



# *Sheetlines*

The journal of  
THE CHARLES CLOSE SOCIETY  
for the Study of Ordnance Survey Maps

“The 1st edition of the 1:2500 in Suffolk”

*RC Wheeler*

*Sheetlines*, 121 (August 2021), pp 13-28

Stable URL: <https://s3.eu-west-2.amazonaws.com/sheetlines-articles/Issue121page13.pdf>

*This article is provided for personal, non-commercial use only.  
Please contact the Society regarding any other use of this work.*

Published by  
THE CHARLES CLOSE SOCIETY  
for the Study of Ordnance Survey Maps  
[www.CharlesCloseSociety.org](http://www.CharlesCloseSociety.org)

The Charles Close Society was founded in 1980 to bring together all those with an interest in the maps and history of the Ordnance Survey of Great Britain and its counterparts in the island of Ireland. The Society takes its name from Colonel Sir Charles Arden-Close, OS Director General from 1911 to 1922, and initiator of many of the maps now sought after by collectors.

The Society publishes a wide range of books and booklets on historic OS map series and its journal, *Sheetlines*, is recognised internationally for its specialist articles on Ordnance Survey-related topics.

## ***The 1st edition of the 1:2500 in Suffolk***

***R C Wheeler***

### ***Introduction***

The first edition of the OS 1:2500 is perhaps the source most widely used by those investigating the history of a site: an accurate depiction at a known date from which they can work backwards. Unlike (say) the earlier six-inch surveys, the source is largely free from pitfalls, offering a snapshot of what there was at a particular survey date that is (latterly, at least) stated on the map. In 99 per cent of cases, that - and the *Concise Guide*<sup>1</sup> for an account of survey practices - is all the user needs. This article is intended to address the other 1% of cases, and also for those who believe that one should engage with so important a source, even if it does appear to be altogether straightforward.

My intention was to deal with the first edition after 1880. Practices before that date were somewhat different, and specimens from that era are rarer. Even for the period after 1880 there are over ten thousand sheets to consider; and, while a general development took place across all counties, for certain aspects uniformity across a county was preferred to synchronicity across the country. I chose therefore to focus on a single county in the expectation that my more important conclusions will be applicable across the whole country.

I chose Suffolk because publication of the main series there started in 1881. The NLS site has a large collection of Suffolk 1st editions that come from the OS Record Map Library. Above all, I had the assistance of Dave King, who was able to go through a collection of sheets that had been sold in the normal way (hereafter called the *Sales collection*) at a time when access to archives and libraries has been difficult or impossible: I am extremely grateful for his help and observations.

An earlier Suffolk survey had started, using the meridian of Otley church tower; only a few sheets were produced and it falls outside the period addressed. The main survey shared a new meridian (Danbury church) with Essex, Norfolk, Cambridgeshire and Huntingdonshire. It also enjoyed common sheet-lines with these counties, so that a sheet that straddles a county boundary appears as a single version only, bearing multiple sheet numbers - eg Suffolk 88.9 / Essex 20.9. Like so many 'obvious' improvements of these years, there were complications. Sheets that contained any part of Essex seem to have been surveyed as part of the Essex survey and appeared in that county's format, where the marginalia give the names of the superintending officers but not the date of publication. Once the survey of Suffolk was under way, those sheets that contained more of Suffolk than of Essex seem to have been 'taken over' by Suffolk and if they had to be re-issued they appeared with Suffolk-type marginalia. So there is, perhaps, a rationalised county boundary that runs along sheet edges. This is not a subject I intend to cover; I mention it because statements made about Suffolk may not apply to some sheets straddling borders - particularly the Essex border.

---

<sup>1</sup> Richard Oliver, *Ordnance Survey Maps - a concise guide for historians*, 2013.

