

# QUINQUENNIAL INSPECTION REPORT OF JARROW, ST. PAUL

DIOCESE OF DURHAM

ARCHDEACONRY OF SUNDERLAND

DEANERY OF JARROW

INSPECTION OF CHURCHES MEASURE 2018 (AS AMENDED 2019)

CARE OF CHURCHES & ECCLESIASTICAL JURISDICTION MEASURE 1999

DURHAM DIOCESESAN SCHEME FOR THE INSPECTION OF CHURCHES 2021

QUINQUENNIAL INSPECTION AND REPORT

December 2025

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# **CONTENTS**

1.0	INTRODUCTION	3
2.0	LOCATION AND SITE	3
3.0	CHURCH AND LISTING DESCRIPTION	4
4.0	PREVIOUS INSPECTIONS	6
5.0	SCOPE OF REPORT	6
6.0	REPORT SUMMARY	7
7.0	CONDITION AND RECOMMENDATIONS	10
7.1	SERVICES	10
7.2	GENERAL	12
7.3	WORK SINCE LAST INSPECTION	14
7.4	FABRIC INSPECTION	14
7.4.1	. TOWER	14
7.4.2	ROOF COVERINGS	24
7.4.3	RAINWATER GOODS	28
7.4.4	WALLS	30
7.4.5	EXTERNALS	38
7.4.6	NTERIOR	41
8.0	PRIORITIES	47
APPENDICES50		
CHUI	RCH PLAN	50
EXPLANATORY NOTES		52
A GUIDE TO ROUTINE MAINTENANCE AND INSPECTION OF CHURCH PROPERTY54		54
ENGI	NEER SUMMARY	56
A PR	ACTICAL PATH TO 'NET ZERO' CARBON FOR OUR CHURCHES	57
ENER	RGY FOOTPRINT REPORT	60

#### **REPORT ON THE 2025 QUINQUENNIAL INSPECTION**

#### 1.0 INTRODUCTION



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This document is in two parts:

The Report is the appraisal of condition and estimated cost priority list;

The Appendix contains the background information of the church plan, guidance notes and routine maintenance guidance.

Date of inspection and weather conditions: 26<sup>th</sup> November 2025. Cold, overcast and threatening rain.

Date of report: December 2025

Report prepared by: Dwid 5 Beammont RIBA AABC

#### 2.0 **LOCATION AND SITE**

Address: St. Paul, Church Bank, Jarrow, NE32 3DZ



# Location:

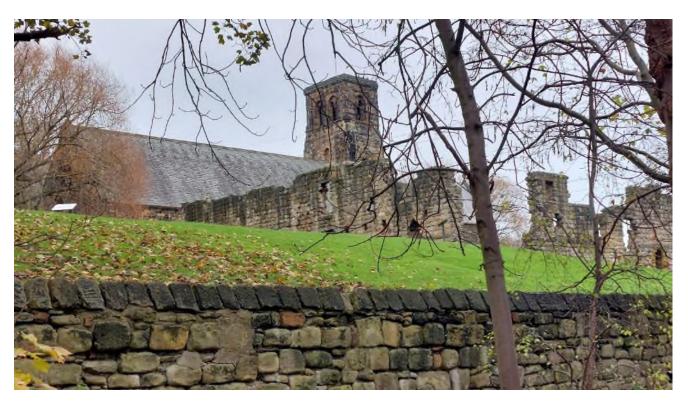
Within the conservation area of Jarrow and the county of Tyne and Wear in the district of South Tyneside. A distance E from the modern town, on a low ridge between the S bank of the River Tyne and its tributary, the River Don. It is part of the monastery site in the care of English Heritage. Jarrow Hall: Anglo-Saxon Farm, Village, incorporating the Bede Museum (the former Bede's World), is close by.

National Grid Reference: NZ 338 652

### **Description:**

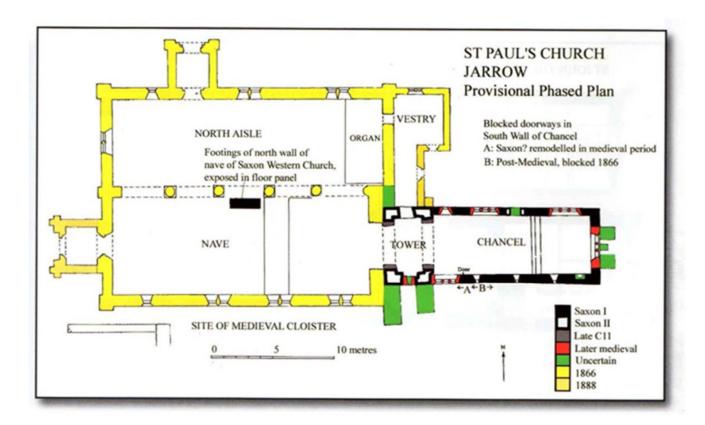
The church was at the centre of the monastery founded by Benedict Biscop on land given by King Ecgfrith of Northumbria in 681. It is part of the twin monastery site of St Peter, Monkwearmouth (which Biscop founded seven years earlier in 674). It thrived during the C7th and C8th.

Bede, the author of the 'Ecclesiastical History of the English Nation', was born in the territory of the monastery and who lived and died here in 735. His bones are in the Galilee Chapel at Durham Cathedral. Sacked by the Vikings 793-5. The monastery was refounded in 1074 by Aldwine, Prior of Winchcombe Abbey in Gloucester, as a Benedictine cell of Durham. At the Dissolution, it became a Parish Church.



Its medieval remains are standing to the south of the church and they are in the care of English Heritage. It had two church buildings: the western, dedicated in 685, whose foundations are visible, via a floor viewing window in the present nave: and the eastern, which is the present chancel, and of Bede's time.

The tower was probably begun in the C9th and completed in the C12. The western church was demolished and rebuilt in 1783 and rebuilt again in 1866 by Sir George Gilbert Scott in a C19th Gothic revival lancet stylecommon at the time and somewhat unsympathetic to the medieval work. The west porch was added in 1888 in similar style.



Sources: Historic Churches of County Durham, Peter Ryder. Church pamphlet and previous QI report by Christopher Downs.

#### **Listing Description:**

Church of St Paul. (formerly listed as 1/84 (St Paul's Church)

18.1.49

Grade I

Parish Church, formerly two separate churches, part of the monastery of St Paul.

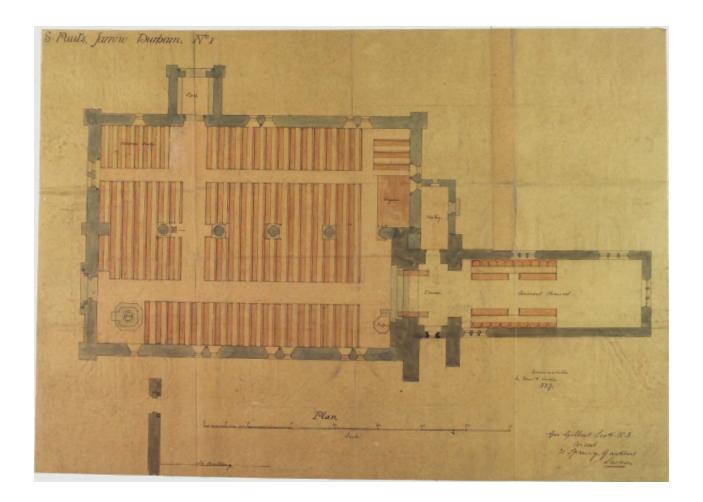
Foundation 681-2 with gift by King Ecgfrith to Benedict Biscop, Abbot of Wearmouth; 685 dedication stone of basilica resited in nave over arch to tower.

Eastern Saxon church is present chancel; tower Norman but may incorporate Saxon fabric; former basilica, is present nave, rebuilt 1782. 1866 alterations and additions of large north aisle and north porch by George Gilbert Scott; 1972 restoration.

Nave of snecked sandstone with plinth; tower and chancel of coursed sandstone blocks, some of which are reused Roman stones. Roofs: graduated Cumbrian slates on nave, lead on chancel; flat stone gable copings. Nave, north aisle and west and north porches; tower joining nave and chancel; chancel has vestry on north-west.

Interior: 5 bays to aisle arcade; groined vault to tower at 1st floor; part of foundations of north wall of basilica exposed under glass in the nave. In the north porch are sculptures and balusters from the earlier building. East window by L C Evetts.

Sources include: R Cramp Archaeological Journal vol CXXXIII 1976, 220-228, 'Jarrow Church'; HM and J Taylor Anglo-Saxon Architecture (1965) vol. I, 338-349.



Plan of 1866-1867 signed by Scott from Lambeth Palace Library. Note hand marked south window at ground floor of tower- that is now infilled with stonework- perhaps intended as a doorway?

**CHURCH LISTING - Grade I** 

## 4.0 PREVIOUS INSPECTIONS

This is the author's second inspection.

# 5.0 SCOPE OF REPORT

This report is made from a visual inspection from ground level. The tower and boiler house were also inspected. Drainage was inspected from ground level only. No testing of the drainage installation has been undertaken. The report is restricted to the general condition of the building and its defects. The tower was assessed in 2017 by ourselves and Structural and Civil Consultants Engineers, then Dr David Wiggins. Some of the comments in the text refer to those reports, as do some of the tower high level images used in this report. For a fuller picture of the tower see Dr Wiggins' report of March 2021.

