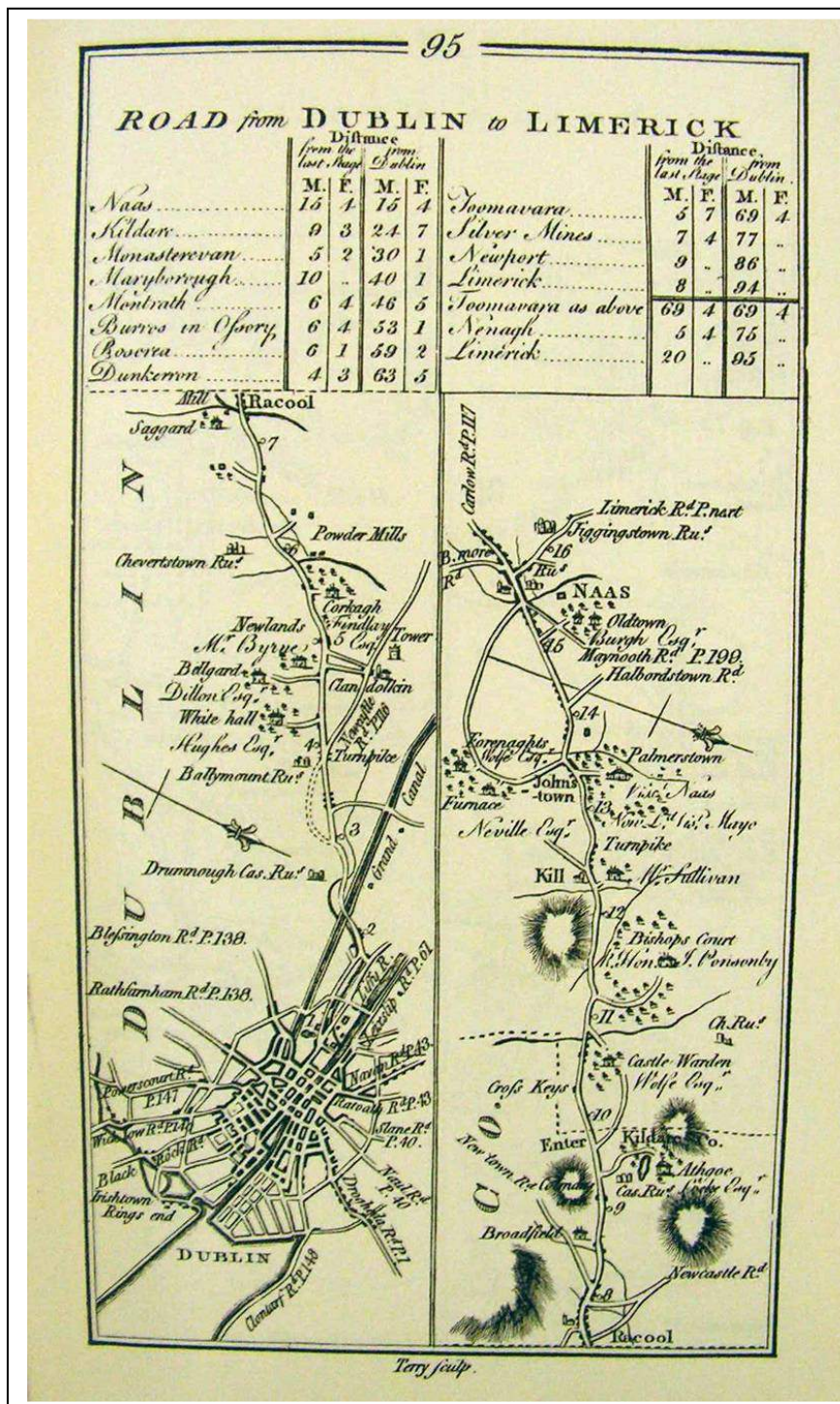


Fig. 4.13. An extract from Taylor and Skinner's Maps of Ireland, published 1782. The map shows part of the ancient Slí Mhór which ran westward out of Dublin, through Clonsilla, Newcastle, Naas and onward to Galway. The route to Naas had already diverged to the south of Clonsilla by the late eighteenth century when the land was surveyed and this map was published. The Slíge were the origins of many of the modern roads that exist today.



Fig. 4.14. An aerial view of central Dublin, during the 1960's. The routes of the former Slíge and their influence on the later urban development of the city are clear: "A" marks An Slí Mhór (now Thomas Street, which extended out to Clonsilla and beyond), "B" An Slí Dala (now Coombe, Cork Street), "C" An Slí Chualann (now New Street, Francis Street), "D" An Slí Midluachra (now St. Augustine Street, Bow Lane), "E" marks the site of the oval-shaped, early Christian monastic enclosure, now enclosed by Stephen Street Upper, Whitefriar Street, Peter Row, Mercer Street and bisected by Aungier Street. (Source: page 5 of "Dublin An Urban History, The Plan of the City", McCullough, N., The Lilliput Press Ltd., Dublin, 2007).

#### 4.2 The mediaeval church of St. Mochua.

The church of St. Mochua was replaced by the current church of St. John around 1789. Our knowledge about the former church of St. Mochua relies heavily on written descriptions and drawings of it, and comparison of these with other contemporary churches. Archaeological excavation of the ground under the existing eastern boundary wall of the church site was carried out in the 1970's to find evidence of an inner monastic enclosure but none was found there. There was another mediaeval church in Clondalkin, at Watery Lane which was recorded by archaeological excavation in 1964; this is not considered here. Its location is recorded by the reference to "Chapell Field" or "Chapel Park" on some of the maps to the north east of the village.

It is not recorded when the church of St. Mochua was built although Petrie dated it to the twelfth century.<sup>22</sup> His feast day is 6th August. The church is described in Mason's History of St Patrick's Cathedral as being one of the finest in Co. Dublin. It was 120 feet long and 50 feet wide,<sup>23</sup> of a Latin cross plan with nave and chancel, and had three altars dedicated to Mary, the Blessed Virgin, St. Bridget and St. Thomas. According to Lewis' Topographical Dictionary of Ireland (1837, pg. 354) and Mason (1820, 26-7), the church was a very large nave-and-chancel church with aisles.

Beranger's drawing two pages on shows that it had a six-

<sup>22</sup> It is difficult to date the building shown on the drawings because lancet windows were built in Ireland between the thirteenth and fifteenth centuries, and windows with intersecting tracery in the fourteenth and fifteenth centuries. Source: pg. 265, *The Medieval Parish Churches of South-West County Dublin*, Máirín Ní Mharcaigh, Proceedings of the Royal Irish Academy. Section C: Archaeology, Celtic Studies, History, Linguistics, Literature) 23 *ibid*, pg. 248

light, east window with intersecting tracery in the nave and three lancet windows in the east wall of the by-then, disused chancel. It had a double bellcote above the western gable. It was known as St. Mochua's Church. It is recorded that by 1649 it was in very poor condition. It was partially restored and was re-opened in 1729. In 1785 permission was sought to demolish and replace it. The artist Gabriel Beranger recorded that it was badly damaged by the explosion of gunpowder at the gunpowder mills at Moyle Park in 1787.<sup>24</sup> The chancel was allowed to become a ruin because, as a Protestant church, the pre-Reformation use of the chancel was undesirable, or perhaps because the size of congregation had dwindled.<sup>25</sup> It was demolished in 1789 and replaced by the present church, dedicated to St. John.<sup>26</sup> There are architectural fragments of the church preserved in the churchyard today: a small piece of a hood moulding, part of a mullion and a segment of wall, 3.2m long at base, 4m high and 800mm thick. The hood moulding is unlikely to be earlier than the fifteenth century and the mullion may be as late as the sixteenth century.<sup>27</sup>

<sup>24</sup> Essay by John Bradley, entitled "The Mediaeval Boroughs of County Dublin", page 131 of "Dublin and Beyond the Pale, Studies in honour of Patrick Healy", edited by Conleth Manning, (Dublin, Wordwell, 1998)

<sup>25</sup> Source: page 6 of "Clondalkin, From Generation to Generation, Village Parish and Neighbourhood", Roy H. Byrne, Ann Graham.

<sup>26</sup> Source: page 36 of "St.. Mochua and the Round Tower", Joe Williams, South Dublin Libraries, 2006. The reason for the dedication to St. John is not known.

<sup>27</sup> Source: pg. 254, *The Medieval Parish Churches of South-West County Dublin*. Also preserved are part of the enclosure, two cross slabs and the baptismal font. Much of the information in this section was sourced from pages 107-124 of "A History of the County Dublin", Vol.II (Gill & MacMillan, Dublin, 1979)



Fig. 4.15. "Clondalkin Church and Tower" by Gabriel Beranger (dated 1767). A view of the church and round tower from the west. Note that the image, signed and dated by Beranger, appears to have relied heavily on Molyneaux's earlier drawing, reproduced below. Note the double bellcote and the existence of the boundary wall between the church and round tower. (1958DTX (33) copied with the permission of the National Library of Ireland. Reproduction rights owned by the National Library of Ireland. This image was copied from the front cover of "St. Mochua and the Round Tower", by Joe Williams, South Dublin Libraries, 2006).



Fig. 4.16. The early Christian cross slab at St. John's churchyard  
(Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.17. Another view of the same cross slab at St. John's churchyard  
(Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.18. The second surviving early Christian cross slab at St. John's churchyard, photographed by Paddy Healy. (Source: South Dublin Libraries, Local Studies Collection)

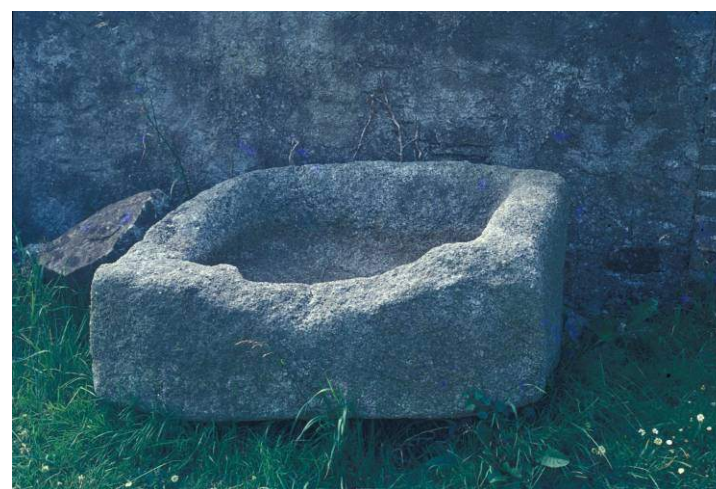


Fig. 4.19. Paddy Healy's photograph of the baptismal font, taken in 1977.  
(Source: South Dublin Libraries, Local Studies Collection)

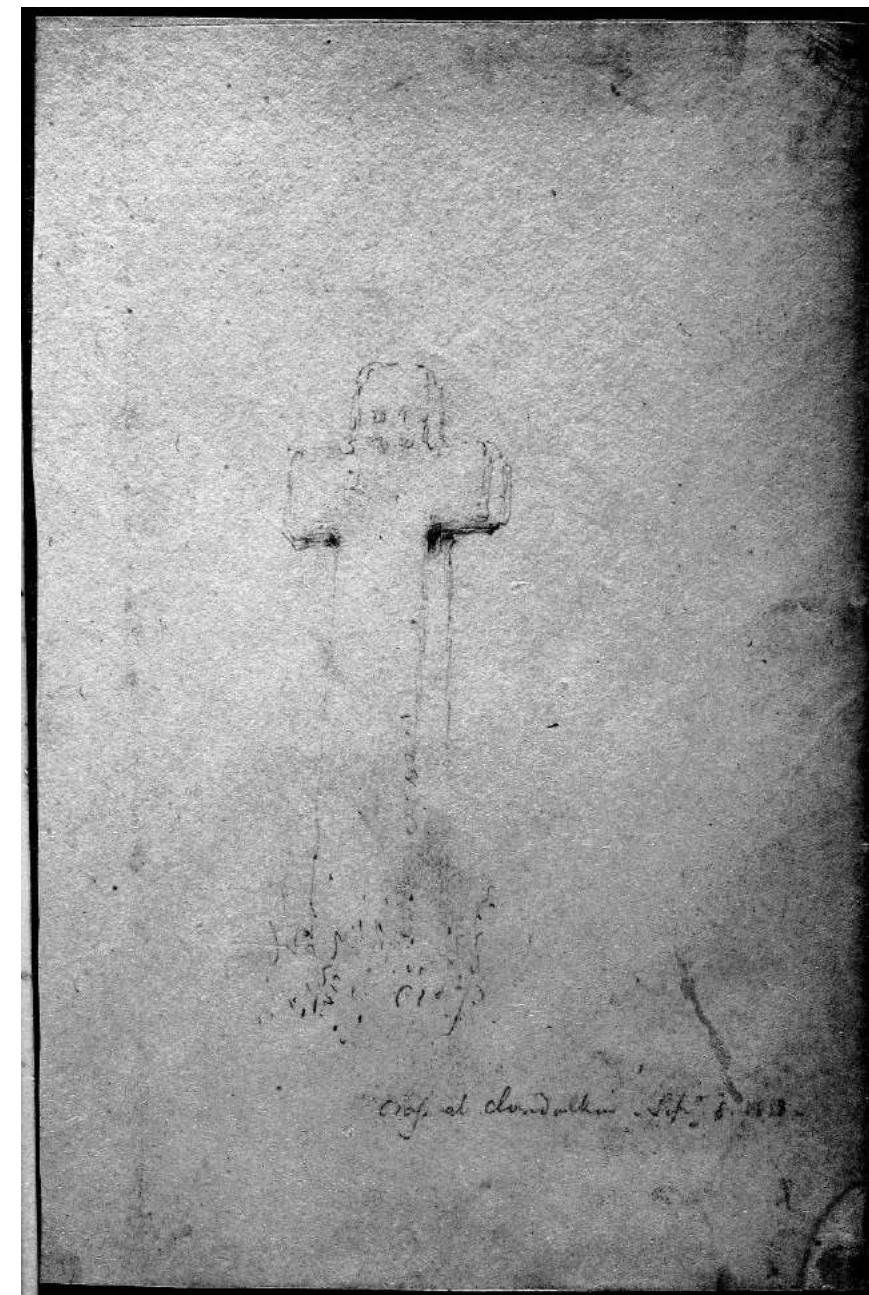


Fig. 4.20. A drawing of the early Christian cross slab in the churchyard.  
(Reproduced by permission of the Royal Irish Academy (c) R.I.A.)

Three views of the medieval church from the eighteenth century:

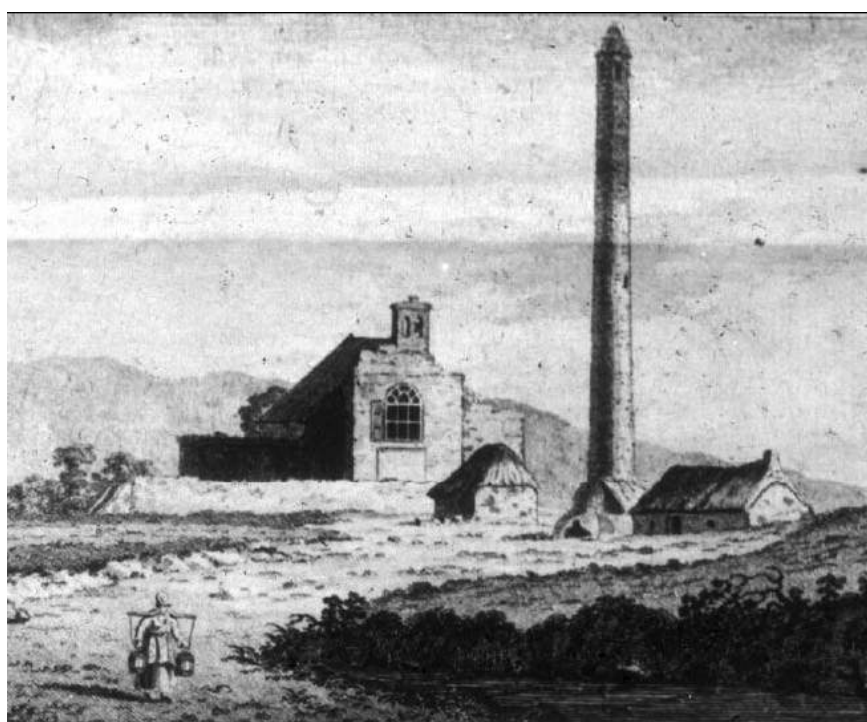


Fig. 4.21. Molyneaux's print of Clondalkin round tower, circa 1725. Note the buttress at the base of the tower. Molyneaux was one of the first people to seriously consider the history of round towers, along with George Petrie. (Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.22. Gabriel Beranger's print of 1767, a view of the church and round tower from the south-east. Note the double bellcote, the raked gable wall, the lancet window in the ruined east wall of the chancel, and the six-light east window with intersecting Gothic tracery at the east end of the nave. Compare this with the Archdeacon drawing of 1795 (Fig. 4.33, page 43). (Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.23. "Clondalkin Church and Tower, 1791" from Grose's Antiquities. The older church is already a ruin beside and behind the then recently built new church of St. John. Although the condition of the older church had deteriorated during the eighteenth century it was badly damaged by the gunpowder explosion at Corkagh in 1787. (Source: South Dublin Libraries, Local Studies Collection)

#### 4.3 The urban development of Clondalkin village and the proposed development site in the early and late mediaeval periods

There is some dispute among academics as to when Irish towns like Clondalkin first became towns, mainly because of sparse evidence of urban settlement in Ireland before the Vikings developed them in the ninth century. The dispute often revolves around the definition of a town – borough status confirmed by a charter, or evidence of a proto-urban settlement, or an ecclesiastical centre? We do know that Irish monasteries often attracted large populations due to their social cohesiveness and stability, and their high rate of agricultural productivity. The monasteries included a literate elite, administrators, labourers, often a large estate with public buildings and monuments, public open spaces, streets, some of which may have been paved, and on the outskirts, they often had a marketplace. Clondalkin conforms to this description in all respects: the intersection of the oval enclosure and the Slí Mhór at Monastery Road was the site of a market place and the street to the west became Main Street.<sup>28</sup> By extension of this logic the island site, now the Village Inn (formerly called “Morans” and before that “Richard Power’s” public house) at the intersection of Orchard Road, Main Street and Monastery Road may have once been the site of a market house or tholsel of sorts. Island sites for such buildings were common in Irish towns: Bray, Dunlavin, Athy, Kinsale, and the demolished tholsel on High Street in Dublin were all of such a type. The Longfield

<sup>28</sup> Essay by John Bradley, entitled “The Mediaeval Boroughs of County Dublin”, page 130 of “Dublin and Beyond the Pale, Studies in honour of Patrick Healy”, edited by Conleth Manning, (Dublin, Wordwell, 1998)

map of 1782 (Figure 4.39 on page 44) shows two public spaces at this intersection - an elongated trumpet shape at the southern end of Orchard Road, and a diamond-shaped public space to the south, both separated by the island site. This arrangement survived long enough to be photographed in the late nineteenth century (Figure 4.62C, page 54 from the Eason collection, N.L.I.). Many of the buildings in this area were redeveloped or possibly had new facades built onto existing structures in the mid-to-late nineteenth century<sup>29</sup> with common parapet heights, fenestration and plaster render finishes which contained these urban spaces and gave them a pleasing sense of enclosure, a quality partially lost only in recent decades by the redevelopment and enlargement of the pub on the island site, the partial privatisation of the diamond space as a car park-taxi rank bounded by a wall to the north and by the incremental demolition of other walls and less important buildings.

Another church was built to the north-east of the monastic enclosure, on Watery Lane, roughly at the site of St. Killian’s housing estate today. Although nothing remains above ground level, archaeological excavations in the 1970’s by Etienne Rynne for the National Museum of Ireland revealed the walls of a church within an oval enclosure. A bronze pin dating from the 10th or 11th Century was found against the outside wall of the church. Rynne reported that a wooden church surrounded by an earthen enclosure had existed. Joe Williams suggests that it was probably replaced by a stone church in early medieval times, which may have been destroyed during the 18th century when it was replaced by

<sup>29</sup> Registry numbers 11209035, 11209036 and 11209037 of the National Inventory of Architectural Heritage (N.I.A.H.)

the Catholic Parish church on Monastery Road known as St. Killian’s Church.<sup>30</sup> Clondalkin was sufficiently important to be plundered by the Vikings in 833; the Annals record a Viking settlement in 867: Dun Abhlaoibh, literally “the fort of Olaf” but its precise location is not yet known.<sup>31</sup> The monastic life appears to have continued under the Vikings. Clondalkin became part of a Norse kingdom which stretched from Skerries in the north, south to Wicklow and from Dublin city inland to Leixlip and Clondalkin. It is recorded that the church lands at Clondalkin were given to the archdiocese of Dublin by the MacGilla Mocholmóg family, who were vassals of the Norse kings of Dublin. The monastery was burned in 1071. In 1077 there was a struggle between rival factions for control of the abbacy which resulted in the granting of to the church to the Céile Dé. Following the Norman invasion Clondalkin became a large manor of the archbishop of Dublin and was accorded the status of borough, certainly by the thirteenth century. The corporation was ruled by a sheriff and bailiff.

During the 13th century a large medieval town began to develop around the former monastic settlement. By 1326, archbishop Alen’s Register records 32 house plots within the area. In 1393, five streets were recorded within the village: Mill Street, Steeple Street, Pope Lane, New Street and Mahow Street. The name Mill Street is an indication that a mill complex existed within or on the outskirts of Clondalkin

<sup>30</sup> Pages 8 and 9 of “St. Mochua and the Round Tower”, Williams, J. South Dublin Libraries

<sup>31</sup> Clarke, Howard, editor, “The Making of a Metropolis”. Page 63 “a striking concentration of monastic sites is to be found in and near the Liffey valley, namely Clondalkin, Finglas, Glasnevin, Kilmainham, Santry and Tallaght, with Swords and Lusk further north”. Also Fig. 3.2 of “The Dublin Region in the Middle Ages, Settlement, Land-Use and Economy”, Margaret Murphy and Michael Potterton, Dublin, Four Courts Press, 2010

village by then and that the River Camac was used as an energy source from as early as the 14th century - it is recorded that mills were already using the Camac at 1326.<sup>32</sup> Steeple Street is presumably Tower Road (the round tower is described as a “steeple” on the Longfield map of 1782) and New Street might be New Road. The archaeological excavations of 2004 and 2008 discovered some evidence of little archaeological significance of mediaeval and post-mediaeval settlement just to the west of the round tower, mainly in the south-western corner of the round tower site or field and in the front gardens of Millview Terrace.<sup>33</sup> However the sub-surface archaeological potential of the site is still considered high. The features included waste pits which appear to be domestic in origin: local or provincial pottery and a small metal assemblage. Archaeological investigations of the site so far have not detected the monastic enclosure within the development site. However the lack of certainty about the western boundary of the former enclosure and geophysical survey of the field west of the development site may detect the enclosure and other archaeological remains in the future. The absence of medieval (monastic, Norse and Norman) material in the ground around the round tower suggests that the site was cleared at some time in its history.

It is sometimes claimed that horticulture was introduced to Ireland by the Anglo Normans along with other forms of manorialisation like town planning and a more advanced building technology. However the evidence from pre-Norman

<sup>32</sup> pages 422-423 of “The Dublin Region in the Middle Ages, Settlement, Land-Use and Economy”, Margaret Murphy and Michael Potterton, Dublin, Four Courts Press, 2010

<sup>33</sup> “Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin” by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists (May 2008),

monastic gardens in Ireland proves this incorrect, although it is considerably less well documented than in England. Enclosed gardens and orchards, the cultivation of herbs, fruit and vegetables and their inclusion in the diets of the monastic communities are documented. The terms garden and orchard were often used interchangeably. Clondalkin was one of several archiepiscopal manors in the thirteenth and fourteenth centuries and was one of eleven boroughs in county Dublin, one of which was the city itself. The Archbishops of Dublin had developed seven of these eleven boroughs, which shows their powerful influence on urban development at this time; the other boroughs had been founded by secular lords. Part of the reason for this is because huge tracts of land in county Dublin belonged to the church before the arrival of the Anglo-Normans. A mediaeval borough was a place where property-owning burgesses were. On payment of royalties, burgesses enjoyed certain privileges granted by the local lord or king which set them apart from other people. These included the right to travel, the right to set up a business or practice a trade, marry without the lord’s consent and others. The concept of burgess and borough existed in Ireland before the arrival of the Anglo Normans. Before 1169 Clondalkin, Dalkey, Tallaght and Swords were important towns. By the mid-sixteenth century some of the southern boroughs had begun to decline because of their peripheral position in the Pale had reduced them to frontier settlements, vulnerable to attacks by the Gaelic Irish from the mountains to the south and plains to the west.<sup>34</sup> The exact location of the medieval borough of

<sup>34</sup> Much of this information was sourced at pages 130, 131 and 142 of “Dublin and Beyond the Pale, Studies in honour of Patrick Healy” – an essay by John Bradley entitled “The Mediaeval Boroughs of County Dublin”, edited by Conleth Manning, (Dublin, Wordwell, 1998)

Clondalkin is unknown and archaeological excavations to date have not found any evidence of it. It is speculated that the survival of Tully’s Castle, a crenellated tower from the sixteenth century on Monastery Road and Austin Cooper’s description of another castle nearby (as yet undiscovered by archaeological excavation) may be the remains of what were a series of such towers and developments along this road, leading into the older village from the east (Bradley and King 1988, 219). However the concentration of burgage plots along the approach roads from the south suggest this as a possible alternative. In 1598 Clondalkin was described as being amongst the ‘walled and good towns’ of Ireland.<sup>35</sup> By the end of the sixteenth century, it was described as a substantial village, graded below the rank of a market town. In 1615 the church within the village was described as being in good condition by the regal visitation.

In common with most of Ireland, the wars, insurgencies, counter-insurgencies, violence and chaos of the seventeenth century reduced the population and status of the town and partially changed the ownership of the townlands around the village. The village declined in size and importance. The Down Survey shows a reduced village after the rebellion of 1641, the Confederate wars and Cromwellian invasion. It is recorded that the village was burned during the Confederate wars in 1642. This may have caused the destruction of castles along Monastery Road and the ruin described by

<sup>35</sup> Source: “The Description of Ireland in 1598”: “Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin” by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists, dated May 2008, page 9, reference to F.E. Ball’s text. This is also mentioned in the essay by John Bradley, entitled “The Mediaeval Boroughs of County Dublin”, page 131 of “Dublin and Beyond the Pale, Studies in honour of Patrick Healy”, edited by Conleth Manning, (Dublin, Wordwell, 1998)

antiquarian Austin Cooper in 1780 as being on the site of the later paper mill which existed until recently on the north bank of the Camac. The 1659 census gives the following information for the townland of Clondalkin:-

The owner of 1,340 plantation acres of “profitable land” is given as the Lord Archbishop, the same as in the 1641 Despositions (unlike most of Ireland, the land ownership of this townland had not been changed by the land settlement after the Cromwellian invasion). The total population is given as 89 people, of which 81 were English and 8 were Irish. The size and extent of the townland of Clondalkin was different then from now. The Down Survey records that there was only the stump of a castle, some thatched houses and the round tower, described as a “high watch tower”.<sup>36</sup> It is not certain if these figures include the village or not; later censuses consider the village separately from the surrounding townland of Clondalkin.

There is still a great deal that is unknown about the early urban history of Clondalkin. Photographs of the 2008 excavation by Valerie J. Keeley Archaeologists (copied in the Archaeological Impact Assessment reports, Appendix D to this report) show an intensive use and occupation of the ground just 50 metres to the west of the round tower – waste pits, pottery and metal fragments. There is no evidence whatever of this on the field that exists today, or any suggestion of it on the maps and written descriptions researched for this report. Similarly the discovery of the

<sup>36</sup> Essay by John Bradley, entitled “The Mediaeval Boroughs of County Dublin”, page 131 of “Dublin and Beyond the Pale, Studies in honour of Patrick Healy”, edited by Conleth Manning, (Dublin, Wordwell, 1998)

church site at Watery Lane in 1964 was a revelation despite the suggestive names on maps and in the collective memory: Chappell Field, Chapple Field, Chapel Hill. The maps give no indication of its presence other than the name and part of the curved outline of Watery Lane. Only 20 years earlier Ua Broin in his essay about the typographical place names around Clondalkin had expressed his doubts: “In it there is a mound with a little out-cropping masonry, traditionally regarded as marking a church site, but it may be the remains of a rath.”<sup>37</sup>

The description of the barony and the Clondalkin area in the Down Survey is interesting:

*“The Barony of Newcastle and Upper Crosse in the County of Dublin The Qualitie of the Soyle is generally verry good Arable Meadow and pasture with underwood and Furz which Furz yield as much profitt as the Arable Land. This Barony is most bountifully and conveniently watered in all places, on the North with the River Liffy which yeilds much fresh Fish as Salmons and the like: The Riuer Cammock descends from the Mountaines by many small Rills dispersing into STreames in many parts of the West of this Barony emptyeing it selfe in to the River on the North East of Killmainham: the South east part of this Barony is watered by the Riuer Dogher which is a River that Descends by many branches from the Mountaines which being United, doth after greate raines ouerflowe soe yet many tymes both man and beasts are cast away by the Violence of the sudden flood but hauinge the Sea to empty it selfe into is in a very Lytle time*

<sup>37</sup> Ua Broin, Liam. “Clondalkin Co. Dublin and its Neighbourhood.”, Journal of The Royal Society of Antiquaries of Ireland 74 (1944): 191-218., pg. 212

*abated: One maine branch of this River is separated by Artificial helps, at the Towne lande of Templeoge to Convey wate to the Citty which is agane separated not far from Ropers rest to come into the Citty two ways, the one is hard by James Gate and soe passes through Thomas Streete and empties itself into the River neere the Bridge foote: the other Branch Comeing in neere the Crooked Staffe passes by Pimlycoe ye Combe Newrow and under part of Patrick Streete, on both side the way Comminge together at the Mill vnder the the Citty wall by St Nicholas Gate and passeth through the Castle Yard into the River Liffy on the Northeast of the Customs Howse the Residue of the said River Templeoge passes to Rafarnam and there Meeteth with an other branch passinge in the Channell on the South West of Ringsend on this branch had stood many Corn and Tuck Mills which have beene [damaged] by the late warr but some of them have beene lately repaired. There are some pleasant Howses by the Liffy side which are now in Repaire also many good habitable Castles in many parts of this Barony and Stumps and Ruines which are mentioned in the description of the particular parishes.”<sup>38</sup>*

<sup>38</sup> Source of all this quotation:- The website of Trinity College Dublin, accessed on 5th September 2013-09-05 <http://downsurvey.tcd.ie/down-survey/maps.php#bm=Newcastle&c=Dublin>)

Three maps from the Down Survey of Ireland, taken in the years 1656-1658:



Fig. 4.24. (above) Part of the Down Survey map of county Dublin. The survey was conducted between 1655 & 1658 and a census was taken in 1659. Clondalkin is identified by the red arrow.

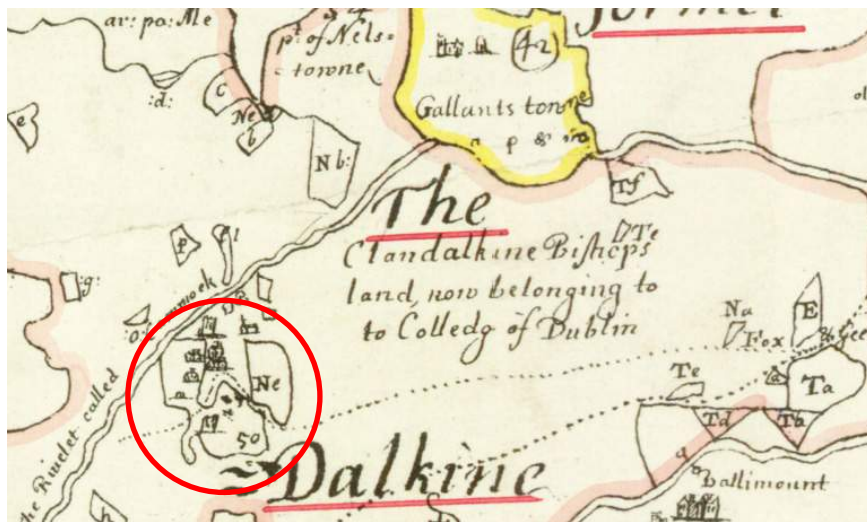


Fig. 4.25. (above) Part of the Down Survey map of the barony of Newcastle and Uppercross. The lands in ownership are surrounded with a boundary (the red circle is not original to the maps). The church, round tower and some cottages are shown diagrammatically above and outside the lands outlined. These were part of the "Colledge of Dublin, or the archbishop's land. Knockmeenagh Lane and Monastery Road are dotted in. Tower Road did not exist then.

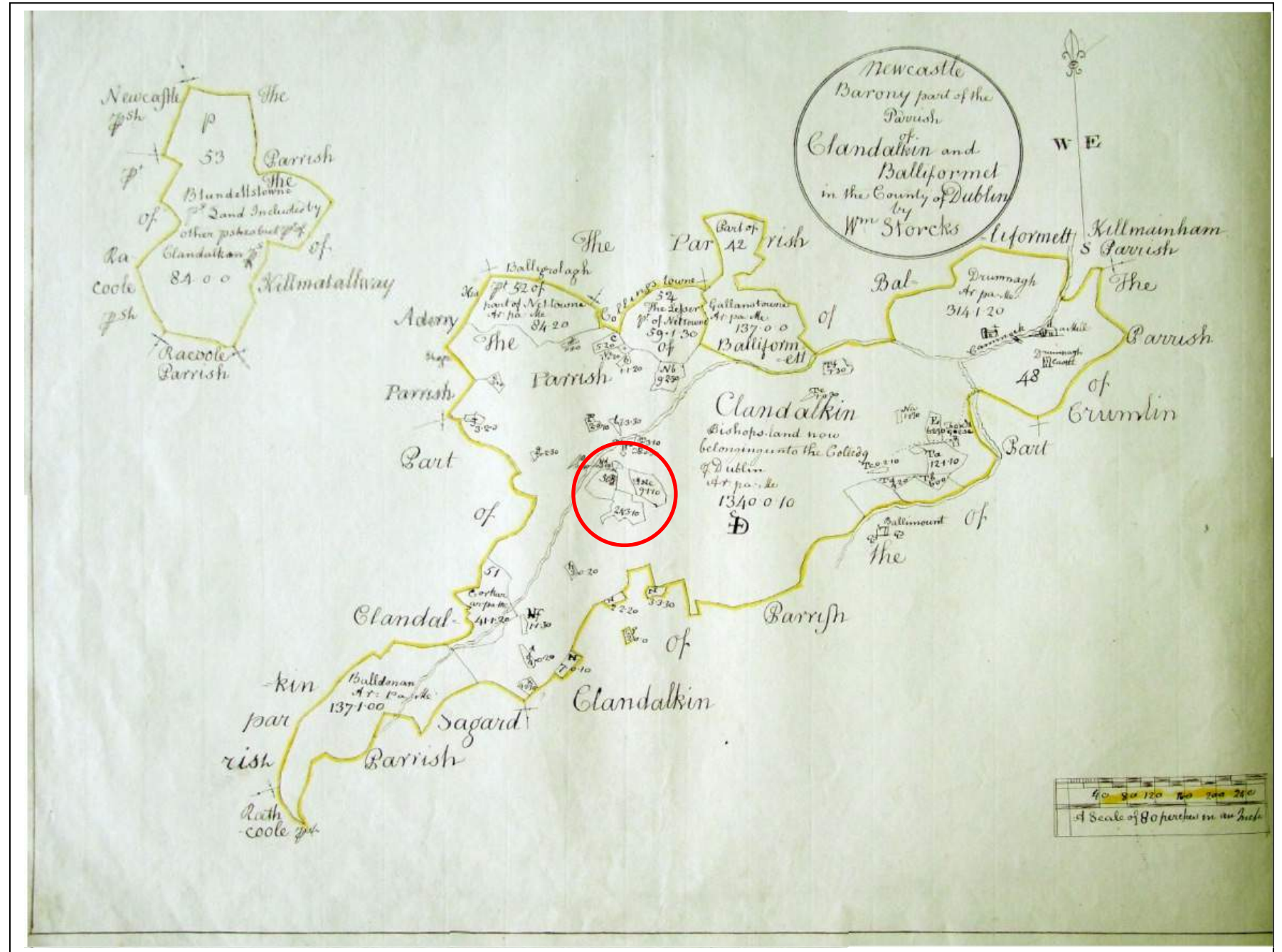


Fig. 4.26. (above) The complete Down Survey map of the parish of Clondalkin and Ballinacorney. Note the same property boundaries indicated on this map as on the barony map above. The trunk like extension of the parcel of land south of Monastery Road are the lands extending down to what is today Convent Road. The round tower site was then part of the vast estate of the archbishop - shown hatched in grey on the 1782 map below - later leased to Thomas Finlay and by 1782 owned by his son John. (Source of the three maps:- The website of Trinity College Dublin, accessed on 5th September 2013-09-05 <http://downsurvey.tcd.ie/down-survey-maps.php#bm=Newcastle&c=Dublin>)

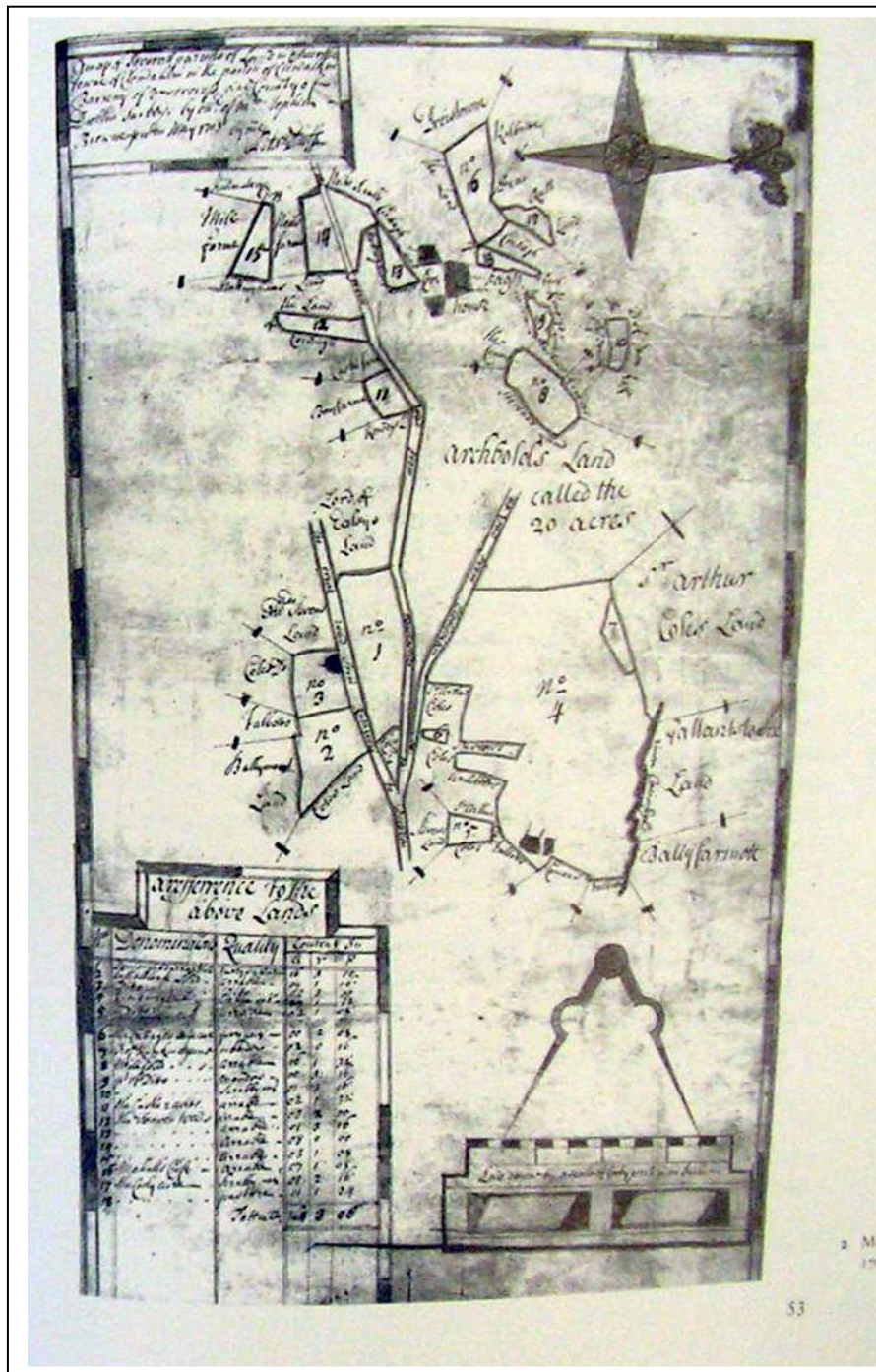


Fig. 4.27. "Map of Severall parcels of Land in & neer the Towne of Clondalkin in the Parish of Clondalkin, Barony of Uppercross and County of Dublin surveyed by ordr of Stephen Browne", dated May 1703, surveyed by Peter Duff. North is to the right rather than up the page. (Source: pages 52-53 of "A Catalogue of the Maps of the Estates of the Archbishops of Dublin, 1654-1850", Raymond Refaüssé & Mary Clark, Four Courts Press, 2000)

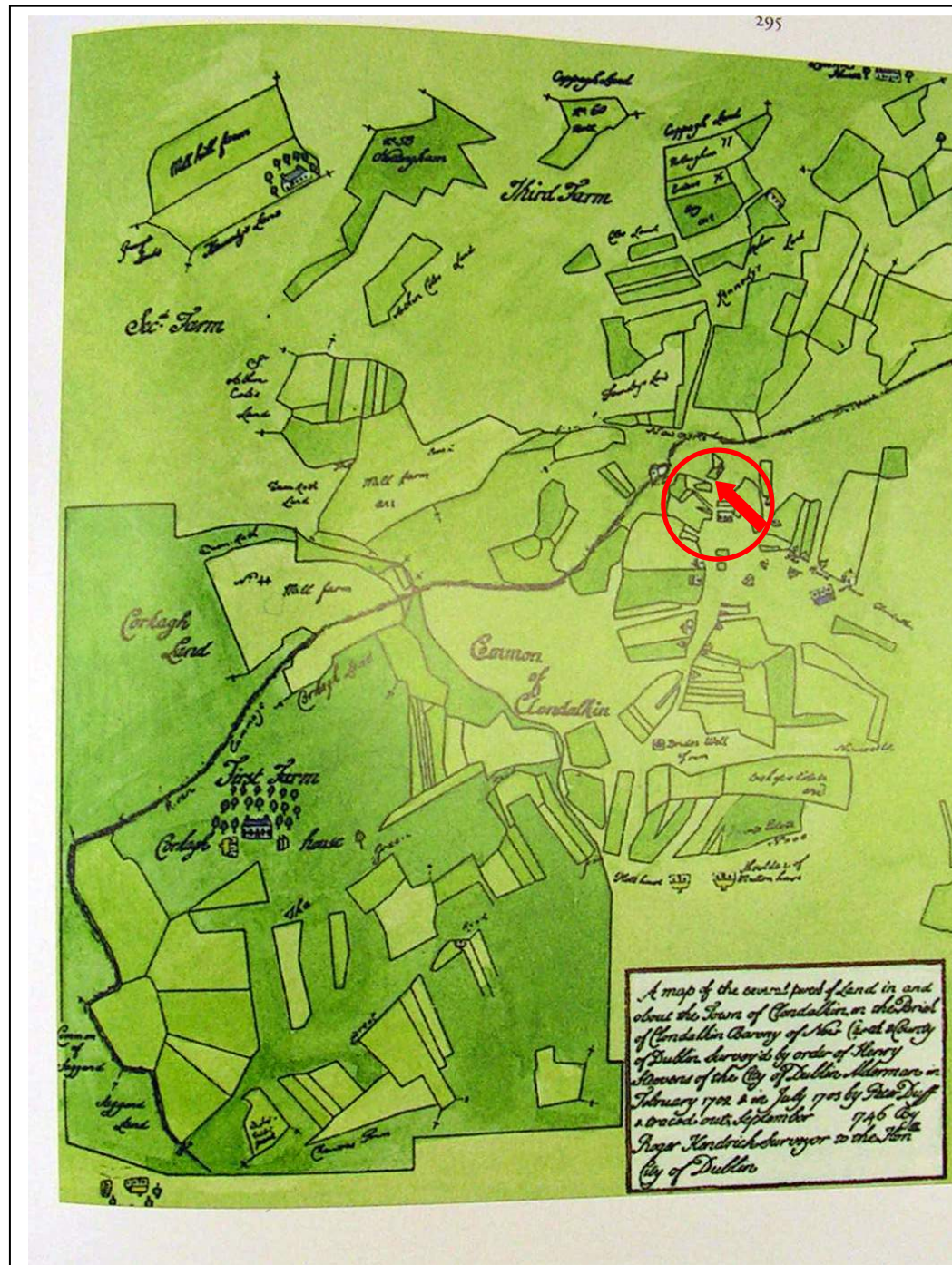


Fig. 4.28. "A map of the several parcels of land in and about the town of Clondalkin surveyed in February 1702 and July 1703 by Peter Duff and traced out September 1746 by Roger Kendrick". The round tower site is indicated with a red arrow. The former monastic enclosure is indicated within the red circle. North is up the page. Note the absence of Tower Road from these early eighteenth century maps. (Source: page 295 of "The Dublin Region in the Middle Ages, Settlement, Land-Use and Economy", Margaret Murphy and Michael Potterton, Dublin, Four Courts Press, 2010)



