## 2.1 Overview

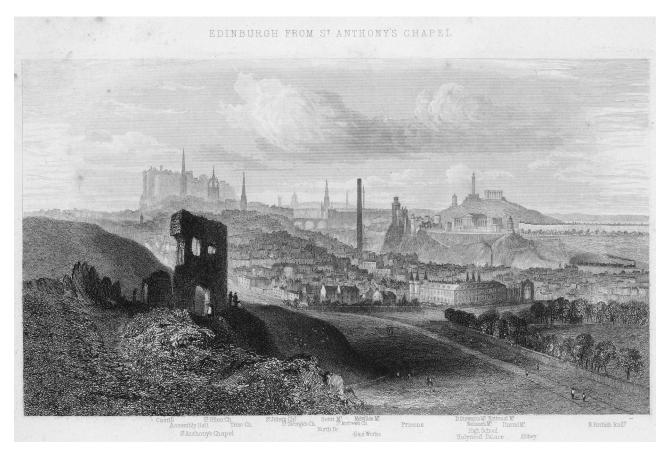
This report presents the results of an extensive programme of archaeological excavation and historic building recording undertaken by AOC Archaeology Group in the area of the former New Street Bus Depot (Canmore Site Number 191564) and the New Street Gasworks (Canmore Site Number 52212) to the north and south of Calton Road, Canongate, Edinburgh. These areas form the core of the prestigious New Waverley development site, formerly Caltongate, which is located within the World Heritage centre of Old Town Edinburgh.

The excavation works were designed to satisfy the requirements of the local planning authority, City of Edinburgh Council, who are advised on archaeological matters by the City of Edinburgh Council Archaeology Service. The excavation works were completed in accordance with the principles inherent in NPPG 5 (SOEnD 1994a), NPPG 18 (SODD 1999) and PAN 42 (SOEnD 1994b). The

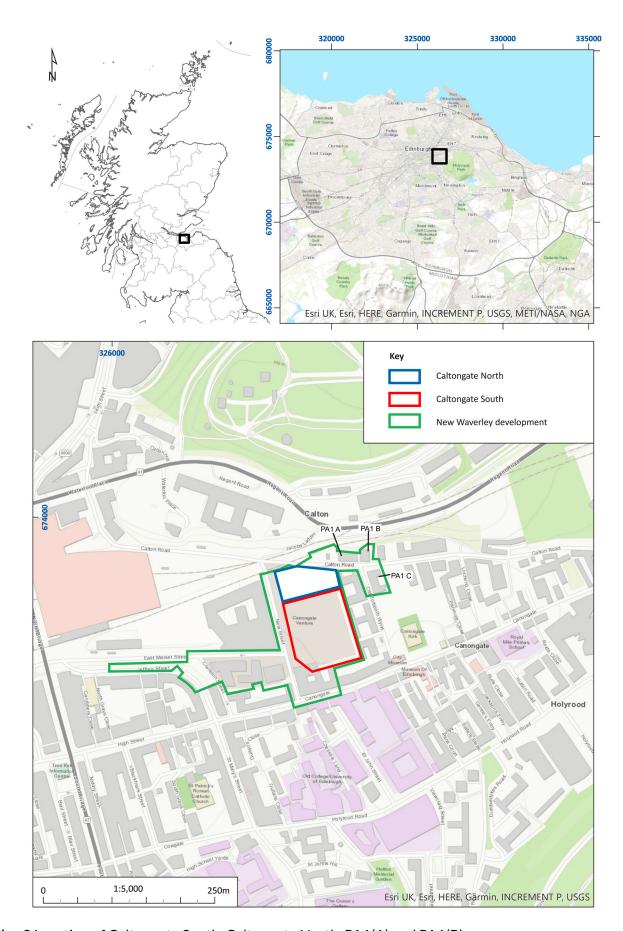
fieldwork was sponsored by Mountgrange Ltd and the post-excavation analysis was funded by New Waverley Advisors Ltd.