### **Zincography**

The process of survey produced five classes of documents: the surveyors' notebooks (1) were used to plot a diagram of chain lines (2). These were pricked through to drawing paper on which the linework of the map was added (3). A tracing of this was taken into the field by the *field examiner*, who checked it for errors and added names and information on land use. This trace (4) was then used to correct and augment item 3 into a fair drawing (5). To produce a printing plate, a tracing of the linework was made from (5). To this, names and ornament were added by stamping. The area men defined and numbered their parcels; from 1884 or 85, the areas themselves were typed<sup>2</sup> on the map. Altitudes and bench marks were added. All this was done (or in the case of the linework perhaps 'gone over') in lithographic ink, so that the paper could be laid face down on a zinc plate to produce a (mirror) image which could then be used to run off the requisite number of copies.

The cost of holding zinc plates against the contingency that further printings might be required was considered excessive, except for urban areas. The zinc plate was therefore cleaned off for use with another sheet. Nor was there any satisfactory way of preserving the tracing for re-use. Thus, if it turned out that more copies did need to be printed, the sheet was *re-zincographed*: basically the whole process was repeated, going back to the fair drawing.

The greatest weakness of this process was the need for tracing. If the tracer draws a line that is displaced by as little as 1/8 of a millimetre, that corresponds to a foot on the ground. This may be one of the causes of the inaccuracy in building dimensions noted by Paul Bishop.<sup>3</sup> It certainly leads to noticeable changes in the length-to-width ratio of small buildings. There are signs that the OS was aware of the problem: they seem to have tried to avoid tracings of tracings - as would happen, for example, if an existing printed map were used as the basis for a subsequent re-zincographing.

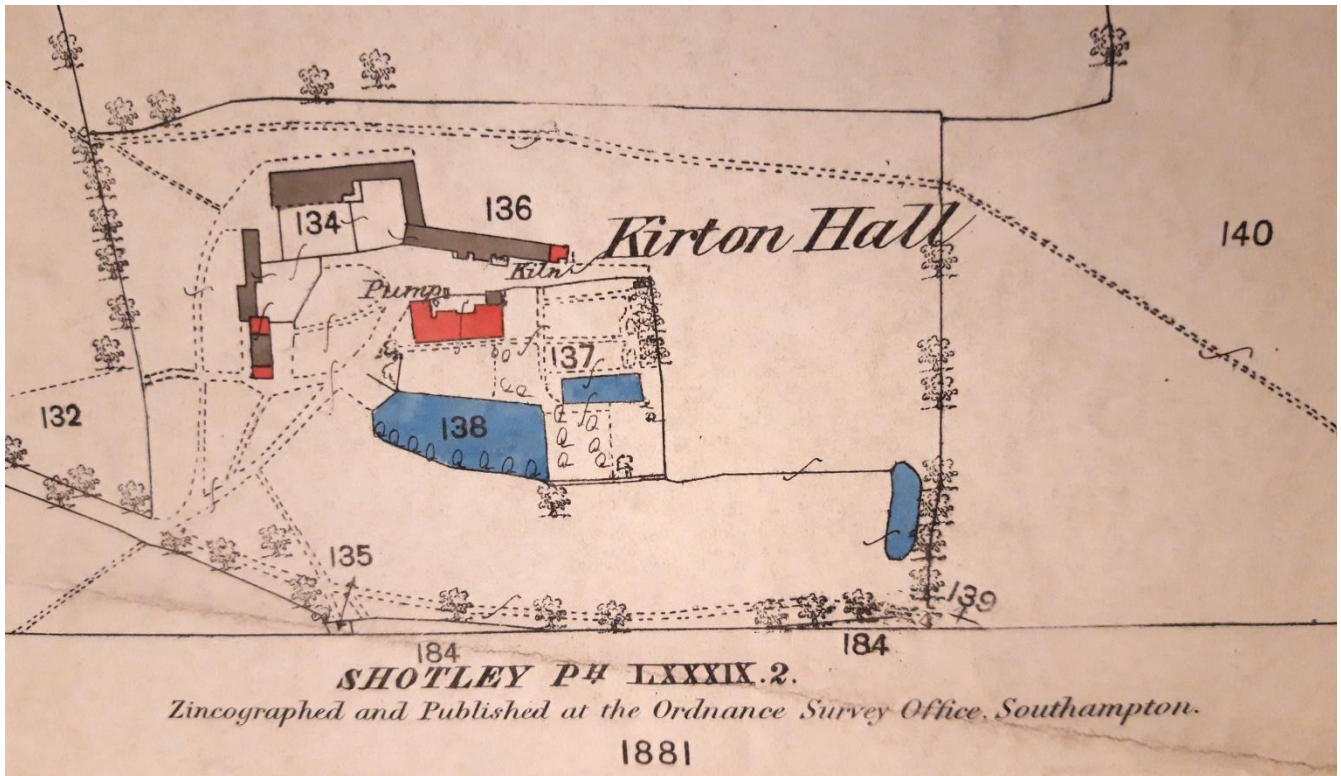
The whole process was also subject to errors of omission, which are seen most easily when different printings of a sheet are compared. I drew attention in Sheetlines 119 to the omission of outbuildings or internal divisions on Leics 37.11; but one encounters more serious errors than this. *Figure 1* shows an extract from Suffolk 83.14 as published; *Figure 2* shows it as re-zincographed in 1900. The outbuilding marked 'kiln' in *Figure 1* is probably a malt-kiln, in which case it is a remarkably late survival: malt-kilns on individual farms in Lincolnshire generally vanished in the 18th century, being superseded by maltings operating on an industrial scale. So the omission of the name in 1900 is regrettable. Note also the rectangular pond south of the garden, which has become trapedzoidal in 1900 - as tracing errors go, this one is quite gross. But there is a bigger change still: "Kirton" has become "Kirkton". In this case, the 1900 version gets it right. To eliminate, so far as we can, the possibility that the Name Book was in error rather