Fig. 4.29. An extract from the 1782 map (see also Fig. 4.14, page 27). Note the absence of any burgage plots, buildings or other settlements along Monastery Road. This may indicate that the area was not settled, or just that it was not part of the survey. (Source: The website of the National Library of Ireland)



Fig. 4.30. An extract from the 1782 map (see also Fig. 4.14, page 27). This shows the burgage plots along what are now Convent and Boot Roads. The land ownerships correspond with the 1746 map opposite. (Source: The website of the National Library of Ireland)

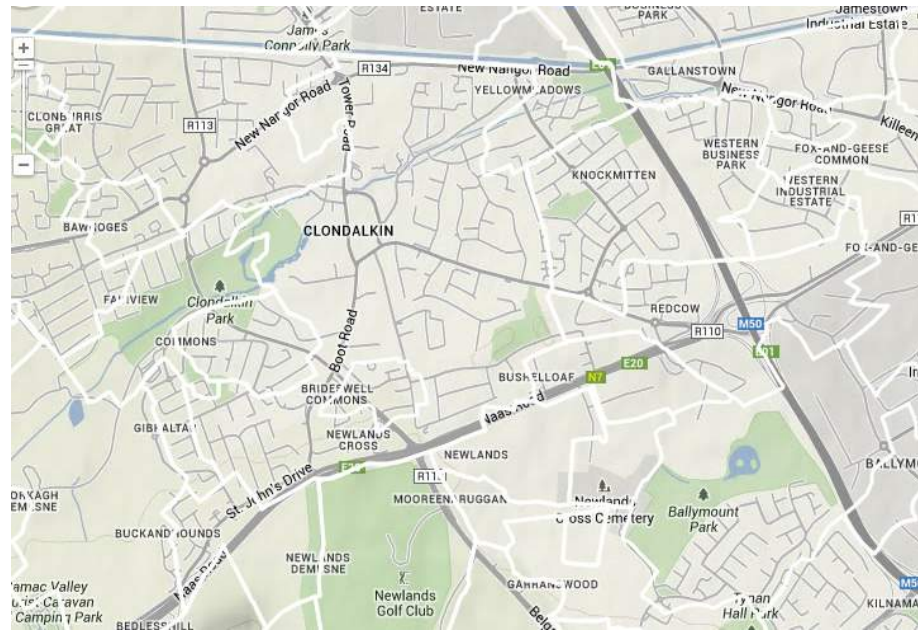


Fig. 4.31. The townlands of Clondalkin and the surrounding area as recorded in the 1659 census of Ireland. (Source: The website of Trinity College Dublin, accessed on 5th September 2013)

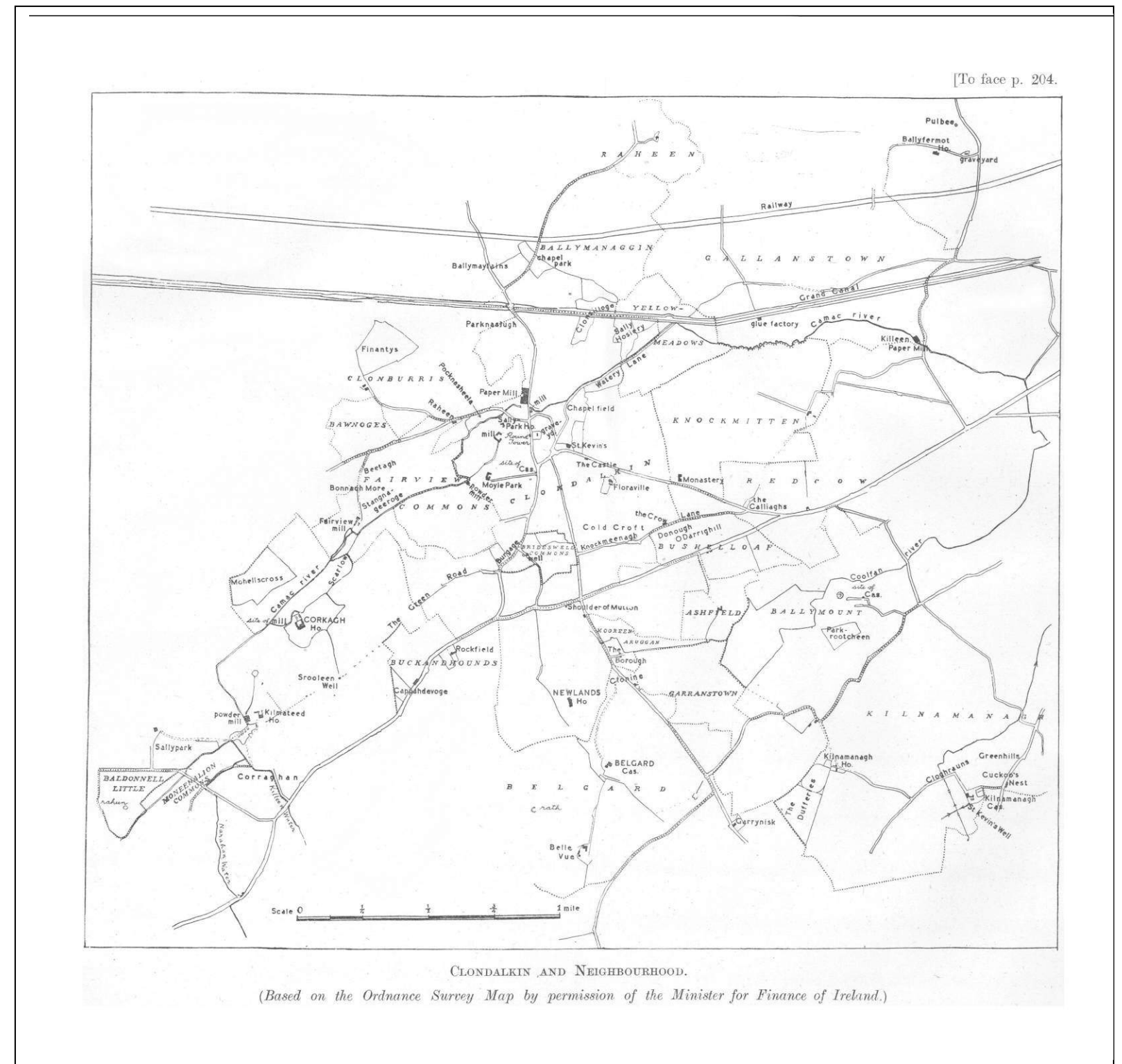


Fig. 4.32. A mid-twentieth century, large-scale ordnance survey map of the townlands around the Clondalkin area. This can be used as a guide, but comparison with the previous Down Survey maps and land ownership maps is difficult because the seventeenth century townlands differed in size, name (sometimes) and extent from those that exist now. Note how the westerly continuation of Knockmeenagh Lane is described as the Green Road. (Source: South Dublin Libraries, Local Studies Collection)

#### 4.4 Clondalkin village and the proposed development site in the eighteenth and early nineteenth centuries

The settlement of the Williamite wars at the end of the seventeenth century secured power in the hands of the “Ascendancy”, a minority mainly Protestant elite. The peace and stability which followed brought economic development and more construction throughout Ireland. Gabriel Beranger’s drawing of Deansrath castle and house to the west of Clondalkin is an example: the narrow slit windows, walls and defensive architecture of the earlier ruined castle has given way to a small farmhouse with wider window and door openings, a peacetime building. Clondalkin village only recovered gradually during the eighteenth century. The Archdeacon drawing of 1775 (or 1791?) (Figure 4.33, next page) shows a ruined house and fragmented boundary or enclosure wall at Orchard Lane with empty spaces between. Austin Cooper’s description of the village in 1780<sup>39</sup> describes there being more ruins than inhabited buildings in the village. The Longfield map of 1782 shows a street and marketplace barely contained by small buildings, walls and embankments, a thin urbanism, the remnants of a formal plan.

However there was some new development in the second half of the century: Tower or Roundtower Road was cut through the former monastic enclosure, making more permanent an old path between the tower and church. Tower Road is not shown on the seventeenth and early and mid-eighteenth century maps. The round tower and church were

<sup>39</sup> Cooper, Austin. An eighteenth century antiquary; the sketches, notes and diaries of Austin Cooper (1759-1830). Printed by direction of his great grandson, Albert Damer Cooper. Ed. Liam Price, M.R.I.A. Dublin: J. Falconer, 1942.

once part of an inner enclosure or precinct although the drawings of the church of St. Mochua show an enclosing wall around the church beyond the tower. Joe Williams states that Tower Road probably resulted from the upgrading of a pathway between the north and south entrances to this enclosure.<sup>40</sup> Another book dates this intervention to the year 1760 but no source is given for this information.<sup>41</sup> In 1782 the foundation of Moyle Park Mill was laid near Moyle Park House on the River Camac, and as mentioned previously the church of St. John was built in 1789 to replace the ruined church of St. Mochua.

Increased industrial activity – paper mills, oil mills and a gunpowder mill, stone quarrying, brick manufacture, lime burning and gravel extraction – gradually brought prosperity. By the end of the eighteenth century there were seven large mills along the banks of the River Camac including a large gun powder mill at Corkagh. However, in 1787 a massive explosion took place within Moyle Park Mills that severely damaged Clondalkin village, causing extensive structural damage to the church of St. Mochua, which was replaced with the existing church dedicated to St. John. In the 1830s the Sallypark paper mills (upper and lower) were opened. These industrial developments with their associated mill buildings, workers’ houses, mill ponds and sluices formed a new district of the village built on green fields along the river bank, to the west and north of the round tower. Development of the sites of what are today 15 and 16 Tower Road first appear on Taylor’s Map of 1816 and are also shown on

<sup>40</sup> page 8 of “St. Mochua and the Round Tower”, Joe Williams, South Dublin Libraries, 2006)

<sup>41</sup> Page 62 of “Clondalkin From Generation to Generation”

Duncan’s map of 1821. The lands are shown undeveloped on John Rocque’s map of 1760. We cannot be certain that what is shown on these maps are the houses that exist today, or if they were a previous generation of house or cottage, or if the present houses are modified versions of what is shown on these maps. Certainly the constructional detail of these houses is typical of the period; the use of local bricks, the low granite window cills in relation to the internal floors and external ground level. The two houses (formerly four) are typical labourers’ houses of their era: small, very plain, with little or no decorative detail that might give a clue to when they were developed. Dating of the timber members in the houses might reveal the construction date of the houses, but it might not be exact; timber and other materials were often recycled from one building to another.<sup>42</sup>

<sup>42</sup> On page 19 of “Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin” by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists (May 2008), it is stated that “Thomas Seery and Son established the Clondalkin Paper Mill in 1801 on a site leased to them by William Caldbeck of Moyle Park.” The houses at 15 and 16 Tower Road were built as part of this mill complex so the date of construction probably followed shortly afterward.

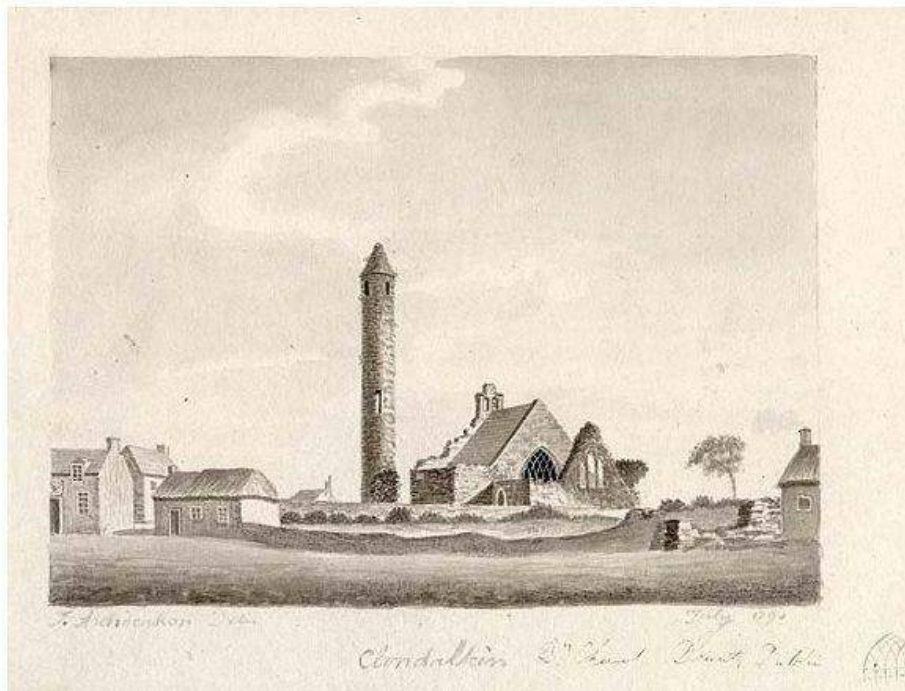


Fig. 4.33. Thomas Archdeacon's print of 1775 or 1791 shows the part-ruined medieval church viewed from the west, very similar to Beranger's view. The precise viewpoint from which the drawing was done can be located on the Longfield map of 1782 (Figure 4.39 next page), to the north of the former market house or tholsel. A fragment of the oval enclosure is in the centre foreground, a ruined house and standing house on the right side, and on the left side the houses at the southern end of Orchard Lane. These correspond exactly with the 1782 map. The Black Lion pub, Massey's Funeral Home and Freyne's pharmacy would be later built directly in front of the houses on the left side of this drawing, and may have incorporated part of these older buildings into their backs. The opening to the lane which once connected the former market place with the church enclosure can be seen between both houses on the left side. It is also shown on some of the eighteenth century maps and part of it still remains between Massey's Funeral Home and Freyne's pharmacy today. (Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.34. "Danesrath Castle, near Clondalken [sic], 5 M: from Dublin" by Gabriel Beranger, first published 1773 under the title "A Collection of Drawings of the Principal, Antique Buildings of Ireland" (Source: The website of the National Library of Ireland)

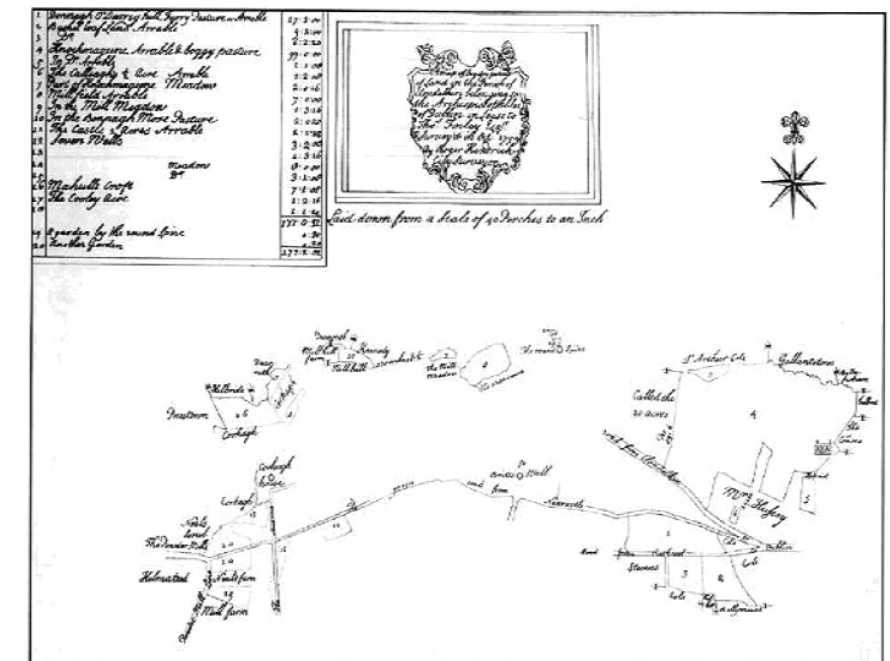


Fig. 4.35. "A map of sundry parcels of lands in the parish of Clondalkin belonging to the Archiepiscopal See of Dublin in lease to Thomas Finlay", Surveyed by R. Kendrick, October 1759. Thomas Finlay was a Scottish settler who leased the lands from the archbishop. These lands were later fused by Finlay's descendants to form Corkagh Estate. Thomas's son John was the registered owner of the lands described on the Longfield map of 1782 above. The junctions of Knockmeenagh Lane ("road from Newcastle") and Monastery Road ("the road from Clondalkin") and the "Road from Ballyfermot" are on the right side. Note the outline of the main piece of land on the right side described as "... arable land"; this includes part of the round tower development site. The same land bank is indicated as being in separate ownership on the Down Survey maps (Source: page 7 of "The House of Corkagh", by Joe Devine, Dublin: South Dublin Libraries, 2003)



Fig. 4.36. John Rocque's map, 1760 (Source of maps in Figs 4.36, 4.37 and 4.38: South Dublin Libraries, Local Studies Collection)

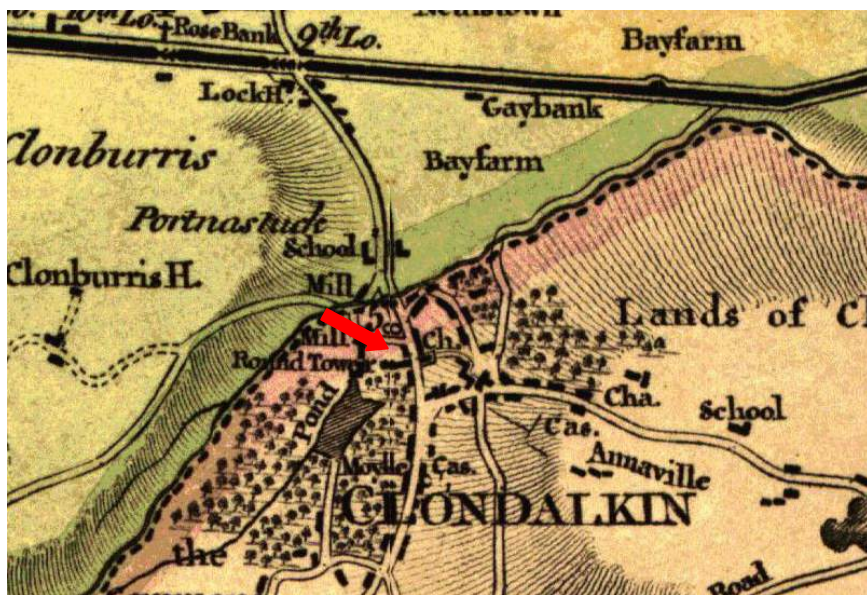


Fig. 4.37. Taylor Map, 1816. The future site of numbers 15 & 16 Tower Road are developed.

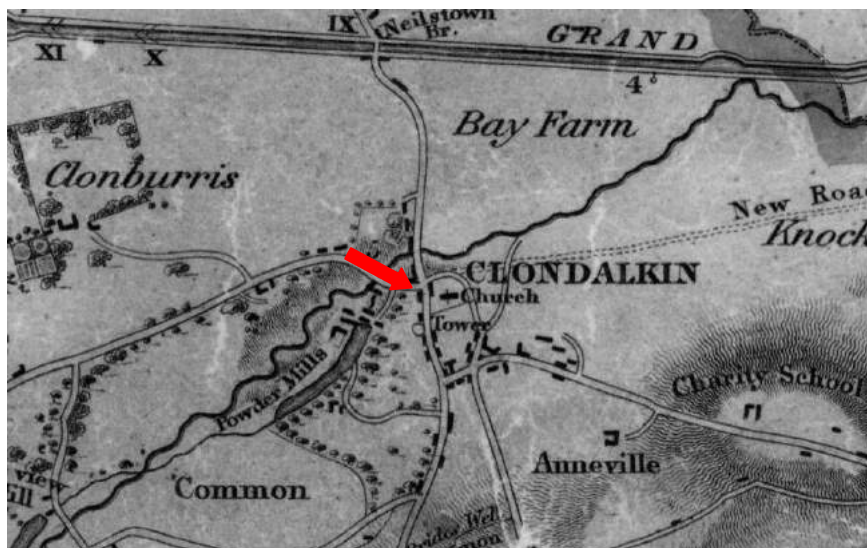


Fig. 4.38. Duncan map, 1821. The houses at Tower Road are shown.



Fig. 4.39. "A survey of the old mill holding at Clondalkin in the County Dublin traced from a map done by Mr. Brownrigg abt. the year 1782 and showing how the same is now disposed of by Mr. Caldbeck & his undertenants, done by John Longfield Jan 7 1808". (Source: Longfield collection, National Library of Ireland). The relationship that once existed between the round tower ("Steeple") and the mediaeval church, demolished 1787, with the door of the tower facing the western gable of the church is clear. This church was orientated east-west and was closer to the tower than the present church of St. John (built 1789) which is orientated north-south. The map is also of interest because it shows the land ownership - Mssrs. Finlay and Tool or Cole (?) are the relevant landowners of the future site of the five houses, and other lands around the village. The map also shows burgage plots on either side of the southern approach road to Clondalkin (now Convent Road and Boot Road) and an area of commonage. A note of caution: these maps often record intended land ownership and buildings as well as the existing situation. The late mediaeval church is also shown in John Rocque's map (Fig. 4.36), north is to the right side, but the presentation is more diagrammatic and less accurate; for instance the tower and church are not located relevant to each other properly.

#### 4.5 The village and the proposed development site in the nineteenth and early twentieth centuries

By the eighteenth and nineteenth centuries the reduced village was concentrated around Main Street, hence the description in Thom's Street and Trade Directories of that period of the village "chiefly consisting of one irregular street". Tower Road had been cut through the former monastic enclosure as recently as the mid-eighteenth century, formalising an existing path between the church and the tower. The early and mid-nineteenth century views of Tower Road, then named Roundtower Road, show it still as a country lane, with a surface of mud or gravel, overshadowed by enormous mature trees which surrounded the round tower and dotted with occasional houses with thatched hipped roofs. Only the late-nineteenth century photographs show how much had changed during the mid-to-late nineteenth century: the demolition of several thatched houses, the development of the formally designed almshouses and schoolhouse at Church Terrace, the construction of footpaths and water pumps (at the junction with Nangor Road and another at the western end of Main Street), the construction of more boundary walls, the replacement of the earthen embankments beside the round tower and the clearance of the huge trees, leaving the tower silhouetted against big colourless skies. This situation has changed little today.

Comparison of the second and third edition ordnance survey maps shows the development of substantial two storey houses along Nangor Road and the northern end of Tower Road, Towerville etc. along with Sallypark mills, and a cluster

of thatched houses extending down to the river on the land where the snooker hall exists today and to the west of it. These were short-lived, captured on the first and second edition ordnance survey of the 1860's (Figure 4.45, pg. 46), two land valuations map (Figures 4.71 and 4.72, pg.59) and on Henry Brocas's drawing of the bridge over the river "Camma" and the town from Nangor Road (Figure 4.44, pg. 48). Likewise the houses at Millview Terrace, originally 5 in number, later merged to three, were probably built behind the existing houses on Roundtower Road between 1830 and 1840 to house workers from the paper mills. The date is estimated from the maps and the surviving evidence in the houses themselves.

The nineteenth century is sometimes referred to as the Romantic Age, the age of William Wordsworth, Samuel Taylor Coleridge, John Keats, Percy Bysshe Shelley, William Blake, and Byron, Romanticism (also the Romantic era or the Romantic period). It was an artistic, literary, and intellectual movement that originated in Europe toward the end of the eighteenth century and was at its peak in the approximate period from 1800 to 1850. Partly a reaction to the Industrial Revolution, it was also a revolt against aristocratic social and political norms of the Age of Enlightenment and a reaction against the scientific rationalisation of nature. It was embodied most strongly in the visual arts, music, and literature, but had a major impact on historiography. Antiquarian poets and artists were drawn to ruins and relics of the past. The presence of so many ruins in and around Clondalkin, and its proximity to Dublin made it a destination. The round tower was a particular focus of attention and was the subject of much debate about its

origins, age and purpose. George Petrie and Molyneux were the first theorists to give these buildings serious study. These visitors have left us a rich legacy of descriptions, drawings and prints. Most of the written accounts are generally positive in their description of the village which compares favourably with others in the district. A selection of nineteenth century accounts of Clondalkin, compiled by the Royal Irish Academy includes:

*Anon, The traveller's guide through Ireland (Dublin, 1815).*

*Binns, Jonathan, The miseries and beauties of Ireland (London, 1837).*

*Brewer, James, The beauties of Ireland (London, 1825).*

*Colt Hoare, Sir Richard, Journal of a tour in Ireland (London, 1807).*

*Coyne, J. Sterling, The scenery and antiquities of Ireland (London, 1842).*

*Cromwell, Thomas, Excursions through Ireland (London, 1820).*

*Mathison, George, Journal of a tour in Ireland during the months of October and November 1835 (London, 1836).*

*Poisson, Jean Charles, Angleterre, Écosse, Irlande : souvenirs et impressions de voyage (1862).*

*Prévôt, Charles Victor, Los tres reinos (Barcelona, 1844).*

*Staples, John, A tour in Ireland 1813-14 (Dublin, 1817).*

*Stevenson, Burton, The charm of Ireland (London, 1915).*

J. Stirling Coyne wrote in 1842

*“The antiquarian who finds himself in Dublin should not omit visiting the little village of Clondalkin to see one of those mysterious pillar-towers”.*

His book also includes a beautiful illustration of the tower. In 1844 Charles Victor Prévôt wrote a French and Spanish edition of his travels in Ireland including his visit to “*la torre de Clondalkin*”. An American, Burton E Stevenson, writing in 1915 devoted a whole chapter of his book, “The charm of Ireland” to Clondalkin:

*“The tower stands at the edge of what is now the main street and is a splendid example of another particularly Irish institution”.*

He describes the tower and its history in detail ‘*whatever their purpose, there they stand, and very astonishing they are*’. While he examined the tower, his wife Betty talked to local people who lived in the cottage at its foot.

Lewis’s Topographical Dictionary of Ireland (published 1837) describes Clondalkin village as follows:-

*“The village, near the entrance of which are the remains of a fortified castle, consists chiefly of one irregular street, and in 1831 contained 150 houses neatly built, though small, and some neatly ornamented cottages appropriated to the uses of charitable and benevolent institutions ...*

*It is situated on the small river Camma, and the road from Dublin to Newcastle, and is a constabulary police station. In common with the parish, it is within the jurisdiction of the manor court of St. Sepulchre’s Dublin. The greater portion of the parish is arable land; the soil is fertile, and the system of agriculture very much improved under the auspices of many resident gentlemen, who farm their own estates, and have established ploughing matches for prizes, which are annually distributed. There are quarries of good limestone, which is raised in abundance for agricultural and other uses ...*

*There is an oil mill in the parish, and in the demesne of Little Corkagh are some gunpowder mills, established a century since, but not used since 1815; one of them has been converted into a thrashing and cleaning mill, capable of preparing 100 barrels daily. The Grand Canal passes through the parish ...”*

The river Camac is barely visible in the village today and hardly features in people’s consciousness of the village or its sense of place. For much of its route toward the village it flows through quiet parkland and behind private houses and gardens. In the village it is contained in a culvert hidden under the car park of the Mill shopping centre where one of the mill ponds was covered in during the 1990’s, only emerging quietly along the north side of Orchard Road and quickly disappearing again behind privately owned lands as it flows eastward. Henry Brocas’s sketch two pages on (Fig. 4.44) is the only evidence of any river frontage by buildings or houses. The sketch appears to date from the early nineteenth century. The row of thatched cottages by the Camac on the right side of the drawing were developed on

the lane to the north of Sally Park House. They were short lived. The cluster of half-hipped roofs and gables of taller buildings in the centre of the drawing were part of the mill complex. They occupied the site of the snooker hall that exists today and lands to the west. These buildings and their road are partly shown on the second edition ordnance survey map but have mostly vanished from the survey for the third edition. The bridge remains, although it is hard to view today- the lands to the south being privately owned and those to the north being buried under the shopping centre’s vast surface car park along with the culverted river and mill pond. The site of the lower mill is now occupied by a modern apartment block with its own car parking area overlooking the mill pond, which remains fairly intact and is a protected structure. Moyle Park House and its avenue and gate lodge were built along the western side of the southern end of Tower Road, then lined with trees and a rubble stone wall. This line of trees and boundary wall was interrupted by small cottages with their parcels of land along Tower Road, shown on the early nineteenth century drawings and maps, some of which are copied below.

From the evidence of the earliest photographs, comparison between the first, second and third edition ordnance survey maps (from the mid-nineteenth century to the early twentieth century) and the surveys by the National Inventory of Architectural Heritage (N.I.A.H., [www.buildingsofireland.ie/](http://www.buildingsofireland.ie/)) suggest that the village was substantially re-built during the mid to late nineteenth century, although the buildings may incorporate earlier built fabric. Complete demolition of a building and clearance of its site was, and remains, an expensive option when compared with adaptation.



Fig. 4.40. Roundtower Road, drawn in 1828 for the first ordnance survey. These drawings and the detailed written descriptions in the surveyors' notebooks were an important part of the survey and were consulted in the later preparation of the maps in a drawing office. Note the houses shown in the distance, which are now 15 and 16 Tower Road. For those interested in further research the surveyor's notebooks are kept in the National Archives of Ireland. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.)



Fig. 4.41. Clondalkin, by W.H. Bartlett, dated 1842. The hipped roofs of what is now the southern end of 15 Tower Road can be seen in the distance, beyond the tower. The ornate depiction of the thatched roofs on either side of the road is probably fanciful, and would be typical of the Romantic age. A more realistic view can be seen on the sketch to the left, Figure 4.40 and on Figure 4.4, three pages on.



Fig. 4.42. A view of the round tower by George Petrie. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.)

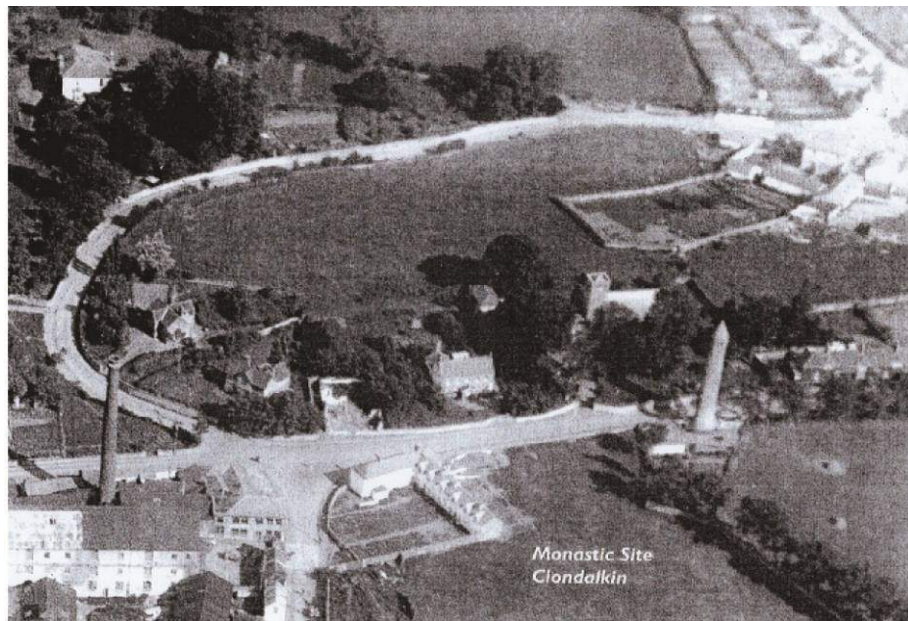


Fig. 4.43. An aerial postcard view of the proposed development site (Source: from pg. 35 of the report "Round Tower Site, Clondalkin-Design and Conservation Report" commissioned by South Dublin County Council from Shaffrey Associates Architects, 2008. The original source is not given)

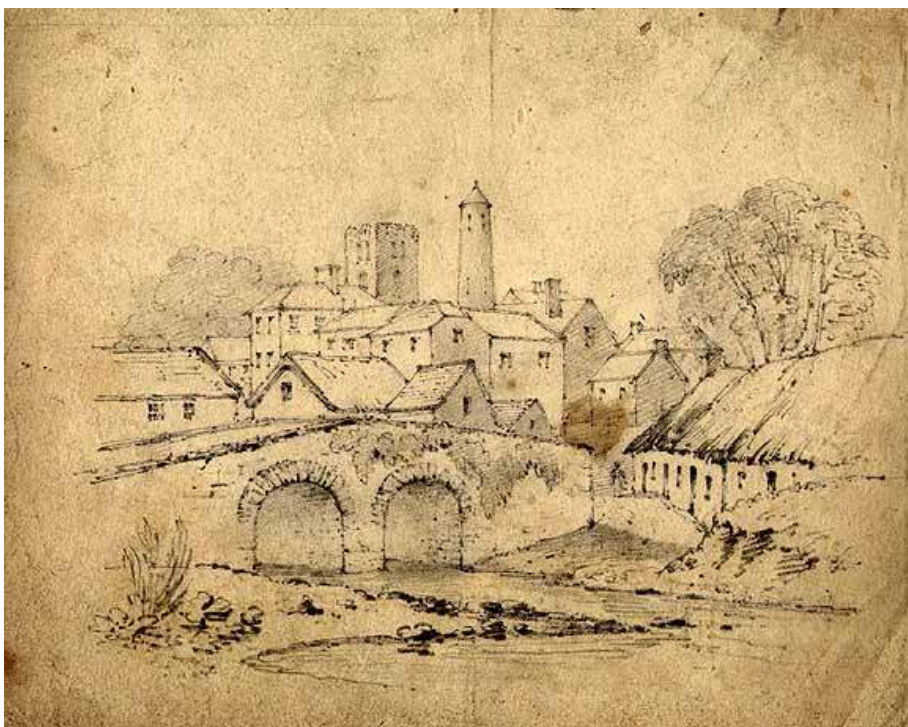


Fig. 4.44. "The round tower, old church and bridge over the river Camma at Clondalkin, Dublin" by Henry Brocas (1798-1873). (Source: The website of the National Library of Ireland)

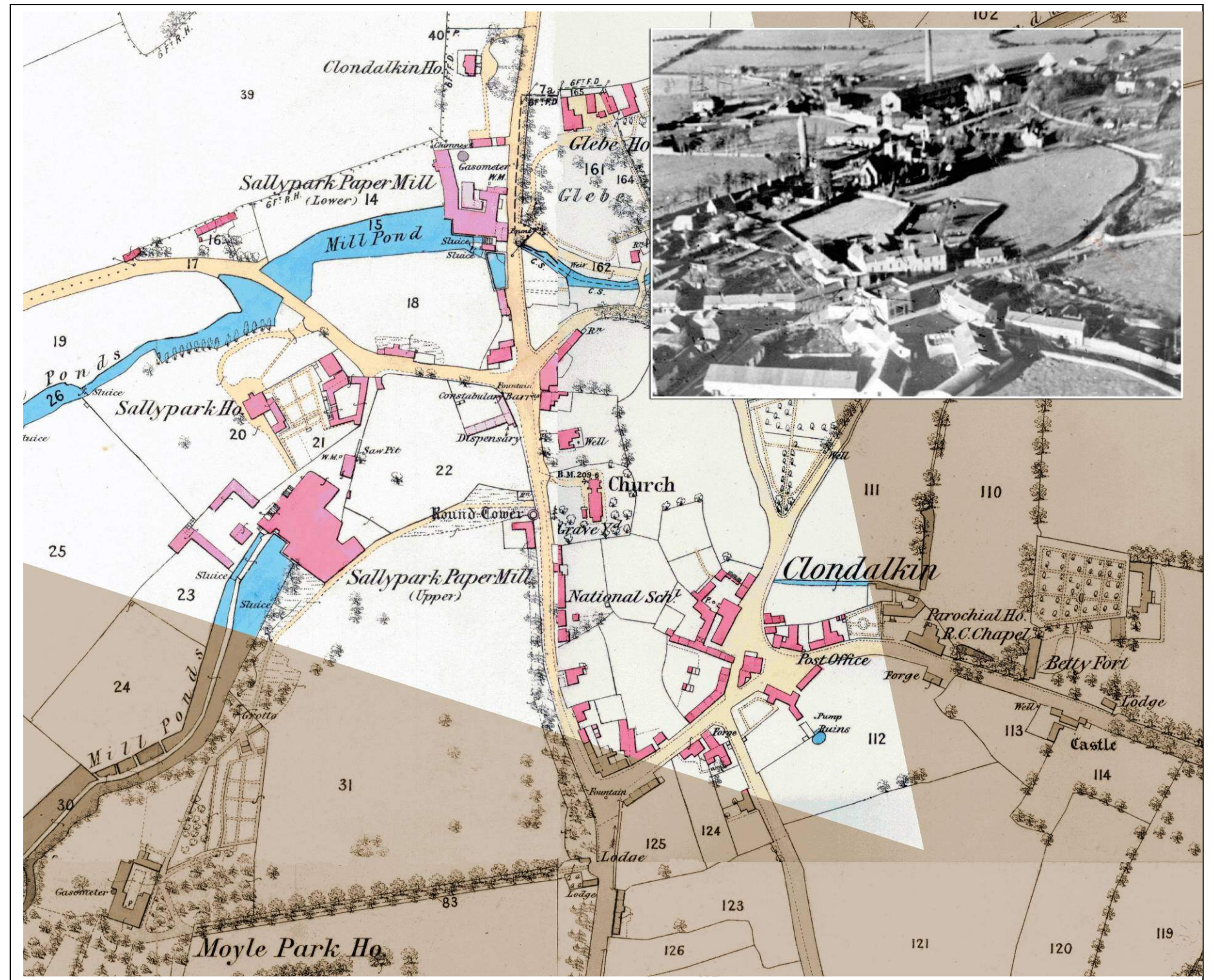


Figure 4.45. An aerial view of Clondalkin, photographed around 1930, overlaid on an extract from the second edition ordnance survey map, circa 1868. The village had developed during the late nineteenth and early twentieth centuries, mainly along Tower Road and (old) Nangor Road. Note the four houses shown at Millview Terrace, instead of three as exists today and five as shown on the land valuations map (Figs. 4.70 & 4.71). The public spaces at the intersection of the Slí and the enclosure are evident. The long thin shallow plans of many of the buildings, single pile, one room, or one room and a corridor deep, are evident on both the aerial photograph from the 1930's and on the map, which suggests that they were once thatched. This is supported by Table B1 of the 1911 census, and by descriptions of the village in travel books and in Lewis' Topographical Dictionary and Thom's Directory. (Source of the photograph and map: South Dublin Libraries, Local Studies Collection. The overlaying and adaptation is by the author)



A



B



C

Figures 4.46, A, B & C. Three aerial views of the village.

A (left, above) and B (left, below): An aerial view of Clondalkin village from the south-west and from the south-east respectively. (Source: South Dublin Libraries, Local Studies Collection). C (above): An aerial view of Clondalkin village from the south, compiled from several screen shots downloaded from the website "bingmaps.com" on 4/1/2013. Note the houses on the south side of Main Street, developed in the 1890's. These houses may contain older fabric within, between the late Victorian facades and the modern rere extensions which accommodate their commercial uses today.



Fig. 4.47. An engraving from the Dublin Penny Journal of 7<sup>th</sup> September 1833. The houses on Roundtower Road are more realistically depicted compared with Bartlett's engraving two pages back. The building on the right would later be cleared to make way for the almshouses

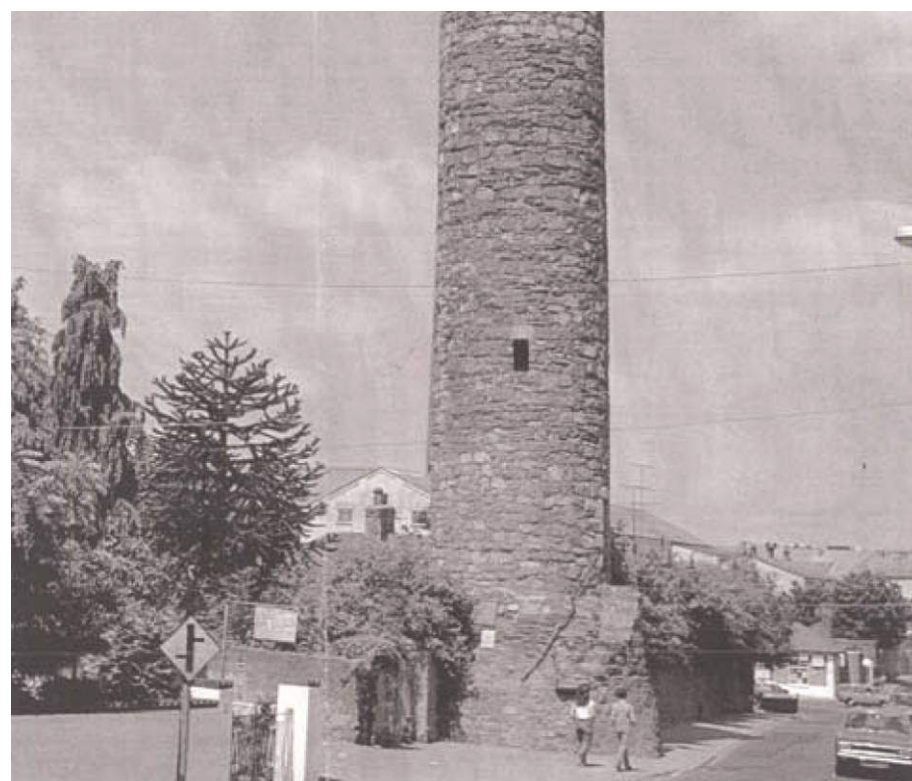


Fig. 4.48. The round tower, the 1970's (Source: Shaffrey report, pg. 27)

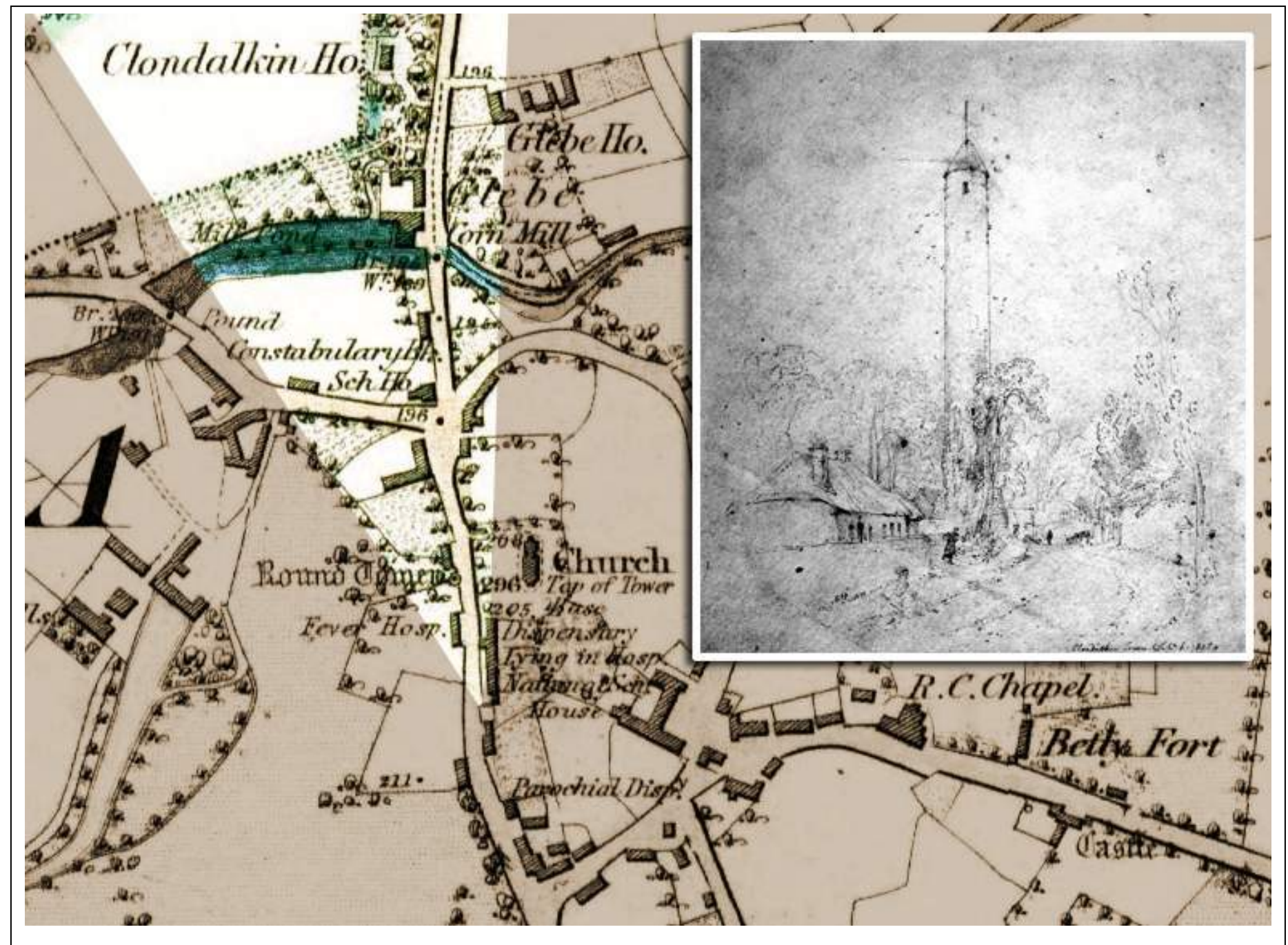


Figure 4.49. A drawing of Roundtower Road around 1830 overlaid on an extract from the first edition Ordnance Survey map, circa 1837. The drawing was done as part of the first Ordnance Survey of Ireland to assist the surveyors in recording the detail. In the time before photography became more portable and affordable accuracy of the depiction was important. The map and drawing show Roundtower Road as a country lane overshadowed by enormous trees and faced by thatched houses, two attached on the left with a chimney above either hipped end. (The map was sourced at South Dublin Libraries, Local Studies Collection, and the drawing is reproduced by permission of the Royal Irish Academy (c) R.I.A. The overlaying of map and drawing and adaptation is by the author)



Fig. 4.50. View from the Grand Canal, by T.J. Westropp, probably around 1879. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.)

