

# ARCHAEOLOGY AT THE WATERFRONT

## 1: INVESTIGATING LIVERPOOL'S HISTORIC DOCKS

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2014

23  
LANCASTER  
IMPRINTS

*Published by*  
Oxford Archaeology North  
Mill 3  
Moor Lane Mills  
Moor Lane  
Lancaster  
LA1 1QD  
(Phone: 01524 541000; Fax: 01524 848606)  
(website: <http://oxfordarchaeology.com/>)

*Distributed by*  
Oxbow Books Ltd  
10 Hythe Bridge Street  
Oxford  
OX1 2EW  
(Phone: 01865 241249; Fax: 01865 794449)

*Printed by*  
Berforts Information Press, Oxford, UK

© Oxford Archaeology Limited 2014

ISBN 978-1-907686-18-4  
ISSN 1345-5205

*Series editor*  
Rachel Newman  
*Indexer*  
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*Design, layout, and formatting*  
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Front cover: *Excavations of the Mersey Railway Company's Pumping and Ventilation Station, at Mann Island*  
Rear Cover: *Excavations at the new Museum of Liverpool site, Mann Island (top right); Excavations of the Countryside Neptune site, Mann Island (top and bottom left)*

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I M P R I N T S

Lancaster Imprints is the publication series of Oxford Archaeology North. The series covers work on major excavations and surveys of all periods undertaken by the organisation and associated bodies.

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## Glossary

Counterfort     A strengthening buttress set at right-angles to a retaining wall

Lucam     A structure that projects out from a building's roof, protecting a hoist, and allows this to winch up goods clear of the building

## Abbreviations

BM	Boat Museum (Ellesmere Port)
CWT	Centum Weight (Hundredweight)
GWR	Great Western Railway
LHPC	Liverpool Hydraulic Power Company
LLC	Leeds and Liverpool Canal
LMR	Liverpool and Manchester Railway
LNWR	London and North Western Railway
LORC	Liverpool Overhead Railway Company
LUAU	Lancaster University Archaeological Unit
LVRO	Liverpool Record Office
LYR	Lancashire and Yorkshire Railway
MAS	Merseyside Archaeological Service
MDC	Merseyside Development Corporation
MDHB	Mersey Docks and Harbour Board
MMMMAL	Merseyside Maritime Museum, Maritime Archives and Library
MPTE	Merseyside Passenger Transport Executive
MRC	Mersey Railway Company
NMLFAU	National Museums Liverpool Field Archaeology Unit
NWSIAH	North Western Society for Industrial Archaeology and History
OA	Oxford Archaeology
OS	Ordnance Survey
SURCC	Shropshire Union Railway and Canal Company
SWL	Safe Working Load
UNESCO	United Nations Educational, Scientific, and Cultural Organisation
WHS	World Heritage Site

## Summary

Liverpool's historic waterfront forms an internationally significant area, which holds importance for the eighteenth- and nineteenth-century development of world trade, commerce, and the mass movement of people, as evidenced by the United Nations Educational, Scientific, and Cultural Organisation (UNESCO) inscribing World Heritage Status on a c 3.5 km stretch of the historic dock system in 2004. Between 2006 and 2008, Oxford Archaeology North and the National Museums Liverpool Field Archaeology Unit conducted extensive programmes of archaeological investigation, both within and adjacent to the World Heritage Site, funded by Countryside Neptune, the National Museums Liverpool, BAM Nuttall Ltd, Balfour Beatty Civil Engineering Ltd, Pierse UK, and British Waterways.

This investigation comprised detailed historical research, excavation, and building survey, which examined parts of the historic dock system that had been progressively created during the eighteenth and nineteenth centuries to the north of Liverpool's first dock (the Old Dock). These focused on two adjacent areas at Mann Island (centred on SJ 3403 9008 and SJ 3394 9004). These areas lay directly north of Canning Dock and the Canning Graving Docks and were examined as a prelude to the construction of a large commercial development (Countryside Neptune site) and also the new Museum of Liverpool. The work provided an unique insight into the establishment of the Dry Dock (later Canning Dock), which opened in 1739, and associated eighteenth-century land reclamation which resulted in the creation of Nova Scotia and Mann Island, an area that historically was known as 'Sailor-town'. This scheme of excavation also uncovered significant evidence relating to George's Dock Passage, constructed in 1775, several eighteenth-century warehouses and slipways, and also late eighteenth-century land reclamation associated with the formation of both Manchester Basin and Chester Basin, which formed two adjacent tidal basins used by a distinctive type of sailing barge, known as a Mersey flat. In addition, the excavations allowed the subsequent sequence of early nineteenth-century land reclamation to be discerned, which led to the extension of Mann Island and the conversion of Manchester Basin initially into a half-tide dock, and later into a fully impounded wet dock, with a double-gated river entrance. Manchester Dock was infilled between 1928 and 1936, apparently leaving the dock intact, since the excavations uncovered the walls of the nineteenth-century dock and river lock, as well as the *in situ* inner lock gates and their opening/closing mechanisms. The excavations across this area, and to the east of George's Dock Passage, also produced evidence for the form and workings of the adjacent quaysides during the nineteenth and early twentieth centuries. This evidence comprised remains relating to warehouses, cranes, bridges, and hydraulic-power systems, as well as other features associated with the policing and maintenance of the docks, and the operation of the George's Dock Pumping and Ventilation Station, which served the Mersey Railway Company's tunnel.

