## **Lincolnshire Museums**

# **Information Sheet**

**Archaeology Series No.3** 

## DUG-OUT BOATS FROM LINCOLNSHIRE AND SOUTH HUMBERSIDE



The Brigg boat shortly after its discovery in 1886

#### DISCOVERIES

Dug-out boats are among the most spectacular archaeological finds of any date. They usually take the form of a great oak tree shorn of its branches and split down the middle, the boat being hollowed out of the log by a combination of burning and adzing. Boats up to 50ft (15 metres) long are not unknown, demanding the use of truly colossal forest oaks. Occasionally other trees such as ash were utilized, but these were only used for smaller boats. Of a total of about one hundred and seventy boats recorded from England and Wales over twenty-seven have been found in Lincolnshire and South Humberside.

The boats from this area come mainly from the peat which formed in the principal rivervalleys: nineteen from the Witham and its tributaries, three from the Trent and two from the Ancholme. Another three boats have been found in the Lincolnshire Fens; the thick deposits of later silt here may account for the small number of discoveries.

Perhaps the most interesting group of boats is that from the middle reaches of the Witham. The density of finds here is such that Branston and Stainfield parishes have produced four boats each, in the latter case all from a single field. The river would once have been broad and shallow, meandering along the broad valley floor and extending in some places to a series of lagoons in which disused boats could be hauled up and left. In many cases cracks seem to have developed in the boats, requiring repairs; others may simply have become waterlogged and sunk.

#### PRESERVATION

Preservation of these boats is due to burial in wet deposits from which air is entirely excluded. When they are removed from their find-spot they quickly dry out and begin to disintegrate; damping down will halt the process temporarily but nowadays the only long-term method is reburial in wet conditions or delicate and expensive laboratory work to replace the water in every cell in the wood with a fine wax known as 'P.E.G.' (Polyethylene-glycol). Boats such as that from Short Ferry, Fiskerton, now in the Museum, found before the new technique was available, were treated by other methods resulting in slow but irreversible decay and distortion.

The following is thought to be a comprehensive list of known dug-out boats from Lincolnshire and South Humberside.

Parish	Map Ref.	Date of Find	Length	Beam
Appleby	SE 966 122	1943	surviving	
			portion 24' 7 1/2"	4' 2''
Bardney (1)	TF 105 699	c.1815	30′	4' 6''
Bardney (2)	TF 116 685	1931	_	- <u>-</u>
Billinghay	c.TF 1555	pre1776	several boats	
Branston (1)	c.TF 0869	1845	surviving	
			portion 25'	
Branston (2)	c.TF 0869	1925	c.28′	3′
Branston (3)	c.TF 0869	pre 1925		
Branston (4)	c. TF 103 709	1976	surviving	
			portion 7' 6''	c.2′
Brigg	SE 997 075	1886	48' 6''	4' 3''
Deeping (Fen)	TF 1816	1839	46'	5' 8''
East Ferry	SE 819 004	1903	surviving	
			portion 4'	c.2'
Fiskerton	TF 0896 7120	1952	24′	3′ 1′′
Kirkstead	TF 196 625	1840	-	-
Metheringham	TF 1422 6560	1912	21' 6''	3′
Nocton (1)	c.TF 099 649	1790	25'	-
Nocton (2)	c.TF 099 649	1790	14′	
(North?) Kyme	c.TF 1653	pre1776	several boats	
Pinchbeck	c.TF 2326	1819	20'	2′
Scotter (1)	SE 825 008	c.1810	40'	4'
Scotter (2)	SE 888 009	c.1836	50'	4'
Stainfield (1)	TF 0990 7156	1953	surviving	
			portion 6'	c.2′
Stainfield (2)	TF 096 715	1966		
Stainfield (3)	TF 096 715	1966	—	_
Stainfield (4)	TF 0975 7157	1976	c.30′	c.2'6''
Stixwould	TF 159 648	1848	_	
Sutton St. Edmund	c.TF 3613	pre 1825	_	
Washingborough	c.TF 011 708	1816	30' 8''	2' 6''
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The Fiskerton and Metheringham boats are in the City and County Museum, Lincoln and the Appleby boat is in Scunthorpe Museum. The Brigg boat was destroyed in an air raid on Hull during the last war.





A somewhat idealized drawing of the Nocton (1) boat found in 1790 Banks Collection, Lincoln Central Library

The Short Ferry (Fiskerton) boat after preliminary cleaning 1952 View from the bow

#### DATING

Until recently the only means of dating these craft was by analyzing the pollen from the peat in which they were found and comparing it with that from other sites, the proportion of pollen from various trees and plants illustrating broad changes of climate which could be approximately dated. Now there are two methods, one utilizing the pattern of annual rings, shown by any large tree, which can be compared with patterns in wood of which the date is known, and the other calculating the gradual loss of radio-active carbon isotopes (C<sup>14</sup>) in the timber, which occurs at a known rate, and thus arriving at an approximate date for the object made from it. Two boats, those from Brigg and Fiskerton, have already been dated by the latter method to about 1000 BC. Four more boats await processing in the same way and others may be roughly dated by comparisons of shape and function, but in many cases the true date will never be known.

#### **TYPES OF BOAT**

Several of the boats from this area conform to a type in which the bow is rounded and the stern is closed by a separate stern-board, making construction easier since slices of wood could be adzed out vigorously towards the stern. Other common features are internal 'ribs' carved out of the solid, which both strengthened the boat and also provided support for bottom-boards to raise cargo out of the bilge-water. Some of the boats had holes drilled along the bottom at regular intervals, not as is sometimes suggested for draining the boat, but as an aid to construction, so that the bottom thickness could be gauged from time to time as the work proceeded. In use these holes were blocked by tapered plugs, driven in from the outside.

The purpose of the dug-out boats is not known for certain but the largest examples must have been used as cargo-carriers, and were probably poled along the shallow waterways by a crew of one or two, and with their long narrow lines they no doubt handled very much like canal barges.

Plank-built descendants of these boats, called 'schuyts' were used on the inland waterways and in the Fens, in fact in much the same circumstances as the dug-outs, until the middle of the last century.



Find-spots of dug-out boats

### **FURTHER READING**

A 'Dug-out' canoe from South Wales. C. Fox., Antiquaries Journal VI 1926 121-151.

Logboats of England and Wales. S. McGrail, 2 volumes 1978. *British Archaeological Reports* 51.

Lincoln, Rutland, and Stamford Mercury 1800 —

Andrew White 6.12.78 City and County Museum, Lincoln.