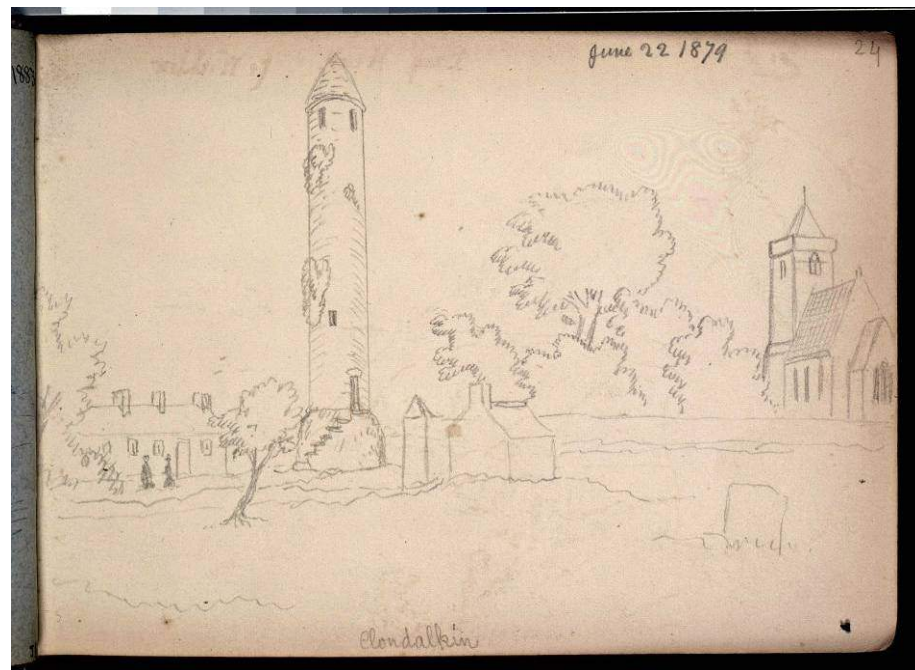


Fig. 4.51. A pencil sketch of the tower and church of St. John, viewed from the south-west, by T.J. Westropp, probably around 1879. This was redone in pen and ink, below. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.).

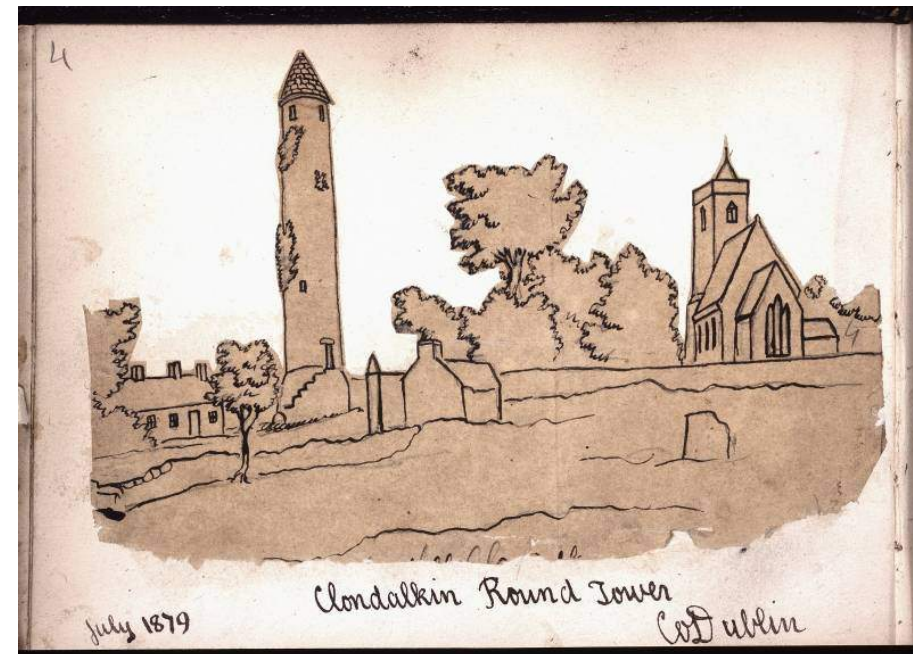


Fig. 4.52. A slightly more stylised version of the same view, dated 1879. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.).  
schoolhouse of Church Terrace around 1870. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.).



Fig. 4.53 The Round tower of Clondakin as drawn by W.T. Wakeman 1843. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.).



Fig. 4.54 The Round Tower at Clondakin, by David Frederick Markham, published circa 1848. (Source: The website of the National Library of Ireland)

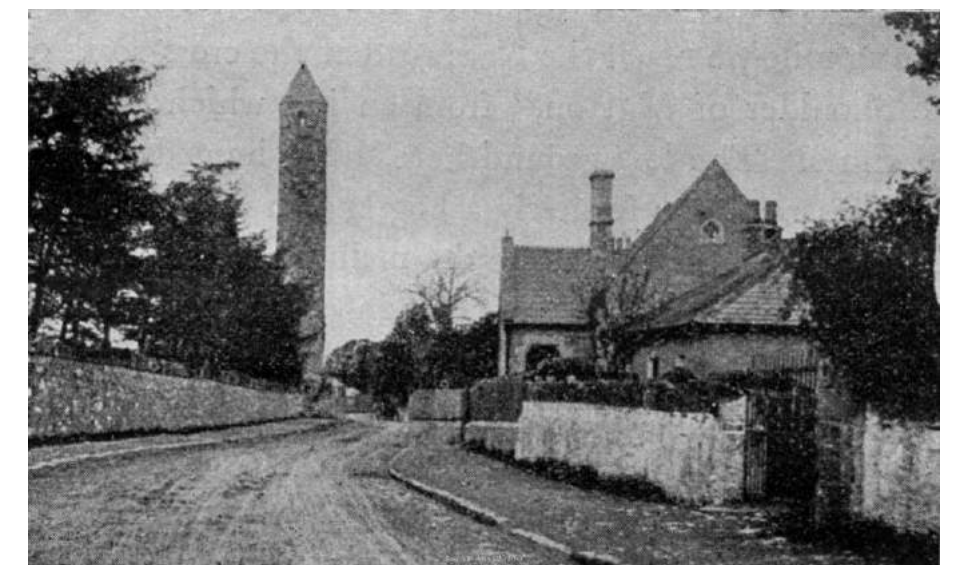


Fig. 4.55 An undated and unattributed photograph copied from the book "The Neighbourhood of Dublin" by Weston St. John Joyce (1921)

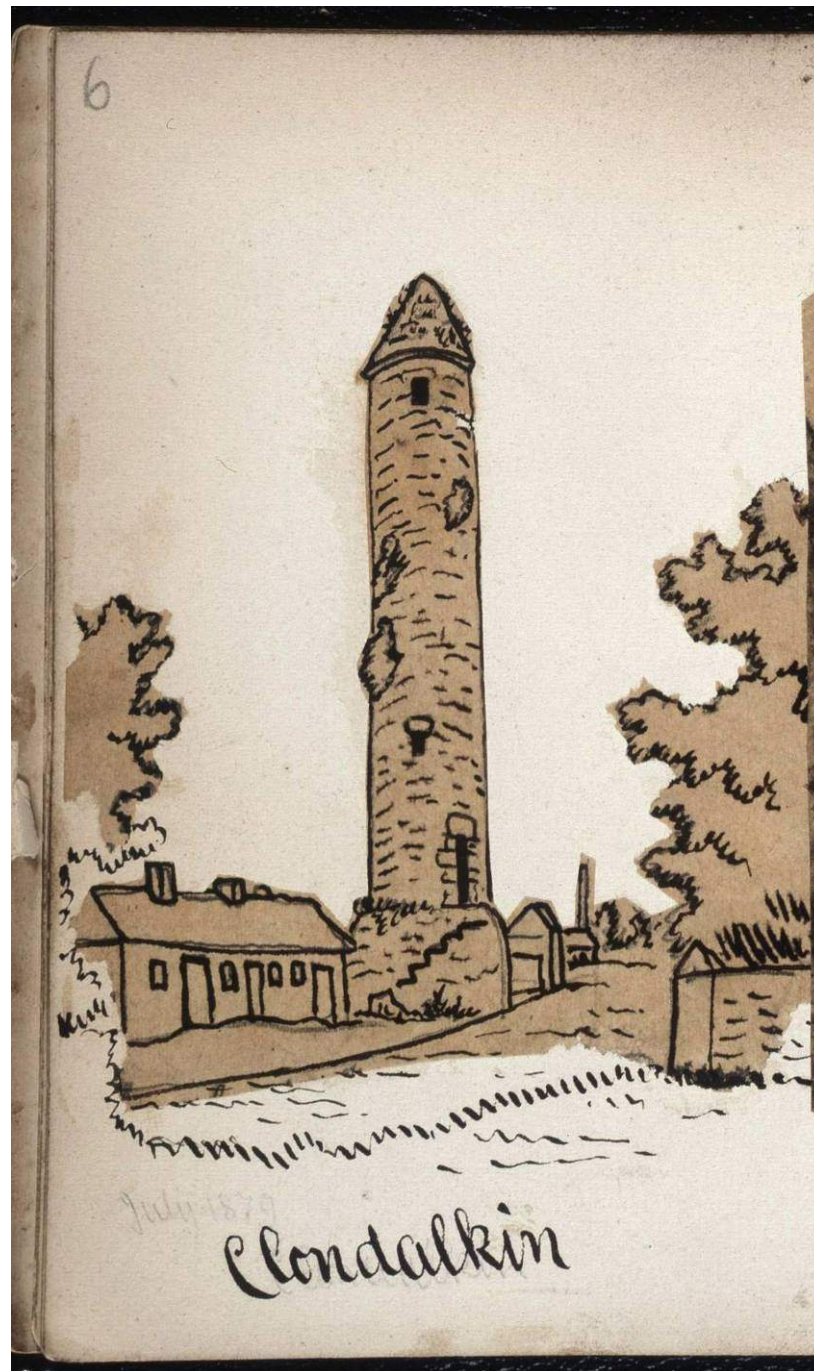


Fig. 4.56 The Tower, by T.J. Westropp, probably around 1879. (Reproduced by permission of the Royal Irish Academy (c) R.I.A.).



Fig. 4.57 Clondalkin Round Tower from the Eason collection of the National Library of Ireland, dated 1900-1920. The southern end of the hipped roof of 15 Tower Road is visible just to the right of the round tower. The cottages shown on the sketch on the left, Fig. 4.56 are gone. (Source: The website of the National Library of Ireland)



Fig. 4.58 The Round tower, Clondalkin, Co. Dublin, from the Lawrence collection of the National Library of Ireland, dated 1890. (Source: The website of the National Library of Ireland)

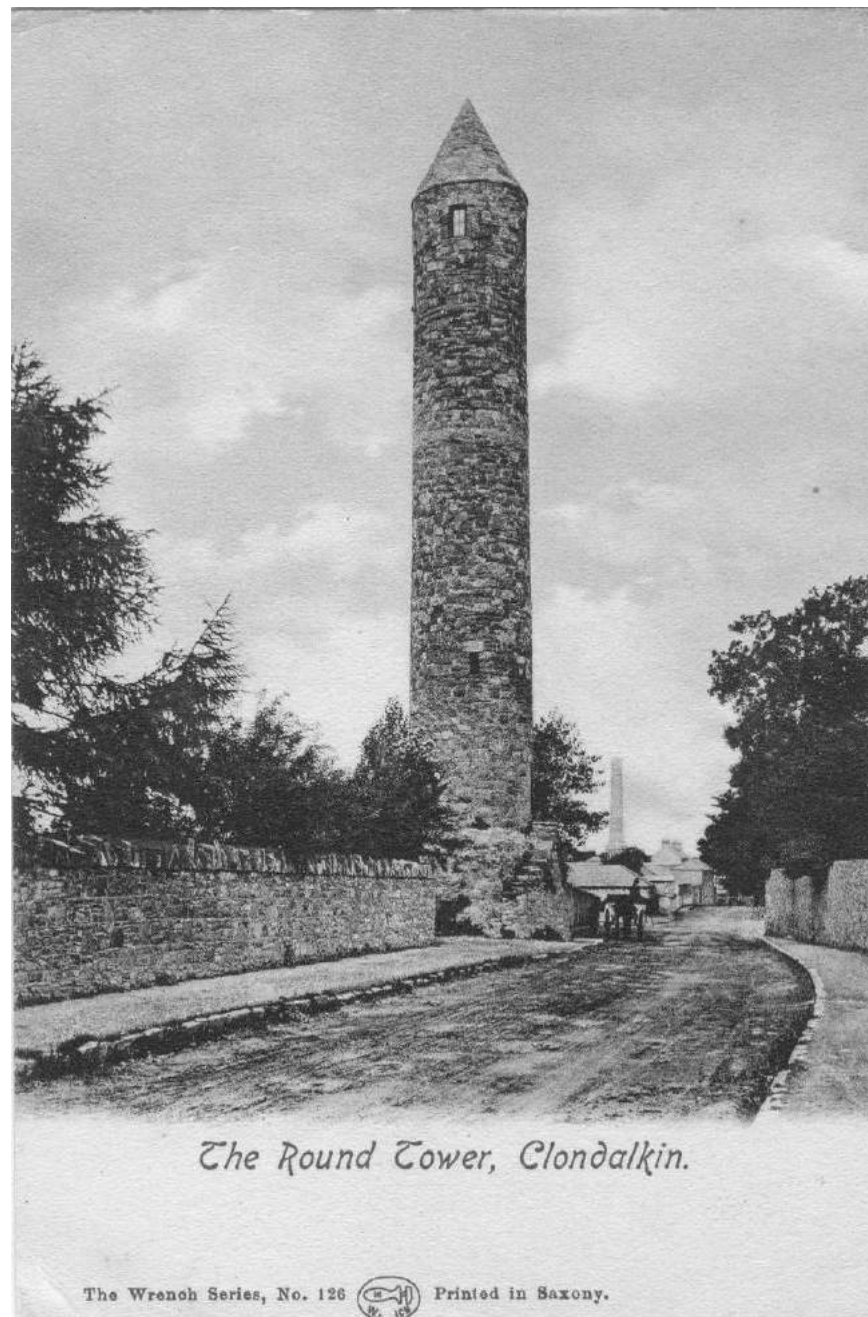


Fig. 4.59 A postcard view of the round tower from the south, probably from the late nineteenth or early twentieth century. (Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.60 A photograph taken in 1989 from almost exactly the same viewpoint as the photo on the left and on the preceding and following pages. Note that the footpath built in the late nineteenth century remained. Note the boundary wall on the left, reduced in height, rendered and openings made for driveways to houses developed during the 1950's. Number 15 Tower Road is concealed by the trees. (Source RTE stills library, from the website <https://stillslibrary.rte.ie>).

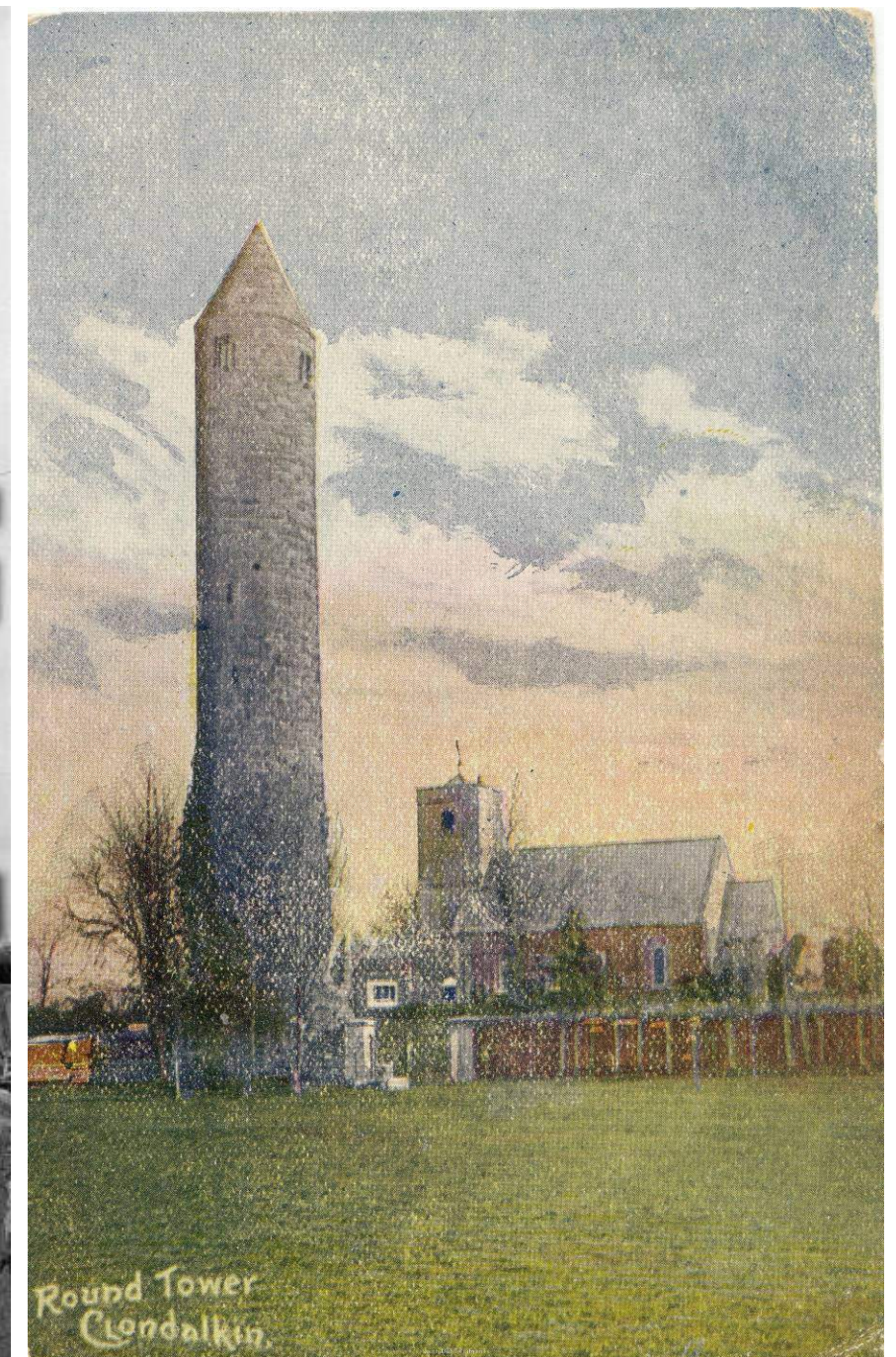


Fig. 4.61 A tinted photograph, postcard view of the round tower and St. John's church from the south-west. The view pre-dates the construction of the semi-detached houses along the west side of this part of Tower Road during the 1950's. (Source: South Dublin Libraries, Local Studies Collection)

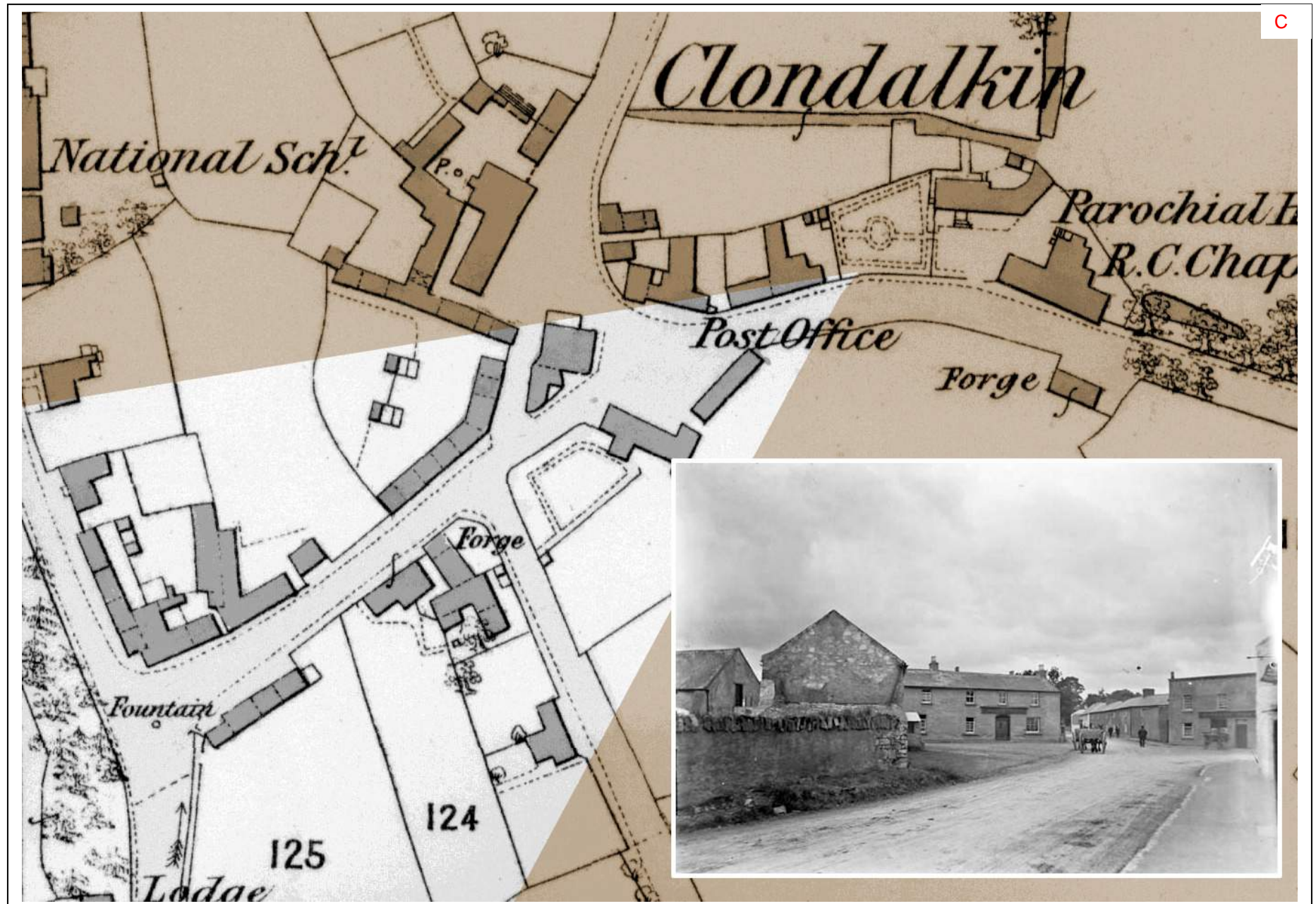
Nine views of the former marketplace and three generations of building on the island site at its centre:



A view from Monastery Road of the intersection of Orchard Lane, Monastery Road and Main Street, not dated but probably early-to-mid-nineteenth century. The thatched houses along north side of Main Street recede to the distant Roundtower Road. The narrow L-shaped building in the foreground is shown on the first edition OS map and the 1782 Longfield map, and pre-dated the pub shown in photograph C, built circa 1850 (Source: The website of the National Library of Ireland)



A current view, photographed from the same viewpoint as the Eason photograph opposite. The "Village Inn" is the third generation building on the island site; about 10 years ago it replaced the building shown on the Eason photograph opposite. (January 2013)



Figures 4.62, A, B & C. Three views of the former market place at the junction of Monastery Road, Orchard Road and Main Street. Three generations of building occupying the island site in the centre of the market place are shown.

A: An early-to-mid-nineteenth century view, watercolour (Source: The website of the National Library of Ireland, Prints and Drawings Section)

B: A photograph of the former market place taken in January 2013 from the same point as that in the Eason collection, see C below.

C: A view of the former marketplace at the junction of Monastery Road, Orchard Road and Main Street. (Source The Eason Collection, from the website of the National Library of Ireland. Not dated, but probably late nineteenth century). The photograph is overlaid on part of the large scale (25" to 1 mile) ordnance survey (Source: South Dublin Libraries, Local Studies Collection). The public house which replaced the dilapidated structure on the island site in view "A", can be seen in its previous version (which remained until a decade ago) on the right side of the photo. The single-storey thatched houses on the north side of Main Street receding into the distance in view "B" have been replaced by 2-storey slate-roofed houses in this view. The diamond-shaped open space is evident. The north side of Main Street would decades later be almost completely re-developed.



Fig. 4.63. A photograph of the east side of Richard Power's pub (now the "Village Inn") from the end of Monastery Road, taken in 1989. Compare this with the early twentieth century view in the Eason print on the previous page. (Source RTE stills library, from the website <https://stillslibrary.rte.ie>)



Fig. 4.65. The same view as Fig. 4.63, January 2013.



Fig. 4.67. The east side of the island site, the junction of Monastery Road with Orchard Lane in 1989. The pub named "Richard Power" on the island site would be re-named "Morans". (Source RTE stills library, from the website <https://stillslibrary.rte.ie>)



Fig. 4.64. The open space on the north side of the island site, the end of Orchard Lane in 1989. The backs of the buildings on the north side of Main Street can be seen in the centre of the photo. (Source RTE stills library, from the website <https://stillslibrary.rte.ie>)



Fig. 4.66. The same view as Fig. 4.64, January 2013. The long blank wall was once behind a row of small houses which were laid along the long vacant site beyond "Quinlan's public house, a.k.a. The Black Lion".



Fig. 4.68. The north façade of the same building which faced Orchard Lane, photographed in 2002, since demolished and replaced by the "Village Inn". The National Inventory of Architectural Heritage (N.I.A.H.) dates this building to about 1850. Therefore the watercolour in Fig. 4.62A on the previous page shows the building which pre-dated this public house. (Source: the website of the N.I.A.H., [www.buildingsofireland.ie](http://www.buildingsofireland.ie))

4.6 The documentary evidence from the mid-nineteenth century onwards, street directories, census records, valuations and deeds.

From the mid-nineteenth century onward there was an explosion of historical records and documentation from which a lot of information can be gleaned. The first edition Ordnance Survey of Ireland was the most advanced survey and mapping of any country in the world at that time. A few years before it, the Tithe Appointment Books, compiled land valuations between 1823 and 1838 and the survey was followed by the Primary Valuation of Ireland, also known as the Griffith's Valuation, carried out between 1848 and 1864.

In the Primary Valuation, or Griffith's Valuation the area of land held is given in Acres, Roods and Perches. There are 40 square Perches to a Rood and four Roods to an Acre. The "Rateable Annual Valuation Land, Buildings, Total" column refers to the taxable or "rateable" value, which was the income that the property could reasonably be expected to produce in a year. For buildings, the size, construction materials, age, state of repair, and dimensions were factors taken into account. For land, the extent of the land holding, soil quality, average rents, aspect, and distance from market were all taken into account. From the latter we know that of lot numbers 15 to 19 inclusive (probably the five houses on Millview Terrace), the first three are valued at £1, 8 shillings and 0 pence and the last two at £1, 13 shillings and 0 pence and £1, 17 shillings and 0 pence respectively – if there were five houses at Millview Terrace, not four.<sup>43</sup> The economic

<sup>43</sup> The official records conflict on this point but examination of the houses themselves makes 5 houses at Millview almost certain. The confusion may have

householders, a distinct from heads of household, are listed as Patrick Balfe, Anne Hanlon, Winifred Hoolihan, vacant and vacant. The four houses at Tower Road (later amalgamated into two houses) are probably lot numbers 25 to 28 inclusive, valued respectively at £2, 17 shillings and 4 pence ("House and yard", only number 26 had a yard), £2, 14 shillings and 0 pence, £3, 2 shillings and 0 pence, and £2, 14 shillings and 0 pence. The economic householders are respectively John Burby, Michael McDonnell, Michael Dolan and James Byrne. The immediate lessors John Hudson and Thomas Seery were probably middleman of sorts rather than outright owner, a common arrangement at the time. More information could be obtained by checking the records in the Land Valuations Office in Middle Abbey Street, Dublin and by tracing the transfers of ownership in the Registry of Deeds, Henrietta Street, Dublin - this research was considered to be beyond the scope of this report.

The size of the land holding in the next column is blank because of the nine (or eight) houses only one had a yard, number 26 Roundtower Road (today 16 Tower Road). The houses at Millview had no back gardens then and probably blank *rere facades*.<sup>44</sup> It is not clear if the front gardens were allocated individually to each house – there is no description in the valuation record of four or five houses together, each with "house and garden". The next column records the "Net Annual Value of Land" which is blank because none of them are recorded as having "land". The next column indicates the

been caused because part of what is now 15 Tower Road appears to have once extended back into the east end of Millview Terrace

<sup>44</sup> It is likely that the small windows at the back of numbers two and three Millview Terrace (on the first floor landings) are not original but were made later to admit light after part of the field behind the houses was colonised as *rere gardens*

"Net Annual Value of Buildings" described previously. The column on the extreme right side indicates the "Total Net Annual Value" of the lands and buildings.

The abstract from the censuses of 1831 and 1821<sup>45</sup> show that the population of the village had decreased by 125 people, from 881 to 756 persons, between 1821 and 1831, but that the parish's population increased by 459, from 1778 to 2237 persons. When these figures are compared with the figures from the census of 1861<sup>46</sup> some interesting trends are noted. In 1841 the total population of Clondalkin parish is 2026 and Clondalkin Town 505. In 1851 the total population of Clondalkin parish is 1974 and Clondalkin Town 474. In 1861 the total population of Clondalkin parish is 1738 and Clondalkin Town 668. The town's population steadily decreased until the 1861 census and the parish's population slightly less so, which may be explained by the Great Famine, or possibly by a re-drawing of the town's official boundary for census purposes. Examination of the maps and close reading of the Directories from the mid-nineteenth century onward show that labourers' cottages and suburban houses were being developed on the roads leading to Clondalkin village. The previous occupants of the four houses which are now numbered 15 and 16 Tower Road could not be established by online desktop research for this report with absolute certainty. However it would appear likely that the heads of household of the four houses on the night

<sup>45</sup> "Comparative Abstract of the Population in Ireland as taken in 1821 and 1831, arranged in the order of parishes, boroughs, counties and provinces" (published 1833, the House of Commons).

<sup>46</sup> "The Census of Ireland for the year 1861. Part 1 showing the Area, Population and Number of Houses by the Townlands and Electoral Divisions, Vol. I, Province of Leinster" (Alexander Thom, Dublin 1863). Both this and the abstract from the 1831 census were sourced at the website of the University of Southampton.

of the 1911 census are those listed below, John Weldon, Margaret Keogh, Mary Wall and Patrick Power. “Kynock Company”<sup>47</sup> is listed as the head of household of the four houses. This conclusion is based on the fact that of the 63 houses recorded in “Clondalkin Town”, these are the only four houses listed together, each of which has two windows in its front façade and each of which has between two to four rooms. It is of interest to note the number of occupants recorded as being present in each of these tiny dwellings on the night of the census.

The map reference number for the land where the current Millview cottages or terrace are, was given the number 25 and it was described in the Valuation Books as Land leased to Irish Paper Mill & Co. by “Knoyck Ltd.” and later leased from Pulp & Paper Co. Ltd. The immediate lessor’s name changed back and forth between Knoyck Ltd., Pulp & Paper Co. Ltd., Irish Paper Mills Co. Ltd., and a Mr. Rick P. Nolan.

The current Millview cottages appear on the map as being a row of five cottages given the following numbering system as per Griffith Valuation Records: 25a, b, c, d, & e. These cottages formed part of the mill complex at Sallypark Lower and were probably rented out to mill workers. Also note that the current structures that are named 15 & 16 Tower road, were originally four units with the following numbering system: 26, 27, 28a & 28b. On page 63 is an extract from the report by Shaffrey and Associates Architects which show a conjectural recreation of the subdivision of Millview Terrace

<sup>47</sup> On the Land Valuations records the name is incorrectly recorded as “Koyneck”. Kynock and Co. Ltd., were a Birmingham-based munitions manufacturer who acquired the Clondalkin Paper Mill from Mr. Hacking in 1906, who in turn had acquired it in 1898 from Mr. Robert Caldbeck.

before it was altered in the late nineteenth or early twentieth century, and the alterations made to the façades and internal layouts that took place within all the structures on Tower Road.

House numbers 26, 27, 28a & 28b Roundtower Road were amalgamated into two structures nos. 15 & 16 Tower Road, probably sometime in the middle of twentieth century. However it is possible that they were altered before the 1911 census – the absence of any four houses listed together in the census which would accord with their external appearance suggests this. House numbers 25a, b, c, d & e were also amalgamated into three, or possible four, structures 25ab, cd & e, c. in the early years of twentieth century, and eventually were renamed as 1, 2 & 3 Millview Terrace.

On the first edition ordnance survey map (circa 1837) the long row of buildings to the south of St. John’s church, along the eastern side of Tower Road, are described with a note stating “Dispensary Lying in Hosp..... House”. These dispensary buildings were later demolished and replaced by the almshouses and school house on Church Terrace that were built between 1870 and 1879. The Dispensary was re-located to Tower Road, the ordnance survey map of Clondalkin from 1868 (Fig. 4.45, pg. 48) shows the remains of a part of the wall or column from the earlier medieval church. The same map shows 15 Tower Road (formerly 28b Roundtower Road) identified as a Dispensary which is also noted on the Griffith Valuation Records. Millview Terrace appears to be divided into four units with a boundary wall to the west; this may have been an oversight or an error; the

survey was based on built boundaries rather than land ownerships. On the second edition ordnance survey map of Clondalkin circa 1870, the cottages shown in the early nineteenth century drawings are gone and the boundary wall shown in the photos from the Eason and Lawrence collections photo (Figures 4.57, 4.58 & 4.59) has been extended northward. Moyle Park’s eastern boundary wall along Tower Road has been constructed after which the early cottages along that path, immediately to the south of the round tower, were demolished. Also note the small nib of what appears to be a wall attached to the north side of the tower and the structure just north of the Round Tower, marked as Gate Lodge on the 1880 Griffith Survey (Fig. 4.73) of which the footprint partially survives today. The landholding immediately to the north of the round tower has been demarcated with boundaries. The footprint of the former gate lodge and the remains of one wall still remain.



Fig. 4.69. A photograph of the boundary wall to the north of the round tower. Note the two stubs of wall immediately to the north of the tower and the remains of a boundary wall in the left foreground (June 2013)



Fig. 4.70. A photograph of the round tower taken from a high vantage point during wintertime, not dated. The former gate lodge to the north of the round tower can be seen. Only fragments of the walls of this structure remain today. A more complete view of the gate lodge is shown on Fig. 3.17, page 24. The gate lodge is still shown on the most recent edition of the Ordnance Survey maps although it has been demolished for at least a decade. (Source: the Local Studies Section of South Dublin Libraries)

The terrace of nos. 15 & 16 Tower Road were originally composed of four terraced houses (units), each having two-storey front façade with two bays to ground floor level, one bay to first floor level. Internally they were composed of a single room at ground floor and a single room at first floor level. The map prepared during the Griffith's Valuation from the 1850s, numbers these four units as 26, 27 and 28 a & 28 b from north to south. No. 28b was used as a Dispensary

during the second half of the nineteenth century while the remaining units were described as houses and were rented out to different lodgers by the nearby mill complex.

Also on the Primary Valuation, Millview Terrace is described as being composed of five houses (units) with the following numbering system: from west to east as 25 a, b, c, d & e. They were all rented out to different lodgers by the mill complex. This group of buildings was probably built for the workers of the mill at Sally Park Lower. This numbering system was applied to Millview Terrace throughout the second half of the nineteenth century and through the early years of twentieth century. The 1930s-1960s Valuation records show the amalgamation of the "five houses, 25 a-e" into three, changing the description to the following: 25a-b, 25c-d & 25e. This revised numbering system accurately reflects the structural alterations in the amalgamation. Number 25e also increased in size by amalgamating with the former return of 27 Roundtower Road.

A close examination of the front facades of Millview Terrace, shows an inconsistency in the rhythmic distribution of the ground windows and doors to the units. Also some windows are jammed right up against party walls, a situation that would be most unlikely to have been built. Careful reading of the existing floor plans in the architectural drawings in Appendix 1 to this report also shows that some of these windows have square or perpendicular reveals, although most of the other windows have splayed reveals. The same lack of rhythmic distribution can be noticed at first floor facade composition where the first floor gabled windows are set at varied distances implying that the front façade and

window arrangement was altered to accommodate the amalgamation of the units. However the floor plans are most telling: The previous existence of five houses can be clearly seen, 25a-b was a merging of these two houses to form 1 Millview Terrace, 25c-d to form 2 Millview Terrace, and 25e incorporated what appears to have once been a rere extension to 15 Tower Road, making 3 Millview Terrace slightly smaller than number 1 and 2. This reading of the development of the houses will be checked if works commence, when a series of horizontal strips of the internal wall plaster will be carefully removed from the insides of the external walls of these houses to establish the previous distribution of windows and door openings, since blocked up and plastered over.

Land Valuations records show that the plot of land to the east and south of this group of buildings was leased from different organisations and persons starting with Kynock Ltd. in the 1850s, then from a Mr. Caldbeck in the 1860s, then from Pulp & Paper Co. Ltd in the 1870s, then from a Mr. Rick P. Nolan in the 1880s, then Pulp & Paper Co. Ltd. again in the 1890s. It is likely that this plot of land was part of the paper mill at Sally Park (Lower) which was opened in 1837. Refer to the note copied below from the archaeologist's report.

Much of the information described above is based on the report provided to South Dublin County Council by Shaffrey and Associates Architects in 2008 and 2009 and on their research of the records held in the Land Valuations Office.



The following history of the Clondalkin Paper Mill is copied from the report "Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin" by Brid Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists (May 2008).

"Thomas Seery and Son established the Clondalkin Paper Mill in 1801 on a site leased to them by William Caldbeck of Moyle Park. The business expanded and in 1869 Seery sold his share to Thomas Fegan. The mill closed in 1875 due to a government tax on paper, machinery and rags, to be reopened in 1880 by William Bertram, trading as the Dublin Paper Company. Closed again in 1898, a Mr. Hacking purchased the land from Robert Caldbeck in 1899 and production resumed. Sold to Kynock and Co. Ltd., a Birmingham munitions manufacturer, in 1906, it was renamed the Irish Paper Company. Their board of directors included future British Prime Minister, Neville Chamberlain MP (Byrne and Graham 1989, 46). Kynoch, who also bought the Drimnagh Paper Mills in 1901, also operated the Arklow-based Wicklow Copper Mining Company. Purchasing the Clondalkin mill allowed the company to assumed complete control over the paper for cartridges and wrappings for their chemical explosives produced in Wicklow (Rynne 2006, 295). In 1913 it was sold to the Becker Company. Production boomed with the advent of World War I. In decline post-war, the company switched to the production of paper supplies but closed in 1922. Reopened as the Clondalkin Paper Mill in 1936, it rode out successive global crises until finally closing in 1987."

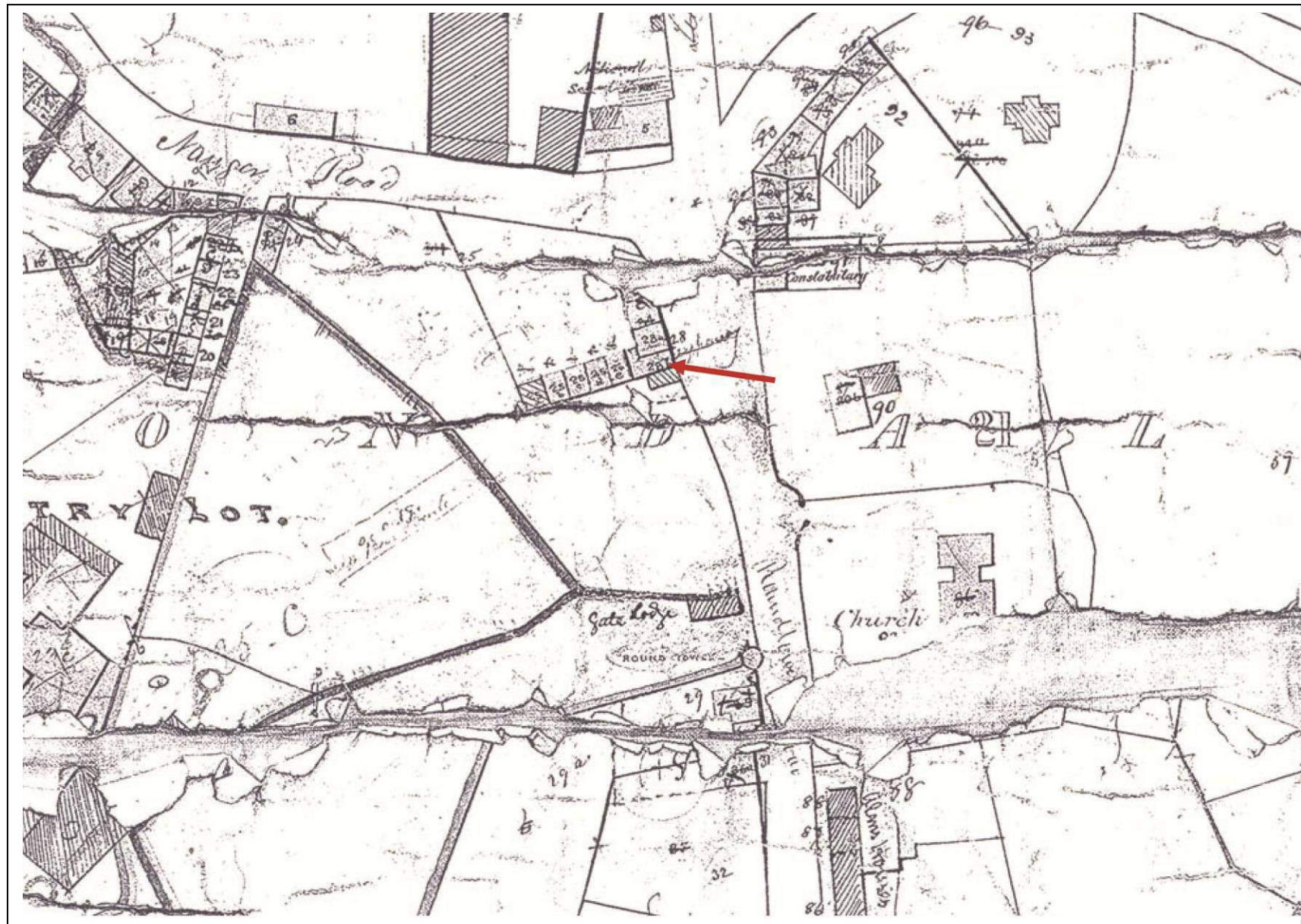


Fig. 4.73. Clondalkin circa 1880, part of a Land Valuations map. Tower Road was then called "Roundtower Road". The small extension to the south of number 15 (previously 28b) was the Dispensary, as noted on the ordnance survey map shown previously. As per the previous map, this map clearly shows five houses on Millview Terrace, numbered 25, (25)A, B, C, and D. The roughly contemporaneous ordnance survey maps of that period all show four houses at Millview Terrace. The confusion may be partly explained by number 28B Roundtower Road which in this map also seems to extend back, partly into the east end of Millview Terrace. Close examination of the odd pair of windows at this location, squeezed together; Room No. 1 on architectural drawing number SK\_05 in the Appendix would appear to support this. (Source of this map: pg. 22 of the "Round Tower Site, Clondalkin - Design and Conservation Report" by Shaffrey Associates Architects for South Dublin County Council)

Extracts from census data:

Castletknock - - Parish	4,984	3,721		St. Werburgh's - Parish	2,620	3,384
Castletknock - Village	162	188	4,251			
Blanchardstown - Village	302	342		DUBLIN, inside the Circular Road, and as connected with the County inside the Circular Road		232,362
Chapelizod - - Parish	672	549	2,181			
Chapelizod (?) - Town	597	1,932		DUBLIN and its Suburbs outside the Circular Road, and as connected with the County inside and outside the Circular Road		265,316
Chapelmidway - Parish	no return	335				
Cloghan - - - Parish	590	613				
Clondalkin - - Parish	1,778	2,237	2,993			
Clondalkin - - Town	381	756				
Clonsilla - - - Parish	718	943				
Clontarf - - - Parish	1,738	1,944				
Drumcondra - Town	591	590	2,534			
				Essex - - - - Parish	466	1,075
				Fireglass - - - Parish	1,184	1,900

Fig. 4.74. An extract from the 1831 comparative abstract shows the population increase in the parish and decrease in the town between 1821 and 1831. The second column from the left shows the population in 1821, the next in 1831, the next shows the aggregate of town and parish.