---

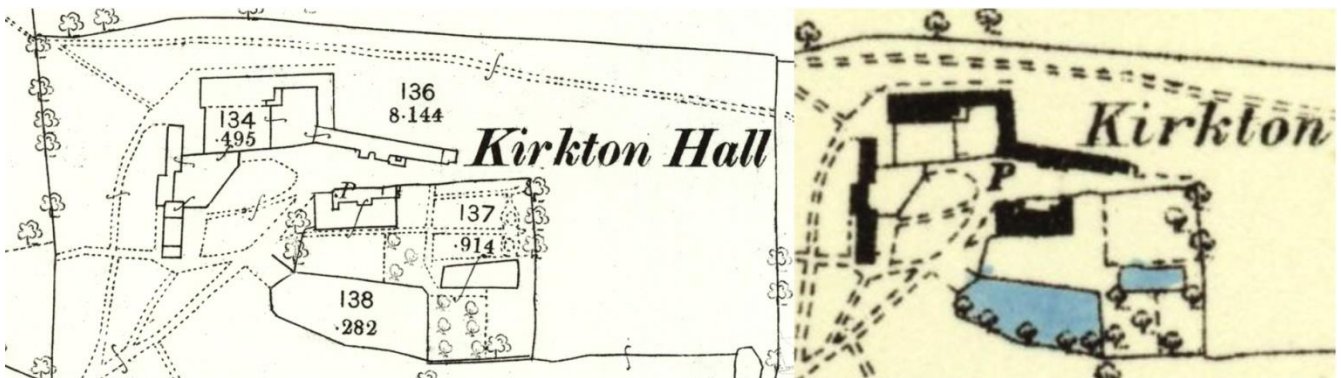
<sup>2</sup> *Typed* in this context means that a block was made up from moveable type and the name was stamped on the map.

