#### METHOD STATEMENT

Proposal: Listed Building Consent for the retention of unauthorised works, namely removal of ground floor wall and subdivision of first floor room with new partition wall, new doors and door fittings to facilitate relocation of bathroom from ground floor to first floor. Also proposed is infilling of holes left by removal of pipework, replacement of window head and sills, replacement of windows to rear elevation, alteration of first floor rear window, replacement of existing rear door and installation of mechanical extraction to bathroom

Address: Primrose Cottage 4 Main Street Bolton by Bowland BB7 4NW

**Application no: 3/2023/0270** 

Revision: 0

Date: 27 April 2023

## Introduction

This Method Statement has been prepared in support of the above application to provide additional information in respect of works 7, 8 and 9, as identified by drawing no. 0426 02, revision 0, dated 29/03/2023. The photos referred to below are attached as appendix 1.

## Work no. 7

This work is described as follows:

Make good holes left by former 110mm WC branch pipe and 40mm bath/ basin pipe with stone and mortar to match existing (currently infilled to an unsatisfactory standard). A small amount of stone suitable for this repair will be generated by the replacement of concrete sills (proposed work no. 9).

### Issues:

- Redundant pipework appears to remain in the wall and has been infilled with a portland cement based mortar (see photo 1).
- Near vertical joints indicate the window above was once a door opening. The majority (if not all) of the infill is pointed with a mortar mix that is likely to be portland cement based. It is also possible that the stonework to this infilled panel is bedded on a mortar mix that is portland cement based.

## Proposed method:

 Carefully hack out redundant pipes and surrounding portland cement based pointing, using hand tools.

- Infill hole with surplus stone created by work no. 9, bedding with matched lime based mortar. See below for mortar specification.
- Repoint where surrounding Portland cement based pointing has been removed. See below for mortar mix and repointing method.

#### Work no. 8

This work is described as follows:

Replace existing broken 6 inch window head with a new stone window head to match existing.

### Issues:

- The window head is broken and requires replacement (see photo 2).
- It has a punched face with tool marks at an angle of 45 degrees from the vertical. This indicates that it might be older then other windows opening to this elevation, which have smoother and more regular stone heads and sills (where not concrete).

## Proposed method:

- Mason stone head out of matching stone, including punch marks at an angle of 45 degrees from the vertical. Do not overwork stone to try create an artificially aged and weathered appearance. Rather it should be legible as a sensitive stone repair/ replacement.
- Carefully prop stonework to avoid or minimise any further movement.
- Carefully remove existing window.
- Carefully hack out broken stone head and replace, bedding with the matched lime based mortar. See below for mortar specification.
- Repoint around new head and renew any surrounding pointing that becomes loose or missing, using lime based mortar. See below for mortar mix and repointing method.
- Refit new flush-fitting windows, in accordance with approved detail.

## Work no. 9

This work is described as follows:

Replace existing 3 inch concrete window sills with new 5 inch stone window sills to match existing.

#### Issues:

• There is not a clearly preferable style of sill for the rear elevation. A simple sawn stone sill set to fall, is therefore specified.

# Proposed method:

- Acquire simple sawn and square stone sills that match the unweathered colour and composition of the existing first floor bedroom/ shower room sill. Allow for overhangs to match bearings of above heads and to shed water clear of the building.
- Remove existing windows.
- Carefully hack out concrete window sills and replace with stone sills, bedding with matched lime based mortar. Ensure sills a set to fall and shed rainwater. See below for mortar specification.
- Repoint around new sill and renew any surrounding pointing that becomes loose or missing. See below for mortar mix and repointing method.
- The areas of portland cement based pointing below each window sill may be removed (if desired) and the stonework repointed with the matched lime based mortar.
- Refit new flush-fitting windows, in accordance with approved detail.

#### Mortar

The rear elevation has been patch pointed in the past, especially below the concrete ground floor window sills, using what appears to be portland cement mixed with standard soft building sand. This material is inappropriate for this historic building both technically and visually.

All new mortar used, both for pointing and bedding, should carefully match the colour, texture and composition of the existing/ historic lime based mortar. This is to be done by removing a small amount of historic lime based mortar and having it carefully analysed and matched by a specialist (such as Womersley's).

# **Repointing Method**

## Preparation

- The cement based pointing and mortar should be carefully removed using hand tools.
  No angle grinders or similar shall be used. If removal proves to be damaging to the
  stonework (e.g. parts of stone breakaway with the mortar), work should be stopped
  and the LPA contacted for advice.
- As a general rule, all loose mortar should be removed and joints raked-out to a depth that is double their width.
- Joints should be thoroughly cleaned from top to bottom. Use brushes, low pressure compressed air or wash out the joints with a hose.

• Mortar should be mixed in accordance with instructions provided by a specialist supplier (such as Womersley's).

## **Application**

- Stonework and prepared joints should be thoroughly wetted.
- Mortar should be firmly pushed into the back of the joints in layers using pointing irons, avoiding large volumes of deep filling. Pinning stones should be used to fill wide and deep joints in the same style as the original build.
- Joints should be filled close to flush with the surrounding masonry or to the weathered edge.
- To ensure good compaction and adhesion within the joint, the mortar should be tamped firmly with a stiff bristle brush as it starts to firm up.
- Once the surface of the mortar is firm lightly scrape the surface to expose the aggregate.
- Use hessian to protect curing mortar from wind, sun and drying out too quickly.

# APPENDIX 1 – PHOTOS REFERRED TO ABOVE

# Photo 1



Photo 2