#### **Executive Summary**

There is little change to the fabric and contents. Since the last inspection, previously reported defects of blocked tower roof downpipe flooding the floors and leak to the nave/aisle box gutter are now being attended to. The principal issue is the breaking tower stonework and rust to old reinforcement that is opening the joints. And whilst there hasn't been much in the way of change it isn't going to go away and substantial repairs must be planned for. Reorganising the tower drainage is a must. Gutter replacement is wanted at the S chancel and reslate of the W porch. It is vital that the PCC place an order for annual roof and gutter maintenance as it is beyond the abilities of churchwardens

The inside it is well presented, light and airy. Repair records are kept and the PCC are to be commended on managing the upkeep of this significant, historic church with limited funds but this is the time to put into place a longer-term repair plan.

#### **Structural Condition:**

The tower is of principal interest here in that it is ancient and has been much modified. It had an inspection by us with Structural and Civil Engineers in 2017 because of the last QI which advised, as had the previous QI by Chris Downs that there would be a need for repairs, and that was borne out by the engineer's report. The recommendation was to introduce additional tie rods, repair the existing ones and put in some bed reinforcement whilst removing the rusting iron plates in stone bed joints.

We procured a second opinion by Dr David Wiggins in March 2021 as corner cracking was making us doubt the original engineer findings and repair solution. His report summary is within the appendix.

He convincingly argues that the diagnosis and proposals put forward by SCC are flawed. He offers an analysis and solution that certainly chimes with my thinking, as I get to know the building better. He considers arch strengthening and tie rod repairs as not required and that the cracking to the structure is wholly due to the jacking action of the retro fitted bar in bed joints. This may also be causing inner and outer leaf separation.

The bar and tie rods are all probably of the time of the GG Scott reordering works.

In essence the tower is built on clay, leaning westwards- up to 150mm (hence the later buttresses in the nave), has rusting iron flat bars that need to be removed, the rust expansion (jacking) has particularly opened up the corner stonework at the SW at mid height and induced cracking throughout. He also notes historical and active cracking throughout (active caused principally by the jacking bars and more latent and historical; the tie bars and ground movement), that there are some loose stones (now repaired) and the S belfry mullion capital was thought to be cracked (later found not to be).

His immediate recommendations that included to temporarily securing the corner was carried out by Stone Technical in 2013 along with mortar packing of the open joints (they remain tight). And he recommended that movement monitoring is carried out to: the ground/foundation induced activity at the crossing; tower verticality and monitoring of cancel wall verticality and restraints. That hasn't been carried out.

Inside, the condition of the tower arches into the nave and chancel are much the same as the last QI.

There is some slight movement showing on the nave side of the tower arch, to the right-hand buttress on the S side that has been seen before and there seems no change to it.

Hairline cracking to the south window in the deafening chamber is unchanged.

A significant new defect is the soaking of the tower floors by a blocked tower roof downpipe. The water has come down all three floors and the deafening chamber floor is the worst affected with early signs of rot appearing in joists and boarding. Wet into the inner walls is maybe showing within the chancel side of the tower and there has been a leak in the crossing ceiling dripping onto the floor. If the timber floor rots any more its structural efficiency will be reduced, and if standing water seeps into the tower walls there will be degradation of the medieval fabric.

At the chancel N wall, there is a really minor crack (perhaps 1mm), inside and out, midway along the wall above where the door has been blocked in. I don't think that has been picked up before. It is exacerbated by the fact that the chancel has been repointed in cement ribbon pointing and this is brittle and it has snapped. There is no major opening up here, more a minor easing and flexing of the structure which has just snapped the brittle cement. Admittedly there is, on the outside up at high level, directly above the N door and the window above it, a crack at the eaves corbel and might it be that there is some dormant roof spread in the middle of the wall causing that upper level crack? It is now more obvious to see that that the chancel walls sway out to the north in the middle as they are tall and probably thin and ancient.

We have suggested budget figures for monitoring and masonry repairs along with tower roof gutter reconfiguration in the priority section. We have linked them both together s they both need scaffold.



#### **Roofs:**

The general condition of the roofs is good to fair, fair being the condition of the inboard slopes of the nave and aisle, the vestry requires some patch repairs, and the west porch needs reslating. There are areas of flashing that have been replace with lead substitute particularly at the vestry which are acceptable, but they are looking a bit untidy as they have been picked at.

#### **Rainwater Goods:**

They were all being cleaned out during the inspection. The north side chancel gutter has been replaced in half round and the south looks to need doing now- it leaks at joints and the backs are rusting away. The box gutter between aisle continues to make problems as the E outlet is constricted by buttress stonework and it has an adjoining roof scissoring on the tower buttress slope, causing a hidden part that is often overlooked. During the

gutter cleaning at the inspection a sapling trunk had taken hold and had penetrated the lead alternative lining to the buttress flashing (an alternative due to previous lead theft) causing a leak to the organ chamber east wall. And within the vestry. It has been active for many years.

There is a major problem with the blocked tower downpipe in the belfry now wetting the floors (and likely the walls) of the tower.

Elsewhere the gutters and downpipes, being cast iron, are generally fine, they lead to, in some cases gulleys, other times they discharge to the ground. Some of the gulleys are blocked and need to be running. Might Scott have put in drainage when he carried out the restoration works in 1866? Probably only on the northern side, opposite to the monastery. Because on the S, monastery side, the downpipes just discharge to the ground. The assumption here being that the archaeological impact of underground drainage would be too big and so never installed. A review of the record drawings would be interesting to know what he did.

#### Walls:

The walls are in good condition, whilst they have hard cement pointing, the stones are in good order, there's the odd stone that might need some attention in maybe 10-15 years but now there doesn't appear to be a need for any stone replacement. The W porch, which was built in 1888, in similar style to Scott's earlier N porch, is suffering from cement pointing at the column capitals and arch mouldings and parts have broken away and this will only get worse in time. It would be wise to consider some conservation repair works in the distant future. A conservator's report would be wanted first before any works are carried out. Was this designed by Scott?

### **Externals:**

The churchyard is closed and under the care of the Local Authority, the boundary walls to the N have been patch repaired (well) by the LA and trees have been trimmed or removed. There must be a shared responsibility between English Heritage and the Local Authority for boundary maintenance, as the walls wrap around the southern part of the site, enclosing the monastery area and these are breaking up in places, it will be worthwhile to the PCC to establish what their repair obligations are or if they are English Heritage's or the Local Authority's

Entrance gates on the W side are away for repair and the stone piers are cracking still because of iron expansion of the old hinges and this should be attended to, as this is the public entrance to the site, and it is important that it doesn't appear run down. The site info board (English Heritage's?) at the west entrance has been vandalised and sets a poor maintenance example and should be repaired promptly). The east boundary is overgrown and forms part of the cottage property and this is run down. BBA have independently reported on the cottage in the past.

#### Inside:

The church is very well presented, it is light and airy. It has an important display of historical stonework. It benefits from a shop but there are no w.c. facilities or servery.

Condensation remains on the viewing glass in the nave floor to the early foundations in the nave. The heating system is just about adequate (it has a 'new' boiler but old circuit). The lighting level has been upgraded. The glory of the church is the ancient chancel and it is kept very well and it really looks the part. Within the organ chamber there is poor decoration due to the aisle box gutter leak. It has also had its plaster patched at low level that is coming away. Is the condition a threat to the organ?

Paint breakdown at the nave SW corner, I think due to tracking moisture at the external abutment and area of poor masonry and pointing.

There has been two break ins since the last report one managed to get to the shop via the north porch resulting in damage to the door and small cash taken.

#### **Net Zero**

The major issue facing all churches is the cost of running heating, power and lighting. The church has an oil fired heating system. The boiler is 9 years old and tank renewed at the same time. There is no gas in the road nearby. There is energy saving guidance in the appendix.

There are Co2 figures at the rear of the report for all of the churches in the parish but no historical tracking of St Paul is available.

#### 7.0 CONDITION AND RECOMMENDATIONS

The following items are the observations made during the inspection. Below the item is a recommendation for work with a letter identifying its priority.

*In section 8 the same priority items are re ordered into their priority categories.* 

A- Work requiring urgent attention, B- Within 1 year, C- Within 2 years, D- Within 5 Years, E- A possible improvement or item to note, M- Routine Maintenance or monitor/watching brief

#### 7.1 SERVICES

The log book was up to date and recorded the work done, including routine testing.

- Water: There is a supply to the vestry sink which comes from the cottage in the N E corner of the site.

**Recommendation:** None.

Foul drainage: None.

**Recommendation:** None.

- **Surface water drainage:** Discharges to the ground on the S side and is to gulleys on the N and W. It is unknown if this is to a drainage system or to soakaways.

Recommendation: None.

**B Lightning conductor:** The system has a rod at the south east corner of the tower fixed to the south wall at high level. The tape winds round the tower anti clockwise to the north elevation where it drops to ground at the junction of the tower and vestry. The tape has been stolen before and now has galvanised protection. The date of the guard fitting is unknown.

**Recommendation:** Test outstanding. PCC to check with insurers what their recommended frequency is and arrange test accordingly.

- **Electricity:** Rewired in 1992. The system has many cabinets in the vestry corridor, all labelled and appearing in good order. Tested in Feb 2025, all ok.