In addition to the Mann Island development sites, the programme of archaeological investigation also extended to a detailed examination of the footprint of the extension to the Leeds and Liverpool Canal, which extended for 2.5 km between Stanley Dock and Canning Dock (SJ 3382 9211 to SJ 3408 9003). This involved historical research and excavation across the Mann Island section of the canal extension, which complemented that work completed at the Countryside Neptune and Museum of Liverpool sites, and also within its Pier Head (centred on SJ 338 904) and Central Docks sections (centred on SJ 334 914). The Pier Head section produced evidence for late eighteenth- and early nineteenth-century land reclamation and the construction of river walls associated with the progressive extension of the western and northern quays of George's Dock; remains of George's Dock Dry Basin, which opened in 1771; elements of a late eighteenth-century pier associated with George's Dock; and early nineteenth-century remains associated with the remodelling and extension of Chester Basin. Moreover, the scheme produced evidence for twentieth-century activity directly adjacent to the 'Three Graces', which forms the centrepiece of the World Heritage Site. Similarly, the Central Docks section of the canal extension allowed an examination of the waterfront's nineteenth- and twentieth-century remains, such as those associated with Prince's Dock, which opened in 1821, and a quay between Victoria and Trafalgar Docks.

Aside from the structural remains, a large collection of artefacts was also recovered during the archaeological investigations across Mann Island and along the Leeds and Liverpool Canal extension. This material principally comprises pottery and fragments of clay tobacco pipe and these, along with the other elements of material culture recovered during the Oxford Archaeology North excavations, are summarised, in order to build an impression of Liverpool's growing industry and its trading contacts throughout the eighteenth and nineteenth centuries.

This volume also summarises the archaeological investigations undertaken by Oxford Archaeology North and the National Museums Liverpool Field Archaeology Unit in other parts of the historic waterfront, prior to 2009. It therefore contains summary details of the excavations completed at Duke's Dock (centred on SJ 3335 3891), Rochdale Basin (centred on SJ 3413 8938), Queen's Dock entrance lock (centred on SJ 3446 8916), Canning Dock (centred on SJ 3423 8996), and at Pier Head (centred on SJ 3379 9022). More significantly, there is a summary of the archaeological work undertaken at the Old Dock (centred on SJ 3437 8997), which represents the world's first commercial wet dock, opened in 1715.

## Acknowledgements

The archaeological investigations undertaken on Mann Island and along the Leeds and Liverpool Canal extension owe their success to many individuals, and also the close co-operation between the archaeological contractors and the various companies involved in the redevelopment of Liverpool's waterfront. With regard to the work at the Countryside Neptune site, on Mann Island, Oxford Archaeology North would like to thank Countryside Neptune for commissioning the archaeological investigation, and in particular Ian Bradshaw, Stephen Osuhor, and Tim McCormac for their interest and enthusiasm. In addition, thanks are extended to Dave Hodgkinson and Helen Martin-Bacon, of Wardell Armstrong, who acted as the archaeological consultants for Countryside Neptune. The archaeological investigation at the Countryside Neptune site would not have been possible without the help and support of the principal contractor, BAM Nuttall Ltd, and especially the support of their site team, which included Neil Millward, Peter Marner, David Mahoney, John-Luke Smith, Eamonn Murphy, and Dave Hanlon. During the fieldwork at the Countryside Neptune site, on-site support was provided by Terry Mason, and his team, from Tidale, the demolition contractors, whilst a debt of gratitude is extended to the machine-plant operators, from both Boundary and Mahers plant hire, for their patience and professionalism in undertaking the machining. Hylift operator Des Alcock, of Hylift Access Hire, must also be thanked for his assistance in capturing aerial photographs of the bulk excavation across the Countryside Neptune site as it progressed.

The archaeological evaluation and excavation work at the Countryside Neptune site was undertaken by Vix Hughes, Andy Lane, and Caroline Raynor, with the assistance of Ric Buckle, Caroline Bulcock, Ged Callaghan, Tim Christian, Pascal Eloy, Will Gardner, Fiona Gordon, Annie Hamilton-Gibney, Joanne Hawkins, Pip Haworth, Paul Holmes, Gemma Jones, Andrea Kenyon, Tom Mace, Dave Lamb, Des O'Leary, Mark Oldham, Kieran Power, Andy Proctor, Elizabeth Murray, and Claire Riley. The watching brief work in 2009 was undertaken by Des O'Leary and Ric Buckle, and the watching brief work in 2011 was undertaken by Caroline Raynor. The fieldwork was managed by Jamie Quartermaine, whilst the post-excavation process was managed by Jamie Quartermaine and Murray Cook.