DUBLIN.

BARONY OF UPPERCROSS.

Parishes, Townlands, and Towns.	Area.	Population										Houses				Valuation	
		In 1841.		In 1851.		In 1861.		In 1871.		In 1881.		Inhabited.	Uninhabited.	Total.	Poor Law Valuation in 1861.	General Valuation in 1861.	
		Persons.	Males.	Persons.	Males.	Persons.	Males.	Persons.	Males.								
BALLYMOUNT P.:																	
Ballymoun, Lower.	310 0 3	34	103	16	23	41	7	16	9	2			11	1,281 10 6	1,208 15 0		
Ballymoun, Upper.	334 0 37	283	42	20	20	40	55	11	7	7			7	892 18 0	1,077 0 0		
Blackthick.	137 1 39	19	11	0	0	15	3	2	2	2			4	198 15 0	190 15 0		
Gillinstown.	395 2 17	19	182	63	72	135	3	40	20	2			23	1,418 10 0	1,704 0 0		
<b>Total.</b>	<b>1,185 1 16</b>	<b>346</b>	<b>340</b>	<b>107</b>	<b>124</b>	<b>231</b>	<b>68</b>	<b>69</b>	<b>48</b>	<b>7</b>			<b>55</b>	<b>3,763 18 0</b>	<b>4,476 10 0</b>		
CLONDALKIN P., part of:																	
Ashfield.	32 3 33	14	7	3	3	6	1	1	1				1	60 5 0	60 5 0		
Ballybally.	225 2 11	120	151	63	73	185	25	26	27				27	234 12 0	268 15 0		
Ballybarn.	295 1 0	11	4	3	3	6	1	1	1				1	108 15 0	108 15 0		
Ballymanagan.	145 0 35	51	25	22	20	111	7	16	25	1			20	322 19 0	327 0 0		
Ballymanagan, Great.	350 0 35	19	23	7	0	15	1	4	3	1			4	505 15 0	498 10 0		
Ballymoun, Little.	37 1 11	21	8	4	7	11	2	1	1				1	62 15 0	62 15 0		
Barnogue.	29 0 15	20	15	17	10	37	17	11	0				0	40 10 0	40 10 0		
Bellinacorney.	40 0 13	23	44	17	10	37	17	11	0				0	63 10 0	63 10 0		
Belinacorney, Common.	0 2 13	2	13	2	2	4	0	0	0				0	13 5 0	13 5 0		
Belinacorney, Small.	75 2 30	12	40	15	10	30	2	7	7	2			1	133 4 0	128 5 0		
Belinacorney, Upper.	55 3 24	11	3	4	3	7	2	1	2				2	100 5 0	99 15 0		
Carraig.	104 0 35	70	52	19	23	41	0	0	7				7	277 10 0	1,106 5 0		
Cherestown.	345 1 34	19	41	16	12	30	4	6	7				7	352 10 0	345 15 0		
Cherestown, Great.	219 3 14	23	45	14	12	26	4	7	4				4	331 10 0	324 15 0		
Cherestown, Little.	40 1 34	9	17	4	7	11	2	2	2				2	106 10 0	131 3 0		
Clonsilla.	507 0 21	302	306	67	94	101	54	50	37	2			29	1,201 5 0	1,425 15 0		
Clonsilla, Upper.	11 1 10	5	5	6	6	11	0	1	1				1	16 5 0	16 5 0		
Clonsilla, Lower.	63 1 13	21	22	5	6	11	6	5	3	1			4	108 15 0	109 0 0		
Collinstown.	145 1 30	30	45	14	19	33	6	6	7				7	260 0 0	239 15 0		
Cotman.	51 3 30	19	50	40	20	30	3	14	10	1			10	54 17 0	62 15 0		
Corkagh.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Corkagh, Demesne.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Dunmurry.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62	86	117	25	22	21				21	348 0 0	383 0 0		
Fulwell, Small.	84 2 13	42	17	8	7	15	5	3	3	1			4	163 5 0	143 2 0		
Fulwell, Upper.	219 3 1	74	43	11	10	22	14	8	6				6	337 5 0	336 0 0		
Fulwell, Lower.	216 1 30	32	40	22	25	45	0	5	7				7	327 18 0	325 15 0		
Fulwell, Middle.	35 0 3	20	49	29	11	31	0	9	4	1			6	183 17 0	176 15 0		
Fulwell, Great.	153 2 12	109	154	62</													

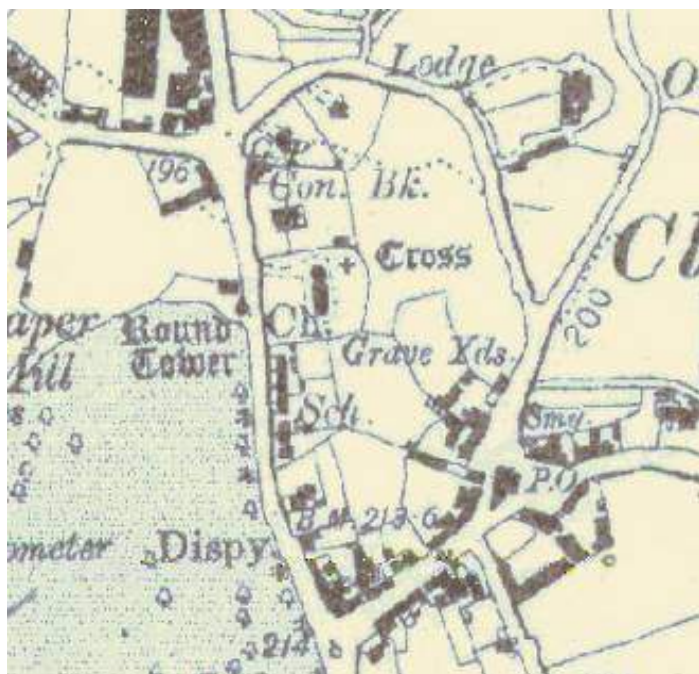


Fig. 4.77. Third edition Ordnance Survey map (1910-13) (Source: South Dublin Libraries, Local Studies Collection)



Fig. 4.78. The fourth edition (circa 1935-38). The 4th edition map shows that a boundary wall, fence or hedge once existed behind number 16 and contained a very narrow long strip of garden or yard behind the house which connected with the existing yard at the north end of the house. (Source: South Dublin Libraries, Local Studies Collection)

In summary, the Archbishop of Dublin and the church was the owner of the lands after the foundation of the monastery and the lands which now form part of the development site. This arrangement appears to have continued during the Viking occupation, existed before the Anglo-Norman invasion of Ireland and remained in place during and after the violence and dispossessions of the seventeenth century. The site was leased to Thomas Finlay, a Scottish settler and banker whose son John eventually acquired this site, as shown on the Longfield map of 1782. Finlay was Mr. John Finlay of Corkagh demesne to the west of the village. The Finlays were prominent in banking, church and affairs of state. John Finlay was a member of The Great Parliament of Ireland, 1791. He was also a friend of Lord Kilwarden, afterwards Chief Justice of Ireland. Both were members of the Vestry of St. John's Church of Ireland in 1791. He was M.P. for Dublin from 1790 – 1797 and leader of The Uppercross Fusiliers. He married an heiress, Elizabeth Stear of Bedford and was quite influential. As well as operating an existing Bank set up by his father Thomas. While Lt. Col. of the Dublin Militia, he was charged at the time of the 1798 rebellion with rounding up the rebels around the Clondalkin area. Col. John Finlay died in 1823, aged 73.

The change in ownership between this and the foundation of the office of Land Registry has not been investigated during the research for this report. From the extract copied from the archaeologist's report (2 pages back) it would appear that the proposed development site was acquired by Mr. William Caldbeck of Moyle Park from the Finlay estate.

South Dublin County Council's records indicate that it acquired the site of number 16 Tower Road in 2001. The previous assignment was in 1945 and was registered to Michael Muldowney. The previous assignment to that was in 1898 when the house was transferred from William Caldbeck to "Leinster Paper Mills".<sup>48</sup> The house was part of a large transfer of 47 acres of land including the mill ponds and other structures. The previous assignment to that was in 1870 to John Fagan, Fegan or Egan - the text is difficult to read. It is likely that the property was let during these periods and there is possibly a long chain of lessors or intermediate lessors. To establish ownership before John Fagan or Egan, his name would have to be checked back in time through the records held by the Registry of Deeds. Number 15 was leased by Clondalkin Paper Mills to Peter Cusack and subsequently went through several ownerships. The former dispensary and lands to the south were leased by Clondalkin Paper Mills to Anna Sheehan in 1945. The previous assignment was in 1936 and was registered to Clondalkin Paper Mills. In 1898 the house was transferred from Major William C. Rope Caldbeck to Clondalkin Paper Mills.

<sup>48</sup> It is noted that this detail from South Dublin County Council's records appears to conflict with the archaeologist's report. "Leinster Paper Mills" does not feature in the latter.

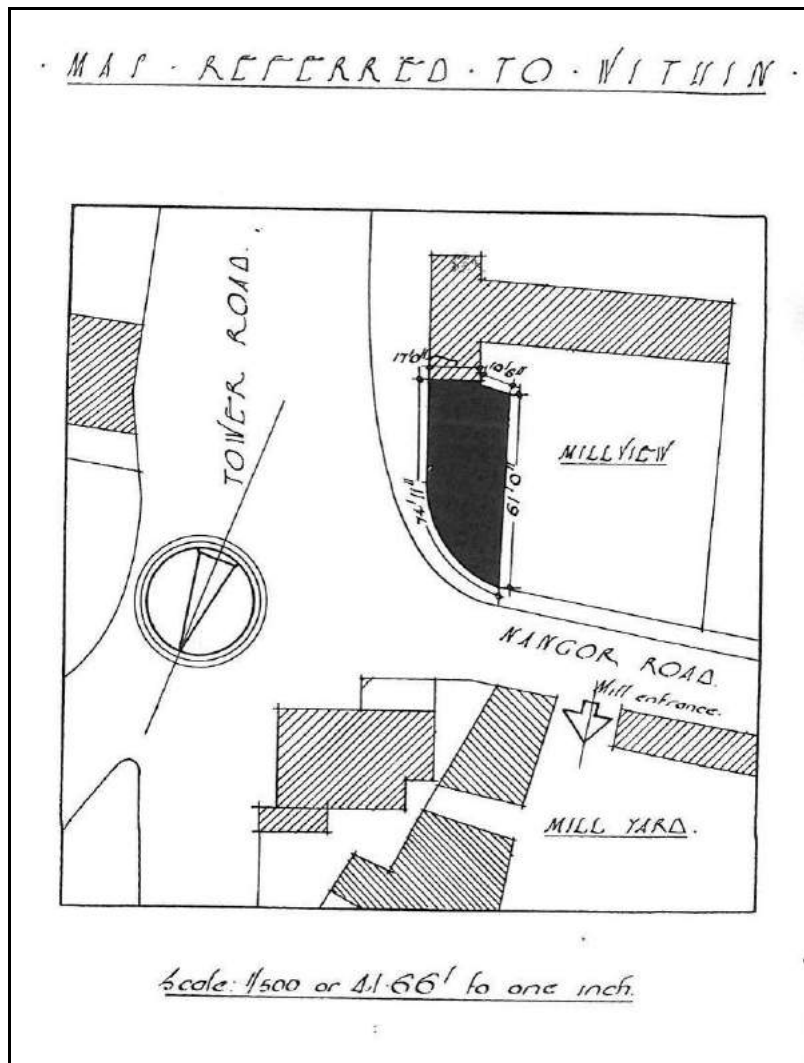


Fig. 4.79. An extract from the indenture for 16 Tower Road which was part of the deeds prepared for the purposes for transfer of ownership or acquisition of lands. The drawing shows the layout and dimensions of the site of the house and the former back yard. This layout accords with that shown 1969 ordnance survey map shown below. The layout is also interesting because it shows that the extension of number 28b Roundtower Road back into Millview Terrace appears to line up with the former party wall between 28b Roundtower Road and 5e Millview. (Source: South Dublin County Council's records of the Development Department)

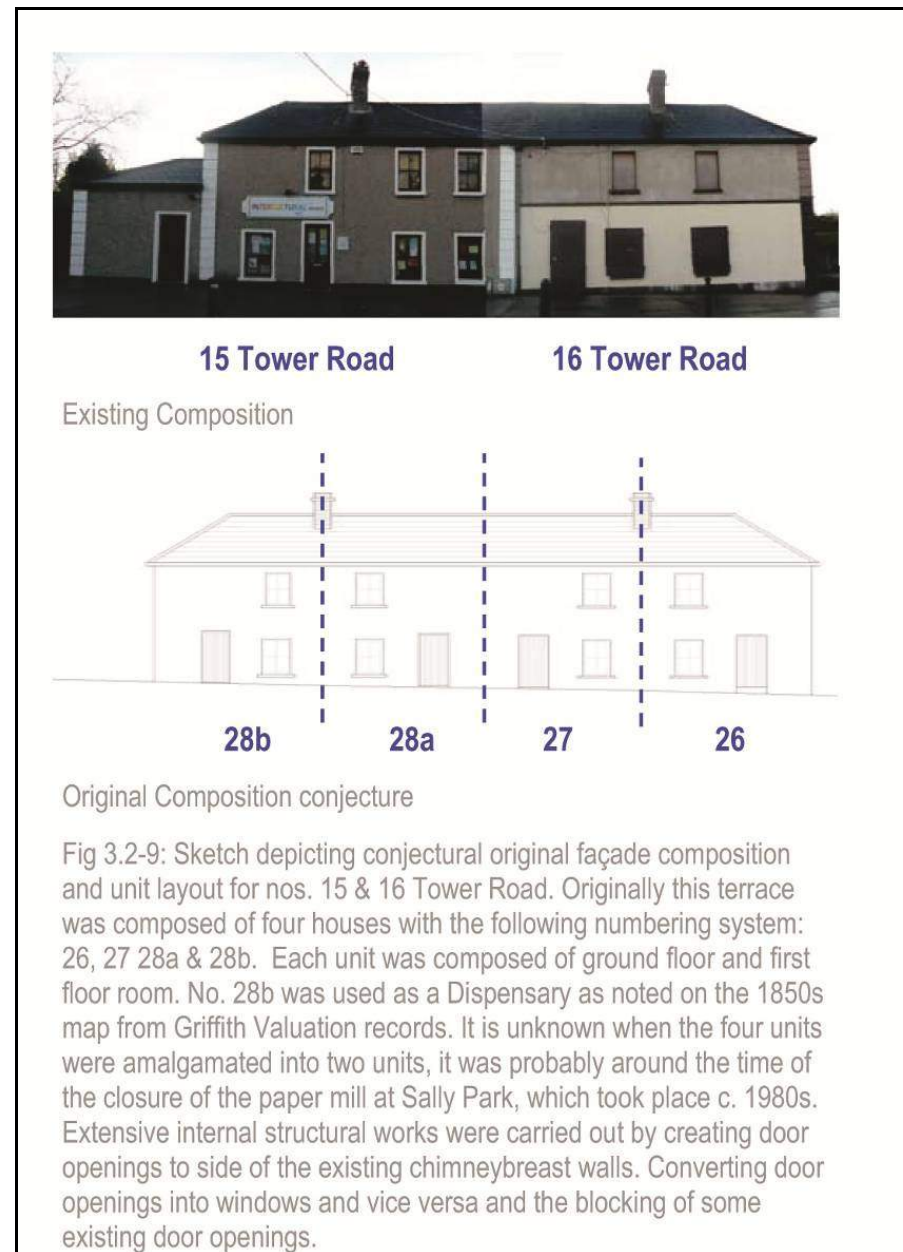


Fig. 4.80. An extract from page 30 of the report prepared for South Dublin County Council by Shaffrey Associates, Architects, entitled "Round Tower Site, Clondalkin - Design and Conservation Report". From examination of the photographs copied two pages on, the conjectural arrangement shown above is correct.

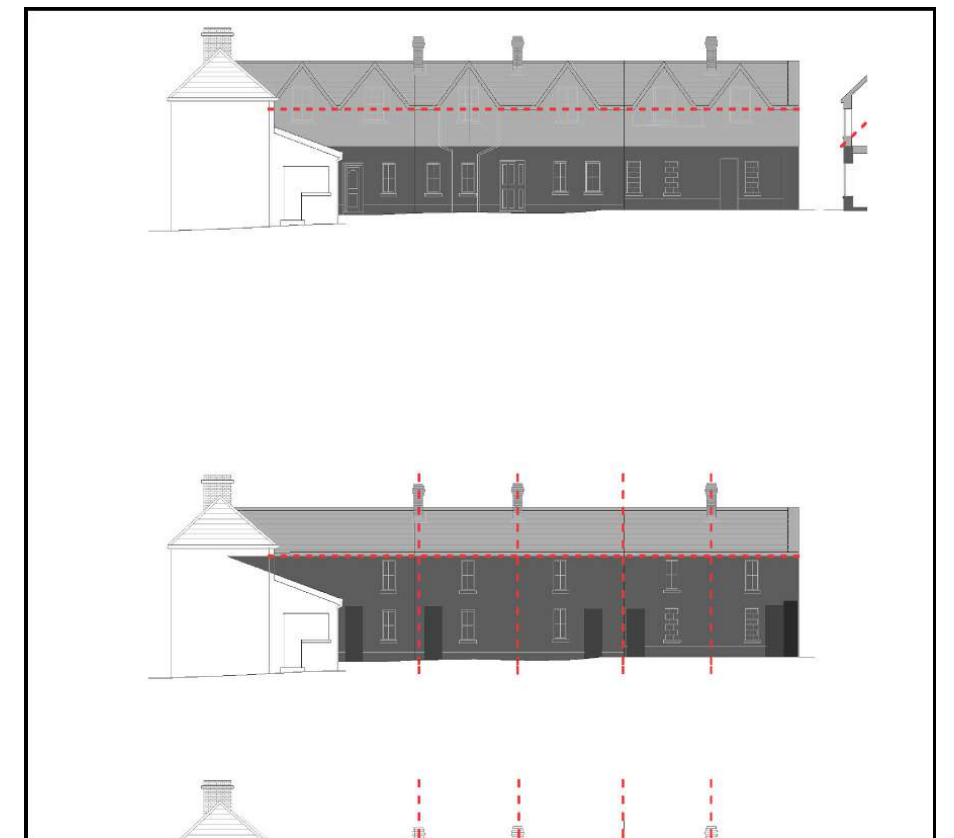


Fig. 4.81. Millview Terrace front elevation: A conjectural drawing of how the merging of the five (or four) houses to three houses might have been achieved. The existing composition and the original unit breakdown with the first floor level were altered in the early years of twentieth century. The lower image shows how the original façade may have been composed. This would make it similar in most respects to the original façade compositions of numbers 15 and 16 Tower Road. Note that number 3, the easternmost house of Millview Terrace may not be described correctly on the lower image. As stated previously, it would appear that 28b Roundtower Road extended back into Millview Terrace. (Source: A report prepared for South Dublin County Council by Shaffrey Associates, Architects, entitled "Round Tower Site, Clondalkin - Design and Conservation Report")

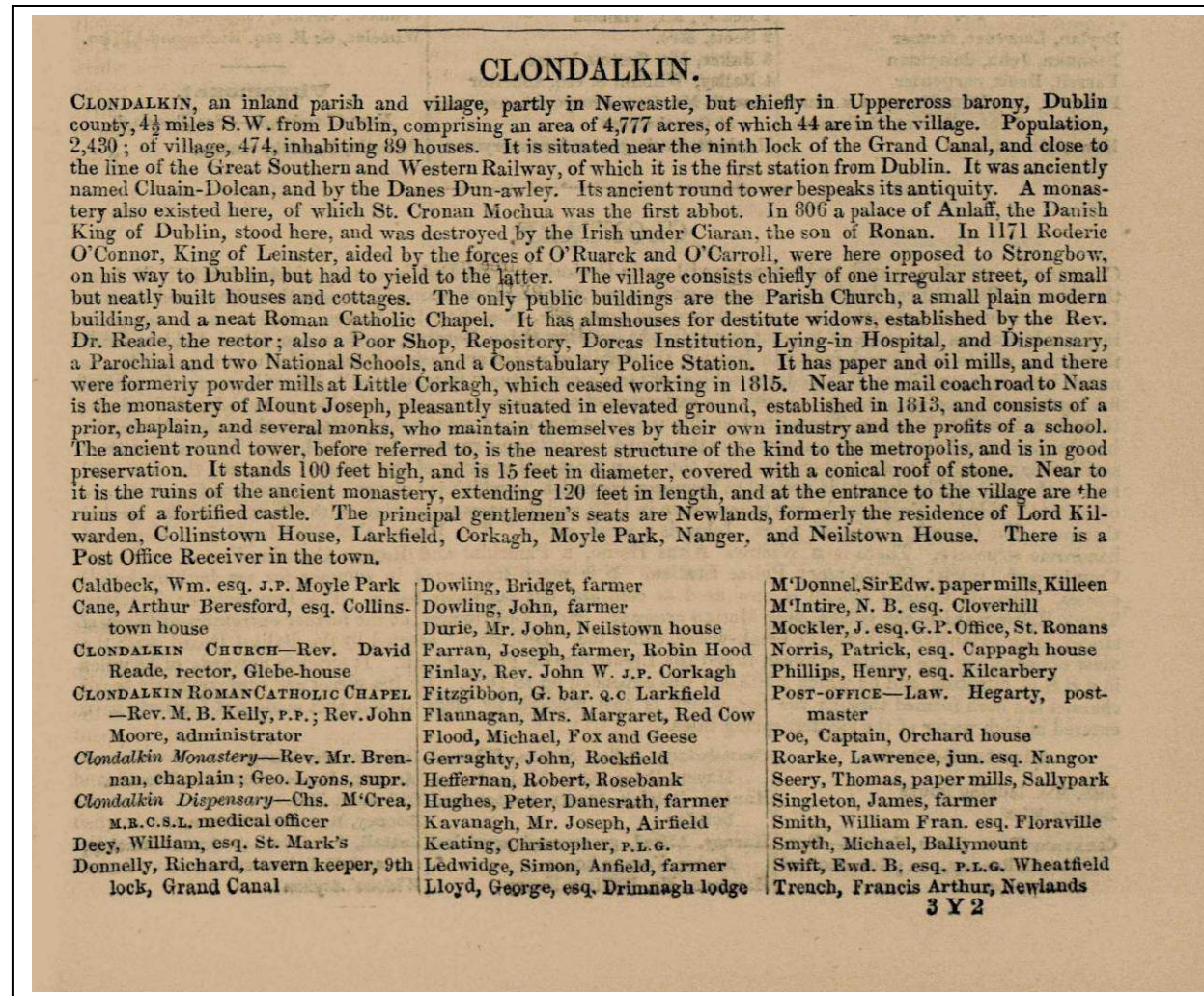


Fig. 4.82. An extract from Thom's Directory, 1855 edition. (Note: The directories are available to view and browse in the Local Studies Collection of Tallaght library)

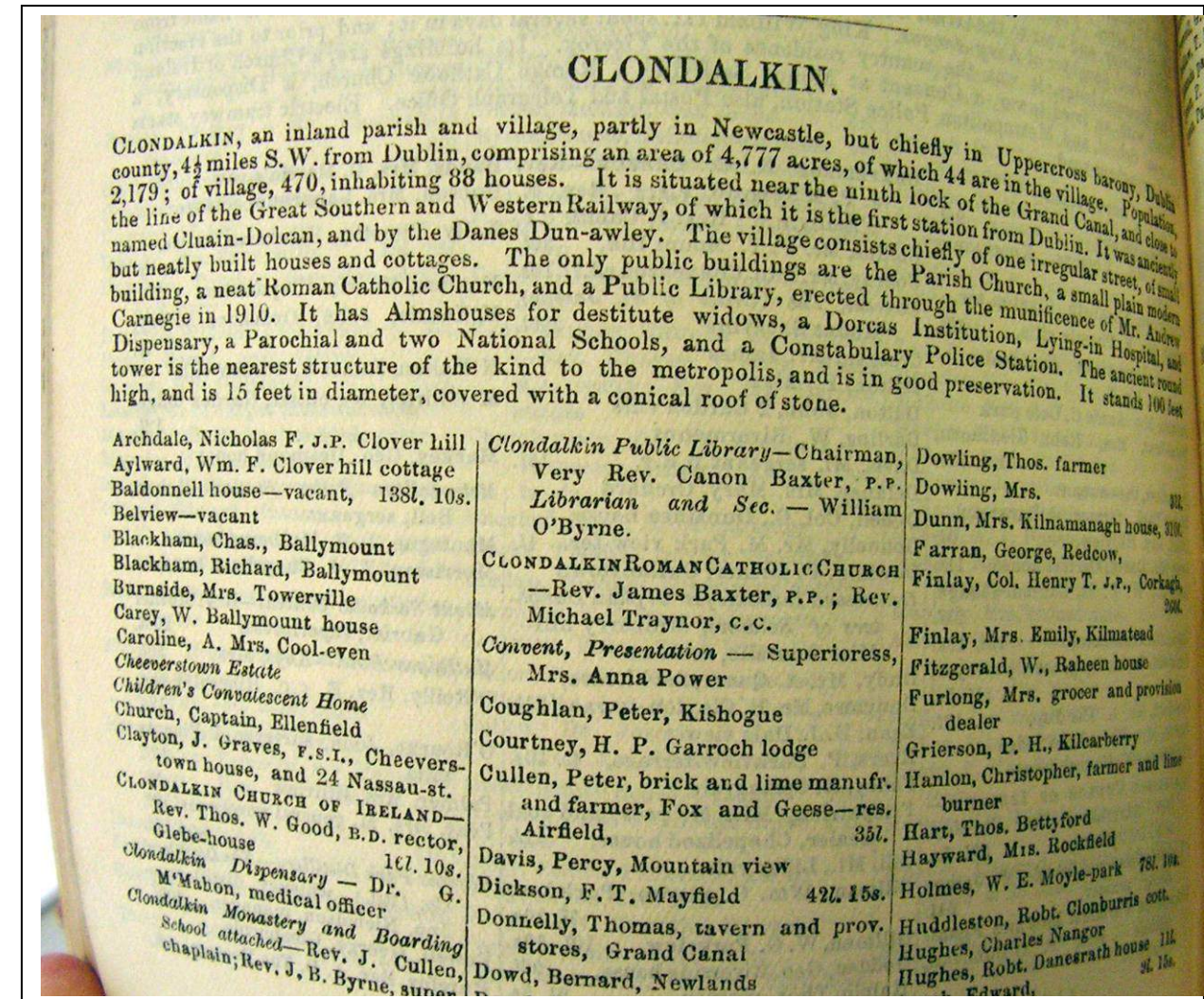
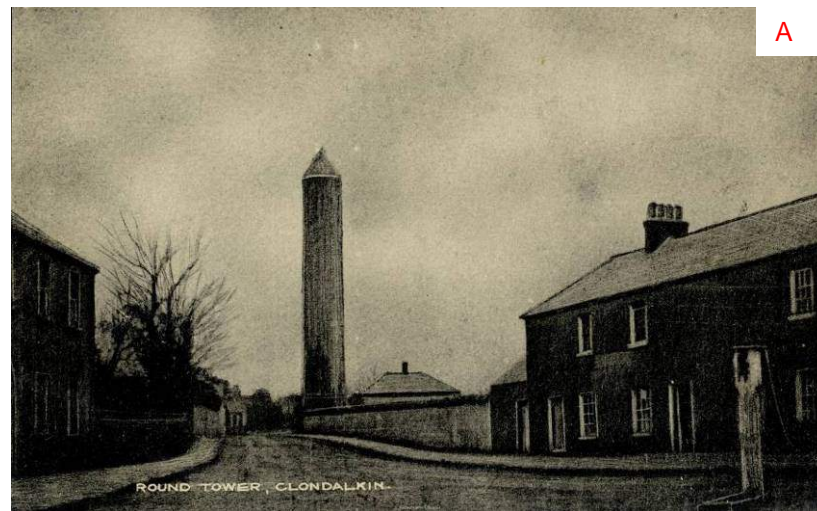
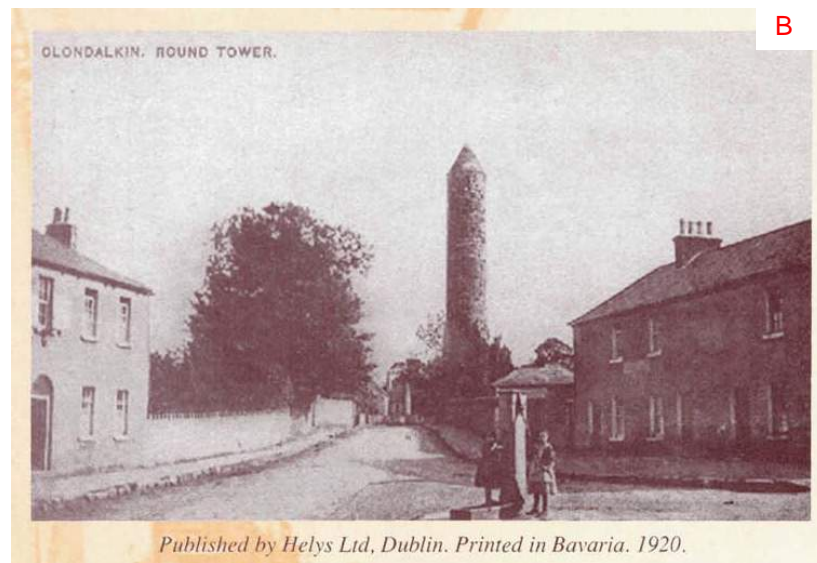


Fig. 4.83. An extract from Thom's Directory, 1912 edition. (Note: The directories are available to view and browse in the Local Studies Collection of Tallaght library)



A



B



C



D

Figures 4.84, A, B, C & D. Four views of Roundtower, or Tower Road from the north, near the junction with Nangor Road.  
 A (top left): A view from the late nineteenth century, a re-touched or drawn-over photograph. Note the fountain and the arrangement of doors and windows in house numbers 28b, 28, 27 and the edge of number 26 Roundtower Road, before the four houses were amalgamated into 15 and 16 Tower Road. The extension to the side of number 28b was the Dispensary indicated on the contemporaneous maps. (Source: South Dublin Libraries, Local Studies Collection)  
 B (middle left): A similar view from another postcard. The photograph shows the previous generation of sash windows that pre-dated the 2-over-2 sash windows, one of which survives at the back of the ground floor of number 16. (Source: pg. 37 of "Clondalkin, Postal Views" by Joe Williams)  
 C (bottom left): A similar view, photographed in May 2014 by the author. Note the aluminium window frames & double glazing, perhaps 20-30 years old.  
 D (main image above): From the cars in the photograph, this view probably dates from the 1970's. The photo is overlaid on the 1969 Ordnance Survey map. (Source: South Dublin Libraries, Local Studies Collection)



Figures 4.85. An enlargement of the photograph from the 1970's shown in Fig. 4.84 D on the previous page. The water pump at the junction with Nangor Road is gone. Note the changes in the alignment of footpath and road. The house shown on the left side of Figures 4.84 A and B above is gone. It was knocked and replaced in the 1940's by a detached house set back from the road, called "St. Lawrence". In the raking sunlight, the old roughcast render finish to 16 Tower Road can be clearly seen as can the blocked-up door on the extreme right; this was once the entrance to 26 Roundtower Road, amalgamated with number 27 to form one house, number 15 Tower Road. The render has since been replaced with a smooth sand and cement finish. The second (or third) generation 2-over-2 sash windows are in number 16. The 6-over-6 windows in number 15 are older, probably original; the smaller curved horns at the junction of the meeting rail and stile are just visible. These windows have since been lost. The additional window openings had not yet been made to number 15. Both houses were then roofed with natural slate; only number 16 retains these today. Then as now, the chimney pots were missing from number 16. Note the size of the monkey puzzle tree beside the round tower.

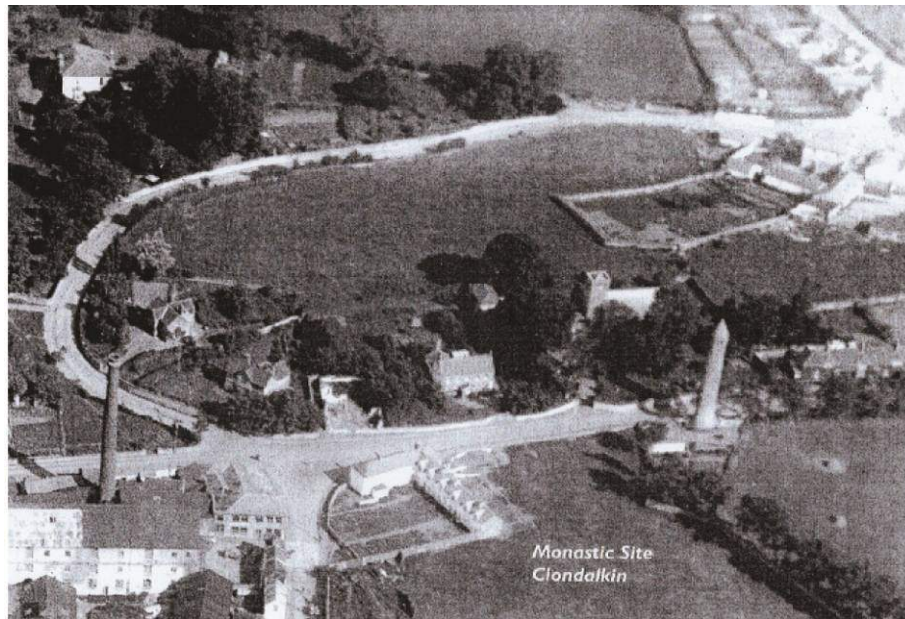


Fig. 4.86. An aerial postcard view of the site. The boundary running east west across the field to the north of the tower is now just a step down in the long grass. The irregular elongated back gardens of Millview Terrace have not yet extended down the field. (Source: page 35 of "Round Tower Site, Clondalkin-Design and Conservation Report" by Shaffrey Associates Architects for South Dublin County Council").

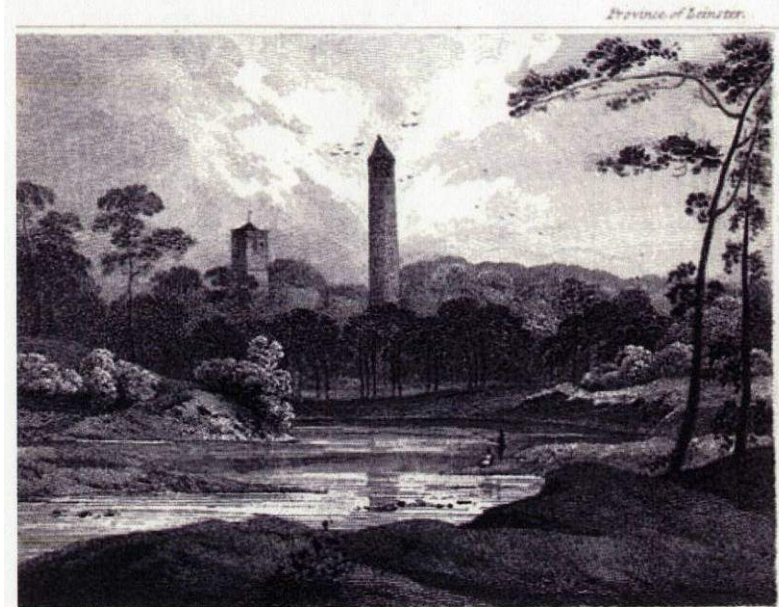


Fig. 4.87. A view from the millpond, since covered over by the surface car park of the Mill shopping centre. The view is based on an 1819 engraving by George Petrie, which is in the National Galley of Ireland. (Source: The book "Excursions Through Ireland" and the website [http://en.wikipedia.org/wiki/File:Round\\_Tower\\_Clondalkin\\_Dublin\\_1820.jpg](http://en.wikipedia.org/wiki/File:Round_Tower_Clondalkin_Dublin_1820.jpg))

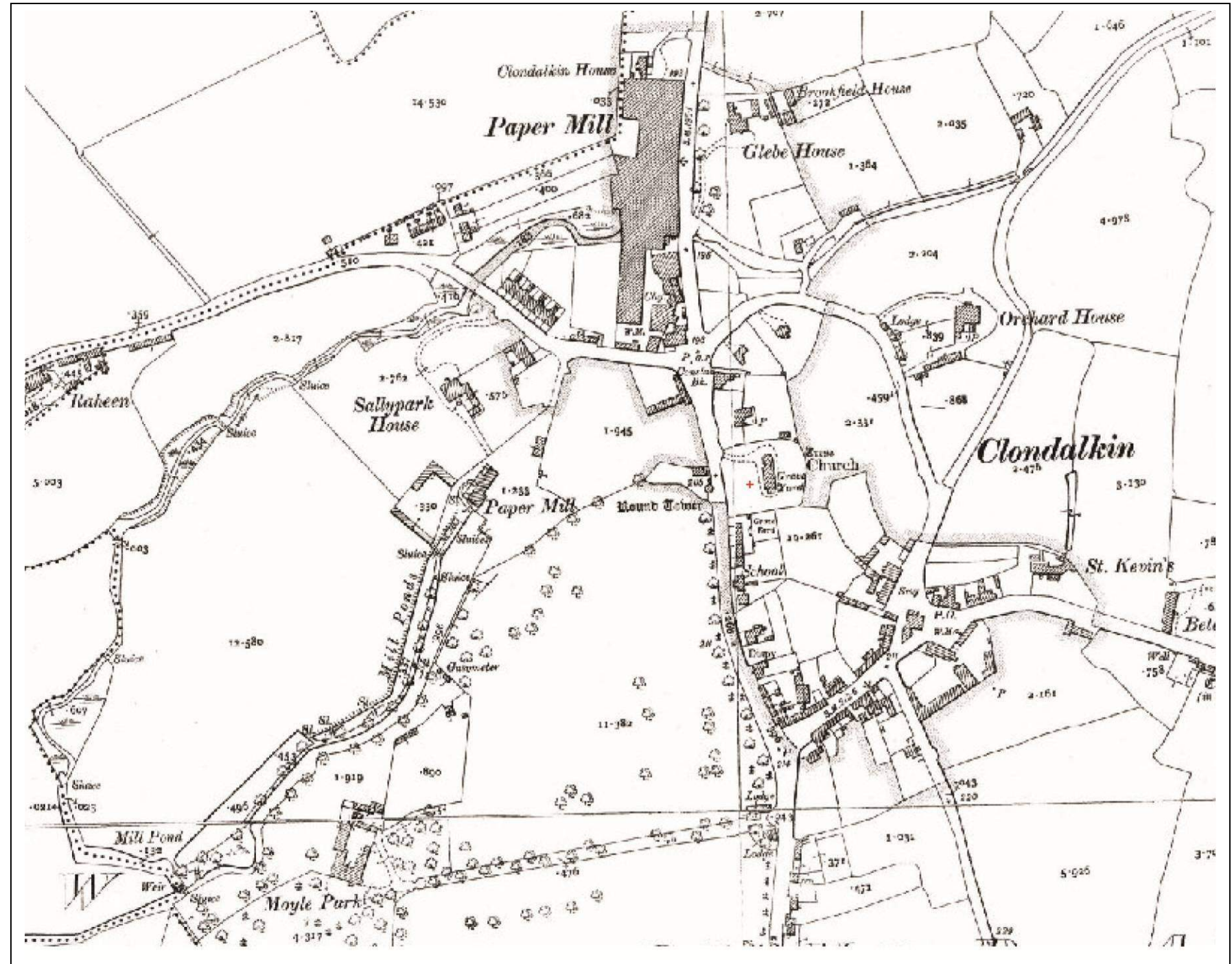


Fig. 4.88. A second edition Ordnance Survey map of the village, revised c.1870. The water pump is shown on the traffic island at the junction of Tower and Nangor Roads. Moyle Park's eastern boundary wall along Tower Road has been constructed after which the early thatched houses along that route were demolished. Also note the small nib of what appears to be a wall attached to the tower from the north side and the structure just north of the Round Tower, marked as a "Gate Lodge" on the 1880 Griffith Survey map shown previously (Fig. 4.70) and of which the footprint partially survives today. (Source: An extract from page 21 of the report "Round Tower Site, Clondalkin – Design and Conservation Report" commissioned by South Dublin County Council from Shaffrey Associates, Architects (2008).

## 5. The European connection

The project has a European connection. During the early middle ages - the period of European history lasting roughly from the 5th century to the 10th century, Irish and Scottish monks spread Christianity and established monasteries in Britain and continental Europe, principally in Scotland, England, France, Germany, Switzerland, Austria and Italy. The first such mission was the foundation of a monastery on the island of Iona in the year 563 A.D. by Columba, an Irish monk and missionary. Early missions in Europe include those founded at Annegray, Luxeuil, and Fontaines in France and Bobbio in Italy. Later, during the 7th century the disciples of Columbanus and other Scottish and Irish missionaries founded several monasteries in what are now France, Germany, Belgium, and Switzerland. The best known of these are St. Gall in Switzerland, Disibodenberg in Germany, St. Paul's at Besançon, Lure and Cusance in the Diocese of Besançon, Beze in the Diocese of Langres, Remiremont Abbey and Moyeuil Abbey in the Diocese of Toul, Fosses-la-Ville in the Diocese of Liège, Mont-St-Michel at Peronne, Ebersmunster in Lower Alsace, St. Martin's at Cologne, the Scots Monastery, Regensburg, Vienna, Erfurt and Würzburg. These early monastic foundations and centres of learning were distinct by being organised around monasteries rather than dioceses. Many grew in power and influence during later centuries and spread through Anglo-Saxon England and the Frankish Empire. Some have become modern towns, cities and universities today. In the 14th and 15th centuries most of these monasteries declined, partly for want of Scottish or Irish monks, and partly on account of lax discipline and financial difficulties.

There is a manuscript in a museum at Karlsruhe, Germany, known by various names: the "Karlsruhe Bede", "Reichenau Baeda" or "Karlsruhe Calendar", which was bound by two strips of vellum that had been recycled from another manuscript to make a protective cover for the Bede. The fragments of binding are of interest for this project, not the text in the Bede itself. The handwriting on the fragment of binding is in Latin and of what academics refer to as the "insular Irish style", a distinctive script that is ascribed to Irish monks and dated to the late eighth or early ninth century. The text of the fragment is part of a mass for penitents and a mass for the dead. Scholars have pointed out the similarities between its text and the Bobbio Missal and Stowe Missal. In an upper margin is the entry, "[Libe]r sancte Trinitatis et sancti Cronáni filii Lugaedón", a reference to saint Crónán, or Mochua of Clondalkin, who was son of Lugaed. In the early 20th century many scholars<sup>49</sup>, some of them German, agreed that there were grounds for conjecturing that the mass-book, of which this sheet had once formed a part, originated at the monastery of Clondalkin. More recent studies have noted that the Karlsruhe Calendar itself makes no reference to the feast of Crónán of Clondalkin which somewhat diminishes the likelihood of the text being written at Clondalkin and suggests Tallaght or Glendalough as possible alternative homes. The debate is discussed in greater detail in the report prepared by Valerie J. Keeley Ltd.