Recommendation: none

- **Lighting:** A new system was installed in 1992. The tungsten lighting is being replaced by LED fittings. New in the nave in 2023 and The north nave in 2025

Recommendation: none

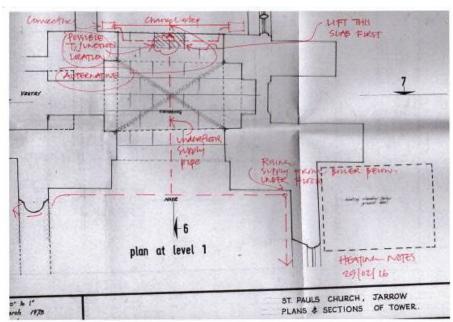
**Sound system**: Comprises a lectern mic, lapel mic and speaker. No loop.

Recommendation: None.

**B** PAT: Tested in March 2024.

Recommendation: 2025 test due

**B Heating:** Comprises cast iron radiators and surface pipework, additional fan convectors add to the heating to the nave and chancel. The oil fired boiler was replaced in 2016 along with a new oil tank and grille that is outside in its own hut in the se corner. The existing pipe from the tank to the basement boiler room was validated as being ok and not needing change. There was a water leak at the crossing and this was repaired in 2016 there has been trouble before here and looks to be a recurring maintenance issue). Leak to external oil feed pipe repaired.



2016 drawing of investigation at crossing

The system just about delivers adequate heating, it is only fired up for services and it is worth considering at running this at 12° during the heating season to see whether economies can be made and to improve the ambient temperature. Last test unknown

Recommendation: check that last test has been done

D Bells: There are two bells hung in a steel frame in the tower, they have been previously identified as of an early date, one with medieval inscriptions and the other due to its shape. The metal parts of the frame and fittings are rusting, guessing that these are at the date of the Victorian re-build by Scott. There is evidence that there is still a bit of primer on parts of the iron work suggesting that the parts that are built into the wall which are surround by concrete are still primed, there doesn't appear to be an expansion of rust. Howard Smith has visited since the last QI. Hardly rung. One bell rope to S side broken.



Incidentally the older oak frame timbers are still retained within the tower. I wonder how old the timber is. Might this be converted into fundraising furniture or objects?

**Recommendation:** Clean down rust and paint with inhibiting paint. Fix rope. Establish age of redundant bell frame.

**B Organ:** 1911 by JJ Binns. Grade II. Major overhaul by Harrison and Harrison 1997. The blower was resited from the pit under the vestry floor to within the organ enclosure. It is tuned regularly (at the inspection) and plays well though. Is the high level damp and dusty paint/plaster affecting the organ?

**Recommendation:** check organ loft environment is satisfactory.

**D** Rainwater goods: There is now an arrangement in place to inspect the rainwater goods, but infrequently. There are repairs needed.

**Recommendation:** Put into place a management structure to have their rainwater goods inspected annually.

#### 7.2 GENERAL

# Churchyard:



It is closed and the responsibility lies with Sunderland City Council. There are no standing gravestones, they have all been laid flat. Within the site are mature trees and it is unsure if these are covered by a tree preservation order.

Three trees previously reported to be threatening the N boundary wall as the graveyard is higher than the external ground levels have been trimmed.

The N boundary wall has been repaired in the areas that 3 trees above were pushing the wall, and the gate piers that have moved caps, the W is in good condition apart from one of the gate piers which has rusting iron breaking the stonework. The junction down to the S wall where it turns into brickwork is breaking up a bit and is this the responsibility of Historic England? The W and E wall is mostly covered with ivy and no easy to inspect but it looks ok.

**Recommendation:** see inspection section

- **Access for the Disabled:** The PCC has a resolution in place which addresses the requirements of the Discrimination Against Disabled Act.

Recommendation: None.

• Wheelchair access: Wheelchair users are dropped off at the W highway and this is level to the W porch. There are steps up to the low altar position and also a step at the chancel and at the communion rail. The open plan layout provides for an open space and the space flows well between the nave and the arcade to the N aisle. There are metal ramps to access the chancel.

Wheelchair users generally go to the front of the nave or are in the N aisle facing S.

Recommendation: None.

**B** Fire matters: The PCC should carry out an up to date Fire Risk Assessment in accordance with latest Regulatory Reform (Fire) Order 2006 (details available via the DAC, the local Fire Officer and/or the internet).

The inspection was due in April 2025

Recommendation: carry out an up-to-date Fire Risk Assessment

D H & S policy: last update in 2023

**Recommendation:** keep updating

- **Insurance:** The church is insured by Ecclesiastical.

**Recommendation:** None.

**D Asbestos:** In 2016 a report was carried out and none was found. There isn't an asbestos register. Boiler inspected in 2022 and none reported.

**Recommendation:** The PCC to create an Asbestos Register.

Bats: None reported.

Recommendation: None.

- **Security:** There is a security alarm system in place and that was serviced in May 2025.

Recommendation: None.

### 7.3 WORK SINCE LAST INSPECTION

New LED light fittings to nave and north nave
Installation of tower netting
N boundary wall repairs
Chancel N side gutter replaced
Smart meter installed in cottage
Vesty lights in LED

### 7.4 FABRIC INSPECTION

# 7.4.1 <u>TOWER</u>

### D Tower Roof:



Lead covered with a parapet gutter all the way round, its ponding on the N W side. Outlet on the S E side looks ok but silted up and must be cleaned out.

The lead covering is sound, solid timber battens and lead rolls. There is a ridge fixing nail showing and that could do with a patch over it. The hatch is copper but on rather rusty hinges these need attending to. Glass fibre pole that is rocking and it has a poor copper apron flashing trying to shield the lower lead







welded joint and that is cracked and will be leaking. There needs to be a grab handle at the hatch exit.

It has a very low coping, perilously dangerous in fact. The stones look alright, but they have been siliconed in that past that is beginning to wear away, as reported last time. The flashings are ok but interestingly it looks as if the plastic pointing has shrunk back and so it doesn't need attention now but it's not perfect but it will do for the moment. Really it all needs redoing in lime if there are other repair works to the tower that come in the future.

There is one cracked flashing on the W side and b the hatch but it doesn't really need anything doing at the moment.

**Recommendation:** remove silt from outlets, patch ridge nail, ease hatch hinges, provide grab rail, repair pole flashing and pole fixing down, repoint flashings. Reset fall of gutter when next carrying out significant repair works to the tower.



# C Belfry:



- Ceiling Roof timbers are ok, no water penetration through the leadwork. Timber a bit gnarled but to be expected.
- Walls The walls comprise large stones with belfry openings. General
  walling is ok. The balusters are wasting at their joints but they look
  sound.



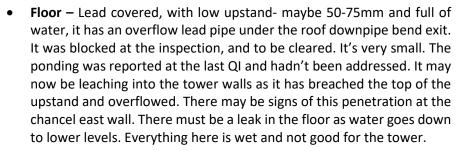














- There is a build-up of gravel and dust that needs to be removed along with a few more dead birds. There is a large light mounted on the floor with boxing. Does it work?
- **General** Is the ABT alarm still here?

The roof hatch covering is breaking up now and the perimeter frame of it is broken it needs replacing, there needs to be a grab handle at the top of the stair.

The glass fibre pole terminates at this level and it is a bit wobbly, it is secure enough, it will rattle in the wind and it will break apart in the end.

There is a large central floor beam, now very wet, with rusting bolt fixings some of the nuts have gone on it so we need to know what job it is doing on the ceiling below, it is beginning to break-up now and is a bit green in places with some rot on it, it is like a waterlogged fallen tree.

The belfry openings are covered by copper mesh and that is clearly not effective as there have been birds getting in here, they seem to be broken mostly at the bottom part and they all need fixing back.

There is a rusting metal bell frame carrying two bells which are tolled, the bell frame goes into concrete pads and these look sound. There is evidence of it having been primed and painted in the past therefore the buried part should still have its priming on and so it shouldn't expand, one would hope. The south bell has lost its rope fixing. They are rarely used.

There is a downpipe in the S E corner it's got runs on it and it is blocked.

The access stair up to the roof is sturdy but has a bit of damp to it, I don't think it has got a problem just yet but in the S E corner there is heavy ponding and there is some dirt and one of the strings is sat in that dirt so it is just getting wetter and wetter over time, it needs a proper sweep out in here.

**Recommendation:** sweep up floor, investigate if the floor drains water out and the lead floor if leakproof, check light works, replace hatch, provide grab rail, ensure bird mesh is effective, prime the bell frame, check bell operation, unblock the downpipe, check stair foot is ok



Ziminski, stonemason visit in 2023

# C Deafening Chamber:







- Ceiling There is no explanation for that central beam that is in the floor above (is it for the flagpole support?). The ceiling is beamed with boarding and the S E corner beam is affected by water.
- Walls The wall cracking is unchanged since the last inspection. This
  room has the two levels of tie rodding in it- up at ceiling and at floor
  level and it's all as before.



- Floor The floor has a bell hatch with loose floorboards in, there is also
  a piece of rotten plywood placed over a hatch in the floor which is
  rotten.
- Windows The windows have diamond leaded glazing. Is this a more modern edition because there is what looks like old bird droppings on the tie bars, so perhaps these were infilled in later years? It has polycarbonate and this is breaking down, the joints are breaking down on the S side they are very cobwebby and they really need a clean down to be inspected further. There is something odd about the position and design of the central baluster in the arch- it isn't in the middle of the wall- it's towards the inside, and the capital outside is cantilevered to catch the arch.



2020 image

- General In the S W corner just below the window cill there is a crack running through the joint just above the tie rod and this is reflected on the masonry on the outside, there is also a shear crack on the corner of the S W window jamb as it joins on to the cill. Also on the N as well as the S. The cill seems to be the most affected. It's obvious that this is the weak corner on the tower.
- **Recommendation:** clean down the glass and inspect. Clean up floor and ceiling, check for rot, repair hole in floor.