The other excavations along the waterfront include those at the site of the Museum of Liverpool and within the footprint of the Leeds and Liverpool Canal extension. The scheme of archaeological work at the site of the new Museum of Liverpool was undertaken by the National Museums Liverpool Field Archaeology Unit. It was funded and sponsored by the National Museums Liverpool, and the assistance of Sharon Granville and Janet Dugdale is gratefully acknowledged. Fieldwork was managed by Mark Adams, and the project was supervised by Clare Ahmad, assisted by Helen Jones. Site Assistants were Sarah Pevely, George Luke, Ron Gurney, and Jeff Speakman, with volunteers Kathy Jason, Chris O'Brien, and Anys Price. Plant was provided by the main contractor, Galliford Try / PIHL. Post-excavation reporting was managed by Rob Philpott.

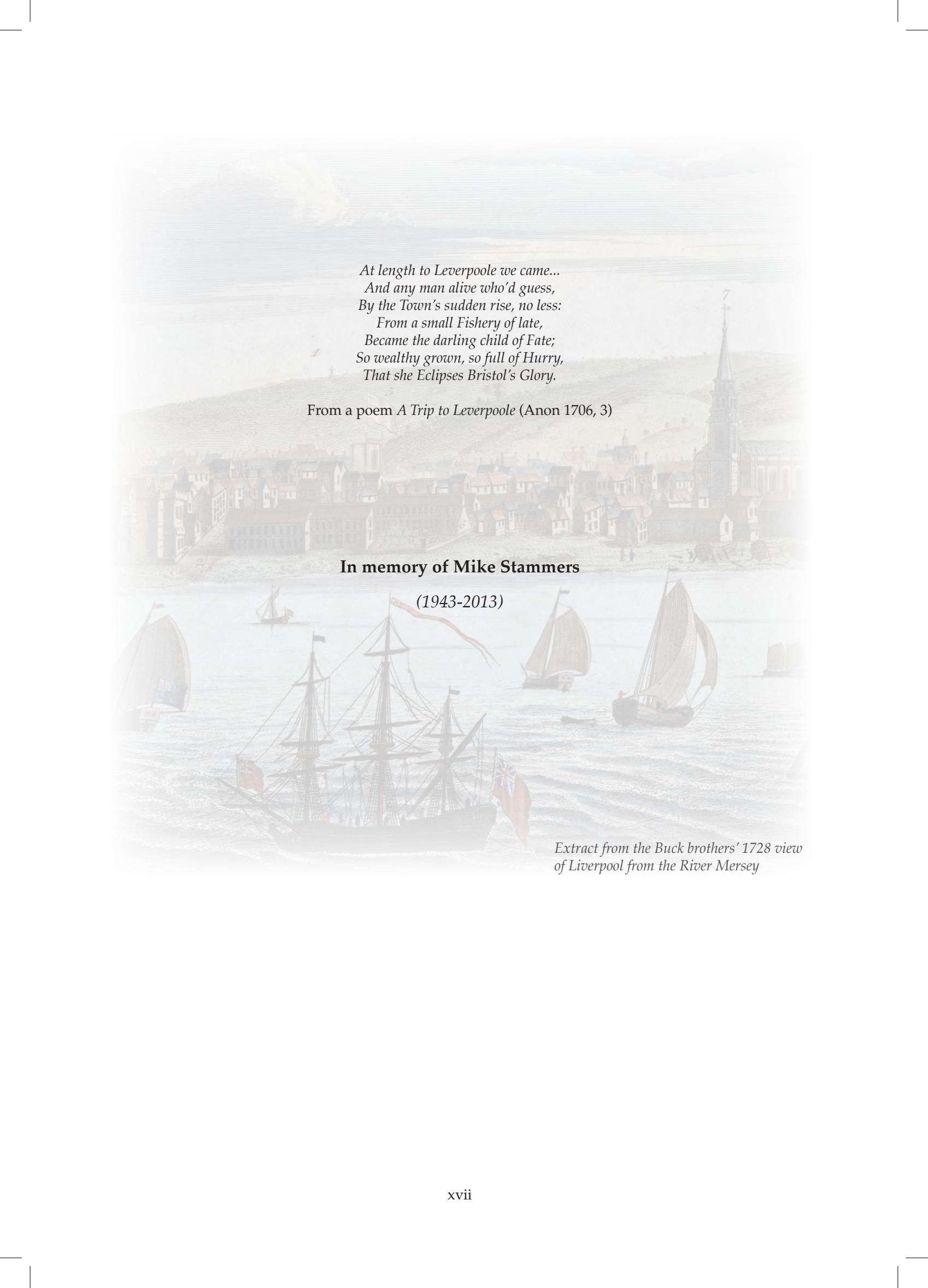
The investigation along the canal extension was undertaken by Oxford Archaeology North and formed three separate pieces of commissioned work. The investigation on the Mann Island section was commissioned by BAM Nuttall Ltd and British Waterways; the work at Pier Head was commissioned by Balfour Beatty Civil Engineering Ltd and British Waterways; whilst that within the Central Docks was commissioned by Pierse UK and British Waterways. The Mann Island scheme of work would not have been possible without the on-site support and assistance of the BAM Nuttall Ltd construction team, including Terry Nuttall, Tony Wilkes, Dan Davies, and Alan Bennett. Similarly, sincere thanks go to all of the Balfour Beatty construction team, for support and assistance during the Pier Head excavations, especially Jon Galloway, Mick Rurnmens, Matthew Storr, Stefan Smith, Jonathan Giles, Philip Kelly, and Johnstone Cummings, and the Pierse construction team, for on-site support during the Central Docks fieldwork, particularly Richard Driver, Ronnie Griffith, Pete Ridgeway, Steve Jones, Steve Thiem, and Aled Gary Roberts. Many thanks are also offered to all the British Waterways staff involved in the Mann Island, Pier Head, and Central Docks sections of the canal link, particularly Tim Brownrigg, Charles Wilsoncroft, and Ian Thomas. We especially thank Tony Orme, Clerk of Works for British Waterways, for his infinite patience, advice, and good humour throughout all phases of the excavation, and Richard Longton, for his support after Pierse UK went into liquidation. Thanks also go to the ARUP team of Richard Summers, Lyndsay Hammond, and Miles Wilkinson, whilst the skilled staff of PP O'Connor, Maher, and Clonfin Plant Hire must be thanked for their patience while working alongside the archaeological team.

