33 Cumberland Terrace, London NW1 4HP

Structural Report 2021_02_23 Page 1 2298_Report01_A

Report Contents

- 1.0 Introduction
- 2.0 Existing Building, Site and Ground Conditions
- 3.0 Existing Information / Drawings
- 4.0 Proposed Works
- 5.0 Discussions
- 6.0 Conclusions



1.0 Introduction

- 1.1 This report has been completed by Martin Shortt (MIStructE, CEng) for Harrison Shortt Structural Engineers Ltd.
- 1.2 Harrison Shortt Structural Engineers Ltd. have been appointed by Mrs Janet Jacobs to advise on the proposed refurbishment works to 33 Cumberland Terrace including forming the opening through the party wall between the Dining Room (2.08) and Reception Room (2.09).
- 1.3 Our client does not currently own the property as such it has not been possible to complete opening up works.
- 1.4 We have not visited the building.

2.0 Existing Building, Site and Ground Conditions

- 2.1 The existing building is a Grade I listed five storey (including lower ground floor) building constructed in 1826 as a series of terraced houses.
- 2.2 The buildings were originally traditionally constructed with brickwork external and party walls. The front façade is rendered full height and the rear wall is rendered at lower ground and ground floor levels.
- 2.3 The original internal load bearing walls are likely to have been brickwork.
- 2.4 The floors and roofs are likely to have been constructed with timber joists.
- 2.5 The roof is a rolled lead clad flat roof that is likely to be constructed with timber roof joists. There are sections of slate clad pitched roofs to the front of the building.
- 2.6 The building is likely to be founded on corbelled brickwork foundations on London Clay.
- 2.7 The building was severely damaged during World War II and the building was rebuilt in 1959 with a concrete frame and concrete beam / clay pot floors. Refer to 3.1 showing the bomb damage and 3.2 showing the rebuilt structure.
- 2.8 Parts of the front and party walls were rebuilt as part of these works with concrete / blockwork. Refer to 3.3 showing the junction of the front and party walls at No.31 at first floor level.
- 2.9 When the building was rebuilt in 1959 it was converted to flats.
- 2.10 Openings have been formed through the party walls to laterally connect the building.
- 2.11 No.33 is on the second floor and extends over three of the original houses (14, 15 and 16). No.33 is accessed from a communal entrance that serves 26-35 Cumberland Terrace and there appear to be two flats per level.

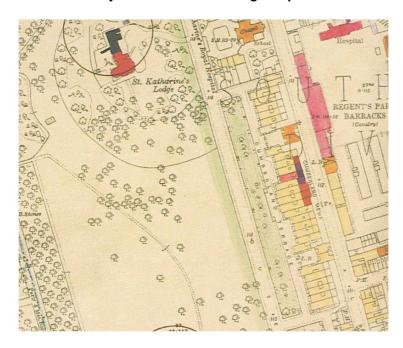
Structural Report 2021_02_23 Page 2 2298_Report01_A

- 2.12 No.31 is on the first floor and directly beneath No.33.
- 2.13 As part of the works completed at No.31 on the first floor in 2019/20 openings were formed through the party walls at the front of the building. Refer to 3.2 below.

Structural Report 2021_02_23 Page 3 2298_Report01_A

3.0 Existing Information / Drawings

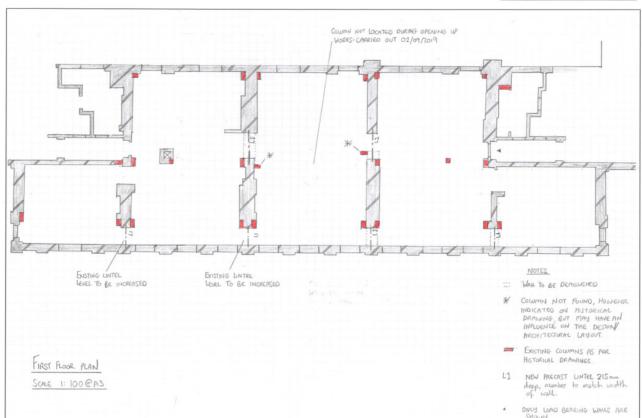
3.1 London County Council Bomb Damage Maps 1939-45.



3.2 Price and Myers drawing showing existing structure and proposed works 31 and 38 at first floor.

PRICE&MYERS ※ ♣ ۞ ◎
Consulting Engineers







Structural Report 2021_02_23 Page 4 2298_Report01_A

3.3 Openings made within the existing party wall at No.31 at first floor showing concrete construction.



33 Cumberland Terrace, London NW1 4HP

Structural Report 2021_02_23 Page 5 2298_Report01_A

4.0 Proposed Works

- 4.1 The proposed works involve forming an opening through the party wall to connect the Dining Room (2.08) and Reception Room (2.09).
- 4.2 The front and party walls were rebuilt in 1959 with concrete / blockwork at first floor and second floor level. Refer to 3.3 showing the junction between the front and party walls at No.31 at first floor level.
- 4.3 The party wall between the Dining Room and Reception Room appears to be 18 ½" thick (470mm). It will be necessary to install 4No. Supreme R22A precast concrete lintels (215mm deep x 100mm wide) with 150mm minimum bearing.
- The lintels should be installed using a "half and half" method where 2No. lintels are installed from one side of the wall and drypacked in place and then the other 2No. lintels are installed from the other side of the wall and drypacked. The reveals should be rebuilt when the lintels are installed.

5.0 Discussions

5.1 As the structure in the area of the proposed works has been rebuilt no historic fabric will be removed as part of the proposed works.

6.0 Conclusions

- The proposed works involve forming an opening through the party wall to connect the Dining Room (2.08) and Reception Room (2.09) at No.33 at second floor.
- 6.2 Openings have been formed at No.31 at first floor directly below the proposed openings in No.33.
- 6.3 The front and party walls were rebuilt in 1959 with concrete / blockwork in the area of the proposed works.
- The proposed works are relatively straightforward and can be completed without any adverse structural effect on the building or adjacent properties.