<sup>49</sup> A number of reference texts were kindly made available by the Royal Irish Academy: "Zeitschrift für Vergleichende Sprachforschung auf dem Gebiete der Indogermanischen Sprachen" (Gutersloh, C. Bertelsmann, 1892); "A Collection of Old Irish Glosses Scholia and Verse" (edited by Whitley Stokes D.C.L. and John Strachan L.L.D., Cambridge University Press, 1903); pages 701 and 702 of "Sources for the Early History of Ireland: Ecclesiastical, an Introduction and Guide", James F. Kenney (Irish University Press);

consultant archaeologists to South Dublin County Council, which is included a part of this report.<sup>50</sup> Ó Riain<sup>51</sup> suggests that the Viking raid on Glendalough in 834 may have precipitated the movement of the Calendar to the Continent so soon after its compilation, 'perhaps in the satchel of a fleeing monk'. This might explain why such an early Irish manuscript which has a reference to a monastery founded less than two centuries before it was written, ended up on continental Europe. Regardless of the uncertainty about the precise place of origin of the fragment and its connection with one or all of the monasteries at Clondalkin, Tallaght or Glendalough, its remarkable survival and its mention of the name of Clondalkin's founder saint is at least, more evidence of the long historical ties between Ireland and continental Europe during the early mediaeval period and is of itself sufficient reason for inclusion in this report and in any discussion of the history of south county Dublin.

<sup>50</sup> "Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin" by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists, dated May 2008

<sup>51</sup> Padraig Ó Riain, author of an unpublished report which is referred to in the archaeologist's report is also the author of "A Dictionary of Irish Saints" (Four Courts Press). On page 233 the origin and meaning of the name Crónán is given as follows: "a diminutive form of *crón*, tawny or tan coloured, this was a common name with almost twenty bearers listed in the martyrologies. Furthermore under the hypocoristic guise of Mochua, almost sixty are included ... Among those known by both forms of the name were the patrons of Clondlakin and Roscrea" The text also refers to "Crónán of Clondlakin (Cluain Dolcain, barony of Uppercross, Co. Dublin ... this saint was the best known of seven sons of Lughaidh son of Nathí of the Uí Chéithigh, a branch of the Laighin (Leinstermen) that gave name to the Kildare barony of Ikeathy. The mother of these saints, Cainnear was attached to the church of Cluain Dá Shailleach, now probably Clonsailla, a few miles from Clondalkin ... In 790 his relics with those of Caoimhghin of Glendalough, a close association had developed between the two churches which is still reflected in the presence at Clondalkin of St. Kevin's well. This connection is confirmed by two other sources, a litany of Irish saints which names Crónán under the guise of Mochua, among the members of Caoimhghin's familia, "community", and passages in the Life written for Caoimhghin that mention Crónán, in one case consigning to him the honour of baptizing the Glendalough saint.... Crónán's feast fell on 6<sup>th</sup> August"



Figure 5.1. A diagram of the distribution of centres of Irish influenced settlements around Europe during the early Christian period. (Source: page 26 of “Guide to the Irish National Heritage Park, Ferrycarrig, Wexford”, by Edward Culleton, B.A., Ph.D., 1987, The Wexford heritage Trust, 1990, first published 1987)

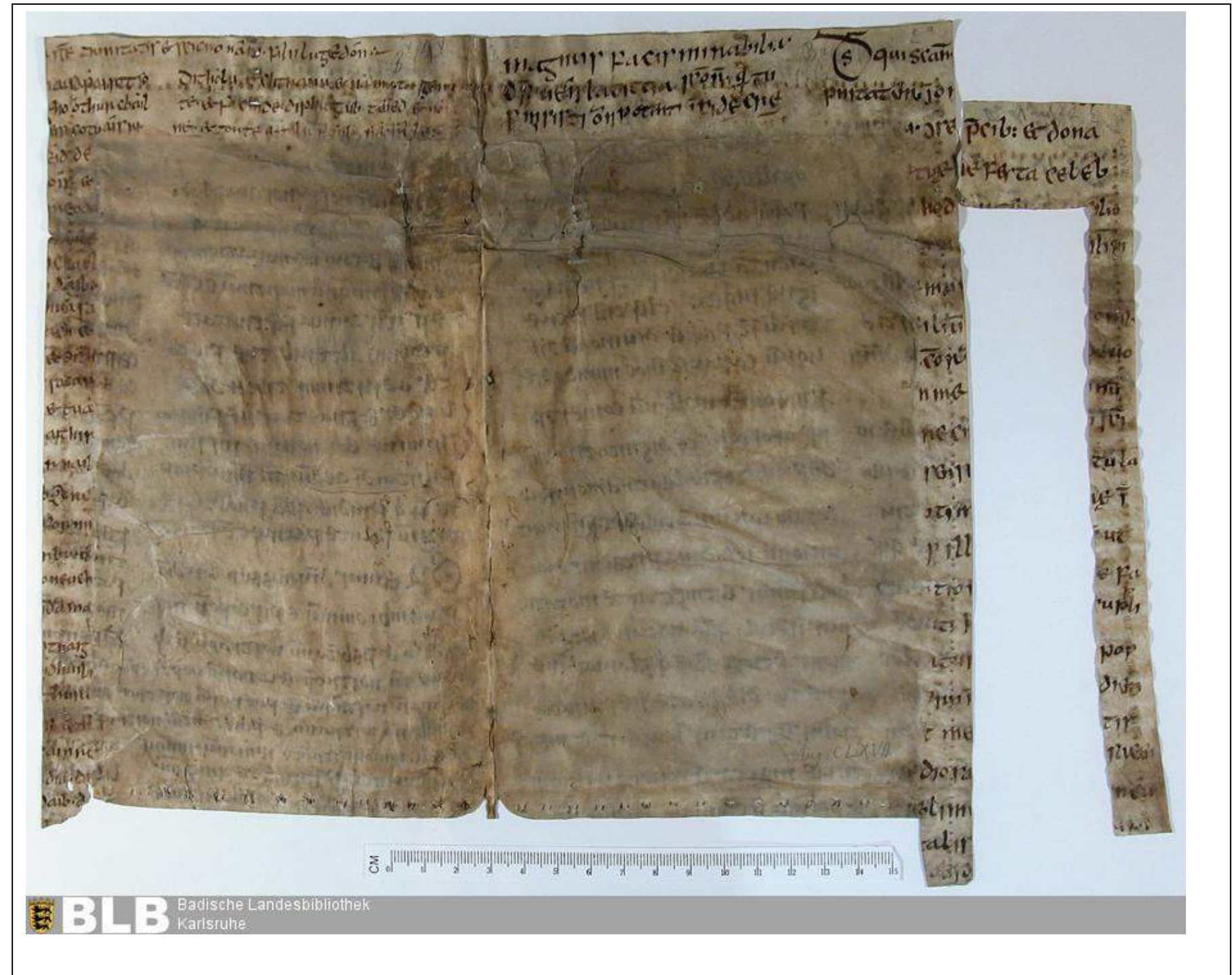


Figure 5.2. The binding of the Reichenau or Karlsruhe Beda, which was kept for a time at Walahfrid Strabo’s monastery of Reichenau. The text on the top left corner of the page quite clearly reads “[Libe]r sancte Trinitatis et sancti Cronáni filii Lugaedón”, a reference to St. Crónan (also known as Mochua), the monk who founded the monastery at Clondalkin in the seventh century. The start of the quotation within brackets is missing but has been assumed by scholars. This fragment has caused speculation and debate among academics and historians as to its origin. Is it from a manuscript which was written at Clondalkin and possibly taken to Europe by a fleeing monk? The debate continues. The same text also includes a prayer for protection “against a flood of foreigners and foes and heathens and tribulations” which may be a reference to the Viking raid of 833 or of other marauding Viking bands. There is further discussion of this fragment in “Ireland and Scandinavia in the Early Viking Age”, Howard Clarke, Máire Ní Mhaonaigh & Ragnall Ó Floinn, editors. (Source: The website <http://digital.blb-karlsruhe.de/blbhs/Handschriften/content/titleinfo/21598> , accessed 20th March 2013.

## 6. The Conservation Plan

### 6.1 Introduction and purpose of the Conservation Plan

### 6.2 Methodology and extent of inspection

### 6.3 The houses at Millview Terrace & Tower Road

### 6.4 The exteriors of the houses

### 6.5 Extensions, annexes and accretions

### 6.6 The interiors

### 6.7 Assessment of the significance

### 6.8 The round tower

### 6.1 Introduction and purpose of the Heritage Report

The purpose of the conservation plan is to clearly identify the character and special interest of the five houses and the site of the round tower, and to provide detailed information on the buildings and their component elements. As stated previously, the round tower is not considered in detail because it is owned and managed separately by the O.P.W. on behalf of the minister for Arts, Heritage and the Gaeltacht and because no works are proposed to it by this project. The report follows the layout of the established Architectural Heritage Impact Assessment format, so it can be a working document which can be updated, revised, and easily incorporated into any future submission or consultation.

### 6.2 Methodology and extent of inspection

Site visits were undertaken in January, May and June 2013 comprising visual assessments and architectural and dimensional recording of the houses, site and streetscape, with a digital photographic record of general views and key

features. The buildings were examined throughout, apart from the attic spaces and concealed or closed-up spaces. All external elevations and the roofs of the main blocks and the extensions were examined from a ladder. Should the project develop further, these would be re-examined from a mobile aerial access platform or cherry-picker as necessary.

As shown in the previous chapters, historical research was undertaken using the resources of the Local Studies section of Tallaght Library (South Dublin Libraries), the Irish Architectural Archive, the National Library of Ireland (the maps in the main reading room and the Prints and Drawings department), the Gilbert Library (Dublin City Council), Richview Library (University College Dublin). In 2008 South Dublin County Council commissioned a report from Shaffrey Associates Architects (dated January 2009) about the site. This was studied, is referred to in this report and extracts are taken from it. Many other published and unpublished works were also studied, as referenced in the main body of the text. The assessment of historical significance follows the N.I.A.H. guidelines with its formalised survey methodologies for historic buildings and relevant published and publicly available work. The planning guidelines for local authorities was also used to structure this conservation plan.

### 6.3 The houses at Millview Terrace & Tower Road

As explained previously in the section about the urban history of the village, the earliest development on the sites of numbers 15 and 16 Tower Road, formerly a terrace of four houses, is shown on Taylor's map of 1816, and later on Duncan's map of 1821. The sites are shown undeveloped on

John Rocque's map of 1760 and on the Longfield map of 1782. It cannot be said with certainty that these are the present buildings. Before amalgamation into two houses, the four houses were very small, about 40 sq.m. in area, fairly typical of artisans' or labourers' dwellings constructed at that time for use by workers in a big local industry, in this case the local paper mills

### 6.4 The exteriors of the houses

The houses at 15 and 16 Tower Road are of two storeys, with a slate roof over. Number 16 has not been occupied for years; the window openings have been secured with steel plates, the normal mechanical and electrical services have been removed, or where they remain are not operational. The internal finishes are dirty and the interior is malodorous. Number 15 is in use as an intercultural centre during office hours and is in much better condition but has fewer old or original fittings and fixtures. Both houses are part of an attractive terrace which share the same roof profile, building line, wall finishes, fenestration (previously) and roof construction.

Formerly, numbers 15 and 16 originally comprised four small 2-bay, 2-storey houses, 2-room houses, each with one room on each floor. Two of the houses were altered and amalgamated with the adjacent house, probably during the early to mid-twentieth century. As stated previously both houses were probably built in the early nineteenth centuries. The precise date of construction might be ascertainable by researching the records or transcripts in the Registry of Deeds or possibly in the Land Valuations Office or be

undertaking scientific dating of the timber used in their construction; this was considered to be beyond the scope of the research needed for this report.

Overall number 16 is in poor-to-fair condition, but has some serious defects: part of the roof has been breached and the house has not used for an extended period so it has not been ventilated, heated or maintained properly. One timber sash window from the mid-to late nineteenth century or early twentieth century remains in the back of number 16.



Fig. 6.1. Numbers 15 and 16 Tower Road, viewed from Tower Road (January 2013)



Fig. 6.2 The side or north end of 16 Tower Road in the left foreground, the front of number 3 Millview behind. (January 2013)



Fig. 6.3. The extension to 16 Tower Road which occupies most of the former yard space of number 16, as shown in the 1969 ordnance survey map (Figs.4.84D, pg. 65 and 4.78, pg. 62). (January 2013)

The houses on Millview Terrace are terraced, two-bay, two-storey houses, the upper floor contained in dormer attic rooms. The external walls of yellowish brick are rendered with a smooth rendered base course. House numbers 1 and 2 have timber sash windows and number 2 has a centrally positioned, front, glazed timber door in a widened opening. All of the houses have pitched slate roofs, slate covered dormer roofs to the front and brick chimney stacks. Many of the windows and some of the doors have been replaced throughout with late twentieth century aluminium-framed units, more so in numbers 15 and 16 than in numbers 1, 2 and 3. The plan of the main body of each house on Millview Terrace is as follows: there are two rooms at ground floor level and two rooms at first floor level. There is narrow steep stairs at the end of each house. The floor plans and areas of number 1 and 2 are similar but number 3 is slightly smaller, having been formed from an amalgamation of the easternmost of the five houses on Millview and the rere of 25e Roundtower Road.

## 6.5 Extensions, annexes and accretions

The historic maps show an incremental development of a succession of extensions attached to the rear of the houses, all of which retain no architectural significance. There is single-storey, extension attached to the back or west side of number 16 with a mono-pitch, lean-to, tiled roof over, dating from the 1950's or 1960's. This contains a toilet, bathroom and another room whose exact purpose is not known. The single-storey extensions to the rere of numbers 2 and 3 Millview contain former kitchens, toilets and shower rooms. These are mono-pitch roofs with low-angle slopes, covered with felts and pitch coverings or comparatively recent construction. There was a substantial extension to the rere of number 1 which was demolished and cleared about a decade ago after the fire in the house.

## 6.6 Interiors

Internally, the plans show the houses with a corridor to the rere at first floor level giving access to the first floor rooms. The party walls with centrally positioned back-to-back chimneys venting to a single stack of flues act as spine wall to divide each house in the original layout. Where 2 Millview Terrace was made from the amalgamation of 25c and d Millview the fireplace and chimney stack was removed. Where bedrooms, internal landings and entrance halls, are separated from each other by non-loadbearing partitions, these are flimsy timber partitioning, typically 50mm to 75mm thick, to form smaller rooms with connecting doors. The main staircase of each house is of timber frame construction.

As discussed in the previous section the arrangement of windows and doors has been modified in all five houses. One timber sash window from the mid-nineteenth century remains in the back of number 16. All the other windows in number 16 are late twentieth century aluminium-framed. Number 15 Tower Road has modern timber sash windows to the front and modern aluminium to the rere and side. Internally, the buildings are generally floored with timber, with some old, possibly original, square edged, butt jointed floorboards surviving at ground and first floor levels, and more modern thinner tongue and grooved floorboards used elsewhere. The ceilings are formed of lath and plaster in all houses except number 15 where these have been substantially replaced at first floor level with modern plasterboard on timber studs. Fragments of the older, higher plaster-on-lathe ceiling remain in the attic above. Internal doors throughout the buildings are of timber with early twentieth century latches. Some early, possibly original ironmongery remains in numbers 16, 3, and 2. The walls are painted and plastered (though different plasters have been used for repair during different periods) and the underlying internal wall surface is composed of brick – where it has been exposed. The plasterwork is generally composed of plain flatwork, with dado in some rooms. The internal wall surfaces are painted or covered with wall papers. The construction of the extensions to the rere of numbers 2, 3 and 16 necessitated the past blocking up of windows at all floor levels or their reduction in size to function as openings for serving food and for communication between a kitchen and dining or sitting area. Only one surviving cast iron fireplace survives, a fine cast iron Edwardian fireplace, at first floor level of number 1 Millview.



Fig. 6.4. Rere facades of 1, 2 & 3 Millview Terrace & 15 Tower Road (June 2013)



Fig. 6.5. The back of 3 Millview Terrace (left) and the southern end of number 15 Tower Road. (June 2013)



Fig. 6.6. The back of number 3 Millview Terrace (June 2013)



Fig. 6.7. The back of 1 Millview Terrace. The traces of the outline for the roof of the former extension can be seen on the rere façade. (June 2013)



Fig. 6.8. The fronts of 3 and 2 Millview Terrace (left to right) (June 2013)



Fig. 6.9. The front of 1 Millview Terrace. (June 2013)

## 6.7 Assessment of the significance

Both 15 and 16 Tower Road are an important part of the historic core of Clondalkin village, situated at the prominent junction of Nangor and Tower roads and are significant as such. Numbers 1, 2 and 3 Millview Terrace are an attractive terrace of houses retaining some original features and distinctively large gabled dormer windows, the setting of which is enhanced by the long front gardens. The assessment of the significance of the houses is based on the criteria set out by the NIAH:

**Architectural:** The 2-storey houses, built around the end of the eighteenth or early nineteenth centuries, consist of two attached terraces with some original features, having many original features are a representative example of early nineteenth century artisans' residential buildings constructed throughout Ireland during this period. They are situated at an important junction in the old village.

**Historic:** The buildings have associations with the paper mill, a significant industry in Clondalkin until recent decades. The houses are part of the surviving heritage of the former institutional use on the site and industrial heritage of the village. They are situated on the site of the round tower and within the enclosure of the former monastic settlement.

**Technical:** The houses have no special technical values.

**Vernacular:** The houses are a good example of local vernacular, being built from locally sourced materials.

**Group:** The houses are a terrace of very early nineteenth century residential buildings and are situated at a prominent road junction in the village.

**Uniqueness / Rarity:** The buildings are a good representative of housing from their period, but cannot be deemed to have any special unique or rarity values. The arrangement of gable fronts of the houses at Millview Terrace is unusual and their amalgamation from five houses to three is of interest.

**Detail / Design:** The buildings retain many elements of good design, including the gables and windows, but the external envelope does not have any especially significant decorative details. The front façade retains its overall layout and arrangement.

**Technology:** The houses were built using the technology and materials of their time.

**Archaeology:** This report does not consider archaeological issues. Please refer to the archaeologist's report in Appendix D.

**Setting:** The buildings are located within sight of the round tower, and probably at the centre of the early mediaeval monastic enclosure. They are also at an important road junction in the old village and are part of the former paper mills, having been used to house workers. The loss of the former mill buildings has reduced the associative significance of the houses and site somewhat, although the mill pond still remains.

**Significance** The buildings are good examples of residential buildings of the period and retain many period fittings and fixtures. Their significance lies mainly in the two terraces; the group and setting values of the terraces and their contribution to an understanding of the architecture, character and history of the village.

Refer to section 13 for an assessment of the impact these proposed interventions would have on the special significance of the houses and the site.

## 6.8 The round tower

The detached round tower is constructed of roughly coursed hammer-dressed Dublin calp limestone with granite used for window and door jambs. The tower is 27.5 meters in height above ground, topped by a conical cap, with a diameter of just over 4 meters externally and 2.2 meters internally making it is the slimmest round tower in Ireland. The base of the tower is surrounded by a rubble stone buttress that is about 3 meters in height and 1 meter in depth. This stone buttress pre-dates 1725 when the tower was illustrated in a sketch dated 1725 by Samuel Molyneux (Fig. 4.21 on page 35). The rubble stone buttress incorporates stone steps imbedded within the buttress leading to the main entrance door, which is located facing east towards the present St. John's Church. The main entrance is square headed with granite jamb stone door head. There are two small window openings to second and third floor levels. These small openings have limestone jambs and granite stone window heads. Four larger rectangular window openings on the bell-floor level having limestone jambs and granite window head.

Internally, the tower originally had five floors, re-organised to four in 1827 to accommodate a belfry use for St. John's Church. The tower is located at the south-eastern corner of the proposed development site, hard on the edge of Tower Road. The tower is owned by the state and maintained by the Office of Public Works on behalf of the minister for Arts, Heritage and the Gaeltacht. A stone wall extends north from the tower which originally formed the eastern boundary wall of Moyle Park House Demesne and includes the remains of pre-existing walls and facades of houses.

Condition: the Round Tower appears to be in good condition with areas of recent pointing especially to the base of the tower and buttress.

Fig. 6.10 The front boundary wall 3 and 2 Millview Terrace. (May 2011)



Fig. 6.11. Slipped and missing slates at the junction of the natural slates above number 16 and artificial slates of number 15. (January 2013)



Fig. 6.12. Above 15 and 16 Tower Road. Eroded mortar joints and missing bricks. (January 2013)

Fig. 6.13. Electrical mini pillars outside 15 and 16 Tower Road, public lighting and mains supply. Note also note the blocked gully at the base of the RWDP. (January 2013) (January 2013)



Fig. 6.14. The yard to the north of 16 Tower Road. (January 2013)



Fig. 6.15. Inside the extension to 16 Tower Road. (January 2013)



Fig. 6.16. The living room of 16 Tower Road. (January 2013)



Fig. 6.17. First floor room with blocked up fireplace in the party wall of 16 Tower Road. (January 2013)



Fig. 6.18. 16 Tower Road: blocked up sash window in the rear facade



Fig. 6.19. 16 Tower Road: first floor bedroom. (January 2014)



Fig. 6.20. The rear of 15 Tower Road and front of 3 Millview. (Jan. 2013)



Fig. 6.21. The rear extension to 3 Millview Terrace (January 2013)



Fig. 6.22. The westernmost bedroom of 3 Millview Terrace (May 2011)



Fig. 6.23. One of the doors to the bedroom in 3 Millview Terrace. (May 2011)

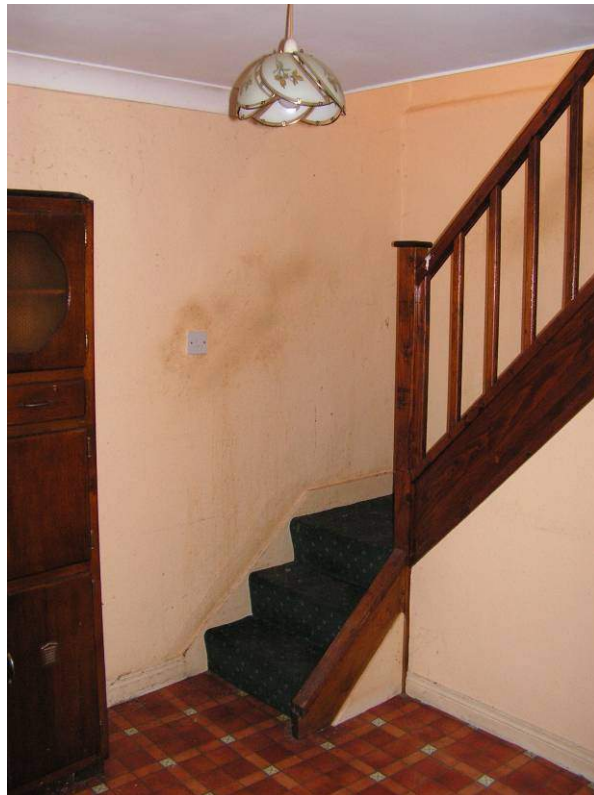


Fig. 6.24. The stairs in number 3 Millview Terrace. (May 2011)



Fig. 6.25. The living room in number 3 Millview Terrace. (May 2011)



Fig. 6.26. 15 Tower Road. The entrance and reception area. (August 2013)



Fig. 6.27. 15 Tower Road. Blocked up fireplace and view to reception area from ground floor room. (August 2013)



Fig. 6.28. 15 Tower Road. The kitchen and back door of the extension, formerly the site of a Dispensary. (August 2013)



Fig. 6.29. 15 Tower Road. First floor meeting room. (August 2013)



Fig. 6.30. The attic above 15 Tower Road. A fragment of the older plaster and lathe ceiling remains above the modern plasterboard ceiling on the bottom of the photo. The artificial roof slate above has been laid on a bituminous felt.

## 7. Conservation Condition Report

### 7.1 Introduction

Different levels of occupation, repair and maintenance to different houses over time has led to significant variation in the severity and types of decay found in the houses of the two terraces. Some of the calp limestone boundary walls are in poor condition, especially parts of that between the proposed development site and Tower Road. In places the mortar joints are severely eroded, parts of the coping have disintegrated and fallen away, parts of the wall have been repaired with a dense hard and impermeable OPC mortar in the past which has created its own problems, and damage has been caused by the trees growing too near the wall. At times Dublin 'Calp' limestone has had a poor reputation as a building stone, with Rutt commenting as follows in 1772 in his essay "Towards a natural history of the county of Dublin":

*"Stone of several quarries soon moulder into scales with the weather and should be used for inside work. This has not always been intended to by the overseers of our edifices, where we frequently see these left mouldering in a few years".*

There are a number of sub-types of Dublin calp and a few of these (e.g. shaley beds, pyrite-containing beds) give rise to significant concerns and are associated with the rapid deterioration noted by Rutt and later authors. As explained previously in section 3 there are many examples of good quality durable calp used successfully in prominent buildings in Dublin city, Clondalkin and elsewhere. The calp limestone

used in the boundary walls and in the tower is generally of good quality. Time has proven it to be so. Many of the stone units show variations in bedding, including variation in colour (grey, brown-black, whitish) and durability. The stone is generally correctly laid following the natural bedding, with only a small minority of (mainly shaley) stones are laid face-bedded and showing recession or other failure. In general, most of the calp limestone found in the area appears sound. Deterioration, where it occurs, is generally associated with failed mortar joints and damage caused by lack of maintenance of the nearby garden. The bricks in the houses are almost certainly of local origin and from the surveys carried out so far, and are generally in good condition, where exposed to view. A detailed examination of the bricks, hardness, condition, contents, mineral structure, etc. has not yet been carried out.



Fig. 7.1. A view of the stone boundary wall along Tower Road from the west side. Note the trees growing right beside the wall. (June 2013)



Fig. 7.2. The northern end of the same stone boundary wall along Tower Road, just to the south of the gate beside 15 Tower Road. (June 2013)

Internally, the building is generally floored with timber, with some original floorboards surviving at first floor level, and later thinner floorboards used elsewhere. Most of the ceilings are of lath and plaster, and are supported by the collar ties in the roof structure at first floor level and by the floors above at ground floor level. The plaster and lathe ceilings have been partly removed from the first floor rooms of number 2 and almost entirely replaced with modern plasterboard in number 15. Doorways throughout the houses are generally of timber, though the majority of these have been replaced during the last few decades. A few older doors remain in the first floor rooms of numbers 1 and 16. The walls are painted and plastered (though different plasters have been used for repair during different periods) and the underlying internal wall surface is composed of brick, where exposed. Future opening up works will confirm this.

## 7.2 Summary of General Condition

The external envelope of the buildings and external boundary walls shows multiple failures including:

- Ongoing deterioration of brick door lintel (back of number 1)
- Failure of the rainwater goods and gullies on all five houses as a result of poor maintenance, allowing high concentrations of rain water to wash down the façades and into the subsoil near the foundations which may be contributing to rising damp in places.
- Localised failure and harmful impacts of the existing OPC pointing mortars on the boundary wall along Tower Road.
- Invasive plant growth at the foot of the same boundary walls and at the base of the façades of house numbers 2 and 3 Millview where ivy is growing on the façades.
- Severe weathering of the mortar joints of the old boundary wall to the north of the tower and structural stresses in parts caused by the adjacent trees, damaged wall tops, missing copings and colonisation by weeds. Trees, ivy and woody shrubs at the base of the tower and the adjacent boundary wall have been recently (July 2013) cut back but are beginning to re-generate indicating that the plants are still active in these areas.
- The presence of soiling in sheltered areas, particularly the external walls in the sheltered areas at the junctions of numbers 15 and 3.
- The presence of biological growth including higher order plant species, pigeon soiling and the formation of black bio-films.

- The presence of voids and breaches in the walls allowing moisture and vermin access into the building (particularly house number 2).
- Corroding defunct iron fixtures and fittings (generally minor and localised damage).
- Breaches of the slate roof coverings (slippage and loss of slates) and associated moisture ingress to the roof and interiors, saturation and decay of structural timbers within.
- Soiling: In general there is relatively little soiling of these buildings. Historic buildings in urban centres typically exhibit a range of dark-coloured soiling deposits, normally grouped together under the heading 'black crusts'. These soiling deposits consist of accumulations of a range of material including carbonaceous material, organic material and airborne particulate matter bound together and to the building in a complex gypsum- or iron-based binder. However they are not a significant agent of decay on these five houses and although unsightly are not contributing much to the deterioration of these buildings.

The interiors of the buildings also show failures including:

- Widespread failure of the internal plasterwork (estimated at 20% failure at ground floor level, 10% failure at first floor level, as a result of saturation and possible salt damage from within the walls.
- Collapse and cracking of the ceiling lath and plasterwork (house numbers 1 & 2)
- Poor ventilation and internal environmental conditions associated with long-term vacancy, sealed window openings (applicable to all houses except number 15) and with water ingress through breaches in the slate roof coverings.

- Structural concerns (the crack at the back or southern end of the party wall between numbers 1 and 2 Millview.
- Widespread failure of painted wall surfaces and wallpaper.



Fig. 7.1. Breaches in the roofs above 16 Tower Road, partly missing gutter, and decay in the fascia and soffit above the extension (May 2013)



Fig. 7.2. Fallen gutter at the back of 16 Tower Road. (November 2013)



Fig. 7.3. Breaches in the roof of number 2 Millview and several slipped slates. Note also the extensive colonisation of the wall and part of the roof by ivy. (November 2013)



Fig. 7.5. Ivy and weeds colonising the front façade of 2 Millview Terrace. (March 2013)



Fig. 7.7. 2 Millview Terrace. The lead has been stripped from the valleys where the dormer roofs join the main roof (March 2013)



Fig. 7.4. The rere façade of number 1 Millview Terrace. Grasses and weeds have colonised some of the wall tops and the gutters. A shrub is thriving near the base of the rere façade. Note the outline of the pitched roof of the former extension which was demolished about a decade ago. The roof was destroyed by fire and a new corrugated sheet metal and plastic roof installed. (June 2013)



Fig. 7.6. 2 Millview Terrace. A closer view of one of the windows (March 2013)

### 7.3 Blocked drains and broken rainwater goods

Plant growth in the drains adjacent to windows at first floor level of numbers 3 and 2 (alive and thriving) at the eastern end of the northern elevation, are not only indicative of failed rainwater goods and lack of drainage at this façade, but can also cause mechanical damage to the wall fabric, and contribute to prolonged periods of wetness on the adjacent masonry surfaces. It is proposed to carry out a CCTV survey of all underground drains after a thorough attempt has been made to rod out and clear them and isolate and locate any blockages. Following completion of all new-build and refurbishment works it is proposed to carry out a smoke test on all drainage.



Fig. 7.8. Slipped slates above numbers 2 and 3 Millview. Note also the decay in the verge, the eroded flaunching mortar at the top of the chimney and the absence of any chimney pots. (May 2011)



Fig. 7.9. Ground floor of number 3 Millview. Moisture in the base of the chimney stack, probably caused by lack of ventilation of the flue and deterioration of the top of the chimney above. (May 2011)

#### 7.4 Higher Order Species

Small trees, woody plants and other higher order species have established a foothold in a number of areas at ground level, and have also exploited open joints at high elevation elsewhere. Well-established plants at ground level, particularly inside the boundary wall along Tower Road, have been recently cut back. However, new growth is evident which indicates that the plant was still active, for example at the base of the tower and to the south of number 16. Ivy is growing up the front facades of numbers 1 and 2 Millview. These plants can contribute to significant damage of historic building fabric, for example from mechanical disruption by roots, by their contribution to moisture ingress, and by prevention of normal drying of the facades. They need to be treated and removed in their entirety. The three key areas of colonisation are growth in dry joints at high elevations, and colonisation of blocked drains at ground level externally.

#### 7.5 Pigeon Soiling

One of the consequences of abandonment of the houses (except number 15) in recent years was the colonisation of the buildings by roosting pigeons. This has allowed a lot of pigeon guano to accumulate in the upper floors of the interiors and attics and on horizontal surfaces used as perches or as access points by pigeons seeking ingress and egress from the building. Window ledges were frequently used for these purposes, and now show accumulations of guano, and also on the vertical wall surfaces below. Guano is normally considered a harmful deposit as they gradually release acids onto masonry surfaces with accompanying

harmful impacts. Pigeon soiling had accumulated on windows at first floor level on the rear facades of numbers 2 and 3 Millview. While not urgent from the perspective of the overall stability of a historic structure, pigeon soiling is normally considered unsightly, poses medium to long-term risk to the masonry, and poses health and safety hazards to users of the buildings. These deposits typically have poor adhesion to the underlying substrate, and can normally be effectively removed using brushes and wooden scrapers with the minimum effective dose of water. It should be noted that some contractors prefer to remove this type of deposit with pressurised water systems or “power washing”. This should be avoided because of the significant quantities of water used in power washing poses additional problems of saturating the interiors and walls, some of which may have been pointed with impermeable OPC mortars, and which could cause secondary problems such as future salt efflorescence and other decay forms of the internal wall surfaces. Therefore power washing is not recommended. Simple brushing and scraping of the guano with a minimum of water will be equally effective, but with less potential harmful ‘knock on’ effects for the building fabric.

#### 7.6 Voids

A small number of voids are evident. These take two forms: circular holes bored through the wall fabric, presumably for past services or ventilation or openings left where grilles or windows have been removed or damaged.

Iron Corrosion: There are a small number of now-defunct iron fixtures and fittings attached to the exterior of the

buildings (e.g. nails, hooks, pins - probably the remnants of a removed rainwater down pipe). None of these are of architectural heritage significance. The majority currently pose no structural threat to the surrounding masonry (though they should be expected to pose such a threat in the medium-term) but are causing iron-staining of the adjacent masonry and are unsightly. Also many of them no longer serve any useful purpose. For example the embedded iron pin and defunct cast iron rain water down pipe at the eastern end of house number 1 is no longer connected to a gutter. The protective paintwork has failed and the iron is in the early stages of corrosion. At the time of typing iron staining is evident on the surface of the masonry. As the iron corrosion progresses, mechanical disruption should be expected to develop in the masonry, which may ultimately cause structural failure if the irons are permitted to remain in situ for any length of time.

## 7.7 Roofs

The pitched roof of number 15 is of modern fibre cement slates laid on bituminous roofing felt. The slates may contain asbestos cement and should be surveyed. Likewise the corrugated fibre cement sheet roofs on the extensions behind number 2 may also contain asbestos cement. The roofs of the houses and their underlying construction have not yet been surveyed in detail. All of the other roofs are covered with “natural” stone slates of receding courses, diminishing in size as they were laid from eaves to apex or ridge. A more detailed assessment of the condition of the roof covering will be done should the project proceed further

and also a survey of the roof structure by a structural engineer who is competent in the repair of historic buildings.

## 7.8 Interiors

### 7.8.1 Wall Plasterwork

The internal plastered wall surfaces have cracked, bulged and flaked in places, and detachment of plaster from the masonry substrate is evident – bulging loose plaster on the internal face of external walls. Damage is widespread in house numbers 1 where it was exacerbated by fire damage and by the sudden cooling and saturation of this house immediately afterwards. Elsewhere it occurs in local areas at ground level of number 16 and number 2. Further investigation and limited targeted opening-up of the built fabric needs to be undertaken to establish the cause, precise extent and severity of plaster deterioration. From the surveys carried out so far, the extent of deterioration is widespread in some localised areas, less so in others. The damage may be caused by a number of problems: a crumbling basecoat which has detached from the underlying masonry substrate which is often associated with prolonged wetting and drying cycles of a saturated wall fabric, and salt efflorescence, etc.

It was noted that some of the walls are coated with modern washable, impermeable, paint systems; most paint systems made since the 1960’s have a higher percentage of vinyl as a binder to the pigment. Close examination of the wall surfaces revealed that in addition to the obvious blistering, and flaking of the paint, there was widespread cracking and bulging of the wall surface beneath. Opening-up works need

to be undertaken on all floor levels to determine the integrity of the underlying plaster substrate and to establish if salt efflorescence is a cause. There are several possible contributory factors including moisture ingress at roof levels (house number 2), failure of the rainwater goods (all houses except number 15), lack of adequate ventilation and drying due to the houses being closed up and window openings sealed and general lack of maintenance and repairs.

### 7.8.2 Ceiling Plasterwork

The original lath and plasterwork is remains in house numbers 16 and 3, partially in house number 2 and has been almost completely removed from house numbers 1 and 15. A thorough inspection of the upper sides of the original ceilings was not possible for this report because of the limited space above the collar ties in the roof and because of material stored or abandoned in the attic spaces. The old ceilings are a standard construction, composed of multi-coat plasterwork laid on a timber lath framework.

The damage to the plaster and lathe ceilings in numbers 1 and 2 is related to the fire damage and subsequent mechanical damage caused during clearance in the former, and to decay processes in the latter. It was difficult to accurately determine the extent of repairs required to the old ceilings by inspection of the underside of a ceiling alone. Further investigative work will be necessary to determine the condition of the ceiling backs – the condition of the timber laths and the mechanical bond between them and the base coat of plaster. The condition of the supporting floor joists will be considered in detail in a structural engineer’s report in the

future. The preliminary assessment of the ceilings undertaken between January and July 2013 to establish priorities for stabilising the ceilings identified key areas requiring repair. The preliminary assessment suggests that much of the ceiling plasterwork may be preserved using minimum intervention methods. However, while moisture ingress is currently presumed to be the major factor in the current levels of deterioration, other factors may be revealed once the ceiling back is available for inspection. It is likely that much of the ceiling plasterwork can be preserved rather than replaced, as the professional literature on decorative and plain ceiling repair has consistently reported that the plasterwork rarely fails, it is normally the support structure which requires attention.

### 7.8.3 Painted Surfaces

Paint layers throughout the buildings have largely failed. The need for limited opening-up of a representative sample of areas, to understand plaster deterioration has been noted previously. Due to the widespread deterioration of the plasterwork, much of the currently failing painted surfaces will be removed as part of necessary works to rehabilitate the building fabric for any new uses. Areas of sound plasterwork, may be left in situ, allowing the preservation of any historically significant paint layers which may survive under the modern paint coverage in these areas.

### 7.8.4 Floors

For the purposes of this report, the floor coverings were only partially lifted at certain locations, no floor boards were lifted

and closed parts of the structure and cavities were not opened up. The ground floor of each house is solid, possibly concrete or compacted earth finished with a poured concrete screed. The floors are covered with various finishes: carpet and plastic vinyl sheeting. Further investigation is required. The floors of the extension to house numbers 2, 3 and 16 are also solid. The first floor rooms and landings have a timber floor covered with layers of carpet. No significant defect or sag or “bounce” was noted in the floors from this inspection, except on the landing, at first floor level of house number 3.

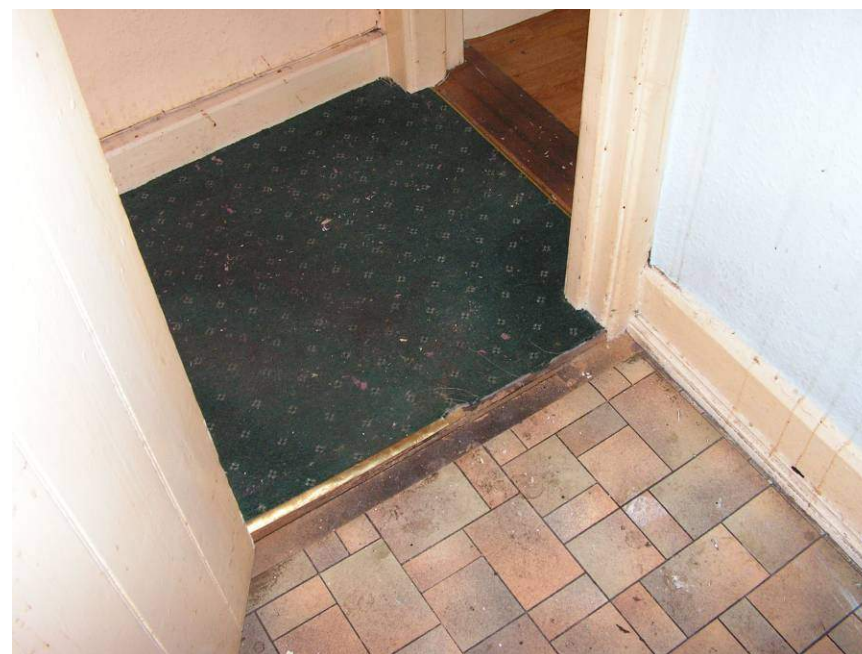


Fig. 7.10. First floor of number 3 Millview Terrace. The carpet covered floor of the landing has failed structurally and there is significant bounce. (May 2011)

### 7.8.5 Windows and doors

There are two doors to consider in number 16, the main entrance door is that in the northern façade of the lean-to extension, facing Nangor Road and (one of) the original front

door was in the eastern façade, facing the public footpath on Tower Road. Both doors are modern, of aluminium and probably date from the 1980's. Most door openings are secured: with lockable steel shutters in numbers 1 and 16 and with timber plywood in numbers 2 and 3. The only early timber front door still in situ is in the front of house number 2. An old door, possibly original, was found in the yard behind 3 Millview Terrace.

When the terrace of 15 and 16 Tower Road consisted of four terraced houses instead of two; there was another door opening at the northern end of the eastern façade which opened onto a tiny hall at the foot of the existing staircase of number 16. Of the seven square-headed, rendered reveal, window openings in number 16, only one early timber sash window remains. This is in the blocked up opening in the rear, western façade of the house. This window is a simple two-over-two window with elongated curved horns at the junction of the meeting rails and stiles, which dates it roughly to the late nineteenth or early twentieth century. Therefore it is probably a second-generation, possibly third generation window. The photographs in Figures 4.84 A – D in this report shows that the previous windows were glazed in a six-over-six pattern. These may have been the first generation windows. All the other windows have either been replaced with modern aluminium framed windows or removed.



Fig. 7.11. 3 Millview. The door was stored in the back yard. (May 2011)



Fig. 7.13. A door at first floor level in number 3 Millview. (May 2011)



Fig. 7.12. The front door to 2 Millview Terrace. (March 2013)



Fig. 7.14. A blocked up 2 over 2 sash window in the back of 15 Tower Road. This is the only remaining such windows in 15 & 16 (Jan. 2013)

In house number 15 no early window or door remains. The timber sash windows to the front façade are modern and the aluminium windows to the rear and to the kitchen area date from the 1980's. Early timber sash windows remain in house numbers 2 and 3 Millview Terrace, both front and rear façades. The elongated curved horns at the junction of the stiles and meeting rails suggest that these date from the late nineteenth or early twentieth centuries. All the cills are of stone, probably granite, painted.

The replacement aluminium framed windows in house numbers 15 and 16 limit natural ventilation, usually restricted to a centrally-placed top-hung unit within the glazing. All of the windows in house numbers 1, 2, 3 and 16 have been blocked-up, with steel sheet at ground floor level and with plywood sheet or plastic at first floor level. This further reduces the amount of ventilation of the interiors.

Very little is known about the condition of door and window lintels because they are concealed by plaster internally and by render externally. There is limited evidence of damage to the brick surrounds of window and door openings in isolated locations, for example in the fire-damaged number 1 Millview Terrace. This is in the form of cracked brick heads, mullions and cills coupled with deterioration and cracking of several heads and reveals.

A note of caution: House number 15 is in a far better state of repair than the adjacent number 16, or numbers 1 and 2. However, while internal surfaces appear sound and the building is in use and regularly maintained, it should be borne in mind that there may be underlying problems which

are concealed or managed by on-going maintenance which may become evident should this house fall out of use for any reason.

#### 7.8.6 Services

The habitation of the buildings for almost 200 years meant that alterations were constant.. In the absence of a more thorough inspection for this report, some of these services and penetrations may be associated with water-related decay.



Fig. 7.15. The electrical circuit board in number 3 Millview. (May 2011)



Fig. 7.16. A water heater and bath in the rere extension of 2 Millview Terrace. (March 2013)

## 8. Structural Condition Report

This part of the report is restricted to what has been observed to date. It is recommended that a structural engineer be engaged to advise on this part of the project at an early future stage. Therefore these notes are only preliminary in nature. A programme of opening up and investigative works will also be needed to thoroughly investigate the structure of each house.

The external walls of the five houses are approximately 560mm to 600mm thick at ground floor level, slightly thinner at first floor level, and are of a pale yellow brick jointed with a lime mortar. The construction of the walls is not yet known, but they appear to be of a double leaf construction, with an external rendered brick leaf, an internal leaf generally of brickwork and rubble infill with lime based mortar binding between the leaves. Future careful examination of any existing penetrations in the wall may reveal more of their construction. Because the buildings were rendered externally and plastered internally, no repairs in OPC mortar have been noted – yet.