# D Platform Stage:



- Ceiling The ceiling is beamed and boarded and has had a lot of water penetration and needs to be checked for rot. This seems to be the worst affected.
- There is a pair of high level tie rods running N to S, these are painted, unlike the ones above it which are not. There is a lower tie rod of a bigger section and different pattern, unpainted on the E side running N to S. So does that suggest that there were two phases of tie rodding?
- Walls The walls are in good condition, arches are all sound.









• **Floor** – The floor has quite a slope to it running high at the south and low to the N.

It has a drainage hole on the N side (rodded at the inspection) I wonder therefore if the ceiling is a later introduction and that this actually used to be a shorter tower. The church report that water had come through the floor and showed on the tower crossing ceiling and floor below it.

• **General** – Dirty glazing needs sweeping up.

There is the parts of the redundant timber bell frame here, so what historical worth have they? And when was the steel frame put in?

The stair up to the deafening chamber is good but again there is no grab handle which is necessary.

**Recommendation:** clean up the floor, provide grab handle, review what to do with the bell frame timbers.

### M Tower Crossing:



2021



 Ceiling – The crossing comprises stone ribs and stone vaulting. The ribs are twisted slightly, due to ground settlement as the engineer reports. There as been water penetration in the ceiling and splashes on the floor.

### Walls –



- West Arch looks ok, there is one diagonal crack coming from the S buttress radiating upwards which we know of in the past. Suggesting of a crack in the arch on the nave side but not in the stone only in the joints. Hard pointing doesn't help.
- When weighed up with the observations outside it suggests that the S
  E corner of the tower has had differential settlement. Or other reasons,
  as there are competing forces acting on the structure due to tie rods
  and the massive buttresses may be dragging the tower a little but it's
  not going anywhere.



- East has different masonry in the middle- rebuild to the inner or outer edges? Some historic damp marking to the south side and the suggestion of damp in the middle section that may have come from the deafening chamber floor overtopping?
- **Floor** ok

Recommendation: monitor

# **TOWER EXTERIOR**

### D Tower

Recommendation: see comments in the summary

**East Elevation** – The pattress back is rusting and once thought to pushing the stone inwards- perhaps that's wrong, because of the Wiggins engineering appraisal. There doesn't even seem to be any metal in the stone beds, which is seen on the south and west elevations.



#### South Elevation –



The access platform has been repaired and the wall below it can now be seen. It all looks ok. There was a door way in the past The W buttress has a flue coming out of it and seems ok.

Some shaleing stone seen from the platform

The belfry baluster looks ok. Comments for the deafening chamber twin arch opening are the same as the north side.

The cracking comes round on to the S W upper pattress there is also a bit by the E pattress, this elevation also has horizontal bands of steel in.









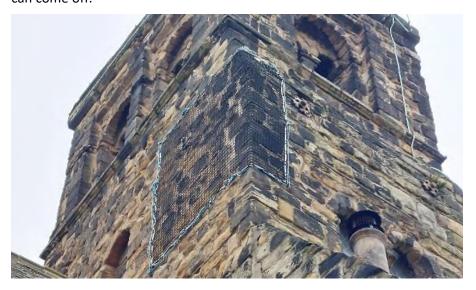
#### West Elevation -





2020 image for comparison

This has the most serious cracking at the S W corner at the deafening chamber level and in-between the tie rods, the corner was coming apart at the last inspection. Since then the joints have been packed and a net added to stop them falling out. The new lime mortar packing is sturdy and the stones (from the ground) don't look to have moved or that the mortar joints have opened up. Is the net checked? and it is worth considering if the net can come off.



There are also four noticeable bands of bedded metalwork in the stonework that starts from the corbel projection and there are four levels above that, there is also a further crack forming more towards the centre above the apex at the stonework above the top pattress, the belfry stonework and balusters all looks ok above it. It hasn't changed since the last inspection.

#### North Elevation –





The down tape comes down on this side, albeit crosses over on the E and comes from the S E corner, there is also another terminal on the N W corner.

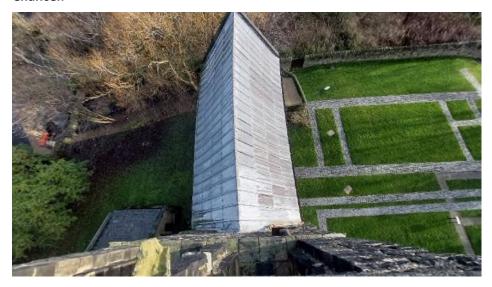
This elevation has tie rods showing at two stages, they seem ok, Is the crack running down from the deafening chamber ceiling tie rod pattress, coming down to the springing point of the arch, this was recorded by Wiggins in 2001 and looks the same.

There is something odd about the position and design of the central baluster in the twin arch- it isn't in the middle of the wall- it's towards the inside, and the capital outside is cantilevered to catch the arch. The pointing in of the polycarbonate to the windows looks rather ham-fisted.

The bottom pattress next to the buttress top is rusting badly.

# 7.4.2 ROOF COVERINGS

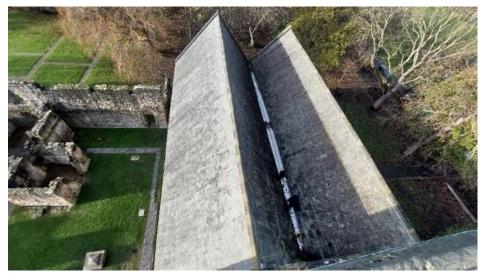
### M Chancel:

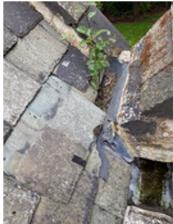




The chancel is a leaded roof of some age now (1930's?), Some patching at the E end in the past. The lead has oxidation and chemical reaction to impurities marking and is one to watch.

### B Nave:





Roof is joined to the north aisle by a box gutter, draining at both ends.



The nave was reslated in 2005 with Westmorland to the outer slope and reclaimed to the inner. This was repeated in 2008 to the north aisle and now the south slope reclaimed are slipping. Half of the stone ridges were renewed. Stainless steel box gutter between. Lead flashing thefts in 2009 resulting in lead alternative replacements.



Above images 2021-3 supplied by David Ferguson

At the W end the slates have been broken in the past by intruders getting into the box gutter, The configuration at the east end of the box gutter is complicated by the tower buttress. The box gutter travels through it by a s/steel chute (reported to be ok). Above that is a gutter to manage the junction of the junction of the buttress and south slope eaves, made further complicated by the gable upstand.



Lead is the preferred material here as it is too fiddly for s/steel but lead theft has caused leaks. It was replaced in lead alternative before the last QI- when we reported a shrub growing there- see side pictures. It was being removed at the inspection, revealing a hole causing a leak to the vestry and organ chamber. And it's likely it has been seeping for many a year. It shows the importance of having an annual roof inspection at the time of gutter and downpipe cleaning.

The E and N porches are in Westmoreland, and patchy in places. There is a general low-level need for various cracked and slipped slates to be replaced around the job. The North porch need is greater now.

**Recommendation**: repair east end box gutter aisle roof junction with buttress.

#### North Aisle:



Same as the nave apart from both water tables are cement pointed and are sound.

Recommendation: none

### B Vestry:





Both of these roofs are patched and not in the best conditions. Their flashings have been lost over time and been replaced by lead alternative which are tearing and looking slightly worn. There are a few slates missing where intruders have tried to get up on to the roofs in the past, some slates slipped as well.

**Recommendation:** tidy up the roof and flashings

#### B West Porch:







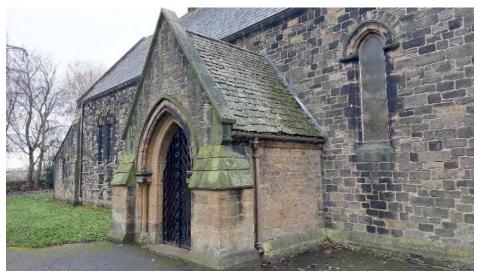
Terracotta ridge tile, bedding ok. The flashing to the N aisle is in lead and ok. The flashing to the N gable is by soaker and this has been covered in cement but it is ok, but on the W face the soakers aren't covered in cement they are in place but someone has tried to pull them away and also tried to pull away the lead against the N aisle. Multiple replacement in non matching slates.

Abutment flashing to the gable is in cement (over lead?) and cracked in places but generally ok, some of the slating cracked as well. It's abutment to the nave wall is in cement and doesn't look very obvious what is there. On the S side there is slate loss and some bad patching in the past.

It's looking shabby and if funds allow should be recovered.

Recommendation: reslate roof

### **E** North Porch:





Slating looks sound, lead abutment flashings intact (not cement covered like the W porch). Is this a possible lead theft location?

Recommendation: consider covering lead in mortar

# 7.4.3 RAINWATER GOODS

# B General:

Rainwater goods are cast iron gutters and downpipes sometimes in different patterns. Same condition as last two inspections.

The chancel north gutter has been replaced.





The south looks to need it soon as it leaks at the joints. Downpipes are ok and some were unblocked at the inspection. The gullys are mostly running but the vestry is ponding.



The major problem is the blocked tower downpipe, inside the belfry) which was blocked at the last QI so it's been overflowing for at least 5 years within the tower.

















See tower section for observations. It's time to redesign the system to omit the pipe and go back to spitters to remove the maintenance problem.