The objective of the archaeological works was to fully excavate and record all the archaeological features revealed below the recently demolished New Street Bus Depot relating to the 19th-century New Street Gasworks and any earlier features. The works were carried out between August 2006 and May 2008. The excavations followed on from a previous evaluation (test trenching) of the site undertaken in 2000 (Gooder 2000), the results of which led to the requirement of the full excavation of the site by the City of Edinburgh Council.

The excavations revealed substantial surviving remains of brick and sandstone walls and gasworks ephemera surviving to depths of 4m below layers of overburden, which relate to the known 19th-century New Street Gasworks. Buried garden soils of medieval and post-medieval date were also recorded beneath these remains, revealing important evidence of the medieval and post-medieval occupation of the Canongate. Three major phases of Gasworks



**Illus 1** Early engraving of the City of Edinburgh: vista from St Anthony's Chapel showing the New Street Gasworks chimney at the centre ( $\bigcirc$  HES)



Illus 2 Location of Caltongate South, Caltongate North, PA1(A) and PA1(B)

construction were recognised, which could, in the main, be matched to the surviving cartographic and photographic records.

The excavations provided the opportunity to reveal a significant industrial site as well as being the first major fieldwork investigation of an urban gasworks in Scotland. It has enabled an examination of how these gasworks functioned and expanded with the introduction of more efficient systems and new technology. The lighting of the city with coal gas was at the forefront of the industrial revolution taking place at the beginning of the 19th century and represents an industry of pivotal importance in the modern development of Edinburgh as well as a key site that illustrates Scotland's industrial heritage (Illus 1). Both Edinburgh and Glasgow were the locations of Scotland's first commercial gas companies, begun in 1817, several years before the next gasworks ventures in Scotland, including one at Leith which was set up from 1822 onwards (Cotterill 1976: 121).

## 2.2 Location

The archaeological works at the former New Street Bus Depot and earlier Gasworks covered an extensive area within the World Heritage Site of Edinburgh's Old Town, with New Street to the west, the rear of buildings fronting the north side of Canongate to the south and Calton Road to the north (Illus 2). The archaeological works were undertaken in two distinct phases, with the majority of the site located to the south and centre (0.405ha) excavated in 2006 and 2007 (NGR: NT2630 7385), and another phase to the north (0.45ha) excavated between October 2007 and May 2008 (NGR: NT2626 7390). Prior to the archaeological works, a layer of concrete slab

floor pertaining to the former bus depot covered most of the site, which was bounded by brick walls associated with it. Beneath this were layers of rubble from the demolition of the New Street Gasworks, which was largely removed in the early 20th century. Beneath the demolition rubble was the extensive sub-surface remains of the New Street Gasworks (Illus 2 & 28). These two New Waverley sites, North and South, covered a large extent of the footprint of the New Street Gasworks and the results of these works will be reported together.

In April and May 2008 archaeological works were also undertaken in two areas to the south of Calton Hill, Edinburgh: PA1(A) and PA1(B) (Wilson 2008b; 2008c). Associated with this work was a programme of historic building recording of the surrounding structures (Sproat 2008). The PA1(A) and (B) sites will be considered together in Appendix 1. Further works associated with the New Waverley development on East Market Street (to the west) and on the corner of Old Tolbooth Wynd and Calton Road (to the east) are reported elsewhere (Lowther 2018; Engl forthcoming).

## 2.3 Geology

The superficial deposits in much of the area south of Calton Hill comprise Devensian–Diamicton till formed up to 11.8 million years ago in the Quaternary period and the local environment was previously dominated by ice age conditions (BGS Geology Viewer). In the area formerly covered by the New Street Gasworks, the bedrock is commonly sandstone of the Ballagan Formation, sedimentary bedrock formed between 345 and 359 million years ago, again in the Carboniferous period (BGS Geology Viewer).