Structurally the houses are 2-storey masonry buildings, predominantly brickwork, with single 'A'-type, collared, pitched, cut roofs, slate-covered roofs. The upper floors are of timber construction, boards nailed to and supported by timber joists which extend from and bedded into the front and rere walls. The ground floor construction is solid in all of the houses; future opening up works will confirm its construction - whether a concrete slab or screed on compacted earth, or just compacted earth. There are in total 3 no. single-storey

kitchen and toilet annexes to the rear of the five houses, generally constructed in the mid-twentieth century and consisting of block work walls, concrete floors and asphalt covered or felt covered pitched roofs. The structure and construction of these roofs is not yet known. Limited opening up works will reveal. No comment on the soil is included in this report. A site investigation report has not yet been commissioned.

There is a severe crack or cracks in the party wall between numbers 1 and 2 Millview Terrace, near the walls's junction with the rere façade, which is over 25mm in width in places. The wall of the rere facade may have been pushed out and caused a crack in the party wall. The configuration of the roof trusses also results in horizontal forces at the supports and this may be a factor. A single storey lean-to extension was demolished behind this house within the last decade and the removal of this may have caused a weakness in the wall at this location and thus its ability to resist these horizontal forces, leading to the vertical cracking noted. Alternatively the fire damage may have been a factor. Alternatively the ground behind the wall may possibly have been locally softened below the foundations due to water penetration resulting from the defective rainwater collection and disposal system. This area will require local re-building and strapping. The cause and effect of this damage would need to be investigated by a competent structural engineer and further advice obtained.



Fig. 8.1. 1 Millview Terrace. The party wall with number 2 Millview Terrace from the first floor room. Note the damage caused by fire and the crack in the right side of the photograph. (March 2013)



Fig. 8.2. The rere façade of 1 Millview Terrace. The outline of the demolished extension on the rere façade is clear. The side wall of the extension remains on the left side of the photo, just inside the boundary wall which is concealed in the hedge further to the left. (March 2013)



Fig. 8.3. A cracked and broken cill in number 3 Millview Terrace. The cause of the crack is not yet understood. (May 2011)

Opening up at pre-selected locations will have to be carried out by a contractor under the direction of a structural engineer at each level to expose the primary structural elements. For the purposes of this report it was not possible to access one of the rear annexes behind and attached to 2 Millview Terrace. It was not accessible from within the house and the garden was too overgrown.

Bore holes and trial pits should be made and excavated externally to allow random inspection of the foundations of the existing buildings and the subsoil, to identify the types of soil and their load-bearing capacity.

### 8.1 Asbestos

An asbestos survey will be carried out by a specialist consultant at some future stage to identify if there is asbestos cement in any of the buildings or their components. The fibre cement slates on the pitched roof of number 15 and the corrugated fibre cement sheet roofs on the extensions behind number 2 may also contain asbestos cement. These materials should be checked for any asbestos content by a competent consultant. Although the roofs of the other houses are covered with natural slate, commonly installed replacement in the past – typically but not exclusively, lining boards, insulating quilts, fireboards, electrical junction box linings, floor tiles, toilet cisterns, were often made from material containing different types of asbestos fibres. All five houses should be surveyed for such materials, and if necessary, samples should be taken for laboratory analysis by a specialist consultant. The results of this analysis can contribute to a schedule of demolitions and the preliminary health and safety plan.

### 8.2 The floors and stairs

The floor at first floor level is made from square-edged, timber boards, nailed to on timber joists at centres spanning between the front and back external walls. The moisture content of these timbers has not yet been read and recorded. As stated previously, the floor of number 3 Millview Terrace has failed at first floor level; there is excessive bounce and deflection in the floor of the landing at the top of the stairs. The cause and effect of this damage would need to be investigated by a competent structural engineer.

The stairs within the houses are of varying design but are generally narrow and steep – two flights separated by a tiny half landing, a pitch of 37 degrees in numbers 15 and 2, a straight, single flight with a pitch of 46 degrees in number 16. Some bounce was noted in the stairs and deflection noted on individual steps.

### 8.3 Foundations

The foundations to the main external walls have not yet been exposed by trial pit excavation at random locations around the perimeter of the buildings. This work would need to be organised in the future by a structural engineer to identify the foundation arrangement and the allowable bearing capacity for the soil type.

### 8.4 Roofs

The roof timbers have not been surveyed other than dimensionally for the purposes of this report. The configuration of the collared roof trusses result in horizontal forces at the supports. This horizontal force may have caused or contributed to damage in the external wall behind number 1 Millview Terrace. Some timber decay and structural deterioration was noted in a number of rafter ends and in the wall plate at the front of number 2, where the valley at the junction of the dormer and main roof has been stripped of its lead lining.

The removal of the lead lining and flashings at the junctions of the dormer roofs with the main roof has allowed large volumes of rainwater to get into the building and cause

decay to the structural timbers. The rafters, slating battens and also that part of the wall plate below this area are all exposed and badly affected. This latter decay is of recent origin - the NIAH record of 2003 shows this roof complete and apparently intact. Further investigation of the roof structures will have to be done by a structural engineer to determine what condition the structural roof timbers are in. Moisture content readings need to be taken and recorded, particularly in the wall plates at these locations.



Fig. 8.4. The new roof of 1 Millview Terrace, installed after the houses was severely fire-damaged. (March 2013)



Fig. 8.5. A view of the fronts of the houses at Millview Terrace, May 2007 (the date on the bottom right corner of the photo is incorrect). The fire-damage to the roof of number 1 is visible. This has since been stripped and re-covered with a new corrugated sheet on a new roof structure. Note the absence of any breaches in the roofs of numbers 2 and 3 and the general good appearance of the front windows; the condition of these roofs and windows have deteriorated rapidly in the 7 years since this photograph was taken. Neglect and vandalism are the causes. Compare this view with more recent views on Figures 7.3 and 7.5 on page 79. (Photo courtesy of South Dublin County Council's Architectural Services department)

### 8.5 Other considerations

A structural and / or civil engineer will need to advise on the following items at Cost Plan and later stages:

- Foul & Surface Water Drainage: The existing drainage system has not been inspected for the purposes of this report. Its design and condition will need to be inspected and recorded in the future.

- Floor load-bearing capacities: A structural engineer will need to carry out structural calculations to assess the notional floor capacities for the proposed use of the houses.



Fig. 8.6. Temporary propping of the floor in 1 Millview Terrace. (March 2013)

## 9. Mechanical and Electrical Services Condition Report

A competent mechanical and electrical services engineer will need to be appointed, ideally prior to Cost Plan stage, to advise on the development of this report and specifically to advise on the following:

- To report on the existing mechanical and electrical services installations in the houses and on the site.
- To outline the nature, suitability and overall general operating condition of the existing mechanical and electrical services installations at the building.
- To base this information on observations made on site, because there are no Operation & Maintenance Manuals or 'As-Installed' record drawings available for the houses or the site.

Of all the houses number 15 has the most modern services. Number 3 was only vacated within the past 5-6 years so is reasonably modern. However these systems should be removed and substantially replaced as part of any minimum stabilisation work because it is proposed by the development to consider all five houses as one unit.

As a preliminary set of proposals the following are considered essential:-

### 9.1 Central heating

Heating within the buildings has not been maintained for years. As a result of the lack of heat within the building, the higher moisture content has accelerated the deterioration of

some elements of the building fabric. It is recommended that some form of background heating be considered as part of the minimum stabilisation works, or that the windows be altered to allow for improved ventilation, should the building be left vacant for an extended period of time. Some of the houses have or had a gas or oil fired central heating system (numbers 15 and 16) and the others had none, relying on combustion of solid fuel in an open hearth. There is the remains of an oil fired boiler in the yard to the north of the house of number 16, but almost all the copper piping has been removed. The remains of a stand or base for an oil storage tank is also in the yard. Number 15 is heated by an internal gas fired boiler which is in the kitchen. The gas supply mains could not be located during the survey.

As part of any future renovation works, the following works to the existing heating system should be considered:

- Disconnect and remove any existing boiler plant and provide a new packaged gas boiler.
- Disconnect and remove any existing low level perimeter heating pipe work, to facilitate the removal of the timber floors.
- Install new space heating system consisting of radiators, LPHW pipe work and associated boiler plant. Opportunities may arise to route or conceal new pipe work within the depth of structural floors etc. This will ultimately depend on the extent of refurbishment.
- Install new automated controls to monitor & control the heating system on a zoned or floor-by-floor basis.

The renewal of the central heating systems of the houses may or may not be required for minimum stabilisation works,

depending on how long the building is to be left unoccupied. In unheated buildings, a build up of moisture occurs during the winter season which causes deterioration to the buildings' fabric. Consideration should be given to providing some form of background heating as part of the minimum stabilisation works, if it is likely that the buildings will remain unoccupied for an extended period.

### 9.2 Mechanical systems, pumps, boilers, storage tanks etc.

Some of the existing mechanical systems are at least 40 years old and should therefore be renewed as part of any major refurbishment works. To eliminate the risk of leaks within the houses, the existing water services pipe work, including storage tanks within the building etc should be drained down and removed as part of any minimum stabilisation works.

The existing electrical systems have probably been installed in an ad-hoc manner over the past 40-50 years. With the exception of number 15, the systems do not comply with current regulations and are not in a serviceable condition. The electrical systems would almost certainly need to be replaced as part of any major refurbishment works and even in the case of number 15 because of the proposal to join the houses into one system.

### 9.3 Fire alarm and emergency lighting

There is no fire alarm system in the houses except for number 15 Tower Road. For the protection of the houses and property within them and the safety of users and visitors,

it is recommended that the fire alarm system be renewed as part of any stabilisation works.

There is no emergency lighting system within the buildings. For safety within the building, particularly during long periods of absence or closure, it is recommended that some form of temporary emergency lighting be considered as part of any minimum stabilisation works.

#### 9.4 Water Services Installations

There is a single incoming mains water supply serving numbers 15, 16 and 3. It is likely that numbers 1 and 2 also have a similar service although these may be blanked off. The identified incoming supplies are below-ground supplies connected to the mains water scheme. There are no records available at the time of survey to indicate the route of the incoming in-ground supply. Hot and cold water is provided only in number 15.

##### 9.4.1 Assessment of Current Installation

The existing water services installation consists of a combination of copper, and possibly some lead pipe work, which has been largely removed from the vacant houses. Any remaining pipe work is probably over 40 years old and can be considered to be in poor condition.

Any renovation will entail the following works to the existing water services as a minimum:

- The existing water services installations are over 40 years old and should be renewed as part of any major refurbishment works.
- To eliminate the risk of leaks, the existing water services pipe work, including storage tanks within the building etc should be drained down and/or removed as part of any minimum stabilisation works or refurbishment works. For minimum stabilisation works, there is no requirement to upgrade the water services installations.

##### 9.4.2 Waste Services Installations

There is a fractured network of above ground soils & waste drainage connections serving the five houses. This above ground drainage connections consists of vertical cast iron and uPVC replacement soil vent pipes, connected to below-ground drainage. It is not known if this drains to the local municipal foul drainage scheme or to a septic tank.

At the time of survey, there were no records to indicate the routes of the external drainage network. There is externally routed vertical waste connection located at intervals around the external perimeter of the houses. The vertical stack locations are strategically located adjacent to toilets, bathrooms and kitchens, as would be expected.

Assessment of Current Installation: The cast iron external stacks are possibly original and may be in a serviceable condition and therefore salvageable. Any renovation will entail the following works to the existing water services as a minimum:

- The existing foul drainage installations should be renewed as part of any major refurbishment works.
- To eliminate the risk of leaks the existing foul & storm drainage pipes serving the houses should be tested with remedial works carried out as part of any stabilisation works.

#### 9.5 Gas Services Installations

With the exception of numbers 15 and 3, none of the other houses are serviced with a gas supply. The gas main and existing An Bórd Gáis Meter enclosure for number 15 could not be identified during the survey. The enclosure and meter box for number 3 is crudely affixed to the front façade, just beside the main entrance.

#### 9.6 Incoming Electrical Supply

There are two separate, single incoming supplies, each serving number 15 and number 16 Tower Road. There are two mini pillars in the public footpath on Tower Road, one directly in front of each house. The incoming supplies are below ground and are connected to the village's electrical infrastructure. There are no records to indicate the route of the incoming in-ground supply, other than the service maps supplied by ESB Networks. The main electrical switchboard serving each house is contained at ground level in a self contained switch room located at varying locations, under stairs being the most common.

As part of any renovation the following works to the existing main switchboard should be considered a minimum:

- The main switchboard should be tested and checked.

- The main switchboard may have limited capacity and may not be suitable to serve the future fit-out requirements.

For minimum stabilisation works, there is no requirement to upgrade any of the existing main switchboard installations. There is a requirement to maintain the main switchboard to ensure that the Fire alarm & emergency lighting system installed as part of the minimum stabilisation are continuously powered up.

#### 9.7 General Lighting Installations

General illumination in the five houses is provided by different types of luminaires suspended from the ceilings. There are 1800mm twin fluorescent surface-mounted batten luminaires on the ceiling of the extension to numbers 16 and 2. Tungsten ceiling pendants are used elsewhere, most removed. Power to the luminaires was supplied from each distribution board located on each floor via cabling, contained in trunking distributed into each room via surface mounted plastic conduit or in chased into plasterwork and run under the floor boards

Assessment and Recommendation: The existing lighting installation is in a poor condition, most luminaires appear to be 30-40 years old with many luminaires missing. The existing luminaires utilise considerably more energy than fluorescent lamps now available in the market.

Any renovation will entail the following works to the General lighting installation as a minimum:

- The complete lighting system will need to be designed in accordance with the proposed use of the building. For minimum stabilisation works, the existing lighting installation and associated cabling should remain isolated at a minimum, so not to impose any additional fire risk to the building.

#### 9.8 Emergency Lighting Installations

There is no evidence of emergency lighting in any of the houses except number 15; emergency exit signs are installed above the main entrances / exits.

Assessment and recommendation: All of the areas of the building will need to be protected by a temporary emergency lighting in compliance with IS 3217: 2008 regardless of there been any body occupying the building or not.

Any renovation will entail the following works to the Emergency lighting installation as a minimum:-

- The complete emergency lighting system will need to be designed in accordance with the proposed use of the building. Complete installation of new temporary emergency lighting installation as of IS 3217: 2008. The system should consist of twin spot luminaires which is the most cost effective method of providing emergency lighting.

#### 9.9 I.T. Structured Cabling Installations

There is no I.T. cabling in any of the houses except number 15 Tower Road. The I.T cabling has been installed throughout number 15, generally in ad-hoc manner and added to throughout the life of the building. There is a combination of cable types present, generally surface fixed and clipped to the internal fabric. Any renovation will entail the following works to the I.T. Structured cabling installation as a minimum:-

- The complete I.T. structured wiring system will need to be designed in accordance with the proposed use of the building.

In the case of the minimum stabilisation works the existing I.T. cabling does not need to be replaced with the exception of local connections to fire alarm & any security systems that are considered.

#### 9.10 Security Installations

There appears to be no security system installed within the any of the houses except number 15 which has an intruder alarm fitted.

Assessment and recommendation: In the case that the building is unoccupied for a substantial period of time, the installation of an intruder alarm to all the unoccupied houses is advisable. Any renovation should entail the following works to the intruder alarm installation as a minimum:-

- The complete Security system will need to be designed in accordance with the proposed use of the building. In the

case of the minimum stabilisation works the installation of a temporary intruder alarm consisting of wireless PIR's etc. should be considered.

#### 9.11 Fire Detection & Alarm Systems

There is a fire detection and alarm system in only one of the houses, at 15 Tower Road. It consists of a conventional control panel located in the main entrance to the building at ground floor level.

Assessment and recommendation: The fire alarm system cannot be evaluated in this report. Advice will be needed from a mechanical and electrical engineer. The renovation should entail the following works to the fire alarm & detection installation as a minimum:

- A new fire alarm system in compliance with IS 3218: 2009 "Fire detection and fire alarm systems for buildings- system design, installation, servicing and maintenance".

In the case of the minimum stabilisation works, a new temporary fire alarm installation should be installed in all of the houses in accordance with IS 3218: 2009. The fire alarm system or systems may consist of wireless detectors which would be the least invasive means of providing fire protection to the building while unoccupied. The fire alarm system should be continually monitored by an external monitoring station.

A new intruder alarm system should also be considered. The alarm system could consist of wireless window contacts to

minimise the extent of wiring required. As with the fire alarm the intruder alarm system should be continually monitored by a remote monitoring station.

#### 9.12 Lighting Protection Installation

There is a lighting protection system on the round tower, a copper strip. The system was installed to prevent the risk of damage to property in the event of a lightning strike. There is no such system on the five houses. Advice will be needed from a mechanical and electrical engineer as to whether this is recommended or not.

#### 9.13 Lift Installations

There is no lift in any of the five houses at present. It is necessary to install a lift because the building is proposed to be a public facility and will have to allow access to both floors. Any renovation will entail the following works:

- The complete passenger lift installation will need to be designed in accordance with EN81 and the proposed use of the building.

In the case of the minimum stabilisation works no lift would be required.

The lift has been designed and located to minimise its impact on the existing fabric and to facilitate universal access to the entire centre.

## 10. Recommended stabilisation works and recovery works

### 10.1 General

Extensive works are required to stabilise and recover the deteriorating condition of the building fabric of the five houses. A programme of immediate refurbishment works, also known as “mothballing” are being considered in the short term, (2014) to stop the most serious causes of deterioration. On this basis limited immediate stabilisation works are listed below in paragraph 7.2 which are recommended to halt water ingress in the areas most seriously affected, thereby restricting the aggressive decay processes which are currently in progress. The precise extent of these works are not certain a yet. In the event that the proposed refurbishment works do not proceed, a further schedule of short term stabilisation works are included in item 7.3 below. These works are a second phase of essential scope of works to halt the aggressive decay that could be considered in the building until refurbishment works are undertaken at a later date. In summary, the recommended works listed below are set out under:

1. Immediate stabilisation works - 2014
2. Long term works - dependant up on the the project not proceeding for any reason.

The recommended works are shown on drawing numbers SK01 to SK22 (“SK” is an abbreviation for “sketch design”)

### 10.2 Immediate Stabilisation works - 2014

The precise extent of works has not yet been identified – budgets are not fully agreed. Some or all of the following are being considered for immediate implementation:

- Drain down all water storage tanks and the entire plumbing system.
- Remove all existing roof coverings to house numbers 1, 2 and 3 Millview Terrace, and replace with natural slates (with the exception of the extensions behind numbers 1 and 2 which have felt covered roofs). Patch repair the fibre cement roof slates on number 15 and natural slates on numbers 16, with new to match existing.
- Provide ventilation to attic with concealed slate vents.
- Take down all pvc gutters and down pipes. Install new cast iron half round gutters and down pipes to match the profile of the existing gutters, hopper and down pipes.
- Remove entire existing valley coverings, boards and linings. Replace with copper or lead on new treated timber liners and supports.
- Provide temporary protection to failing brick-work to the back door in the rere façade of number 1(south facing). Fixings to be set into the mortar joints.
- Locally take down defective masonry at the top of the chimneys of house numbers 16, 3 and 2. Re-build to ensure effectively weathered with lime mortar fillet on the upper surfaces and plain chimney pots.
- Provide temporary weathering at the external doors to prevent water ingress.
- Replace all rotten sections of wall plates. Cut back all rotten timber floor joists and remove rotten wall plates in identified isolated locations. Prop from below and provide temporary

safety floor sheeting over. Splice / repair ends of trusses and rafters as required.

- Remove and treat with biocide invasive vegetation and plant growth at the base of the facades of numbers 1 and 2 Millview Terrace (alive and thriving) and treat with biocide. Also remove the growth at the base of the boundary wall to Tower Road.
- Remove and treat all vegetation on elevations and colonisation of drains (hopper heads and gutters) as scheduled below.
  - South Elevation of numbers 1, 2 and 3.
  - Around the windows of the front (north, first floor level) facades of numbers 1 and 2
  - The drain to the east of window at the back (south, first floor level) facade
  - Blocked gullies generally
- CCTV survey all surface and foul water drains. Repair or replace as necessary.
- Fit wire mesh guarding to all window opening sections to prevent pigeon access. Secure the windows in the maximum open position.
- Restrict all vermin access at holes in external walls. At ground floor vents, where grill missing or damaged fit new temporary mesh. Leave in situ any surviving historic grills damaged or otherwise for later refurbishment.
- If the budget will allow, install temporary wireless fire and intruder alarm systems to Services Engineers Specification
- If the budget will allow, install temporary emergency lighting systems to Services Engineers Specification.
- If the budget will allow, remove approximately 10 failed bricks on the chimneys and replace with new to match existing with new lead flashings and trays throughout.

- Remove failed brickwork to the reveals of the back door in the south elevation of number 1 and replace with new to match existing.
- If the budget will allow, partial re-pointing is recommended as part of these mothballing works as the on-going accelerated decay of the boundary wall to Tower Road and the front boundary walls of numbers 1 and 2 Nangor Road is a serious cause of concern.
- Increase ventilation to all attics with patent slate vents or other.
- If the budget will allow, monitor structural cracking in house number 2, first floor level, party wall to No. 1) using Tell-Tales.
- Monitor with vigilance the integrity of the roof and the performance of all rain water goods and surface water drains. Effect repairs, without delay, as required. Continue on-going environmental monitoring.
- If the budget will allow, install a new perimeter land drain in gravel border to entire building perimeter and connect to surface water drainage system.

### 10.3 External Walls

As part of the proposed development the following works are proposed to the external walls:

- Rake out all defective or loose mortar pointing to external stone boundary walls and brick surrounds and re-point with lime mortar. Isolated brick repairs may required (base of the boundary wall of numbers 1 and 2 to Nangor Road).
- Mechanically remove pigeon soiling with wire brush.

### 10.4 Demolitions

As part of the proposed development the following demolitions are proposed to the external walls:

- Take down the two annexed extensions on the south elevation of house numbers 1 and 2 and on the west elevation of house number 16 and secure all openings with localised mortar repairs.
- Take down the single-storey hipped-roof extension to the south of number 15 Tower Road, formerly the site of a Dispensary.
- Repair brick surrounds to windows and doors, secure and weather-protect window openings with new windows or temporary weather proof ply sheeting, awaiting future new installation. Provide ventilation to the interior.
- Repair roof where annexes and extensions demolished. Continue gutter across the elevation. Repair the brick or stone wall and eaves to match existing masonry with local mortar repairs.

### 10.5 Internal Floors

As part of the proposed development the following works are proposed to the internal floors:

- Lift all floor boards on 1st floor level with care and retain for refitting. Repair joist ends, remove and replace rotten wall plates and isolated rotten joists at external walls as required. Refit all floor boards.
- Existing bridging to be assessed and additional installed where necessary.

- At ground floor level, lift with care all floor boards and salvage for reuse. Take out all joists, wall plates and all material in floor void: rubble, builders debris and concrete haunching. Fit new floor, suspended timber or concrete as required for new use. Reinstall the existing floor boards. If salvaged quantity inadequate, lay all salvaged material in complete rooms and provide new floor sheeting for the balance.
- Ground floor of number 16: no works required for stabilisation but removal of existing concrete slab or screed and poor quality fill is recommended for new use. Fit new floor, suspended timber or concrete as required.

### 10.6 Foundations

As part of the proposed development the following works may be needed to the existing foundations:

Underpin the foundations behind or under the rear wall of numbers 2 and 3 Millview Terrace, if necessary and as directed by the structural engineer (to be appointed at a future stage should the development proposal proceed)

### 10.7 Internal Wall Plaster

As part of the proposed development the following works are proposed to the internal plaster:

- Take down existing stud partitions & cart away.
- Remove all unsound plaster. Provisional estimate 70% of total. Re-plaster with lime plaster.

- Sample test existing plaster to inform specification for new lime plaster.

#### 10.8 Ceilings

- Some areas of lath and plaster ceilings have failed. There are also large areas of the first floor ceiling contaminated with pigeon guano, particularly in house number 2. While desirable, these ceilings are not considered essential to the characteristics of importance of the structure, and it is therefore acceptable to replace failed / contaminated lath and plaster ceilings with new ceilings.
- Where possible, some areas should be retained. Limited local repair to match existing should be undertaken and areas of delaminated plaster can be stabilised with steel wire and disc suspension supports. A new skim coat of lime plaster can then be applied.

It is noted that lath and plaster ceilings provide excellent sound absorption. The acoustic performance of any new ceilings should be carefully considered.

#### 10.9 Windows

Remove all existing aluminium replacement windows and fit new timber sash windows to suit new use. Conserve and repair all existing timber sash windows. Provide increased opening sections to enhance natural ventilation of the spaces.

#### 10.10 Services

- Remove with care all existing plumbing and heating pipe work.
- Remove all surface mounted electrical services. Remove all electrical cables from floor voids.
- Fit entire new mechanical and electrical installations. Avoid new notches in joists, reuse existing. Drilling and notching of floor joists to be carried out in accordance with best building practice and with agreement of the structural engineer. Following removal of defective plaster, the conservation architect will assess the masonry for suitability for chasing. It may be appropriate to expose all services.

#### 10.11 Features

- The sole surviving cast iron fire place in house number 1 will be retained.
- The sole surviving old timber sash window in house number 16 and all the old timber sash windows in house numbers 1, 2 and 3 will be conserved and repaired to retain as much as possible of the existing timber.

#### 10.12 Internal Joinery

As would be expected in dwelling houses the existing internal joinery is a mixture of replacement elements over the years. Much of it is of no significance and may be replaced. The three aforementioned internal doors in house numbers 16, 2 and 3 should be retained for re-use. The front door of number 2 and the loose door stored in the yard behind number 3 should be retained.

#### 10.13 Long term works

The extent of works undertaken as part of the minimum refurbishment programme in 7.4 above will have ensured the future survival of the structure. With buildings of this nature, recovering from extensive levels of decay and moisture ingress, continuation of the monitoring is recommended for a period of two to three years post occupation, using regular inspections, moisture meters, (and if considered necessary - data loggers to record temperatures, relative humidity, surface humidity, surface temperature, vapour pressure and dew point). The building should be inspected every 3 months and an environmental monitoring report compiled. These inspections should be undertaken in consultation with the conservation architect. Any areas where recovery is not proceeding as anticipated can be explored at low cost and further minor remedial work be undertaken.

#### 10.14 Exclusions

The above recommendations do not address any requirement for fire safety compliance in relation to occupation of the building. This is outside the scope of this report. If the development proposal proceeds, it will be necessary to get the advice of a fire safety engineer.

## 11. Conservation Methodology for the proposed works

### 11.1 General

With the exception of number 15, long periods of vacancy, natural decay, lack of maintenance and occasional bouts of vandalism, have caused the buildings to deteriorate to their current poor condition described previously in this report.

The approach for the stabilisation and recovery works is to halt deterioration and commence recovery of the buildings in advance of the proposed development programme, and would be carried out using materials in keeping with the character of the building on a like-for-like basis. These works of themselves will not be sufficient to allow the building to be reused. They are specifically identified as the most important items to be addressed in the short term to ensure the survival of the architectural heritage characteristics of importance. They are a first phase of essential repairs. The proposed development will complete restoration to facilitate re-use of the building. All works are to be undertaken under the guidance of a Conservation Architect of Grade 1 or 2. This section of the report includes methodologies particular to the houses followed by general methodologies to be followed for all work to historic fabric in Section 12.

### 11.2 Roof Coverings

The condition of the roofs have not been fully assessed yet. They have only been assessed from the perimeter at ground level using binoculars and by localised inspection from a ladder placed at the perimeter at eaves level.

The roofs of house numbers 16, 2, and 3 are covered with natural slates. The condition of these roofs vary; that on number 16 has been breached near its north-western corner. There are several slipped slates on number 3 which otherwise appears to be the best of the three on Millview Terrace. The roof covering of number 2 is the most dilapidated; many slipped slates and several breaches which allow rain water to pour into the interior. This roof was also damaged by the removal or theft of the lead lining from its valleys. Number 1 Millview Terrace is covered with a corrugated fibre cement roof which was installed after the house was badly damaged by fire about a decade ago.

The existing fibre cement slate roof covering on house number 15 may be near the end of its serviceable life. Typically these slates do not have a good lifespan beyond 30 years, although this varies greatly with location, microclimate, exposure and orientation. Temporary short term repairs could be carried out using new fibre cement slates to match the existing in colour and size. All insecure, cracked or damaged slates would be lifted and replaced. New slates are to be fitted and fixed in compliance with the manufacturer's instructions.

In the longer term, it is proposed to re-slate the five roofs with natural slates as part of the development proposal. Where salvaged material is used, the most visible roof pitch above the front facade should be slated using material salvaged, if possible all of the same orientation and with the same weathering pattern. It may be difficult to source adequate quantities of similarly weathered salvage material

for the external slopes and new slate may be the best solution for the less visible, rere roof pitches. All new slates would be fitted using either traditional copper fixings, through holes at the top of the slates or stainless steel wire clip fixings. For salvaged slates, stainless steel wire clip fixings are recommended. The cross ventilation of attic spaces will be improved by insertion of patent, in-line slate vents.

The current building regulations require a larger batten size than the existing. In addition the requirement to install insulation for new uses will necessitate a review of the optimum design solution to ensure adequate ventilation is provided to the top and underside of a breathable sarking membrane. The roof insulation should be permeable and hygroscopic and a permeable vapour barrier is required on the warm side of the insulation. Maintenance of the sloped ceilings within the spaces below the roof is important to the characteristics of the building. To accommodate these competing demands, in particular the required ventilation above the sloped areas of the ceiling, it may be necessary to introduce counter battens. This will have the effect of raising the roof and altering the relationship of the roof slates to flashings at abutments and copings – for example the raised barge detail at the western end of number 1 Millview. In these locations carefully detailed recessed gutters are to be provided, giving good weather proofing while leaving all coping stone and abutments unchanged. All flashings and valley linings should be carried out in lead or copper. The details will need careful exploration and assessment by a conservation architect to ensure the visual appearance of the building is not compromised.

### 11.3 Rainwater Goods

The existing rainwater goods are in disrepair, and have contributed to the saturation of the wall fabric, failure of the internal plasterwork, salt efflorescence on internal wall surfaces, and the development of dark-coloured biofilms in specific elevations – for example the north-facing corner of the junction of numbers 3 and 15. With the exception of a few remaining cast iron rainwater down pipes, the rainwater goods retain no special architectural heritage values, and their poor condition is significantly contributing to a number of deterioration processes internally and externally. For short term repairs to halt water ingress, repair of the existing and partial replacement with like-for-like, half-round cast iron gutters and circular down pipes in keeping with the character of the building are recommended. All new down pipes should be bracketed a minimum of 25mm off the face of the external wall.

The two hoppers on the east and west ends of the rear façade of numbers 1, 2 and 3, serving the valley at the joint with number 15, may need to be replaced with larger hoppers sized to suit the rainwater flows. All outlets through the walls are to be checked to remove blockages, and ensure adequate size. If necessary, carefully increase size avoiding any appreciable visual change to the elevation. Reline the outlet in lead soakers and flashings ensuring waterproof detail and protection of masonry below. Project the lead under cloak over the side of, and into the hopper to eliminate overspill or wetting of the wall.

### 11.4 Repair Damaged Brick Door and Window Openings

Several door and window openings show cracked window elements including lintels, cills, mullions and jambs, particularly the fire-damaged number 1 Millview. Others are painted and most reveals plastered and painted, so there is a possibility of further damage which is presently unknown. The cause for failure has not been clearly established yet but indications are that a combination of effects including possibly structural stress are at least contributory factors. Investigations by a competent structural engineer should be carried out to assess and understand the structural movements which would inform any recommended local repairs. As the cause has not been firmly established, it is premature to consider excessively invasive works such as stitching, brick or stone replacement which would necessitate significant opening-up and disruption of the masonry.

### 11.5 Replace Failed Brick Door Opening

As stated previously, the door opening at the back of number 1 Millview Terrace shows signs of structural damage and deterioration. The damage comprises open and incipient fractures which threaten to allow sizable (i.e. greater than cobble/fist-sized) fragments of masonry to detach – posing a considerable health and safety risk to potential users of the building, in addition to the consequent loss of architectural character of these elements. Consequently, this opening should be considered to have reached the end of its working lifespan. It is recommended that it be carefully recorded, and be repaired with new brickwork to match.

### 11.6 Re-pointing

The localised use of OPC pointing mortars as a previous repairs in parts of the boundary wall along Tower Road are not original, have no special architectural heritage values, and may be contributing to the deterioration of the wall in places – delamination and recession of the face of the stone behind the joint is evident. It is necessary to remove all existing OPC pointing from the wall, and to re-point with a new lime-based mortar, which would be more permeable than the surrounding historic masonry fabric in order to prevent future water-related failure deterioration of the wall. It is recommended that the existing OPC mortars be stripped out as soon as is practicable to allow the building fabric to dry out as needed. Several other boundaries have severely eroded mortar joints, such as the front boundary walls of numbers 1, 2 and 3 Millview which face Nangor Road.



Fig. 11.1. The front boundary wall of number 3 Millview to the old Nangor Road. The brick wall urgently needs to be re-pointed. (May 2011)



Fig. 11.2. The stone boundary wall along Tower Road just to the north of the round tower. Note the remains of a building. (June 2013)



Fig. 11.3. The stone boundary wall along Tower Road slightly further north. Note the remains of the former boundary wall. (June 2013)

### 11.7 Soiling

Dark-coloured soiling deposits arising from the accumulation of carbonaceous material, organic material and airborne particulate matter are largely restricted to the soffits of windows, and around eaves level, just below leaking gutters. These soiling deposits are generally poorly developed and do not appear to be causing any significant damage to the underlying rendered masonry substrate, though they should be assumed to have some level of impact over the longer term. Considering the potential harmful impacts of over-frequent and overly harsh cleaning operations, and the lack of immediate risk posed to the stability of the historic fabric by the presence of the soiling, it is recommended that action to address the existing soiling should not be considered a matter of urgency. However, it should be noted that removal of these soiling deposits could be undertaken as a preventative conservation measure with relatively little cost in the short-term if carried out to coincide with any re-pointing of the building.

### 11.8 Remove Biological Growth & Soiling

The drainage system at the base of the front and rear facades of all the houses should be cleared of all plant growth and enabled to function as originally intended. Similarly, higher order species exploiting open joints at higher elevations (particularly the front of number 2 and back of number 1) should be treated and removed, as recommended previously.

The greenish black biofilms found on the external envelope are indicative of moist conditions on the wall surface. These deposits are often considered unsightly, but are not currently posing any significant threat to the stability of the underlying masonry. Consequently, they do not need to be removed to stabilise the building.

Pigeon soiling: brushing and mechanical removal of guano deposits with minimal water is recommended, as explained previously.



Fig. 11.4. Biofilms on the render at the back of numbers 15 and 16. Note also the missing gutter, the decayed timber on the left foreground and the crude openings made in the back of the houses. Number 16 (left) is roofed with natural slate, number 15 with artificial fibre cement slates. The latter should be included in an asbestos survey. (January 2013)

### 11.9 Iron Fixtures

The fragments of original down pipe at the western end of the rear façade of numbers 3 and 2 should be retained, shot blasted and protected with a proprietary multi-coat paint

system. Ideally, this feature should be incorporated into any new rainwater disposal system intended for the building. All other iron fixtures and fittings should be removed as soon as is practicable. It may be desirable to also remove iron staining associated with corroding iron fittings, however this is not required for the purposes of stabilising the structure, but may be desirable for aesthetic reasons.

#### 11.10 Repairs of Structural Timbers

As part of any refurbishment further careful opening up is required under the guidance of the conservation architect, the structural engineer and if appointed a timber preservation specialist to establish the full extent of decay and the repairs or replacement required.

##### 11.10.1 Roof Timbers

Generally expose the bearing ends of all roof trusses as for floor joists described below. Where rotten, careful splicing of a new foot to the truss is to be undertaken. The new spliced end to be stitched to the truss with concealed structural dowels or exposed metal plates to structural engineers detail and conservation architects approval. Much of the wall plate under the front slope of house number 2 is rotten. During the re-roofing process the valley linings (at the junction of numbers 15 and 3) and valley boards are to be removed entirely and the wall plates where rotten cut out and replaced with new pressure-treated soft wood wall plates. Any cracks or openings in the tops of the front and rear façade walls are to be re-pointed and bricks replaced as necessary to provide a sound footing for the roof. The void area below the valley is

to be thoroughly hoovered before reinstatement. From the underside leave any wet areas of the external walls exposed for sufficient period to dry out the masonry.

##### 11.10.2 Suspended Floors / Joists

In general, the bearing ends of all joists and wall plates should be exposed on both internal and external walls and the last joist parallel and closest to the external walls.

##### 11.10.3 Ground Floor

On ground floor, lift with care all boards and salvage for reuse. Take out all joists, wall plates and all material in floor void: rubble, builder's debris and concrete haunching. Fit new floor, suspended timber or concrete to the structural engineer's detail as required for new use. Reinstall the existing floor boards. If salvaged quantity inadequate, lay all salvaged material in complete rooms and provide new floor sheeting for the balance.

#### 11.11 Replacement of Failed Internal Plasterwork

A significant amount of the plaster surface has failed internally. It is recommended that the failed areas of plasterwork be stripped entirely back to the masonry substrate. This should be considered as a desalination process, as many of the harmful salts are likely to be contained in the plasterwork. The internal masonry walls should be left exposed for several months with adequate ventilation to allow the walls to dry out, and also to allow any salts concealed or retained within the masonry fabric to

appear as salt efflorescence. Any salt efflorescence which does appear on the surface of the masonry during this period should be immediately removed by dry brushing. Wetting of the wall's surface would be a mistake, it would only cause further mobilisation of the salts. This removal should also be considered part of the process of desalination of the buildings. It is recommended that any plans for insertion of electrical or other services be planned during the period when the salt-laden plasterwork has been stripped back. Once moisture levels in the walls have reached acceptable levels, and the process of desalination appears to be complete, new plasterwork can be applied. New plasterwork is to be executed in lime-based materials in keeping with the character of the building. It is recommended that a sample of sound unaltered original plaster be secured during the stripping back process and used as a model to design a new compatible mortar.



Fig. 11.5. The collared roof of 2 Millview Terrace. (March 2013)



Fig. 11.6. Stained plaster and peeling wallpaper as a result of water ingress from above, first floor level number 3 Millview. (May 2011)

#### 11.12 Repair Damaged Internal Lath and Plaster Ceilings

Local areas of failure were observed at all floor levels. Close inspection of the ceiling backs or their upper surfaces was not possible for the purposes of this report because of the small space above the ceilings and the collar ties of the cut roofs, and because of the material abandoned in the attics. Ceiling repair would take two forms: (1) localised securing of existing plaster and lather, which has lost its connection to the lathe and lathe to the collar tie, with wires and stainless steel washers to the existing collar ties, and (2) replacement of larger areas with new gypsum plasterboard double skimmed. The preliminary assessment of the deterioration

observable from the underside suggests that ceiling repair will be concentrated in the following rooms:

- First floor level rooms of houses numbers 1, 2 and 16.
- The first floor ceilings of house number 15 are of modern plasterboard and were built about 500mm below the level of the original plaster and lathe ceilings which they replaced. If complete refurbishment is planned it may be worth considering reinstatement of the original ceiling height in these rooms with modern plasterboard.



Fig. 11.7. Failure of the ceiling in 2 Millview Terrace. The parging mortar on the undersides of the slates above has also failed. (March 2013)

#### 11.13 Existing Fire Places & Chimneys

There are some existing fire places in house numbers 1, 3 and 16. The latter two have mid-to-late twentieth century surrounds finished with coloured tiles, which are of no significance and do not need to be retained. Number 1 has a sole surviving cast iron fireplace dating from the early

twentieth century, which should be retained and conserved as follows:

- Carefully clean the iron surround with calcium carbonate micro blast or other mild cleaning process to the approval of the conservation architect.
- Access and repair the timber sub-structure of the floor under the hearth.
- Reset any loose stone of the hearth in lime mortar and secure any loose fixing in the cast iron surround.
- Remove all masonry filling to the fire place ope.
- Inspect all chimneys with cameras to their full height.
- Remove any blockages and sweep clean. Assess if any structural repairs are required and agree works with the conservation architect.
- Insert a proprietary flue liner in the flues to allow for ventilation of flue gases from modern appliances which tend to contain higher amounts of water and vapour than combustion of solid fuels, and which could cause degradation of the built fabric of the chimney by sulphuric acid otherwise.
- Allow for partial or complete reconstruction of some of the brick chimneys and reinstatement of the missing terracotta pots and extensive re-jointing of the mortar joints. As noted previously some of the chimneys have deteriorated – severe erosion of the mortar joints, missing bricks and loss of the chimney pots.
- Rebuild the fire place openings in house number 16, if desired. Provide a ventilation grill to each ground floor room which adjoins a previously blocked up flue, minimum 100mm square free area. Trace the rise through the building and provide a similar vent at the top of the flue below the

insulation line within the room on first floor level. Ensure the shaft of the flue is ventilated over its full height. This ventilation strategy is to be integrated into any fire safety compliance proposals for reuse of the building.



Fig. 11.8. A tiled fire place in 2 Millview Terrace. (March 2013)



Fig. 11.10. A cast iron Edwardian surround in 1 Millview Terrace, at first floor level. (March 2013)



Fig. 11.9. The surround has been removed from this fireplace in 1 Millview Terrace. (March 2013)



Fig. 11.11. A fireplace at first floor level in number 3 Millview. (May 2011)

## 12. General Methodologies for Works to Historic Fabric

### 12.1 Introduction

The following is a description of general methodologies, reference and bibliography to works to a range of materials found in the five houses. All works are to be carried out in accordance with the Principles of the Venice and Burra charters, the latter drawn up and agreed in Australia in 1979 and amended in 1981, 1988, and 1999. The approach recommended for the treatment of all internal fungal growth, insect infestation and rising damp, is to avoid all use of chemicals and to resolve the issues by removing the root causes of the problems. The key is to understand the underlying issues and building fabric defects, remove or reduce and manage them and restore the building environment so that all historic material can perform as originally intended. Material that has lost its structural strength and integrity is generally to be removed; otherwise historic material is to be retained.

### 12.2 External brickwork and stone boundary walls

It is proposed that the existing sand and cement renders on the outsides of numbers 15 and 16 Tower Road will be removed and replaced by a new lime roughcast render. This will stabilise the walls and allow moisture to evaporate more easily from them. The principle forms of biological growth noted on the walls are: higher order species, pigeon soiling and greenish black bio films and carbon build ups.

#### 12.2.1 Higher order species

These are to be treated with appropriate biocide, allowed to die back and then to be removed. Care is to be taken to remove all roots and dead growth within the masonry. Limited opening up may be required. Any loose bricks or masonry disturbed by the works are to be carefully removed to avoid damage and to be reset in lime mortar on completion.

#### 12.2.2 Pigeon soiling

Brushing and mechanical removal of guano deposits with minimal water is recommended. Power washing is not recommended because of the harmful effects of saturating walls and fabric with large volumes of water.

#### 12.2.3 Biofilms

In general these mosses and other lower order species are not currently posing any threat to the masonry. Removal is likely to be specified with any future re-pointing. Remnants are to be removed by brush at final clean down during final stages of re-pointing. Where biocides are used sections to distinct boundaries should be treated in one operation.

#### 12.2.4 The stone boundary wall to Tower Road

Before repairing the stone boundary wall the long grass below the west side should be mowed and thoroughly searched for any missing small stones and "pinning" stones which might have fallen from the wall. These should be set

aside for re-use in any repairs. The following works are recommended:

- Any necessary stone replacement should be carried out by an experienced stonemason and the work should be closely supervised by a conservation architect. The replacement stone should be inspected and approved by the architect to ensure that it is sound, free of staining and is an appropriate match to tie in with the existing stone.
- Cutting out of damaged stone should commence at the centre of the stone or stone group and work outwards towards the joints.
- All areas of indents are to be protected from the rain to prevent mortar wash out.
- Work in progress should also be protected from the rain by covering the top of the area with tarpaulins or other waterproof sheets.
- Stone indents are to be cut exactly to size allowing for a perfect match to the measurements of existing joints. All stones are to be a minimum of 100mm thick for indents.
- All stone faces should be moistened prior to bedding and the mortar should be laid evenly on the faces of the stonework. No hard lumps should be present in the mortar that interferes with even bedding.
- The stone is to be firmly bedded in the mortar.
- The stone shall be orientated in the correct bedding planes. During placement, no damage is to be caused to the edges or face of the new or existing stone.
- The mortar is to be finished neatly to a flush finish and no mortar stains are to be left on the faces of the stones.
- The contractor should allow for getting a sample of the existing mortar analysed to facilitate replication of the original mix or a suitable variation as may be appropriate.