Vestry gutters are ok and the porches are generally ok.

**Recommendation:** carry out repairs 1, temporary access to unblock tower downpipe, 2 East end of nave box gutter buttress gutter, 3 chancel S gutter replacement.

# 7.4.4 WALLS

- **General**: There are some repairs that could be carried out but there is a bigger project beckoning in the tower. The comments below are all routine really and they can be put into work in 10-15 years' time.

Recommendation: none

# - Nave:



**South side** – Over sailing cornice to hold up the guttering has minor open joints, some open joints to part of the stonework at the west end that may be causing the plaster peeling inside. Cement pointed in various ages, a couple of the plinth







stones have lost their face and the bottom part of the wall the pointing is slightly poor but it will all survive. Has there been a fire in the E buttress corner?









Four windows, three of which are twin lancets the hood moulds have seen some wear and above them the relieving arches pointing is poor in some instances, some water penetration from the hood moulds because of open jointing and there is delamination of the arch stonework. There is a daylight gap seen from inside to the Westernmost window where the arches meet. The cills have been patched in cement and that is breaking up in places. Windows are covered in polycarbonate are a bit dusty and cobwebby but fair. The glass is diaper and some of it is polycarbonate covered of various opacity.

Evidence of earlier copper tape damp proof system.







**West side** – Large feature gable with rebated water tabling, some of the high level stonework beneath the water tabling on the S side is a little worn but that is probably just the pollution been washed away, the walling over all is generally sound. Two twin light lancet with circular light above, permanently pointed in polycarbonate glazing in grey mortar looks poor, the jointing of the polycarbonate is breaking down. The stonework of the windows is all ok. Buttress between that and the N aisle is a little worn at high level but satisfactory.

#### North Aisle:



**West side** - this is a smaller version of the N aisle window where the three forms are all joined into one, they look ok, just some water wearing away of the pollution up at the upper levels but all sound as is the buttress on the corner.

**North side** – Some open joints to the gutter support corbel, the walling itself is all sound. Same design of windows as the aisle on the S.



This has more modern over glazing in polycarbonate- more see through. But there are some cobwebs, behind this is pictorial glass. Some wear to the ashlar losing its crust slightly but not really problematic. Arches are in better condition on this side.

# East side -





Gable above the vestry's roof looks ok, the walling itself is alright apart from slight erosion to the N side above to the right of the windows. Twin light lancets, hoodmould is ok, generally alright, the ceiling of one of the lancet cills on the S side doesn't look right, large horizontal joint from cabling close to where the hopper outlet is, where there is some greenery.

#### Chancel:

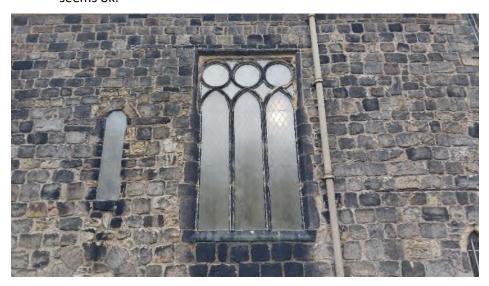


North side – There is a minor crack in the middle of the walling above the single lancet up at high level, there is some cracking inside at low level to the blocked in N door, it might we wall head spread and that the walls are slender and tall. The crack doesn't descend to the ground. However, it's not an issue, just something to keep an eye on.

The walling is generally sound, there are four windows, from left to right;



 Wide tracery three light, no hoodmould to this. Slight wear to the upper parts and possibly a crack to the inner crossing transom but seems ok.



- 2) Narrow, vertical window with pictorial glass has lost a little bit of pointing to the apex. Below that blocked in N doorway is all sound.
- Square shaped three light with circular tops, slight erosion to the frame at the top, seemingly sound, quite slender.
   These three windows have aged polycarbonate to them.
- 4) Small window with some wear to the arch stone this has a new combination metal guarding and polycarbonate cover. Below that a piece of metal in the wall, above it is a big horizontal piece of iron and you can see how it is jacking to the left hand side, to the right of this window is the down tape, tidied up since the last inspection.

**Recommendation:** include removing the north chancel embedded steel as part of the tower repair works

#### West side –





Cross looks ok as does the water table. The general walling is ok, at low level are two massive buttresses and a mini one in between.

Large central wide tracery three light with some erosion to the bottom of the mullions and cill but not advancing. The arch dressings are ok. The label stop on the S side is badly eroded. Hoodmould looks ok, above that is a large circular window with three small porthole style windows around it, the big circular has rusting metal mesh covering it as do the little portholes.

**South side** – Walling is all generally sound, it has three small window openings. The fourth is the large three light wire tracery which has open joints at the cill. The polycarbonate over most of it is very grey.

#### D Vestry:







Unused door- decoration is poor. Stonework generally ok. The projecting vestry door is unused, the handle is missing and painted in-situ rather roughly.

The stonework could do with a bit of dusting off but it is sound enough, it is rather a forgotten corner here. Should it be fenced off or might that make it worse?



The N side has a pair of single lancets together with slight wear to the stonework but nothing troublesome the windows are guarded with clear polycarbonate behind that. Sandwiched in between it are some rusting metal security bars, suggesting of cracking at high level to the abutment to the buttress, is it moving fractionally if it is as its only 1mm.

**Recommendation:** update doors and ironmongery decoration.

North Porch: Original to Scott's design.





Some light loss of the surface crust to the walling, buttresses but ok.

Internally- Open rafter ceiling. Walling is ashlar and okay. The North wall has some open joints at the dressings. The aisle entrance stonework is good, although it has bird marking. The moulded archway to the nave has some open joints to it. The door and gate is in good condition.

Recommendation: none

# E West Porch:







An addition, 22 years after the church was built. Likely added to protect the Nave from west winds and a possible internal reordering (the font was on the right as you went in, but is now towards the east end of the nave).

Open joints on the S side. Couple of open joints on the buttresses.





2020



2025

The W doorway has been heavily repaired in cement mortar and this has led to the breakdown of the stonework at the joints, it is such a shame because it has become a mess. It has affected all of the arch and the jamb stonework. More damage can be done in removing the cement. It really needs a conservator report or experienced stonemason to report on remedial proposals. The N capital has broken off The nook shafts are ok apart from a loss of surface on one them. The ground feels a little bit too high for their bases. Perhaps that has ironed out a step, perhaps they brought the tarmac level up a bit higher to do that. Door within it is fine.

#### Inside-



Open timber roof. The walling is all ashlar apart from the W. There is spalling to the stonework on all porch sides apart from the W gable of the nave. Internal gable keystone has dropped- as seen at last two inspections suggesting eaves spread although this is not obvious on the outside. The flooring is concrete with a 3mm crack at the church entrance.

**Recommendation:** procure remedial report on stonework

#### 7.4.5 **EXTERNALS**

#### B General:



The church has a closed graveyard in the care of the Local Authority. It is grassed with mature trees. It has stone boundary walls and gates to the entrances at the W and W. Whilst in mostly good condition, there are areas of cracking and open joints to walling and gate piers. There are quite a significant amount of mature trees on the site, it would be interesting to know if these are covered by tree preservation orders. The Local Authority are managing them well. Trees affecting the north side have been reduced.

Recommendation: keep vegetation down by the cottage to discourage opportunity for anti social gathering, repair north sign board, reset west gates

and repair piers, establish boundary ownership and thus responsibilities as the south is breaking down and needing timely repairs.

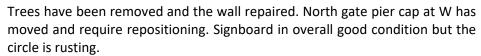
#### **East Side**



Boundary not easily discernible. Part of it forms the boundary wall of the cottage. Looking rather run down now and will become a antisocial hub if vegetation is allowed to increase.

#### **Northside**







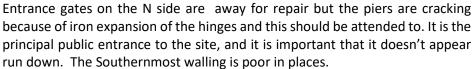






#### Westside













#### Southside

Is there a shared responsibility between English Heritage and the Local Authority? As the walls wrap around the southern part of the site, enclosing the monastery area, these are breaking up in places, it will be worthwhile the PCC understanding if the repair obligations are English Heritage's or the Local Authority.



Brick erosion at sw corner. Pic from 2020









#### 7.4.6 INTERIOR

#### D Nave and North Aisle:



 Ceiling – The nave and aisle roofs are open and formed of five bays by trusses, with a lower ridge, scissor beams and strutting up to a higher ridge. The rafters are infilled with boarding and some joints are open. But all ok.



• They share a box gutter and the east end leaking has been a recurring problem.. First through lead theft, then poor work at the outlet, then lack of maintenance to lead alternative resulting in a sapling rooting in the lining- reported at the last QI causing leaks and at this inspection the sapling has been removed showing a 25mm hole in the lining. The consequence of this constant leak is the walling is in poor condition























Walls – The walls are painted white. There has been plaster loss in the
past but only the skim coat and this has been decorated over. Minor
crack over the south side western window (slim daylight gap at the apex
of the inner plate tracery). Dropped arch as seen before. All probably
as a consequence of differential settlement at the corner.











Arcade all looks fine.

- **Floor** The flooring throughout the church is sandstone paving and there are some open joints, particularly to the trafficked areas. The glazed in floor panel allows a view of the lit C 7<sup>th</sup> foundations of the north wall of the nave of the Saxon western church. It has much condensation on the underside obscuring the view.
- Windows The windows within the nave and aisle are all in good condition, although there is some erosion to the cills of a couple of them on the S side. south side western window. Slim daylight gap at the apex of the inner plate tracery of south, western window with dropped arch as seen before.