The evaluation and excavation work on these three sections of the canal extension was undertaken by Vix Hughes, Caroline Raynor, and Andy Lane, with the assistance of Alex Beben, Jeremy Bradley, Ric Buckle, Caroline Bulcock, Tim Christian, Pascal Eloy, Claire Gardner, Will Gardner, Joanne Hawkins, Pip Haworth, Paul Holmes,

Andrea Kenyon, Tom Mace, Dave Lamb, Des O'Leary, Kieran Power, Rebekkah Pressler, Andy Proctor, and Elizabeth Murray. The fieldwork was managed by Jamie Quartermaine, who, along with Murray Cook, also managed the post-excavation assessment and analysis.

More generally, the post-excavation process has been greatly assisted by Rachel Newman (Oxford Archaeology North's Senior Executive Officer: Research and Publication), who edited individual reports and also this volume. In addition, as part of the post-excavation analysis, David Higgins is particularly grateful to Ron Dagnall of Rainford for providing him with transcriptions of documents relating to Thomas Hayes, Jan van Oostveen for his help with dating the Gouda stem stamp, and to Susie White, who prepared the majority of the archival pipe illustrations. Jeff Speakman, National Museums Liverpool Field Archaeology Unit, commented most helpfully on the report on the pottery recovered from Mann Island and from along the Leeds and Liverpool Canal extension.

The majority of the maps and images used in the volume, as well as the documentary sources consulted, are held in the Liverpool Record Office, the University of Liverpool Library, and the Merseyside Maritime Museum, Maritime Archives and Library, and the help and assistance of David Stoker and Roger Hull, Liverpool Libraries, the staff of the Special Collections, the University of Liverpool, and John Moore, Merseyside Maritime Museum, is gratefully acknowledged. Thanks are also extended to Richard Hawes for permission to use a map extract held in his collection. A debt of gratitude must be extended to Sarah-Jane Farr, the former Merseyside Archaeological Officer, who provided information and considerable support throughout the course of all of the archaeological excavations detailed in this volume. Finally, thanks are given to all the members of the public who showed an interest in the archaeological excavations as they progressed along both the canal extension and across Mann Island.



*At length to Leverpoole we came...  
And any man alive who'd guess,  
By the Town's sudden rise, no less:  
From a small Fishery of late,  
Became the darling child of Fate;  
So wealthy grown, so full of Hurry,  
That she Eclipses Bristol's Glory.*

From a poem *A Trip to Leverpoole* (Anon 1706, 3)

### In memory of Mike Stammers

(1943-2013)

*Extract from the Buck brothers' 1728 view  
of Liverpool from the River Mersey*



Figure 1: Liverpool's historic waterfront and the position of extant and buried docks (© Crown copyright 2014  
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