### 12.2.5 Mortar Repairs, Raking and Re-pointing

Bedding and pointing mortar for replacement bricks and re-pointing is to be carried out in a compatible and appropriate NHL mortar. Where possible, a sample of existing surviving lime mortar should be retained to allow replication. The contractor should allow for getting a sample of the existing mortar analysed to facilitate replication of the original mix or a suitable variation as may be appropriate. Prior to implementation, a sample of mortar repair and of re-pointing should be carried out and agreed with the conservation architect to demonstrate the suitability of mortar, compatibility of colour and finish, together with competency of the contractor. The sand is to be well-graded crushed stone with a predominant particle size to match the original mortar. It is to be low in soluble salts having an inert siliceous content greater than 95%. The sand is to be free from clay and other impurities. Cutting out of OPC mortar should be carried out using hand tools only, such as a quirk, to limit damage to surrounding stone and brickwork. Care is to be taken to remove all OPC mortar from within the depth of the joint.

### 12.2.6 Replacement of lime mortar

Joints shall be raked out to a minimum depth of 25mm or 1½ times the width of the joint, whichever is greater. All debris and dust is to be removed from the raked joints with stiff brittle brushes. All joints must be squared to ensure a good contact between the re-pointing mortar and surrounding stone. All raked joints shall be wetted prior to re-pointing. The re-pointing mortar is to be well compacted into the joints

using a suitable pointing iron. The joint is to be finished to a flush finish where arises are sharp and in good condition; where arises are damaged or decayed it may be necessary to make a localised slight bucket handle finish to the pointing. Otherwise all pointing will be finished flush where possible. The exact finish is to be agreed on site with the conservation architect. Joints should be carefully cleaned prior to re-pointing, including removal of any plants / decayed mortar. No traces of mortar should be left anywhere on the exterior of the stone or brickwork and the mortar should not exhibit any signs of shrinkage or cracking. The arises of the stone and bricks shall be left clean and free from any mortar or snots. Eye protection should be used at all times during lime slaking. Other protective clothing such as dust masks should be worn if necessary.

### 12.2.7 Stone stitching

Where appropriate significant individual; stones that are fractured, may be repaired using stainless steel threaded pins to secure each unit. The stainless steel threaded pins should be set in moisture insensitive epoxy resin (or other binder acceptable to the conservation architect), and the end of the bored hole plugged with a fossiliferous limestone plug set in a NHL mortar to conceal the repair. This will allow each damaged element to be secured, and also enable any fractures which may occur in the future to be clearly identified. All repairs to be closely monitored by the conservation architect.

## 12.3 Roof and Floors

### 12.3.1 Roof timbers

Generally expose the bearing ends of all roof trusses as for floor joists described below. Where rotten, careful splicing of a new foot to the truss is to be done. The new spliced end is to be stitched to the truss with concealed structural dowels or exposed metal plates to the structural engineer's detail and conservation architects approval. The ends of all rafters are to be exposed and checked. All wall plates to be exposed and checked. Remove all decayed timber, ensure all adjacent masonry is dry and has ability to allow moisture vapour evaporate internally and externally. Replace all rotten timber elements including wall plates, valley boards, hip boards and flashings.

### 12.3.2 Suspended Floors / Joists

In general, all bearing ends of all joists and wall plates on both internal and external walls are to be exposed. The last joist parallel and closest to the external walls is to be completely exposed all along its length. Remove stone and brick packing to establish the condition of the bearing ends. Where necessary, a decayed or damaged end is to be cut off and new treated soft wood bearer is to be coach-bolted to the retained joist to the structural engineer's detail. Subject to the engineer's specification, do not build back around the bearing, but leave it open to ventilate. Where possible use new treated soft wood bridging 600 – 900 mm back from the face of the wall in lieu. Any debris found between the joists parallel to the external and spine walls is to be removed to leave the joist free of the wall. Where necessary, move or replace the joist. In cases where the wall has not fully dried

out it is recommended that the bearing ends of the joists be cut back to finish min. 50mm short of the face of the wall. Options for support are a structural steel angle bolted to the wall to a structural engineer's specification. The angle is to be turned up with a new wall plate bolted to the flange and the joist notched over to ensure flush soffit below for reinstatement of ceiling lath and plaster or other finish. To expose joist ends generally work from above lifting floor boards with care as required and salvaging for reinstatement on completion. Where necessary to undertake repairs from below cut clearly and remove with care a strip of the lath and plaster ceiling along the wall approximately 600mm wide. Reinstatement on completion. Avoid new notching of joists for installation of new services, use existing notches where possible. Drilling and notching of floor joists to be carried out in accordance with best building practice and with agreement of the structural engineer.

### 12.3.3 Floor boards & Floor Voids

Where floor boards are to be lifted, care to be taken to minimise damage to the boards and facilitate reinstatement. All damaged pugging, abandoned services and debris to be removed with care. Avoid damage to plaster key of ceiling laths below. Hoover out ceiling void thoroughly. Trim ends of floor boards to finish 25mm away from all external walls. New fire or acoustic treatment to be provided as required prior to reinstatement of floor boards. Levels across the tops of timber joists to be taken, and packers to be introduced to facilitate the levelling of the floor finish for the reinstatement of the floor boards.

### 12.3.4 Embedded Timbers

All embedded timbers to be cut out on a piece meal basis, recesses cleaned and new brick infill with lime mortar to be provided. Refer to Figures 1, 2, 4 and 5 from CIRIA Report 111.

## 12.4 Internal Plasterwork

### 12.4.1 Removal of paint

Analysis of the paint type will define which method of paint removal is best. Small trial cleaning samples should be carried out prior to widespread cleaning to ensure that the chosen method is appropriate.

### 12.4.2 Removal of plaster

Remove, hack off hollow or decayed render. Rake out any loose pointing and replace with lime mortar prior to rendering. Brush wall to remove all loose material. Do not rake out to provide a key. Where the original detail and finish is being replicated do not use plastering bead on corners as this gives a modern appearance. Do not use metal lath to form a key, this can cause stress in the render due to thermal movements. A sample of the existing mortar to be retained for analysis to inform specification for new lime plaster.

### 12.4.3 Re-plastering

When plastering on to existing wooden laths ensure they are firmly fixed and free of lumps of old plaster. New laths to be of riven oak or chestnut. Fix new laths so that the distance between them is equal to their thickness. Ensure that new laths are thoroughly wetted before application of the plaster. Do not apply preservative treatment to old or new laths, it may introduce harmful salts.

For masonry, thoroughly wet with clean water using hose pipe or sprayer. Allow water to soak in and spray again. Repeat until the surface layers of the wall are thoroughly damp but without water glistening on the surfaces. Timber laths should be thoroughly dampened before plastering. The introduction of this volume of water into the building is to be carefully controlled so that water is applied to the area specified and does not spill and pool onto other adjacent surfaces. Careful application with appropriate sprayer in multiple treatments to allow soakage required.

The specification for the lime plaster mix is to be informed by the test results on a sample of the existing render. Whether mixed on site or a ready mixed lime render product is to be used, it should be a minimum of three months old to ensure the lime is fully slaked. Add goat or cattle hair to the mix for application to laths to help form keys between the laths. (Avoid horse hair, too slippery). To reduce shrinkage, hair may be added to mixes for other backgrounds. Hair is not to be left in the mix that is being stored for more than six weeks. Hair is to be gradually teased into the mix, to be well distributed to ensure no clumps. An approximate guide is 1lb hair to two cubic feet of mortar for ceilings for the first coat. Reduce the quantity of hair by half for the second coat.

Deep hollows in the wall surface to be dubbed out using lime mortar and small bits of stone or tile. Thoroughly wet the substrate and keep the lime mix as dry as possible and apply with pressure forcing the mortar into the surface crevices. For best results apply scratch coat using the technique of throwing the mortar mix onto the wall surface to ensure the best bond. Subsequent layers to be “thrown” or trowel applied. Protect the base coat from drying out too quickly using damp hessian, allow early carbonation to start (but not advance far). Thoroughly dampen base coat before applying subsequent coats. Close up cracks that form in the second coat by scouring, using wood float. Allow all plasters to dry slowly. Prevent from rapid drying with polythene or tarpaulin with a ventilation gap between the surface and the tarpaulin.

#### 12.4.4 Repair of plaster or render

Where patches are to be repaired cut back all loose or decayed plaster to sound plaster, all edges to be cut square, using a craft knife. Avoid use of chisels to minimise risk of loosening adjacent plaster. Rake out loose painting behind and re-point roughly. Brush out loose dust and apply render in thin coats as described above.

#### 12.4.5 Lath and Plaster Ceilings

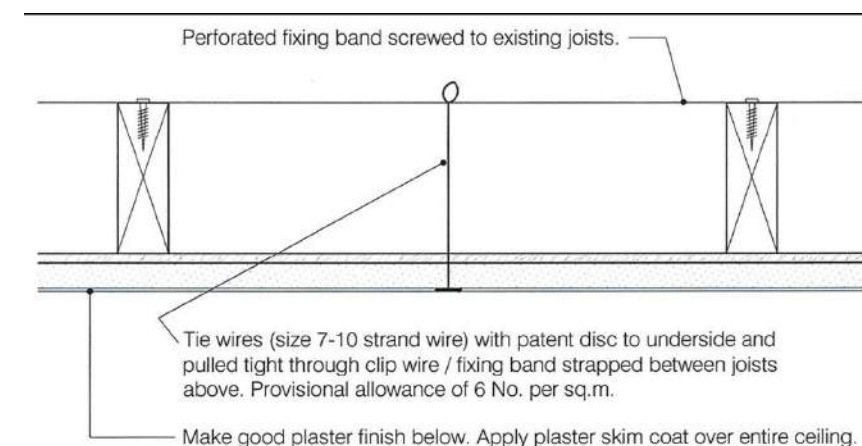
The type and condition of the ceiling back, joists, laths, plaster keys and any other pertinent information should be recorded on opening- up of the ceiling back. The inspection should be accompanied by measurements of all critical factors pertaining to the integrity of the ceiling. The description of the laths should include the type of wood,

dimensions (esp. width and thickness in mm), lath fixing centres, and the gaps between laths. The bond between the laths and the ceiling structure should be confirmed. The condition of the plaster should include an assessment of hair content, and the thickness, number of coats and composition of the original plaster should be determined, and used to inform any repair work necessary. It should be possible to preserve much of the original ceiling plasterwork currently showing cracking and detachment from the ceiling by re-fixing using a minimal intervention approach.

Where existing lath and plaster ceiling to be repaired or replaced use new timber laths and two coat lime plaster with animal hair and skim coat, all to match existing. Cut back and remove all unsound or rotten laths. Carefully remove a further 250mm of sound plaster to expose existing sound laths to facilitate stitching in of new laths. New lime plaster skim coat over entire area of new and old plaster. All timber laths to be exposed from floor void above and debris between joists to be removed by hand to ensure no damage to plaster keys, Hoover thoroughly.

#### 12.4.6 Existing lath and plaster ceiling requiring consolidation

Carefully examine from below all existing ceilings to establish unbounded and unsound areas. From above remove all timber skirtings and floor boards. Carefully remove by hand all debris. Hoover thoroughly. Insert tie wires (size 7-10 strand wire) with patent disc to underside and pull tight through clip were strapped between joists above. Provisional allowance of 6 No per sq m. Make good lime plaster finish below. Apply lime plaster skim coat over entire ceiling.



### 12.5 Historic Windows

#### 12.5.1 Inspection / testing

A wire brush should be used to test paintwork, and a scraper to check if metal fittings or fixtures have rusted. Hinges, stays and catches should be methodically checked.

#### 12.5.2 Maintenance / Repairs

A hot air gun should not be used to remove paint as this could cause damage to the glass. Mechanical / chemical methods of paint removal are recommended where there is no historic glass and no layers of lead paint. A mini-grinder or rasp should be used to remove paint build up, and a wire brush or drill with brush attachment should be used to remove light rust. Where work is done in situ, care must be taken to protect adjacent materials.

Once exposed and cleaned, an appropriate rust primer should be applied before application of an undercoat and top

coat to seal surfaces and putty. Paint should be applied in a dry atmosphere. Repairs necessary other than the above to restore function to opening sections should be carried out by a specialist. The principle of minimum intervention should be followed in regard to repairs to glass. Any repair to leaded glass panels should be carried out in situ where possible.

Protection / protective mechanisms: Where new protection is required to protect glass from breakage or damage, it should be provided in a way that is reversible and as unobtrusive as possible. The protection should not cause damage to the window or surrounding fabric.

## 12.6 Ironwork: Wrought / Cast

### 12.6.1 Removal of paint and rust

The methodology below is applicable to both wrought and cast iron:

- A sound surface must be prepared involving the removal of old failed paint, rust, loose particles, grease and any soluble corrosion salts.
- All work should be undertaken by hand, or by steel wire rotating brushes on very low power. Care should be taken not to scour the metal surface. Manual preparation will not remove all rust particles and all further steps outlined below should be undertaken.
- The entire metal surface should be gently washed with warm water and detergent to remove any grease, followed by thorough rinsing.
- The stonework and any adjacent glass not requiring replacement should be carefully masked.

- Any paintwork which is loose, perished or flaking should be removed. It should not be necessary to remove all paintwork, unless the paintwork is found to have failed completely with rust found to the surface underneath.
- The surface of the corroded ironwork should be cleaned using scrapers and steel wire brushes.
- The paintwork covering the corroding iron elements should be removed to expose the extent of the rusted areas underneath.
- Areas of failed OPC (ordinary portland) cement based repairs should be removed if it is feasible to do so without damaging the stone or brick and iron fabric.
- The joints should be cleaned back using a bronze / stiff bristle brush.

### 12.6.2 Repair

While the iron may appear burnished and clean after scraping and brushing, some rust particles will remain. A rust converter is a liquid which when applied to unstable iron corrosion products, converts them into stable compounds. These products are in common use for car repair. There are three main categories currently available:

- Grey-coloured. These are orthophosphoric acid-based rust converters, converting iron oxides into grey-coloured stable compounds.
- Blue-black coloured. These are tannic-based converters. Owing to the proximity of stone or brick elements, and the risk of staining of stonework – BLUE-BLACK COLOURED CONVERTERS SHOULD NOT BE USED.
- Silicate based converters forming goethite and magnetite.

- The grey-coloured rust converter should be used. The components and manufacturer's instructions should be carefully examined and followed. A trial should be carried out on a loose piece of rusted metal to test before general application. Application of the rust conversion system can then be followed by a standard paint system.

### 12.6.3 Paint

It is advisable to select a complete standard metal painting system using the recommended specific combinations of primers and finishing coats from one manufacturer. It is advised to use the entire system to avoid incompatibility between coats. Red lead primers, if available, should be used. Two coats of primer should be applied, followed by two or more finishing coats as recommended by the manufacturer.

### 13. Conservation Impact Assessment

#### 13.1 General overall impact

The impact of the recommended works described in sections 10, 11 and 12 on the significance outlined in paragraphs 6.5 and 6.7, is considered in this section. The works recommended in this report have all been carefully specified to secure the heritage value of the structure, to enable the introduction of new uses to the buildings and to enhance the long term contribution of these heritage buildings to the development of Clondalkin village over the coming years.

No. 16 Tower Road and 2-3 Millview cottages have been disused for a period of time prior to their transfer to South Dublin County Council's ownership. The long years of vacancy and neglect has caused deterioration within these structures. Furthermore number 1 Millview Terrace was set on fire due to vandalism. No. 15 Tower Road is currently in use as an English language training and advice centre. No. 1 Millview has been used as a residence up until comparatively recently (approximately 2009). Therefore the site, in relation to its central urban location, is severely underused.

All the buildings on site have been identified as being of architectural and historical significance and they will be retained and adapted to suit the new use. The revitalisation of this site while preserving and integrating the significant historic layers in a meaningful manner will ensure the architectural and urban heritage of the site is retained.

The project proposes the utilisation of most of the existing open space for a public and semi-public garden as specified in the current development plan for the open area surrounding the tower to the north and northwest. The existing protected structures on the north and north-eastern end of the site will be adapted to accommodate a new visitors' centre with auxiliary functions, such as multi-purpose theatre, cafe and shop.

The new structures will be structurally independent from the protected structures, thus allowing for future reversibility. The impact of the works can be summarised as follows:

- Short Term Stabilisation Works: Minimal
- Long term Monitoring: Insignificant

This section is explained in two ways: the impact of the short, medium and longer term works on the structures and building elements, and the impact of the works on each building or group of buildings. The impact of the works on the structures and building elements is described in paragraphs 13.2 to 13.6 inclusive. A summary of the impacts on each structure or building address is in paragraph 13.7.

#### 13.2 Immediate stabilisation works (2014)

##### 13.2.1 Drain down water tanks and plumbing systems

This would eliminate current risks where leaks occur and remain undetected over an indefinite period causing further damage to the building fabric.

##### 13.2.2 Patch repair fibre cement roof slates

This is to improve the quality of some of the existing repairs and address other areas of loose slates. It will improve the integrity of the weather protection and reduce water penetration of the external envelope over a short-term period.

##### 13.2.3 Patch, repair, or replace damaged pvc rainwater goods

This will reduce water penetration of the external envelope.

##### 13.2.4 Temporary protection to the damaged brickwork

Temporary protection to the damaged brickwork of the chimney above number 16 and to the damaged door head or soffit at the back of house number 1 will have the following impacts. It will secure the damaged brickwork on a temporary basis. The work is to be carried out with minimal damage to the surrounding stone walling. It will reduce the health and safety risks associated with stone collapse at high level, and maintain on a temporary basis the integrity of the wall until full replacement of these windows and reconstruction of the chimney is undertaken as part of the recommended short term works.

##### 13.2.5 Partial repair of masonry following demolition

The taking down and/or partial repair of masonry where annex and extension walls abut the rear elevations of houses

numbers 2, 3 and 16 will have the following impacts. This will reduce water penetration and enable drying out & recovery.

#### 13.2.6 The removal of rusting, ferrous, embedded objects

The removal of rusting, visible large iron pins and fixings which are partly embedded in masonry will have the following impacts. These works will remove rusting cast iron fixtures from the external stone and brickwork, reducing the damage caused by the gradual expansion forces generated by corroding iron. There is risk that removal will cause damage to the brickwork but this would not be of architectural significance.

#### 13.2.7 Removal of vegetation and treatment with biocide

This will remove live vegetation, which is actively damaging the built fabric of the houses and the boundary wall along Tower Road in an aggressive manner.

#### 13.2.8 The fitting of framed wire mesh to each window opening

The fitting of wire mesh guarding to all window opening sections, leaving all windows open to maximum extent will have the following impacts. The purpose is to optimise the natural ventilation and encourage drying out while protecting against pigeon access.

#### 13.2.9 The fitting of grilles and blocking of holes

The restriction of vermin access, blocking of holes and the fitting of missing floor vent grilles will have the following

impacts. These minor preventative measures will enhance the recovery of the building fabric.

#### 13.2.10 Temporary wireless fire and security alarm systems

The installation of temporary wireless fire and security alarm systems will have the following impacts. These wireless installations will involve minimal damage to surviving building fabric and will enhance significantly the protection of the structure.

#### 13.2.11 Installation of temporary emergency lighting

This installation will involve temporary surfaced fixed wiring which will not impact on the structure.

#### 13.2.12 Testing of the existing drainage pipes

The testing of the existing foul and storm drainage pipes and repair as required will have the following impacts. This will reduce the risk of leaks and flooding.

#### 13.2.13 Environmental monitoring

Environmental monitoring by regular inspection, and also possibly with the use of Data loggers would have the following impacts. It is essential that the internal environment is regularly inspected, ideally by the same personnel, to ensure that the conditions within the buildings are improving and to monitor the effects of the seasons. The installation of the data loggers is suggested and could also be considered. They would cause minimal damage, can be discretely

positioned, and would provide the most accurate scientific observations for the on-going conservation of the building fabric.

#### 13.2.14 Repairs to chimney tops

The removal of the failed brickwork from the most severely affected chimney tops and replacement with new to match existing with new lead flashings throughout and installation of a new lime mortar flashing fillet on the upper surface, as a secondary means of directing rain water off the chimneys will have the following impacts. This is one of the most significant interventions which will remove a serious cause of water ingress and damage to the building fabric. It would be preferable to have this work undertaken along with the re-roofing of the building. However, these works cannot be delayed, and must be undertaken independently of the re-roofing if necessary.

#### 13.2.15 Removal and replacement of the failed brickwork

The removal and replacement of the failed brickwork from the opening at the back of house number 1 and replacement with new to match existing will have the following impacts. This will remove architecturally significant elements which are damaged beyond repair and are a serious safety hazard. Replacement with new to match existing will restore the visual appearance of these features.

#### 13.2.16 Partial re-pointing of the boundary wall

The partial re-pointing of the boundary wall along Tower Road will have the following impacts. This will remove the localised OPC mortar repairs which are currently causing significant damage to the stone and brickwork. The new lime mortar will allow moisture to evaporate more easily from the joints without damage to the stone.

#### 13.2.17 Increase of attic ventilation with patent slate vents

These vents are proposed on the hidden slopes of the roofs – the southern slope of the existing roofs above numbers 1, 2 and 3, and the northern slope of the new extension - and will not affect the appearance of the new building or the original houses. By increasing ventilation they will contribute to the drying out process and to the health of the buildings in general.

#### 13.2.18 Monitoring of structural cracking

The structural condition report identifies structural cracking in the party wall between numbers 1 and 2 Millview Terrace. On removal of the covering plaster, the proposed monitoring of the crack will inform the timing of the proposed repairs and if necessary bring them forward.

#### 13.2.19 Roof repairs and replacement comprising

- Re-roofing of all five roofs with natural slate to match the pattern and coursing of the slates as exists at present and to re-use as much salvageable material from the existing roofs as is possible.
- New lead or copper flashings & valley linings

- New valley boards and supports and replacement of sections of rotten wall plates, rafter and truss ends.
- Roof void ventilation: These works will restore the visual appearance of the building and provide secure and robust external weather protection for the foreseeable future. Ventilation of the cold space is to be provided above the line of any new insulation.

#### 13.2.20 Replacement of rainwater goods and work to drains

The new cast iron rainwater goods, informed by surviving historic details will restore the external appearance of the building and provide robust and long lasting protection. The repairs to the surface water drains will ensure surface water is appropriately removed from the vicinity of the building. The installation of a land drain and gravel border will improve the environmental conditions at the base of the building, and reduce rising dampness and allow moisture a more free passage out of the rising walls.

#### 13.2.21 External Walls

The works comprise local:

- Re-pointing with lime mortar
- Repair to brickwork
- Replacement of limited failed stonework
- Removal of all redundant cables
- Cleaning of pigeon soiling

These works will remove all the OPC mortar which are causing damage to the stones of the boundary wall. The new lime mortar will allow moisture to move more freely out of the

mortar joints, reducing stress in stones, and allow the wall to perform as designed. The replacement stonework is limited and is to match existing, which will have minimal impact on the visual appearance of the boundary wall. The stone repairs will be invisible. Any cleaning of mosses, algal scums and other low grade organic colonisation will be local and will be done with a nylon bristle, wire brush which would cause minimal aggressive mechanical damage to the substrate while removing a good amount of nutrients and dirt.

#### 13.2.22 Removal of block work in the built-up windows

The removal of block work in the built-up windows where annexe extensions will be removed (described above) will have the following impacts. This will restore the appearance of the rear elevation to its original condition and appearance.

#### 13.2.23 Temporary repair of roofs

The temporary repair of roofs where annex blocks will be demolished will have the following impacts. This will reinstate the original roof eaves detail and restore the visual appearance of the south elevation of numbers 2 and 3 and the western elevation of number 16.

#### 13.2.24 Interior Floors

The proposed works comprise:

- Lifting all floor boards, structural timber repairs and their replacement
- Reinstatement of all salvaged floorboards. Where the amount of salvaged floorboards is insufficient, the salvaged

boards to be used to cover complete rooms and new material is to be used for the balance.

- Removal and replacement of ground floor substrate. The removal and replacement of the replacement ground floor is not significant.
- Possibly underpinning of the foundations to the rere wall of house numbers 1 and 2 where the party wall within has cracked. Any underpinning of foundations that might be needed will be invisible. This intervention would ultimately be guided by the advice of a structural engineer.

#### 13.2.25 Services

Remove and replace all existing mechanical & electrical services. The existing services are of no interest. Notching of joists is to be avoided. This approach will ensure the integrity of the main building fabric. The use of chasing to conceal new services to be assessed by the conservation architect after removal of failed plaster to ensure chasing is used only where suitable and unnecessary damage is avoided.

#### 13.2.26 Features

Retain the sole existing fireplace in house number 1 and the more valuable or significant wallpapers that may exist in all five houses. These would be examined by an expert and if parts are worth of conservation and retention, these could be removed and mounted in a frame and displayed on the wall following the repairs to plasterwork mentioned previously.

#### 13.2.27 Internal Joinery

The three surviving old internal doors (house numbers 16 and 3), the sash windows of house numbers 1, 2 and 3, the sound fragments of skirting board and dado rail in house numbers 1, 2, 3 and 16, and the sole surviving sash window in the blocked up opening in the rere façade of number 16. These are among the few details of the buildings' interiors, which survive and which are worthy of preservation and retention. Their retention and conservation will enhance the historic value of the structure. The houses typically contain few decorative details because of their construction as housing for (probably) tenanted workers in the mills and as a result of gradual removal and incremental alteration of any early or significant joinery during the 180 or so years of occupation and habitation of the buildings. The existing joinery is a mixture of replacement elements over the years and is, for the most part, of little significance. Replacement of almost all joinery, with the notable exceptions outlined above, will not have a negative impact on the building's significance and is considered appropriate to accommodate a new use of the buildings and to secure the long term survival of the structures.

#### 13.3 Monitoring

Continued regular inspection and environmental monitoring for a period of two to three years will enable the progress of recovery to be assessed and local intervention if necessary to address any issues arising. It will inform the long-term maintenance regime.

#### 13.4 Reinstatement recommended

The reinstatement of replicas of the original sash windows in the remaining original window openings at the front of house numbers 15 and 16 Tower Road will be as follows. The reinstatement of the correct six-over-six glazing pattern timber sash windows in the original openings – not those which were later blocked up, or new window openings which were inserted in what was blank wall, or previous ground floor level window openings which were converted to door openings. The window design and detail would be based on photographic evidence (Figures 4.84 A - D), although it is noted that the nature of the information is limited – for example the precise horn detail, glazing bar thickness is not clear from the existing photographs and can only be guessed at by comparison with similar period details from other buildings. It is proposed that the later window openings would be fitted with a replica of the later window, the two-over-two sash, to match the sole surviving window in the blocked up opening at the back of number 16.

#### 13.5 The impact of the works on the buildings

##### 13.5.1 The round tower

Potential construction impacts on the round tower include damage to historic structure and fabric of the tower during excavation works.

Mitigation Measures: Constant monitoring of vibrations during excavation works and construction work will be carried out along with monitoring of the structural fabric of the tower in consultation with and to the requirements of the DAHG / OPW Conservation Architect

### 13.5.2 The boundary wall along Tower Road

The removal of part of the previously blocked up gateway or section of wall opposite the church yard entrance, approx. 0.7 meter in length: The careful removal of this portion of the wall near the tower, and any portion of the wall along Tower Road, will be carried out by hand. This portion of the wall dates back to the second half of the nineteenth century. It has no structural importance unlike the buttress ring to the base of the tower. Its removal will not detract from the character of the tower as both the wall and the tower base are constructed of rubble stone.

Mitigation Measure: careful removal of this portion of the wall is to be carried out in line with the conservation guidelines set out in this Conservation Report. This will be carried out in consultation with and to requirements of OPW Conservation Architect and DAHG.

### 13.5.3 The rear of 1-3 Millview Terrace

The composition of the rear facades of nos. 1-3 Millview cottages was never architecturally designed when compared to the architectural treatment that the front facades received. From the cartographic evidence it would appear that the houses originally had no back gardens and that the rear facades were not meant to be seen. The internal layout of the houses were mainly oriented towards the north (front) and very few openings were made in the rear facades and these were generally very small. By the mid-twentieth century most of the ground floor level of rear facades were

cluttered with small, lean-to annexes and extensions, accommodating modern conveniences, such as toilets and kitchens. These facades were not considered important enough to be designed elevations, rather they developed organically, openings made for light and ventilation a necessary. The proposed location of a two-storey, new-build, exhibition block connected to Millview Cottages with a timber framed glass circulation corridor will not detract from the architectural value of these cottages as their value is mainly concentrated within the front elevations.

Mitigation Measure: Full recording of these structures to be carried out before the commencement of any removal works. Repair works to structure and fabric to be carried out as per the guidelines set out in this Conservation Report.

### 13.5.4 Works to the interiors of 1-3 Millview Terrace

The proposed works to the interiors of these buildings is quite radical, their successful execution and detailing will add an existing architectural layer that will make them more suitable for the proposed new use. The steep old stairs will be cleared, small flimsy partitions will be cleared, new wall openings will be created within the existing party walls and within the sides of the existing chimney breasts. Upper level timber partitions will be all removed.

It is also proposed to remove the existing timber floor plate at first floor level to nos. 1 and 3 Millview Cottages to accommodate a structurally dependant bridge connection that will assist in resolving the different floor levels between the existing buildings of Tower Road and Nangor Road and

between existing buildings and new and which will create two double-height spaces within the otherwise small rooms of these houses.

There are no decorative features within these former houses nor is there any decorative joinery work. All the proposed works of creating new opening, enlarging existing and removal of floor structure will only involve the removal of general wall fabric.

Mitigation Measures: the houses are to be fully recorded prior to commencement of works. Repair works and protection to the historic structure and fabric should be carried out in accordance with the guidelines set out in this Conservation Report.

### 13.5.5 Works to numbers 15 & 16 Tower Road

No. 16 is disused and no. 15 is used as training centre. The project will restore both buildings to accommodate the new use with minimal changes to the exteriors. General external repair works to front façade and rear façade will be carried out, like the insertion of historically accurate timber sash windows and door sets. Internally, the two houses will be used as the street fronted commercial aspect of the development, housing a shop in the ground floor of numbers 15 and 16 and new main entrance at the site of the former Dispensary at the southern end of number 15. The logic of the proposed demolition of the single storey extension to the south of number 15 is explained in paragraph 15.1.1. New openings will be made in the party walls and on either side of the existing chimney breast walls to allow for better

circulation and the accommodation of these new uses and also to accommodate universal access for people of different mobility abilities. The work will also involve manipulation of the existing floor level to match with the existing street level and the existing floor level of 1-3 Millview cottages. There will be a potential impact on the structure of these two former houses, due to the creation of large openings within party walls and chimney breast walls. This will have an impact on the original internal layout of these buildings. However, it can be argued, that the original layout is very simplistic and that the retention of any portion of the chimney breast or party walls will still help depicting the original layout of these buildings. Furthermore the interiors of number 15 have already been altered.

**Mitigation Measures:** The houses are to be fully recorded prior to commencement of works. Repair works and protection to the historic structure and fabric should be carried out in accordance with the guidelines set out in this Conservation Report, in relation to creating new openings and the treatment of new ground floor slab

### 13.5.6 The relationship between the round tower and the church

Brian Lalor, in his book, "The Irish Round Tower", states that the relationship between the round tower and the church is manifested physically by having the round tower within the inner enclosure and by the orientation of the round tower's door towards either the chancel in the church, or the western entrance to the church, the tower generally, but not always, being slightly to the south-west of the church. In Clondalkin,

the original relationship between the tower and the church was altered when the medieval church was replaced by the current St. John's church in 1789 by changing the original orientation from east-west to north-south. Previously the door into the tower faced the chancel of the church of St. Mochua but now it faces the western entrance of the church of St. John. Unlike many surviving monastic sites in Ireland, the round tower in Clondalkin is more like a stand alone tower beside the road.<sup>52</sup>

The proposed development within the vicinity of the tower will not restore the clarity of the original physical relation between the tower and church. However, the proposed development is designed to bring the tower back into the centre of a visitors' centre despite its edge position. The circulation within the garden of the proposed development will allow people to approach the tower from the west and to appreciate it from different angles. The position of windows in the new building have been designed to prioritise a view of the tower. The soft landscape design of the open area to the north and northwest of the tower will highlight the centrality and the cultural importance of the tower.

In the longer term South Dublin County Council may consider the possibility of closing part of Tower Road to vehicular traffic to minimise the risk of impact by a large vehicle on the round tower itself, and to re-establish the importance of the connection between the sites of the round

<sup>52</sup> "Clondalkin, From Generation to Generation", pg. 62 : "Until 1760, it was part of the church enclosure, but, in that year, Tower Road was built, thus dividing the tower from the church.". Also Joe Williams in his book "St. Mochua and the Round Tower" records on page 8: "'Tower Road, which separates the round tower from the church, probably resulted from the upgrading of a pathway between the north and south entrances to the enclosure."

tower and the church. Arup Associates have been commissioned by the National Transportation Authority and by South Dublin County Council to evaluate traffic circulation in the village with a view to reduce unnecessary through traffic and a longer term ambition to remove through traffic from Tower Road altogether.

### 13.6 Planning Compliance

This section of the report addresses the conservation stabilisation works proposed in Section 7. It does not relate to further works, which will be required in association with proposed new use. These will be the subject of a separate public consultation process under Part VIII. The planning requirements of the proposed works can be summarised as follows:

- Short term Stabilisation Works: Generally exempt maintenance works. All of the works will require prior consultation with the conservation officer..

### 13.7 Impact of the proposed works on buildings outside the proposed development site

This section will give a brief description of buildings within the surrounding area of the site that contribute to the physical character of the overall area.

- *St Lawrence, Tower Road, built c. 1940s.*
- *Towerville, Tower Road, built c. 1850s.*
- *St John's Church (C of I), built 1789.*
- *St. John's Cottage, Tower Road, built c. 1879.*
- *Clondalkin's National School, Tower Road, built c. 1870.*
- *Riverside Cottages, Nangor Road, built c. 1800s.*
- *Former mill pond & weir, built c. 1800.*



Fig. 13.1. An aerial view of the proposed development site and the surrounding area. Those buildings within the surrounding area of the site that contribute to the physical character of the overall area are identified individually. (Source: The website [www.bingmaps.com](http://www.bingmaps.com), access on 04.02.2014)

### 13.7.1 St Lawrence, Tower Road

A detached three-bay, two-storey, west facing house, built c. 1940s, with a projecting two-storey high front gable to the southern bay with projecting splayed bay windows. The houses has been extended with the addition of a single-bay two-storey flat roofed extension to the north. Hipped natural slate roof with a pair of rough-cast rendered chimney stacks to south and north. Rough-cast rendered wall throughout. The main entrance is set within a hipped projecting entrance porch with a large circular archway, the main entrance is square-headed with glazed side lights and timber door set. The house is lit by square-headed window opening with rendered reveals and timber casement windows. The house is set back from the road and bound to the front by rough-cast render low rise wall tipped with rendered coping.

The house is not listed on the Protected Structure Record of South Dublin County Council Development Plan 2010-2016. This house forms an attractive mid twentieth-century detached house of substantial size contributing positively to the varied streetscape of the eastern side of tower Road. It forms the end of a series of low rise, two-storey high detached, set back structures that dot the eastern side of Tower Road.

### 13.7.2 Towerville, Tower Road

A detached five-bay, two-storey, west facing, rough-cast rendered house, built c. 1850s with a pitched projecting front entrance porch. Double-pitched roof finished in natural slates having a pair of rendered chimneystacks to gable ends and

cast-iron rainwater goods. Rough-cast rendered wall with a smooth rendered plinth. The house is entered through a square-headed door opening within the wall of the porch. The house is lit by square-headed window openings with rendered reveals and rendered stone cills with intact early single pane timber sash windows retaining some early cylinder glass panes. The building is set back from the road and bound by rubble-stone wall topped with flush crenellated coping.

This is a substantial, elegant, mid nineteenth century house with its intact façade composition and architectural features. Its size is a reflection of the status of the original owner, Mr. William Caldback of the near by Moyle Park House. The house is not listed on the Protected Structure Record of South Dublin County Council Development Plan 2004-2010. It has been given a Regional Importance rating by the NIAH.

### 13.7.3 St. John's Church, C of I church, Tower Road

Detached four-bay, Church of Ireland church with a three register square-plan tower to the northern gable and a pitched projecting chancel to the southern gable, built c. 1789, replacing an earlier medieval church on site. Double-pitched roof finished in natural slates with cast-iron rainwater goods.

Rough-cast rendered walls throughout. The church is entered through a round arched door opening located within the western side of the tower. The church is lit by round arched window opening to nave with diamond-paned timber Y tracery. The chancel is lit by triple lancet window. The

church is set back from the road within its own grounds having a graveyard to the south and southwest with grave stone dating to medieval times. The church grounds are bound by rubble boundary walls with rectangular gate piers opening onto Tower Road.

This modest Church of Ireland church along with its surrounding grounds, embody the historical start of Clondalkin from its early form as a medieval monastic settlement, which eventually grew to a village with houses and industrial mills to modern day Clondalkin Town forming part of Dublin suburbs. The church is listed on the Protected Structure Record of South Dublin County Council Development Plan 2004-2010.

### 13.7.4 The former almshouses, Church Terrace, Tower Road

A group of three terraced two-storey, two-bay to three-bay houses, built c. 1879, with squared rubble limestone walls built to courses with a hipped pitched roof having hipped dormer windows at first floor level running across the eaves line, with later single-storey lean-to extension to the northern and southern façade. The group is lit by square-headed window openings with rendered reveals and stone cills, with intact early and original two-over-two timber sash windows with ogee horns.

Each house is entered through a square-headed door opening set beneath a small timber canopy, having early timber door sets. This group of building is set back from the road with a soft landscaped front area and bound to the front

by low rise rubble-stone wall topped with crenellated flush coping with early wrought iron gates leading to each house.

This group of buildings is listed on the Protected Structure Record of South Dublin County Council Development Plan 2004-2010.

#### 13.7.5 Clondalkin National School, Church Terrace, Tower Road

Detached three-bay, single-storey with attic former National School of Clondalkin, built c. 1870 with a gabled single-storey projecting front central bay forming a large entrance porch to form an over all L-shaped plan. Currently used as a classroom building.

Pitched, natural slate roof with comb-style terracotta ridge stone with stone gable end coping. The original stone chimneystack was located within the projecting front porch, which has been removed probably when the roof was renovated. The walls are finished with ashlar limestone quoins and limestone dressings to openings. The building is lit by pointed arch heads with uPVC window casements with quatrefoil windows to attic gables to the south and north.

This school building forms part of a group of modest detached and set back structures that line the eastern side of Tower Road, giving it a distinctive character that is not repeated in any other roads within Clondalkin Town centre. The school building is listed on the Protected Structure Record of South Dublin County Council Development Plan

2004-2010. It has been given a Regional importance by the NIAH.

#### 13.7.6 Riverside Cottages, Nangor Road

A modest group of buildings with intact setting and front façade composition set at an angle to the curved road that approaches the town of Clondalkin. The group is composed as follows: a five-bay, two-storey, pitched roof, rendered house, dating to c. 1800s, former constabulary building. Pitched artificial slate finished roof with rendered chimneystacks to each gable ends. The building is lit by square-headed window openings with modern uPVC windows. The main entrance door to front façade is square headed with side lights and an over light. Set back from the road and fronted by a landscaped front garden and low rise rendered boundary wall. This building was damaged by fire in 2012 and its condition has deteriorated since; it has been vandalised, windows smashed and the ground floor window and door openings have been boarded up. Its future is uncertain at the time of preparing this report.

Beside it, there is a three-bay, two-storey hipped roof house with a round head carriage archway to the western end of the front façade, built c.1800s probably as part of the former mill complex. The carriage arch gave access to a large rear yard that was lined to one side with mill related cottages. Hipped roof with natural slates and modern terracotta ridge tiles. Rough-cast rendered walls. Square-headed window openings with uPVC windows and uPVC door set for the main front entrance.

The five-bay building is listed on the Protected Structure Record of South Dublin County Council Development Plan 2004- 2010, however the three-bay structure with carriage arch is not on the Record of Protected Structures.

#### 13.7.7 Former mill pond & weir

Remains of a Mill Pond and Sluice that once belonged to Sallypark Paper Mill that occupied the eastern bank of the Mill Pond. The mill pond appears on the 1816 map of County Dublin as part of a Gun powder mill complex which was later reused as a paper mill in the 1830s.

The pond, sluice and all the remaining elements of the former paper mill complex that occupied this site form part of a substantial industrial heritage of Ireland that dates from the early years of eighteenth century until the early years of twentieth century. The mill pond is listed on the Protected Structure Record of South Dublin County Council Development Plan 2004-2010.

#### 14. Statement of Significance

The round tower site in Clondalkin Town Centre is architecturally, historically and archeologically significant for the following reasons:

- Religious importance: It represents the centre of Clondalkin's existence as a town from its emergence as a monastic settlement in medieval times located on a early Christian route walked by pilgrims and saints.
- Historical and architectural importance which are embodied by the Round Tower of Clondalkin, where there are only 73 round towers surviving to date in Ireland and the tower in Clondalkin is described as the narrowest tower of all the ones in existence in Ireland.
- The landmark importance of the Tower as the town's icon.
- The partially intact group of buildings, Millview Terrace, dating to the first half of the nineteenth century are a modest example of village houses, retaining some of their modest architectural features and modest internal layout.
- It forms part of the industrial significance of Clondalkin in being part of the land that used to house the Sallypark paper mill lower. A path running by the round tower is showing on the second edition ordnance survey map which gave access to the mill structure from Tower Road.

The importance of the site in terms of its strategic location at the junction of the historic village, the large swathe of

amenity lands, the civic or administrative centre and the emerging new town centre with associated mixed uses and metro stop.

- The potential of the site and buildings, through appropriate repair and new use, to act as a fulcrum between past and present and to enhance the cultural life of Clondalkin.
- The importance of the site strategically as a link between the major thoroughfares of Nangor Road and Tower Road and the comparatively backland sites of the leisure centre, routes to the park and the heritage sites to the west of the village

## 15. Design Statement, a description of the proposals

A summary description of the proposed works to each structure follows.

### 15.1 The existing buildings and proposed works

#### 15.1.1 Number 15 Tower Road

The existing four-bay two-storey semi-detached building dates back to the very early nineteenth century. It has been extensively altered internally and externally; internally it used to be composed of two separate units that were merged at some time during the twentieth century by creating door openings within the party walls. The original timber staircase was removed and replaced by modern one. Externally, one of the existing window opening converted to door opening and vice versa as explained in Figures 4.80 & 4.81. Similar to other vernacular style houses of the early nineteenth century, this house was not heavily decorated, there are no cornices or over ornate timber joinery. The ceilings at ground and first floor levels are approximately 2500mm high and were approximately 3500mm high at first floor level. The house has a later single-storey, hipped extension to south façade accessed through a square door opening. The building is currently in use.

It is proposed to mainly retain and repair the main building envelope as it presently exists. The main exceptions are the artificial fibre cement roof slates and the sand and cement render. The later single-storey side return and the single-storey hipped roof extension will be removed and replaced

with a new single-storey flat roofed structure that will house new main entrance, which will be slightly greater than the existing structure. The existing structure is probably modern and of little significance. The new south side extension will be contemporary in design and finished with a roughcast lime render and seamless floor to ceiling glass windows to eastern façade (road frontage) and to western facade (garden frontage). Access to the extension will be through the new structure to the south of no. 15.

The ground floor level of no. 15 will be used as circulation distribution area giving access to the shop within ground floor level of number 16 Tower Road and to the café extension (mentioned above) and to the main visitors' centre reception area. The central chimney breasts and dividing walls will be removed at ground floor level and mostly retained at first floor level, to accommodate an emergency escape stairs.

It is also proposed to create several openings, or widen existing openings in the rear façades of numbers 1, 2 and 3 Millview Terrace at ground and first floor levels. This intervention will only involve the removal of general wall fabric which is reversible.

The original layout of this structure within its ground and first floor level will be extensively altered. This structure has already undergone extensive alterations in the 20th century internally and externally. The historical and architectural importance of this building is mainly embodied within its external envelope which has a positive contribution to the character of Tower Road. The external envelope will be retained and repaired - principally by removing the sand and

cement render and reinstating the roughcast lime render.

The flow of space between the historic part of no 15 and the new café extension at ground floor level will be enhanced by these works.

As stated previously, it is proposed to demolish the single-storey hipped-roof extension to the south of number 15 Tower Road, formerly the site of a Dispensary. Although the form and outline of this building closely resembles the Dispensary of the second half of the nineteenth century, shown also on Bartlett's print (Fig. 4.41, page 47) it is almost certainly a modern building. Figs. 6.27 and 6.28, page 76, and Fig. 6.5, page 72 show the wide window openings, relatively thin external walls and modern finishes and joinery. Also the aerial view of the village in Fig. 4.46 A, page 49 shows this building entirely stripped of its roof, possibly being re-built. Therefore this is not considered to be as significant as the main body of number 15 Tower Road and its demolition will allow a new entrance to the proposed new visitors' centre to be built in its place.