**Recommendation:** repoint open joints and bed down loose slabs in flooring, repair floor viewing panel

#### **Nave Rear Area**



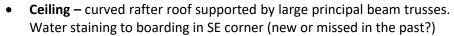




Formed behind the shop at the west end of the aisle. Contains shelving and storage for many items. It is beginning to feel full. Loose slab by rad at north door.

#### M Chancel:

















- Walls Exposed stonework that received a repoint in cement pointing
  with surface ribbon decoration. Little can be done other than keep the
  external pointing in lime to let the wall breathe as best as possible. The
  alternative is to remove it, repoint in lime and then limewash it. There
  are other more pressing issues to contend with.
  - Crack at the N door commented on in the external section, otherwise everything else is ok.
- Floor Couple of open joints at the sanctuary steps and sinking paving slabs adjacent to the floor memorial in the chancel, where the older paving is eroded and deteriorating. But this is part of its character.
- The previous QIs identifies heating pipes beneath the chancel floor and that this area is of interest to archaeologists. There has been a geo physical or ground penetrating radar survey by Professor Sam Turner of Newcastle University who suggests that there may be a crypt.
- The previous report's recommendations were to probably abandon removal of the pipes and patch the flooring where required for safety.

Recommendation: monitor SE ceiling boarding for possible water ingress

**Tower Crossing:** see tower section above

#### D Vestry and corridor:





- **Ceiling** The board panelling at the first aid kit could be redecorated. Some ceiling paint peeling. Roof leak corresponding the E end of box gutter and other side of the wall in the organ chamber.
- Walls painted plaster. Historical water staining. Vestry wall decoration is good
- **Floor** The floor is squeaking slightly by the doorway.
- General It has multiple cupboards and these are containing garments, pamphlets, booklets etc. They also house the distribution board and electrical cabinets. There is also further electrical works above the entrance into the vestry and within the cupboard to the left-hand side of it.
- Has a sink and hot water heater.

**Recommendation:** repair floor and redecorate







#### E Organ Chamber:







The arcade wall has had water ingress in the past and flaking plaster - from leaking valley gutter at the E end between the nave and aisle. The room is full of organ so it's not really possible to tell what wall and ceiling condition is like.

**Recommendation:** investigate wall and ceiling condition.

#### Windows, Doors, External Joinery and Ironwork:

Repeated from last QI

Saxon stained glass excavated and reinstated in the south chancel at high level. C19<sup>th</sup> and C20th pictorial glass in north aisle and chancel.

East window by Leonard Evetts.

Chancel north wall by John Piper.



All window glass appears in good condition. They are protected by polycarbonate sheeting externally. Attempts to remove the last of previous external sealing in some areas has been unsuccessful.

See Terrier and Inventory for description of artefacts.

Including:

Saxon Cross within aisle exhibition

Saxon Dedication Stone inset in the chancel arch

Saxon glass within the middle south chancel window

Saxon Aumbry

Chair, venerated as Bede's

Late C15th Choir stalls

**Bishops Chair** 

Stone octagonal bowl font

Recommendation: none





#### D Boiler House:



Brick vault ceiling with render coming away and the walls are also brick and somewhat sooty. Floor is on two levels, dry, in concrete and the room contains various bits of stonework and lumber and could do with a clear out. Contains a Harrier GTS boiler new in 2106 utilising the existing oil feed pipe that runs under the Monastery site from the remote oil tank. Metal door in frame jams in the opening, rusted a bit and needs easing. The retaining brickwork walls are ok, steps are a bit slippery, and stonework below is a little bit patchy but is ok.

Recommendation: ease door and sweep steps







#### 8.0 PRIORITIES

The following order of priority sets out the relative urgency of foreseeable repairs over the next 5 years. It is not a definitive programme of work and subject to funding, items further down the list could be brought forward if desired. They are priced individually but savings can be made by grouping the works and taking advantage of scaffold for other works. Scaffold costs are not included in the following costs.

A- Work requiring urgent attention, B- Within 1 year, C- Within 2 years, D- Within 5 Years, E- A possible improvement or item to note, M- Routine Maintenance or monitor/watching brief

Priority Location and Scope £

A - URGENT

None

#### **B-WITHIN 1 YEAR**

В	<b>Lightning conductor:</b> Test outstanding. PCC to check with insurers what their	•
	recommended frequency is and arrange test accordingly.	

- **B PAT**: 2025 test due -
- B Heating: check that last test has been done -
- B Organ: check organ loft environment is satisfactory.
- B Fire matters: carry out an up-to-date Fire Risk Assessment -
- B Vestry: tidy up the roof and flashings 500
- B West Porch: reslate roof 15k
- B Rainwater goods: carry out repairs 1, 2 2k
  - 1, temporary access to unblock tower downpipe,
  - 2 East end of nave box gutter buttress gutter, 3, 6-8k
  - 3 chancel S gutter replacement.
- **B Externals:** keep vegetation down by the cottage to discourage opportunity for antisocial gathering, repair north sign board, reset west gates and repair piers, establish boundary ownership and thus responsibilities as the south is breaking down and needing timely repairs.

### **C-WITHIN 2 YEARS**

С	<b>Belfry:</b> sweep up floor, investigate if the floor drains water out and the lead floor if leakproof, check light works, replace hatch, provide grab rail, ensure bird mesh is effective, prime the bell frame, check bell operation, unblock the downpipe, check stair foot is ok	1-2,000
С	<b>Deafening Chamber:</b> clean down the glass and inspect. Clean up floor and ceiling, check for rot, repair hole in floor.	250
	D- WITHIN 5 YEARS	-
D	<b>Bells:</b> Clean down rust and paint with inhibiting paint. Fix rope. Establish age of redundant bell frame.	500
D	<b>Rainwater goods:</b> Put into place a management structure to have their rainwater goods inspected annually.	-
D	H & S policy: keep updating	-
D	Asbestos: The PCC to create an Asbestos Register.	-
D	<b>Tower Roof:</b> remove silt from outlets, patch ridge nail, ease hatch hinges, provide grab rail, repair pole flashing and pole fixing down, repoint flashings. Reset fall of gutter when next carrying out significant repair works to the tower.	750
D	<b>Platform Stage:</b> clean up the floor, provide grab handle, review what to do with the bell frame timbers.	250
D	Tower	1. 1500-2000
	Recommendation: 1. movement monitoring to be carried out to: the	2.100-175,000
	ground/foundation induced activity at the crossing; tower verticality and monitoring of cancel wall verticality and restraints.	3. 5-10,000
	2. There is also a future masonry repair project for the tower that hasn't been formally specified or costed but budget for £100 - 175,000. This is an uplift to the 2018 budget figures which were £85 - 145,000. The project would attract significant archaeological interest and thus increase costs.	4. 25,000
	3. Also a reconfiguration of the tower drainage is required, so set aside 5-10k for this.	
	4. Note that scaffold not allowed for in any prices but for guidance suggest 25k if used for both the tower masonry and roof drainage.	
D	Vestry: update doors and ironmongery decoration.	350
D	Nave and North Aisle: repoint open joints and bed down loose slabs in flooring, repair floor viewing panel	500
D	Vestry and corridor: repair floor and redecorate	500
D	Boiler House: ease door and sweep steps	250
D	Boiler House: ease door and sweep steps	100

### E- IMPROVEMENT/ NOTE

E	North Porch: consider covering lead flashings in mortar	500
E	West Porch: procure remedial report on stonework	2,000
E	Organ Chamber: investigate wall and ceiling condition.	-
	M- MAINTENANCE/ MONITOR	
М	Tower- monitor wall facing east in chancel	-
М	Chancel: monitor roof covering condition	-
М	Chancel: monitor SE ceiling boarding for possible water ingress	-

#### **APPENDICES**

**Church Plans** 

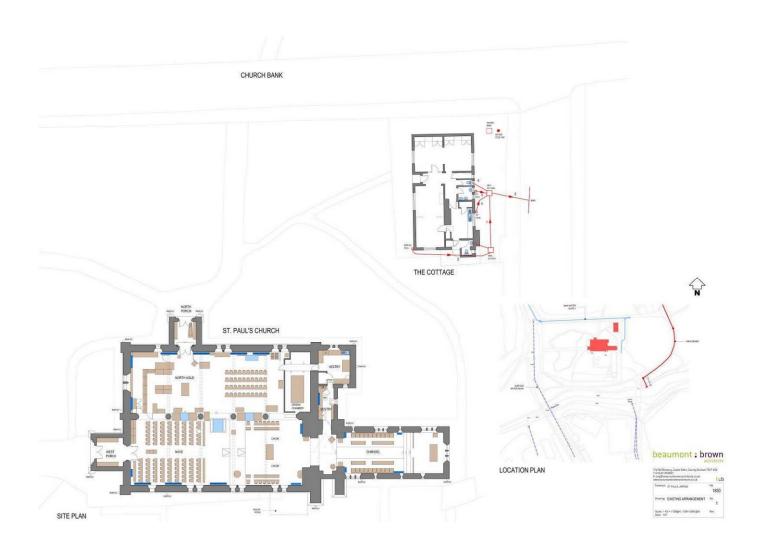
**Explanatory Notes** 

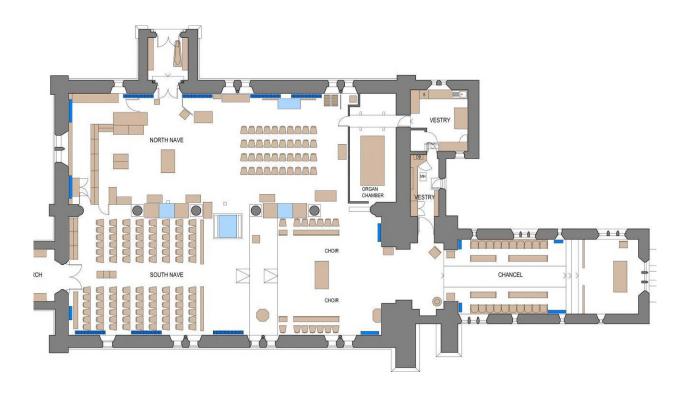
Guide to Routine Maintenance & Inspection of Church Property

Engineer summary

Practical Path to Net Zero Energy Footprint

#### **CHURCH PLAN**







#### **EXPLANATORY NOTES**

- Any electrical installation should be tested at least every quinquennium by a registered NICEIC electrician, and a resistance and earth continuity test should be obtained on all circuits. The engineer's test report should be kept with the church log book. This present report is based upon a visual inspection of the main switchboard and of certain sections of the wiring selected at random, without the use of instruments.
- B Any lightning conductor should be tested every quinquennium in accordance with the current British Standard by a competent engineer, and the record of the test results and conditions should be kept with the church log book.
- C A proper examination and test should be made of the heating apparatus by a qualified engineer, each summer before the heating season begins.
- D A minimum of 2 water type fire extinguishers (sited adjacent to each exit) should be provided plus additional special extinguishers for the organ and boiler house, as detailed below.

Type of Extinguisher

Large churches will require more extinguishers. As a general rule of thumb, one water extinguisher should be provided for every 250 square metres of floor area.

#### Summary:

Location

General area	Water
Organ	CO <sup>2</sup>
Boiler House	
Solid fuel boiler	Water
Gas fired boiler	Dry powder
Oil fired boiler	Foam (or dry powder if electricity supply to boiler room cannot easily be isolated)

All extinguishers should be inspected annually by a competent engineer to ensure they are in good working order.

Further advice can be obtained from the fire prevention officer of the local fire brigade and from your insurers.

E This is a summary report only, as it is required by the Inspection of Churches Measure; it is not a specification for the execution of the work and must not be used as such.

The professional advisor is willing to advise the PCC on implementing the recommendations and will if so requested prepare a specification, seek tenders and oversee the repairs.

Although the measure requires the church to be inspected every 5 years, it should be realized that serious trouble may develop in between these surveys if minor defects are left unattended. Churchwardens are required by the Care of Churches and Ecclesiastical Jurisdiction Measure 1991 to make an annual inspection of the fabric and furnishings of the church, and to prepare a report for consideration by the meeting of the PCC before the Annual Parochial Church Meeting. This then must be presented with any amendments made by the PCC, to the Annual Parochial Church Meeting. The PCC are strongly advised to enter into contract with a local builder for the cleaning out of gutters and downpipes twice a year.

Further guidance on the inspection and the statutory responsibilities are contained in *How to Look After Your Church. The Churchwarden's Year* gives general guidance on routine inspections and housekeeping, and general guidance on cleaning is given in *Handle with Prayer*, both published for the CCC by Church House Publishing.

- G The PCC are reminded that insurance cover should be index-linked, so that adequate cover is maintained against inflation of building costs. Contact should be made with the insurance company to ensure that insurance cover is adequate.
- H The repairs recommended in the report will (with the exception of some minor maintenance items) are subject to the faculty jurisdiction.
- I Woodwork or other parts of the building that are covered, unexposed or inaccessible have not been inspected. The adviser cannot therefore report that any such part of the building is free from defect.

This appendix is based on A Guide for the Quinquennial Inspection of Churches, Diocese of Birmingham 1993.

#### A GUIDE TO ROUTINE MAINTENANCE AND INSPECTION OF CHURCH PROPERTY

It is good practice for the PCC to appoint a fabric officer to take care of the routine maintenance of the church. This officer must report to the PCC and remain subject to its control and direction. The Care of Churches and Ecclesiastical Jurisdiction Measure 1991 requires the churchwardens to inspect the fabric of the church at least once a year, to produce a report on the fabric of the church and the articles belonging to it to the PCC, and to make that repot to the annual parochial church meeting on behalf of the PCC. The following list gives an indication of the time of year when certain jobs should be done. It is not exhaustive.

Spring, early summer Whenever necessary inspect gutters and roofs from ground level and inside

especially when it is raining.

Clear snow from vulnerable areas.

Clear concealed valley gutters.

Make full inspection of the church for annual meeting.

Check church inventory and update log book.

Check bird-proofing to meshed openings.

Sweep out any high level spaces. Check for bats and report any finds to

English Nature.

Cut any ivy starting to grow up walls and poison.

Spray around the base of the walls to discourage weed growth.

Check heating apparatus and clean flues.

Summer Arrange for routine service of heating equipment.

Check interior between second week of April and second week of June for active beetle infestation and report findings to the professional adviser.

Check all ventilators in the floor and elsewhere and clean out as necessary.

Spring clean the church.

Cut any church grass.

Cut ivy growth and spray (again).

Recheck heating installation before autumn and test run.

Arrange for any external painting required.

Autumn Check gutters, downpipes, gullies, roofs etc. after leaf fall.

Rod out any drain runs to ensure water clears easily, especially under pavements.

Inspect roofs with binoculars from ground level, counting number of slipped slates, etc. for repair.

Clean rubbish from ventilation holes inside and out.

Check heating installation, lagging to hot water pipes etc. and repair as necessary.

Winter Check roof spaces and under floors for vermin and poison.

Check under valley gutters after cold spells for signs of leaking roofs.

Bleed radiators and undertake routine maintenance to heating systems.

Check temperatures in different areas of the building to ensure even temperature throughout and note any discrepancies.

Annually Arrange for servicing of fire extinguishers.

Inspect abutting buildings to ensure there is no build-up of leaves or other debris against the walls.

Check the condition of outside walls, windows, sash cords, steps and any other areas likely to be a hazard to people entering the building.

Check the extent of any insurance cover and update as necessary.

Every 5 years Arrange for testing of the electrical systems.

Arrange for the testing of any lightning protection.

It is vital, especially with older people, to keep them warm and well ventilated at all times. The fabric officer should ensure that such ventilation is taking place, especially after services.

#### 003-Church of St Paul, Jarrow





#### 5.0 Summary and Recommendations

- 5.1 The belfry exhibits a complex range of structural distortions throughout, with several suspected root causes in play. It is difficult to completely distinguish them from each other, however in broad terms we believe that there are two aspects to the present condition:
  - Ground/foundation-related movement. The tower appears to have tilted west, apparently
    resolved by the buttressing within the nave. The crossing arches, particularly the western arch,
    appear to have spread leading to sliding and/or outward rotational settlement of the raking
    buttresses to the south. Much of the extent of the movement is clearly of a longstanding history,
    although there is a current character to some of the small cracking which indicates some residual
    on-going activity. We make no recommendations for repairs at this time, this activity should be
    monitored over the next quinquennial period.
  - 2. Embedded iron bed-joint strapping reinforcement. The principal defect identified by the appraisal is the distress exhibited by the south-west corner at about mid-height: the coarse tearing cracking and outward lean of an essentially free-standing column of corner quoins. This is a dangerous issue. This is an outworking of the jack action of the embedded iron flat-bars, raising the height of the south-west corner pier. We disagree with the diagnosis put forward by Structural & Civil Consultants Ltd in this regard.

#### Recommendations for temporary holding repairs:

- 5.2 There are several areas of structural defect which are dangerous and present a public safety hazard, which should receive early attention:
  - Unbonded free-standing quoined corner;
  - Mullion corbel capital split
  - Several loose stone units throughout
- 5.3 We strongly recommend that an experienced rope access contractor implement some temporary holding repairs to reinstate the preload on the quoined corner and strap the corner to prevent falling masonry, until permanent remedial intervention can be carried out.

#### Recommendations for permanent structural repairs:

- 5.4 We make the following high-level recommendations for structural repairs, however these will be subject to detailed design in some cases:
  - Erect a braced scaffold suitably designed to the tower to achieve access;
  - Temporarily tie the upper arches and cross-tie the south-west corner up the height of the tearing crack;

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#### A PRACTICAL PATH TO 'NET ZERO' CARBON FOR OUR CHURCHES

#### **Net Zero**

How churches can reduce their energy.

On 12 February 2020 General Synod recognised that we are in a climate emergency and committed to an ambitious carbon reduction target of Net Zero by 2030. The culture is changing fast, both outside and within the Church; questions of sustainability should inform all our buildings-related decisions from now on, and this report highlights opportunities for action. See also the Practical Path to Net Zero Carbon (PPNZC) document below, and the Sustainability Countdown to 2030 section below.

The Church of England Research and Statistics Team has created an Energy Footprint Tool This will tell your church what your 'carbon footprint' is, based on the energy you use to heat and light your buildings, and is part of the Online Parish Returns System.

You will need to input the data from the most recent year's electricity and gas/oil etc. bills, and the tool will then tell you the amount of carbon produced annually by heating and lighting your church building; it will also offer some helpful tips to reduce your carbon emissions. As you use the tool each year, you will be able to see how your church improves, as you take steps to cut your carbon footprint. Most dioceses now have a <u>Diocesan Environmental Officer</u> in post, who may be able to offer support, including on questions of ecology and biodiversity, and signpost you to <u>further resources</u>.