#### 15.1.2 Number 16 Tower Road

The existing three-bay two-storey semi-detached building dates back to the very early nineteenth century and retains more of its front façade composition than number 15 (one door opening has been blocked), and roof profile and natural slate covering. The interior has been extensively renovated in the second half of the twentieth century mainly through the introduction of new floor and wall coverings, new door openings, new fire places and new staircase. There is a long lean-to extension that spans the length of the rear façade,

which was added in the middle of twentieth century. The building retains its early 20 century door sets at first floor level and one surviving early timber sash window to rear façade at ground level. It has been vacant for many years. This prolonged disuse coupled with deterioration of roof fabric is causing water ingress. Missing and slipped slates can be seen to the northern hip of the roof causing water penetration and internal fabric deterioration. The sand and cement render may be a factor in this by limiting the normal movement of moisture.

It is proposed to retain and repair this building as it presently exists, including the retention and repair of the existing wall fabric, roof structure and finishes, brickwork and any surviving early timber joinery such as windows and timber sheeted door sets. The later rear return or extension will be removed, the existing rear window opening with two-over-two timber sash window will be retained while the existing door opening leading to the modern return will be enlarged to create a large seamless glass window to ground floor rear façade overlooking the proposed landscaped area to north edge of the site. It is also proposed to create a large door opening within the party wall between no. 15 & 16 Tower Road. The central chimneybreast will be retained at first floor level, but removed at ground floor level. All the wall removal work within this structure including the creation of new door openings will only involve the removal of general wall fabric as there are no decorative architectural features anywhere in the building. As per number 15 the existing sand and cement render will be removed and replaced by a new lime roughcast render.

### 15.1.3 Numbers 1-3 Millview Terrace, Nangor Road

This is a group of three terraced two-storey houses dating to around the 1830's with extensive façade and internal alterations dating to the turn of the twentieth century. Set on an east-west axis spanning from the rear façade of no. 15 Tower Road towards the west. The buildings are set back from Nangor Road and fronted by deep gardens with rendered low rise separating and a rubble stone wall to the west of no. 1.

Each house is mainly composed of two rooms at ground floor and two rooms at first floor with a central chimneystack within the separating wall. The main entrance location varies from house to house; it is located within one of the ground floor rooms to no. 1 Millview, while in nos. 2 & 3 Millview, the main entrance door accesses a small lobby to the north side of the chimneybreast. The vertical circulation in each house is located against the party wall within one of the ground floor rooms.

The upper floor level is also composed of two rooms with the central chimneybreast acting as a separation element. The first floor landing is narrow and runs along the rear façade with only one window opening to rear façade located at nos. 2 & 3 Millview Terrace. All the first floor rooms face north.

Nos. 1-3 Millview Terrace have varied sizes of small single-storey lean-to extensions to rear façades dating from the mid twentieth century. All three buildings are vacant. Externally all the three cottages have been extensively renovated when the first floor level was added, probably at some time around

the 1930's, original ground floor openings were re-configured where some windows were turned into door openings and existing door openings turned into windows or blocked up.

The original simple internal room layout has been slightly modified by opening up door openings between the rooms. There are some early twentieth century fire places in no. 3 Millview. No. 1 Millview has suffered severe damage due to neglect and the recent damage caused by fire.

The overall internal layout will be retained within nos. 1 & 2 Millview. No. 3 Millview will be incorporated as part of the main reception area which spreads towards no. 15 Tower Road through a large opening within the party wall and towards the new linear structure that runs to rear façade of nos. 1-3 Millview. Part of the first floor plate to No. 2 will be removed to create a double height space in which a large artefact such as a replica high cross could be displayed.

In 1 & 2 Millview, the two-room down and two room up internal composition will be mostly retained but the small narrow corridor at the rear first floor will be cleared. Door openings within the party walls and at the side of the chimney breast will be created to allow for a circulation flow.

### 15.2 The new structures

The new extension, single-storey, parallel to the rear facades of nos. 1-3 Millview will contain an exhibition space, café-serverey, public toilets, plant room, and storage area at ground floor level. A narrow staircase, lift and corridor slip will connect the extension with the existing buildings at Millview and 15 Tower Road. The lift will provide universal

access to both floors. The narrow staircase, corridor and lift slip will be clad with profiled metal. It has been designed to allow access to the first floor rooms of the five houses and to minimise disruption of the roof profile. The slip allows access to each room without the need to provide a corridor within the first floor rooms themselves. This is advantageous because it frees up these small rooms for public use and avoids the need to design the circulation space that would otherwise encumber them to the legislative minima.

The external upper face or roof of the lift shaft will extend up to 3.7 metres above finished floor level, approximately at the existing ridge height of number 1 Millview Terrace. It may be possible to reduce this height by some 500mm depending on the lift supplier, but a 3.4 metre height from the uppermost finished floor level to under side of lift shaft is the industry norm. The lift shaft has been placed in the most suitable position on the plan and designed to be as unobtrusive possible when viewed from outside.

This design will allow separate and controlled access and use of the visitors' centre from those who wish to visit the café and garden. The proposed reception area will monitor the entrance and important circulation areas and control access to the visitors' centre. The proposed new structures are smaller in scale and height than the 19th century former houses, in terms of the linearity and the pitched roof character. The proposed new materials will mainly be roughcast lime render, profiled metal and glass. The form of the new structures is familiar and partially concealed from the main roads by the existing historic structures.

### 15.3 The landscape proposal

It is important to note that the landscape proposal shown on drawing number SK04 and in Appendix A is an outline proposal only. It is hoped that appropriate consents can be obtained on a conditional basis that the detailed landscape plans could be agreed at a later date. The following is a summary of the landscape proposals:

- The partial conservation of the front gardens of 1, 2 and 3 Millview Terrace as cottage gardens with long low boxed hedges as boundaries, and a new specimen heritage tree to the front, or northern end, gravel pathways to all routes with centrally positioned paved paths in each garden.
- The creation of a new terraced garden in the site to the north of the round tower and to the south of the five houses which will link to the leisure centre and mill ponds and Corkagh Park to the west.
- The re-opening of the blocked-up opening in the old calp wall opposite the gates to the church of St. John, to reinstate or re-establish the connection between the sites of the church and the tower.
- A path curving around the site up to the late medieval archaeological finds at the south-western corner and sloping gently down to the new terrace behind the proposed new extension, through a series of new gardens.
- A terrace is proposed behind the new extension which would be an external seating area to the café during good weather, because of its favourable southerly aspect and sheltered location. The terrace could also be used to display exhibits on plinths, such as replica high crosses and other artefacts could be displayed here.



Fig. 15.1. The existing rendered brick boundary wall at the front or northern boundary of number 1 Millview Terrace. (July 2013)



Fig. 15.2. The western side of the proposed development site. The back of 1 Millview Terrace is visible in the right background. (April 2013)



Fig. 15.3. The back gardens of the proposed development site, from the south-western corner of the site, to the west of the round tower. From left to right: numbers 1, 2, 3 and the hipped roofs of number 15 are just visible above the trees. (July 2013)



Fig. 15.4. The proposed development site from the west of the round tower. The stone boundary wall along Tower Road is visible in the distance. (June 2013)

## 15.4 Conservation Methodologies

### 15.4.1 Methodology of works

### 15.4.2 Strategy for recording, removal and relocation

### 15.4.3 Strategy for interventions and repairs

### 15.4.4 Strategy for Structural Works

### 15.4.5 Strategy Service Installations

### 15.4.6 Fire Strategy

### 15.4.7 Universal access

### 15.4.8 Outline Works Methodology

### 15.4.9 Outline Works to nos. 15 & 16 Tower Road & 1-3 Millview Terrace

### 15.4.10 Outline works to boundary walls

### 15.4.1 Methodology of works

The proposed works will have due regard to the Department of Environment, Heritage and Local Government Conservation Guidelines, the international Charters of ICOMOS and current conservation principles and techniques and best practice. Works carried out will ensure the presentation of the buildings appropriate to its architectural importance. Generally the following principles will be followed:

- The extent and scale of works to the buildings will be carried out in a manner sympathetic to the intrinsic quality and architectural significance of the existing historic structures including the protected structures.
- The general approach with regard to the restoration and adaptation of the buildings will be to retain and repair

authentic architectural structure and fabric. Each building inevitably presents its own set of individual requirements in terms of repairs and accommodation, but a set of fundamental principles will nevertheless apply which will underlie the approaches to the project and the manner in which it is to be undertaken.

- Respect for the existing integrity of the building is always a priority, and works will always be carried out with full reference to historical authenticity.
- All existing fabric which is sound is to be protected. This means a minimum interventionist approach with an emphasis on repair, and replacement only of decayed or missing parts, rather than outright replacement.

- Modifications and additions will be carried out in a manner sensitive and sympathetic to the existing structures

- Repairs and alterations shall be carried out without attempt to disguise or artificially age, but shall also be carried out so that they are sympathetic with the architectural and aesthetic integrity of the complex. New work will, in general, be recognisable as new. The expression of such work will be determined by each individual situation – whether to be in keeping with the existing building, imitative restoration, or to contrast with the existing building. The aesthetic of the whole should be the dictating factor.

- All existing features and decorative work to be retained will be protected. Any addition, whether reconstruction or repair, will be implemented in a manner which will not damage

existing fabric or features, and will not obliterate existing authentic work. In as far as possible, repairs will take place in situ.

- Materials used will be compatible with, and in as far as is possible, match those existing. Work will be carried out using traditional or appropriate methods and natural materials. The aim will be to use natural and traditional materials in preference to synthetic materials which will, in general, be avoided.

- Reversibility or substantial reversibility shall be a guiding principle to repair, alterations and additions to protected structures. As genuine reversibility cannot always be appropriately applied it will not be used to justify inappropriate interventions

- Salvage materials shall only be used where of proven provenance and will only be used in a manner that will not confuse the understanding or appreciation of the historic structure. As a general principle it will be the intention to salvage and re-use all sound material arising from modifications or removal, where feasible and appropriate.

- Appropriate analysis of historic surfaces and finishes will be carried out to assess historic decoration schemes and specifications, which may be used to inform repair and restoration specifications.

- Prior to commencing any works, a further detailed condition survey will be carried out to establish the condition and soundness of surviving structure and fabric.

- Any fabric of historic significance to be removed will be recorded in advance.

#### 15.4.2 Strategy for recording and removal

##### (i) Recording

The structures are to be recorded in the form of survey drawings and inventory photographic record prior to modifications or adaptations being implemented. Where elements are to be removed, demolished or relocated a detailed survey will be carried out prior to work being carried out to document original state. Where appropriate and where repairs are carried out a document of both the original state and the process itself will be recorded particularly where a component or structure is deconstructed, repaired and reassembled. The choice of the most appropriate and reliable methodology will be guided by the scale, accuracy and level of recording required and the relative importance of the artefact.

- Photographic and instrumental surveys will be used to record base records (plans, elevations, cross sections and details)

- Intervention records (before and during works)

- Analysis and interpretation records (material type, surface finish, construction phases and reconstructions) Items and elements for reproduction will be recorded with detailed accuracy. Rectified photography will be utilised where necessary to facilitate conservation work.

##### (ii) Removal

Prior to removal of elements a full recorded survey will be carried out. Building fabric shall be reinstated in its original location with reference to records taken when removed to ensure reinstatement is correct.

#### 15.4.3 Strategy for interventions and repairs

##### (i) Interventions

The general approach will be to execute new interventions in a modern complimentary or contrasting style. New work will be recognisable as new and will be sympathetic with the architectural aesthetic and quality of the original. At times continuing in the existing style may be appropriate and such work will be expressed to read clearly from the original. The manner of expressing specific works will be determined by each individual situation – whether to be in keeping with the existing building, imitative restoration, or to contrast with the existing building. New intervention will always respect the existing in terms of its scale, proportions, materials and craftsmanship, and in its architectural expression.

##### (ii) Repairs

Underpinning all repair works is the philosophy of minimum intervention to the building fabric. It is the intention to retain and reuse original fabric where possible. Repairs will be carried out in manner not to detract from the visual integrity of the structure but will be discernible on closer inspection to a trained eye. The minimum amount of original building fabric

will be removed to allow effective repairs to be formed. Repairs shall follow any existing deformations in the line of the building fabric if these are not to be corrected.

Essential repairs will only be carried out; imperfections in building fabric where sound will not be corrected. Appropriate material and methods will be used to carry out repairs in line with current conservation guidelines, techniques and practices. Equipment used shall be appropriate to the application being carried out and operations shall be carried out by operatives with the appropriate skill level who are familiar with such works and have experience in handling the relevant materials

#### 15.4.4 Structural Works

The structural fabric is an integral part of the existing historic structures including the protected structures and demands appropriate consideration. The buildings and structures to be retained and repaired will require work to accommodate a new use and alterations may be necessary to make it fit for its new use. Changes in use demand that consideration be given to the loads to be carried by the building. Careful consideration to the loading requirements will be given to avoid unnecessary over-design of elements where less might be equally acceptable with no increase in risk resulting from the new use.

Floors will be upgraded to carry loads to give a certain flexibility for the new use and not excessively restrict the loading which they can carry. Equally floors will not be designed to carry loads which realistically will not be required. Detailed inspection of structures will be carried out

to assist in the design. Structural repairs and augmentation of structural elements will be carried out with minimum intervention necessary to satisfy structural requirements for load bearing capacity, soundness and stability. Materials used will be compatible and complimentary to existing building fabric.

Notches and holes in structural timber to be avoided if possible but where required these will be kept to a minimum size to accommodate services and will be to the Structural Engineer's specification. Holes, recesses and chases in masonry will be located to maintain integrity of strength, stability and sound resistance of construction and will be of minimum size to accommodate services.

#### 15.4.5 Service Installations

The mechanical and electrical services installation will be integrated within the fabric of the building and installed in a sympathetic and careful manner, and will be as unobtrusive as possible. The work shall be implemented in a manner to minimise damage to building fabric. Where feasible riser ducts will be used to rationalise the distribution of services throughout the building.

Locations and positions will be selected to limit impact on the building and minimise routes for services and avoid routes that would have detrimental on the building fabric. Non-sensitive areas will generally be used for routes and existing runs and voids will be used. Removal of redundant fixtures and fittings will be carried out in manner as not to cause damage to building fabric.

#### 15.4.6 Fire Strategy

Modern buildings are designed from the outset to allow occupants to leave quickly, easily and safely in the event of a fire, adapting an historic building is more difficult.

As the development involves a change of use for the existing historic structures including protected structures, it will be required to comply with current standards. The primary factors considered are the protection of persons in the building and the building fabric and contents itself. As the building will be open to the public the requirement for life safety measure is more onerous. Where appropriate a fire safety engineering design solution by Specialist Fire Engineering consultants based on risk assessment of the building and development of a strategic approach to fire safety measures will be adopted to minimise impact on the building, important fabric and elements of the protected structure to lead to a more sympathetic solution. Compensating measures will be proposed where appropriate and allowed to enhance fire safety.

#### 15.4.7 Universal Access

Universal accessibility is a concept that states that all environments should be accessible by everyone, regardless of ability. Everybody is different and there is no 'average' person. As a result universal accessibility will benefit all because people with disabilities, people of small or tall stature, parents with buggies, delivery persons and so forth will have greater access to the built and external

environments. Accessibility of the built environment in Ireland for people with disabilities is controlled by Part M of the Building Regulations (2000) entitled "Access for People with Disabilities". The underlying philosophy of Part M is to ensure that as far as is reasonable and practicable, buildings should be usable by people with disabilities. It is now generally accepted that there should be universal access to all buildings for people with disabilities. The intention is to provide independent and integrated access where appropriate within the dictates of the existing regulations .

#### 15.4.8 Outline Works Methodology - General principles for Contractors

All contractors will be made aware that this project involves work to a group of existing historic structures including protected structures, which dictates inherent requisites on how the work is to be carried out and the necessary time to be taken and will require personnel substantial input over the full duration of the project.

Utmost care is required at all times in preserving the fabric of the building and in not damaging existing features and finishes in any way. All contractors will take direction from the conservation architect in this regard and must be prepared to amend and modify work procedures in order to take cognisance of the in places fragile/vulnerable nature of the building fabric.

The work to be carried out will require careful adherence to the specifications and liaison with the conservation architect in all respects. No work will be undertaken unless what is

required is fully understood. Where in doubt with any procedure the contractor will cease work and consult with the architect.

Specifications will not preclude alternative methods for construction, repair and cleaning etc. Samples and tests will be the prerequisite for determining the most appropriate method to be used. Alternative methods may need to be investigated following test results. Materials used shall be sympathetic to fabric that they are applied to.

All materials used shall have the relevant data submitted to the conservation architect for approval. Equipment used shall be that appropriate to the application being carried out.

Details of equipment and working parameters shall be submitted to conservation architect for approval prior to commencement of work. Operations to be carried out shall only be carried out by skilled operatives who are familiar with the operation and have experience in handling the materials.

None but fully qualified and competent workpeople shall be employed on the Works and the contractor shall furnish such evidence as the conservation architect may require as to the qualifications and competence of work persons. Operatives will be required to carry out sample work to indicate their expertise.

The following is a synopsis of works that the contractor and/or sub-contractors will be required to have the requisite expertise in or be able to obtain that expertise. Contractors shall be familiar with repair; cleaning, construction and

building techniques that will be required to complete the conservation and restoration works.

A complete scope of works will be prepared in advance of any on site works commencing and these will be informed by further detailed inspection. In many instances it is not presently possible or appropriate to carry out such detailed inspections due to the condition of the building and difficulties in obtaining safe access.

The contractor shall have the requisite expertise/skill to carry out the following:

- Traditional and modern construction and building techniques.
- Cleaning techniques using chemical cleaning agents.
- Careful stripping out and removal of redundant fabric avoiding damage to building fabric
- Recording and careful removal of elements for reinstatement using methodology to prevent or limit damage to building fabric. Provision of suitable storage with environmental condition conducive to the protection of the fabric.
- Removal of all vegetation from the building masonry structure and wall structures without damaging historic fabric.
- Repair and building of random rubble masonry using lime mortars
- Repair and building of brickwork masonry using lime mortars
- Raking out brickwork and stone joints without damage to masonry
- Cleaning down, consolidation and renewal of deteriorated pointing of stone and brickwork walls

- General pointing techniques with lime mortar
- Treatment for fungus/insect eradication
- Conservation and repair of lime ceiling plaster
- Conservation and repair of lime wall plaster
- Use and protection of lime putty and hydraulic lime mortars and plasters
- Lime lath and plaster
- Timber spliced repair techniques to repairs of decayed timber whether structural or non-structural
- Traditional and contemporary joinery techniques and construction
- Conservation & repair of timber up and down sash windows
- Conservation and repair of timber floor boards including lifting and reinstatement
- Conservation and repair of timber linings including removal and reinstatement
- Conservation cleaning and repair of historic timber work
- Traditional Finishing techniques for timber
- Use of lime paints and distemper
- Use of traditional oil paints
- Traditional slating and lead work
- High quality architectural concrete work
- High quality brick work
- Traditional sheet metal roofing

#### Responsibility /Liability

Utmost care is required at all times in preserving the fabric of the building and in not damaging existing features and finishes in any way. All contractors must take direction from the Architects and Engineers in this regard and must be

prepared to amend and modify work procedures in order to take cognisance of the fragile nature of the building fabric.

#### Quality of finishes

The Specification or schedule of works for the building works will set out the nature and quality of finish required and will provide for samples to be prepared to ensure the standard required is agreed and approved in advance. The nature of the building demands high quality finishes and workmanship throughout.

#### Method Statement

From time to time contractors will be requested to provide method statements to address issues such as programme, safety, enabling works, protection etc. The contractor will be required to produce method statements in advance of specific operations, addressing the relevant issues.

#### Elements to be removed/dismantled and stored for reuse:

Elements shall be photographed, surveyed/recorded by measured drawing during dismantling, to facilitate reinstatement. A condition surveyed to be recorded of each element. Items are to be labelled as to location prior to removal. A measured survey to be carried out and drawings prepared to assist reinstatement where necessary. All due care shall be taken during dismantling to ensure no damage is done to fabric.

#### Storage Facilities

The storage facilities for dismantled elements shall be of adequate size to store all building fabric as referred to in specifications. Building fabric to be stored on an approved racking storage system clear of the ground protected from dampness and supported to prevent distortion. The storage environment shall be conducive to maintaining the fabric in sound condition and prevent any further deterioration. Storage area should be an equivalent non-destructive controlled environment to the location where the particular element has been removed from. Storage environmental conditions should be stable with any fluctuations kept within in a minimum operating range. Space should be well ventilated and relative humidity of environment kept within an acceptable range (55%±5). Timber shall be monitored, moisture reading and air temperature, humidity readings taken at regular intervals (Daily). Records are to be presented to architect at site meetings.

#### Reinstatement of Building Fabric

Environmental conditions within the building shall be suitable for reinstatement of building fabric. Timber elements to be at the correct moisture content. Building fabric shall be reinstated in its original location with reference to records taken when removed to ensure reinstatement is correct. Environmental conditions within retained buildings The contractor will be responsible for maintaining the conditions within the building and for monitoring to ensure proposed work will not affect the environmental conditions and have a detrimental affect on the historic building fabric.

Any heat introduction shall be controlled by humidistat. A baseline set of readings will be taken throughout the building contract recording the humidity and temperature. Surface moisture content readings to be taken of joinery elements (non-destructive methods to be used)

#### Protections and protective mechanisms

Special protection or protective mechanisms will be required for certain elements of the works. The precise method of protection is to be approved by the Architect prior to commencement of the works. It may be necessary to provide temporary protection to items while work is being carried out in its vicinity. All finished and repaired work shall be adequately protected. Protection erected shall be maintained for the duration as instructed by the conservation architect and shall only be removed on the conservation architect's approval. Protections may be required to be removed and subsequently reinstated to facilitate access by the conservation architect or other nominated persons. Where heavy items are being lifted close to historic fabric particular care is to be taken to avoid damage and if necessary increase protection to historic fabric. Typically the protective mechanisms will include protection of historic joinery and other significant features from damage during the works.

In particular, protective mechanisms will be put in place to protect the round tower from accidental damage that could be caused by the works themselves. These will be agreed in advance with OPW who are custodians of the tower on behalf of the minister. It is likely that these will include the

erection of suitable boundary around the tower to prevent and limit mechanical and vehicular damage to it.

#### Services

The mechanical and electrical services are to be upgraded and integrated within the fabric of the building and therefore will require careful co-ordination with the building works. The work shall be implemented in a manner to minimise damage to building fabric

Adequate supervision is to be provided during the works particularly when builders work is being carried out.

Avoidable and unacceptable damage to historic fabric will not be permitted. Services runs will be marked out on site with the Architect. Generally it is the intention to use non-sensitive areas for routes and make use of existing runs and voids. Removal of redundant fixtures and fittings will be carried out in manner as not to cause damage to building fabric. Where removal will result in potential damage, leave in place and notify Architect for instruction.

#### 15.4.9 Works to numbers 15 & 16 Tower Road

##### (i) Demolition Works

Demolition works will consist of removal of

1. Single storey returns to rere / side of numbers 15 and 16 Tower Road and rere of numbers 2 & 3 Millview Terrace.
2. Creation of door openings and some window openings within existing party walls, within the internal walls to the side of the existing chimneystacks, within the rear external walls and side gable which faces south.

Demolition works will be carefully carried out to avoid excessive vibration that would have a detrimental effect on the building fabric and in a manner to ensure no damage to building fabric being retained. Scars from demolition work will be made good. Waste material will be disposed of in accordance with requirements of Local Authority and the EPA.

##### (ii) Formation and modification of openings in external building envelope

Formation and modification of openings will be necessary to accommodate the new use, integrate and connect no 15 into the adjoining new proposed cafe building via large opening within the south gable. Structural framing of new openings will be to structural engineer's details.

Reveals will be formed with brick in hydraulic lime. Generally new openings will be positioned and proportioned to read sympathetically with existing portals. Structural framing of new openings will be implemented to transfer load safely to Structural Engineers detail. Openings will be located to minimise intervention to any significant architectural element, for example quoins.

##### (iii) Roof Works

Roofs will be stripped and all sound slate retained for reuse. Sound lead removed from flashing and gutters will be retained and graded for reuse. Roof timbers will be repaired and treated, retaining all sound timber – carry out splicing

repairs where ends are decayed. Treatment of roof timbers as per recommendation of timber specialists report.

Structural augmentation of roof timbers will be to structural engineers detail generally using spliced repairs to decayed rafter ends and wall plates. Roof will be slated with sound retained slates and new matching natural slates. New breathable roofing underlay will be provided with proprietary inline slate vents. Lead gutters and flashings will be renewed, proprietary neoprene expansion joints will be utilised where appropriate.

All lead work will be carried out to recommendations of Lead Development Association. Brick chimney stacks will be re-pointed with hydraulic lime based mortars. Chimney pots will be secured and re-bedded where appropriate and capping flanchued with hydraulic lime mortar. Existing uPVC rainwater goods will be replaced with cast-iron rainwater ones. All roofs will be insulated with fibre type insulation with hygroscopic properties

#### (iv) External Walls

External walls consist of rendered finish with rendered quoins. It is proposed to carry out investigation to the composition of the existing external render and study the condition of the brick substrate by carryout patch render removal. If the existing external render turns out to be of lime based mix then its removal will not cause damage to the brick substrate, however, if the render turns out to be of cementitious base then it would be advisable to retain this render.

#### (v) Windows

Existing windows consist of a mixture of sliding sash styles and will be retained and repaired where sound. These works will involve overhauling all existing windows to return them to a fully operational condition. Any decayed timber (which is primarily located at timber sills and bottom sash rails) will be cut out with new, matching, timber (red deal) spliced in. Windows will be cleaned down and re-painted. Sashes will be balanced to ensure smooth operation. All existing early glass hand made glass will be retained and replacement glass will be a traditional type matching glass.

#### (vi) External Doors

Existing external doors are modern. It is proposed to replace the existing modern doors with historically accurate timber sets. New doors will match an accurate historic style and construction or be designed to be aesthetically sympathetic with original architecture

#### (vii) Internal walls

Existing internal walls will be retained, however new door openings will be created within existing masonry walls. Existing modern timber partitions that are located to upper level will be removed. Removal of wall sections and the creation of new openings will be as per structural engineer's details. Existing lime plaster where sound will be retained and decayed areas renewed with new lime plaster. Wall

plaster will prepared and be painted with a breathable paint. Chasing of wall for services will be kept to a minimum.

#### (viii) Ceilings

Lath and lime plaster ceiling will be retained throughout, Cracks and small holes will be repaired with compatible filler or lime based repair mix. . New ceiling plaster will be lath and lime plaster. Ceiling will be prepared and decorated using compatible surface application

#### (ix) Floors

##### Solid ground floor

Existing floor will be excavated to provide new floor. Ground floor will be designed as a breathable floor and constructed to negate capillary rise and provided with sumps to alleviate ground water pressure.

##### Timber floors

Existing floors will be retained with repairs to decayed joist ends and refinishing of floorboards. Augmentation of floor structure to achieve load bearing capacity, soundness and stability for new uses will be to Structural Engineers specification. In appropriate detrimental notching and holes in joist will be repaired All floor boards will be lifted throughout to accommodate service installation and repair works Floors will be upgraded for fire by fitting of proprietary fire barrier system between joists. Existing floor levels will be retained.

**(x) Joinery**

Sound timber work will be retained. Replacement elements will match existing profiles or will have an historically accurate profiles and be of compatible timber. Existing modern timber doors to be replaced with historically accurate timber sheeted door sets; all will be upgraded for fire using proprietary upgrading system. Existing modern timber staircases will be removed, new vertical circulation will be introduced using modern materials in contemporary design.

**(xi) Finishing and decoration**

Surfaces will be prepared to receive surface application. Where surface applications are sound and can be over painted these will be retained. Finishing and decoration will replicate historic schemes where appropriate.

**(xii) Mechanical & Electrical**

New mechanical and electrical installation to enable building to meet the requirements of its new use. Installation to Services Engineers specification and details. Careful consideration will be given to minimum chasing of walls and notches, holes to structural timbers.

**(xiii) Ironwork**

Cast iron rainwater goods where they survive will be cleaned and repaired/renewed and treated with anti corrosion paint

system. All existing uPVC rainwater goods will be removed and replaced with historically accurate cast iron ones,

**15.4.10 Proposed works to numbers 1-3 Millview Terrace****(i) Demolition Works**

Demolition works will consist of removal of

1. Single storey modern returns to rear nos. 1-3 Millview Terrace
2. Removal of wall fabric within party walls and rear facades to create door openings and removal of timber wall partitions.

Demolition works will be carefully carried out to avoid excessive vibration that would have a detrimental effect on the building fabric and in a manner to ensure no damage to building fabric being retained. Scars from demolition work will be made good. Waste material will be disposed of in accordance with requirements of Local Authority and the EPA.

**(ii) Formation and modification of openings in external building envelope**

Formation and modification of openings will be necessary to accommodate the new use, such as the proposed large opening at ground and first floor level within the party wall between 15 Tower Road and no. 1 Millview Terrace. Existing openings at ground floor rear facade will be utilised and new openings will be created to connect Millview Terrace with the modern glazed circulation area. Structural framing of new openings will be to structural engineer's details.

Reveals will be formed with brick in lime. Generally new openings will be positioned and proportioned to read sympathetically with existing portals. Structural framing of new openings will be implemented to transfer load safely to Structural Engineers detail. Openings will be located to minimise intervention to any significant architectural element.

**(iii) Roof Works**

Roofs will be stripped and all sound slate retained for reuse. Sound lead removed from flashing and gutters will be retained and graded for reuse. Roof timbers will be repaired and treated, retaining all sound timber – carry out splicing repairs where ends are decayed. Treatment of roof timbers as per recommendation of timber specialists report. Structural augmentation of roof timbers will be to structural engineers detail generally using spliced repairs to decayed rafter ends and wall plates.

Roof will be slated with sound retained slates and new matching natural slates. New breathable roofing underlay will be provided with proprietary inline slate vents. Lead gutters and flashings will be renewed, proprietary neoprene expansion joints will be utilised where appropriate. All lead work will be carried out to recommendations of Lead Development Association. Brick chimney stacks will be re-pointed with hydraulic lime-based mortars. Chimney pots will be secured and re-bedded where appropriate and capping flanchued with hydraulic lime mortar

Existing uPVC rainwater goods will be replaced with cast-iron rainwater ones or other high quality metal. All roofs will be insulated with fibre type insulation with hygroscopic properties

#### (iv) External Walls

External walls consist of rough-cast rendered finish. It is proposed to carry out investigation to the composition of the existing external render. It is proposed to carry out repair to existing external where damaged using lime based mix. The existing group of building top remain fully rendered.

#### (v) Windows

Existing windows consist of a mixture of two-over-two and six-over-six timber sash windows to front facades and smaller three-over-four and three-over-six timber sash windows to rear facades. All existing timber sash windows will be retained and made fully operational. Any decayed timber (which is primarily located at timber sills and bottom sash rails) will be cut out with new, matching, timber (red deal) spliced in. Windows will be cleaned down and re-painted. Sashes will be balanced to ensure smooth operation. All existing early glass hand made glass will be retained and replacement glass will be a traditional type matching glass.

#### (vi) External Doors

Existing external doors are modern. It is proposed to replace the existing modern doors with timber sets. New doors will

match an accurate historic style and construction or be designed to be aesthetically sympathetic with original architecture

#### (vii) Internal walls

Existing internal walls will be retained, however new door openings will be created within party walls and to the side of the chimneybreast to allow for new circulation routs. Removal of wall section and the new openings will be as per structural engineer's details. Existing lime plaster where sound will be retained and decayed areas renewed with new lime plaster. Wall plaster will be prepared and be painted with a breathable paint. Chasing of wall for services will be kept to a minimum.

#### (viii) Ceilings

Lath and lime plaster ceiling will be retained throughout. Cracks and small holes will be repaired with compatible filler or lime based repair mix. . New ceiling plaster will be lath and lime plaster. Ceiling will be prepared and decorated using compatible surface application

#### (ix) Floors

##### Solid ground floor

Existing floor will be excavated to provide new floor. Ground floor will be designed as a breathable floor and constructed to negate capillary rise and provided with sumps to alleviate ground water pressure.

#### Timber floors

Existing floors will be retained with repairs to decayed joist ends and refinishing of floorboards. Augmentation of floor structure to achieve load bearing capacity, soundness and stability for new uses will be to Structural Engineers specification. If appropriate, previous detrimental notching and holes in joist will be repaired. All floor boards will be lifted throughout to accommodate service installation and repair works. Floors will be upgraded for fire by fitting of proprietary fire barrier system between joists. Existing floor levels will be retained.

#### (x) Joinery

Sound timber work will be retained. Replacement elements will match existing profiles or will have an historically accurate profiles and be of compatible timber. Existing modern timber doors to be replaced with historically accurate timber sheeted door set; all will be upgraded for fire using proprietary upgrading system. Existing modern timber staircases will be removed, new vertical circulation will be introduced using modern materials in contemporary design.

#### (xi) Finishing and decoration

Surfaces will be prepared to receive surface application. Where surface applications are sound and can be over painted these will be retained. Finishing and decoration will replicate historic schemes where appropriate.

(xii) Mechanical & Electrical

New mechanical and electrical installation to enable building to meet the requirements of its new use. Installation to Services Engineers specification and details. Careful consideration will be given to minimum chasing of walls and notches, holes to structural timbers.

(xiii) Ironwork

Cast iron rainwater goods will be cleaned and repaired and treated with anti corrosion paint system. All existing uPVC rainwater goods will be replaced with cast iron ones.

15.4.11 Works to the high stone boundary wall beside 1 Millview Terrace

There is a substantial high rubble stone boundary wall to the west of 3 Millview cottages that dates to the first half of the nineteenth century and was probably part of the mill complex. This wall will be retained, excessive vegetation will be carefully removed and wall substrate will be repaired with necessary. Existing low rise garden walls to front gardens and rear gardens that are constructed of a mix of brick and block work will be all removed.

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May 2014

## Bibliography

### Chapter 2 The Masterplan Framework and Wider Context

The Clondalkin Framework Plan, South Dublin County Council, April 2011

Regional Planning Guidelines for the Greater Dublin Area 2010-2022, Dublin Regional Authority, (2010)

A Platform for Change 2000-2016, Dublin Transportation Office (2001)

### Chapter 3 The bedrock underlying Clondalkin, the quarries, the stone and other building materials used

Kinahan, G.H. Economic Geology of Ireland, (1889, Royal Geological Society of Ireland

Carrig Conservation International Ltd. and McMahon, Mary, "South Dublin County Industrial Heritage Survey, Desktop Study" (South Dublin County Council, The Heritage Council, November 2012)

Wilkinson G. 1845 Practical Geology and ancient architecture of Ireland Dublin. William Corey Jr. & Co

"St. Mochua and the Round Tower", Williams, J. South Dublin Libraries

Ua Broin, Liam. "Clondalkin Co. Dublin and its Neighbourhood.", Journal of The Royal Society of Antiquaries of Ireland 74 (1944):

"From Generation to Generation, Clondalkin Village Parish and Neighbourhood", Byrne, R.H., Graham, A, Dublin, 1989

P Pavia, S. and Bolton, J., Jason "Stone Monuments Decay Study" (Duchas)

Pavia, S. and Bolton, J. "Stone, Brick and Mortar, Historical Use, Decay and Conservation of Building Materials in Ireland" (Wordwell, 2000).

"Round Tower Site, Clondalkin – Design and Conservation Report" commissioned by South Dublin County Council from Shaffrey Associates Architects (unpublished report, January 2009)

### Chapter 4 The urban history of Clondalkin village and of the site of the round tower

"The new neighbourhood of Dublin", Joseph Hone, Maurice Craig, and Michael Fewer (Dublin, AandA.Farmer, 2002),

"The Medieval Parish Churches of South-West County Dublin", Ní Mharcaigh, Máirín, Proceedings of the Royal Irish Academy, Vol. 97C, No.5 (1997),

"From Generation to Generation, Clondalkin, Village Parish and Neighbourhood" , R. H. Byrne & A. Rynne

"Archaeological Impact Assessment, Clondalkin Round Tower, Clondalkin, Co. Dublin" by Bríd Kirby & Graeme Laidlaw, Valerie J. Keeley Archaeologists (unpublished report, May 2008)

Ó Lochlainn (1940, 471), Ó Lochlainn, C. 1940 'Roadways in Ancient Ireland', in Feil-Sgríbhinn Eoin MacNeill

Joe Williams, "St. Mochua and the Round Tower", "Irish Field Monuments", The Office of Public works, Dublin, published by the Stationery Office, 3rd edition 1991)

"Guide to the Irish National Heritage Park, Ferrycarrig, Wexford", Edward Culleton, B.A., Ph.D., 1987, The Wexford Heritage Trust, 1990, first published 1987)

"Ancient Ireland, From Prehistory to the Middle Ages", Harbison, P., O'Brien, J., (Weidenfeld & Nicolson, London, 1996, page 63)

"Dublin An Urban History, The Plan of the City", McCullough, N., The Lilliput Press Ltd., Dublin, 2007).

"The Mediaeval Boroughs of County Dublin", page 131 of "Dublin and Beyond the Pale, Studies in honour of Patrick Healy", edited by Conleth Manning, (Dublin, Wordwell, 1998)

"The Dublin Region in the Middle Ages, Settlement, Land-Use and Economy", Margaret Murphy and Michael Potterton, Dublin, Four Courts Press, 2010

"Dublin and Beyond the Pale, Studies in honour of Patrick Healy" – an essay by John Bradley entitled "The Mediaeval Boroughs of County Dublin", edited by Conleth Manning, (Dublin, Wordwell, 1998)

"A Catalogue of the Maps of the Estates of the Archbishops of Dublin, 1654-1850", Raymond Refaüssé & Mary Clark, Four Courts Press, 2000)

"The Dublin Region in the Middle Ages, Settlement, Land-Use and Economy", Margaret Murphy and Michael Potterton, Dublin, Four Courts Press, 2010)

Cooper, Austin. An eighteenth century antiquary; the sketches, notes and diaries of Austin Cooper (1759-1830). Printed by direction of his great grandson, Albert Damer Cooper. Ed. Liam Price, M.R.I.A. Dublin: J. Falconer, 1942.

Others:

As detailed in the Architectural Heritage Protection: guidelines for planning authorities. Guidance on Part IV of the Planning and Development Act 2000 published by the

Department of the Environment, Heritage and Local Government in 2004.

NIAH Handbook (June 2006 edition). Unpublished technical document prepared by the National Inventory of Architectural Heritage, Department of Environment, Heritage and Local Government.

Cooper, T.P. (ed) (1997) Conservation of historical buildings and associated property - EU project STEP 1994-1997.

Unpublished report. Trinity College Dublin;

Pavía, S. and Bolton, J. (2001) Stone Monuments Decay Study 2000: an assessment of the degree of erosion and degradation of a sample of stone monuments in Ireland.

Kilkenny. The Heritage Council;

Fitzner, B. & Heinrichs, K. (2002) "Damage diagnosis on stone monuments weathering forms, damage categories and damage indices".

In Viles, H.A. and Prikryl, R. Understanding and managing stone decay. The Karolinum Press;

Bolton, J. and Pavía, S. (2005) Stone Monuments II: an assessment of stone monuments in South and West Cork, the Iveragh and Dingle peninsulas of Co. Kerry, and selected bedrock areas of Co. Donegal. Unpublished technical report carried out on behalf of The Heritage Council.

Department of the Environment, Heritage and Local Government. (2004) Architectural Heritage Protection: guidelines for planning authorities – guidance on Part IV of the Planning and Development Act 2000. Dublin. Stationery Office.

Cruickshank, D. (1985) A guide to the Georgian buildings of Britain and Ireland. Rizzoli, New York. The National Trust & Irish Georgian Society. Pp.159-161

Christine Casey (2005) The Buildings of Ireland Series. New Haven & London. Yale University Press. Pp.260-261

Craig, M. (1982) The architecture of Ireland from the earliest times to 1880. Dublin. Lambay Books. Pp.285-287

Harris, W.H. (1766) History and antiquities of the city of Dublin. Dublin. P. 126

National Inventory of Architectural Heritage Handbooks June 2006 and January 2009 editions.

#### Reference Documents

General note: All works to the structure to be carried out in compliance with the Venice and Burra Charters and should be guided by the documents listed below:

- International Charter for the Conservation and Restoration of Monuments and Site. ICOMOS, 1964 (The Venice Charter).
- The Australia ICOMOS Charter for Places of Cultural Significance. Originally adopted in 1979, revisions 1981, 1988, 1999. (The Burra Charter).

#### General texts:

- BS 7913:1998 Guide to the principles of the conservation of historic buildings, British Standards Institute, 1998
- Architectural Heritage Protection: Guidelines For Planning Authorities, Published by: Department of Arts, Heritage and the Gaeltacht, 2011.
- The Repair of historic buildings, advice on principles and methods, English Heritage, 1995. By Brereton, C.
- Ashurst, John & Nicola: Practical Building Conservation, Volume 2 & 3,, English Heritage Technical Handbook, Gower Technical Press Ltd 1988

(currently being updated)

- Department of Environment, Conservation Guidelines, 1996.
- Keohane, Fran, Conservation Guidance Manual, Dublin Civic Trust., Dublin Civic Trust. Period Houses: A Conservation Guidance Manual., Dublin Civic Trust, 2001.
- RIAI. Guidelines for the Conservation of Buildings. RIAI, 2001.
- English Heritage, Investigative Work and Historic Buildings, December 1994.
- CIRIA Report 111, Structural Renovations OF Traditional Buildings, 1986.
- Brereton, Christopher, The Repair of Historic Buildings: Advice on Principles and Methods, 1995.
- Society for the Protection of Ancient Buildings: Information Sheet Series C: Masonry; repairs, cleaning
- Ruins: The Conservation and Repair of Masonry Ruins Advice series published by: Department of Environment, Heritage and Local Government, 2010.
- Architectural Heritage Protection: Guidelines For Planning Authorities, Published by: Department of Arts, Heritage and the Gaeltacht, 2011. (Pg 118-123)
- Bricks: A guide to the repair of historic brickwork, Advice series published by: Department of Environment, Heritage and Local Government, 2009.
- McAfee, Patrick, Stone Buildings, O'Brien Press, Dublin 1998, Updated 2001.
- Pavia, Sarah and Bolton, Jason, Stone, Brick and Mortar Historic Use, Decay and Conservation of Building Materials in Ireland.

- Architectural Heritage Protection: Guidelines For Planning Authorities, Published by: Department of Arts, Heritage and the Gaeltacht, 2011. (Pp.120-123 Repointing of stonework esp. 8.3.18 & Repointing of brickwork esp.8.3.36)
- Building Limes Forum (the journal of ) Lime News
- Historic Scotland, Preparation and Use of Lime Mortars. Technical Advice Note HMSO, Edinburgh 1995.
- Society for the Protection of Ancient Buildings: Information Sheet 09, Introduction to Building Limes
- The Traditional Lime Company. A Guide to Lime. 2003
- BS EN:459:2010 Building Lime
  
- Roofs: A guide to the repair of historic roofs, Advice series published by: Department of Environment, Heritage and Local Government, 2010.
  
- Iron: The repair of wrought and cast ironwork Advice series published by: Department of Environment, Heritage and Local Government, 2009.
  
- Architectural Heritage Protection: Guidelines For Planning Authorities, Published by: Department of Arts, Heritage and the Gaeltacht, 2011. (Pg 123-125)
- Society for the Protection of of Ancient Buildings: Information Sheet 10, Patching Old Floor Boards
  
- Society for the Protection of Ancient Buildings: Information Sheet 15, Care and Repair of Old Floors
  
- Windows: A guide to the repair of historic windows, Advice series published by: Department of Environment, Heritage and Local Government, 2007.
  
- Building Limes Forum (the journal of ) Lime News
- Society for the Protection of Ancient Buildings: Information Sheet 09, Introduction to Building Limes
- Practical Building Conservation Volume 3 Mortars Plasters and Renders, English Heritage John and Nicola Ashurst, London 1988.
- Historic Scotland, Conservation of Plasterwork, 1994. Millar, William, Plastering Plan and Decorative. B.T. Batsford, London 1897.

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- Valerie J. Keeley Archaeologists
- South Dublin County Council
- Irish Architectural Archive
- National Library of Ireland, Map Library
- National Library of Ireland, Photographic Archives.
- South County Dublin Library Services, Local Studies section (South Dublin County Council).
- The Royal Irish Academy
- The Clondalkin Round Tower Heritage Group
- The Rally Round the Tower group
- Clondalkin Round Tower Historical Society
- The Clondalkin Chamber of Commerce
- The Royal Irish Academy