**Sustainability Countdown to 2030:** It will be for the PCC to set its priorities for sustainability improvements, and I would encourage you to use the Practical Path to Net Zero Carbon (PPNZC) appended to this Report to help set these. The following gives you a suggested timetable to address in the next five years, as we prepare for 2030 (references relate to the PPNZC):

[List follows, combining items from the report with non-condition items from the PPNZC, such as renewable electrical tariff.]

## A practical path to "net zero carbon" for our churches

These recommendations aim to help churches reduce their energy use and associated carbon emissions. They are based on the findings of our church energy audit programme and input from of a range of professionals in the field.

NOTE: Many of the suggestions below require faculty; please seek input early on. If the church interior is of historic, artistic, architectural or artistic interest, seek professional & DAC advice first, before making changes; stabilising the environment for these interiors is important to minimise cycles of treatment, with their inherent carbon cost.

# A. Where do we start?

These are actions that nearly all churches can benefit from, even low occupancy churches used only on a Sunday. They are relatively easy, with relatively fast pay back.

#### The building itself:

- A1. Maintain the roof and gutters, to prevent damp entering the building and warm air escaping.
- A2. Fix any broken window panes\* and make sure opening windows shut tightly, to reduce heat loss.

- A3. Insulate around heating pipes to direct heat where you want it; this may allow other sources of heat to be reduced in this area.
- A4. If draughts from doors are problematic, draught-proof the gaps\* or put up a door-curtain\*.
- A5. Consider using rugs/floor-coverings (with breathable backings) and cushions on/around the pews/chairs. **Heating and lighting:**
- A6. Switch to 100% renewable electricity, for example through Parish Buying's energy basket, and "green" gas.
- A7. Match heating settings better to usage, so you only run the heating when necessary\*.
- A8. If you have water-filled radiators, try turning-off the heating 15 minutes before the service ends; for most churches this allows the heating system to continue to radiate residual warmth\*.
- A9. If you have radiators, add a glycol based "anti-freeze" to your radiator system and review your frost setting.
- A10. Replace lightbulbs with LEDs, where simple replacement is possible.
- A11. Replace floodlights with new LED units.
- A12. If you have internet connection, install a HIVE- or NEST-type heating controller, to better control heating.
- A13. If your current appliances fail, then replace with A+++ appliances.

#### People and policies:

- A14. Complete the Energy Footprint Tool each year, as part of your Parish Return, & communicate the results.
- A15. Create an Energy Champion who monitors bills and encourages people to turn things off when not needed.
- A16. Write an energy efficiency procurement policy; commit to renewable electricity & A+++ rated appliances.
- A17. Consider moving PCC meetings elsewhere during cold months, rather than running the church heating. **Offset the rest:**
- A18. For most low usage "Sunday" churches, once they have taken steps like these, their remaining non-renewable energy use will be very small. For the majority, all they need to do now to be "net zero" is offset the small remaining amount of energy through <u>Climate Stewards</u> or other reputable schemes.
- A19. Also, think about your church grounds. Is there an area where you could let vegetation or a tree grow?

# B. Where do we go next?

These are actions with a reasonably fast pay back for a church with medium energy usage, used a few times a week. Perhaps half of churches should consider them. Most actions cost more than the ones above, and/or require more time and thought. Some require some specialist advice and/or installers. They are often good next steps for those churches with the time and resources to move on further towards 'net zero'.

#### The building itself:

- B1. If you have an uninsulated, easy-to-access roof void, consult with your QI about insulating the loft\*.
- B2. If you have problematic draughts from your door, and a door curtain wouldn't work, consult with your QI about installing a glazed door within your porch, or even a draught-lobby\*.
- B3. Consider creating one or more smaller (separately heatable) spaces for smaller events.
- B4. Consider fabric wall-hangings or panels, with an air gap behind, as a barrier between people and cold walls. **Heating and lighting:**
- B5. Learn how your building heats/cools and the link to comfort, by using data loggers (with good guidance).
- B6. Improve your heating zones and controls, so you only warm the areas you are using.
- B7. Install TRVs on radiators in meeting rooms & offices, to allow you to control them individually.

- B8. Consider under-pew electric heaters and/or infra-red radiant panel heaters\*, which keep people warm without trying to heat the whole church space. Radiant panels are especially good for specific spaces like chapels and transepts, which you might want warm when you don't need the whole church to be warm.
- 39. If you have radiators, install a magnetic sediment "sludge" filter to extend the life of the system.
- B10. Consider thermal and/or motion sensors to automatically light the church when visitors come in, for security lights, and for kitchens and WCs.
- B11. Install an energy-saving device such as Savawatt on your fridge or other commercial appliances.
- B12. Get your energy supplier to install a smart meter, to better measure the energy you
- use. People and policies:
- B13. Vary service times with the seasons, so in winter you meet early afternoon when the building is warmer.

# C. Getting to zero

These are bigger, more complex, projects, which only busy churches with high energy use are likely to consider. They could reduce energy use significantly, but require substantial work (which itself has a carbon cost) and have a longer payback. **They all require professional advice, including input from your DAC.** 

#### The building itself:

- C1. Draught-proof windows\*.
- C2. If you have an open tower void, insulate or draught-proof the tower ceiling \*.
- C3. Double-glaze or secondary-glaze suitable windows in well-used areas such offices, vestries and halls\*.
- C4. Internally insulate walls in well-used areas such offices, vestries and halls\*.
- C5. If you have pew platforms, consider insulating under the wooden platform with breathable materials\*.
- C6. Reinstate ceilings, and insulate above\*.

#### Heating and lighting:

- C7. Install a new LED lighting system, including all harder-to-reach lights, new fittings & controls.
- C8. Install solar PV, if you have an appropriate roof and use sufficient daytime electricity in the summer.

## D. "Only if...."

These are actions you would do at specific times (such as when reordering is happening) or in very specific circumstances. **Nearly all require professional advice, including input from your DAC.** 

#### The building itself:

- D1. If you are reroofing anyway, then insulate the roof, if appropriate for your roof\*.
- D2. If you have an uninsulated wall with a cavity (typically build 1940 onwards), then insulate the cavity.
- D3. If the building is regularly used & suitable, such as a church hall, consider appropriate external insulation or render, appropriate for the age and nature of the building\*.

#### Heating and lighting:

- D4. If there's no alternative that does not run on fossil-fuels, then replace an old gas boiler or an oil boiler with a new efficient gas boiler.
- D5. If yours is a well-used church which you want to keep warm throughout the week, then consider an air or ground source heat pump. Ground source heat pumps are more expensive and invasive to install than air source heat pumps, but run more efficiently once installed, depending on ground conditions.
- D6. If you are doing a major reordering or lifting the floor anyway, and yours is a very regularly used church, then consider under-floor heating. This can work well in combination with a heat pump (above).

#### Church grounds:

D7. If you have car parking that is sufficiently used, EV charging points for electric cars can work out cost neutral or earn a small amount of income for the church. Note, they will increase the church's own energy use, but will support the uptake of electric cars. They could be good in combination with solar PV panels.

E. By	These actions are often mentioned in this context, but are generally not
exception	recommended, because of the risk of harm to the fabric, energy used, and/or the cost.
☐ Standard se	condary glazing on the main, historic windows (this can be inefficient, expensive, & cause damage).
<ul><li>Install solar</li></ul>	thermal panels to generate hot water (hot water use is generally not high enough to justify it).
□ Background	I space heating at all times unless needed for stabilisation of historic interiors (high energy use).

<sup>\*</sup> If interiors are of historic, architectural or artistic interest, seek professional & DAC advice first.

#### **ENERGY FOOTPRINT REPORT**

There is no data for any years other than 2024.

2024 Report provided by Martin Howard, Buildings for Mission Secretary, Diocese of Durham It is a total parish report and usage has increased 10 Tonnes Co2 since last year.

Logged in as: Bethan Still Diocese: Durham

#### Results for your parish: Jarrow and Simonside

Thank you for taking the time to fill out the Energy Footprint Tool.

The results set out in this summary mean you now have useful information to help you plan and keep track of the different steps you are taking to reduce your carbon footprint year on year.

Thanks to data from churches like yours, the Church of England's Net Zero Carbon Programme team can monitor progress towards becoming net zero carbon by 2030.

The Church of England's ambitious Net Zero Carbon by 2030 campaign aims to equip, resource, and support all parts of the Church to reduce carbon emissions from the energy used in its buildings, schools and through work-related transport by 2030.

The ambitious target was set out by General Synod in response to the climate crisis. Climate change hits hardest on the poorest communities round the world and on the poorest people in every society. Responding to the climate crisis is an essential part of our responsibility to safeguard God's creation and achieve a just world and supports our local mission.

What you do in your church witnesses to our communities that we are people who care about climate justice, now and for the future

Thank you for working together with us to help care for God's creation.

#### **Total Parish Carbon Footprint**

The carbon emissions calculated in this table only include buildings that have been reported through the EFT survey.

	This Year	Last Year
Gross CO <sub>2</sub> emissions (Tonnes) ?	54.5	46.2
Net CO <sub>2</sub> emissions (Tonnes) ?	54.5	46.2

If the figure here is not what you expected, this may be because you have been using a supplier that was previously listed as 'green', but that supplier is no longer on an updated list for 2025. Find out more <a href="here">here</a>

#### **Total Parish Emissions Data**

The carbon emissions calculated in these charts only include buildings that have been reported through the EFT survey.