<sup>3</sup> Paul Bishop, "The Internal divisions and size of buildings", *Sheetlines*, 105 (2016), 27-33.

than the draughtsman typing the name, *Figure 3* shows the contemporary six-inch. In this period, the six-inch was produced from a photographic reduction of the 1:2500 fair drawing. One can see this by looking at the SW corner of the RH yard of the farm buildings (WNW from the 'P') where there is a small enclosure, perhaps a pig-sty, which does not appear on either zincographing.



*Figure 1 Kirton Hall on sheet 83.14 as published.*



*Figure 2 Kirkton Hall on 1900 reprint.*

*Figure 3 Kirkton Hall on six-inch.*

*Figure 4* shows an error of a more useful kind. Shepherd & Chilton have shown that in this era Martello towers were considered as fortification works that needed to be deleted from the published maps.<sup>4</sup> As first published, Sheet 84.7 has three such towers; by the reprint of 1895, all have vanished. That this was an error rather than a change of policy can be seen from sheet 90.1 where a Martello

<sup>4</sup> Ifan DH Shepherd & Steve Chilton, "Where have all the (Martello) towers gone?", *Sheetlines*, 103 (2015), 7-30.



tower is absent when first published (1881), is present on a re-zincograph of c1885-6, and vanishes again from the NLS reprint of 1899. What seems to have happened is that the sheet as zincographed each time included everything; any unredacted copies required were printed off, the offending detail was then deleted directly on the plate, and the ordinary sales copies were then printed. But evidently the need to check whether there was anything that ought to be deleted was sometimes overlooked.

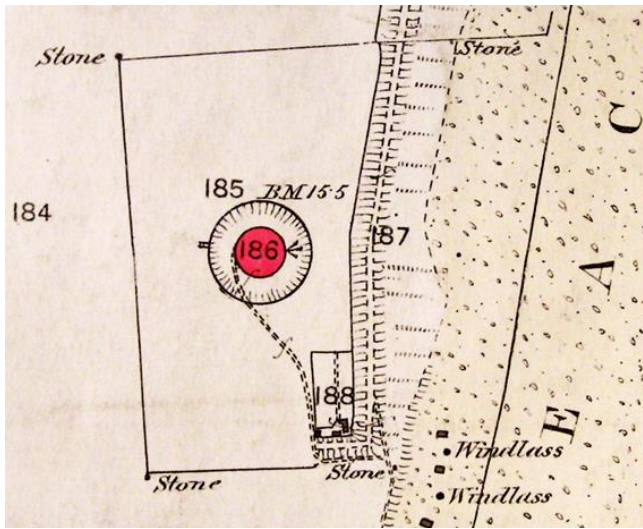


Figure 4 Martello Tower on Sheet 84.7 as published.

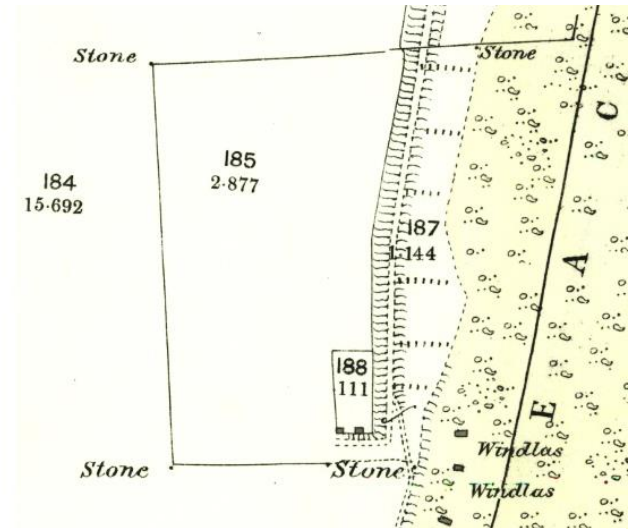


Figure 5 Sheet 84.7 as reprinted 1895

The deletion made for the 1895 reprint of 84.7 (Figure 5) includes the track leading to the tower and the parcel number 186. That much is unsurprising. That the southern slope of the embankment south of the huts or cottages has also gone can be attributed to the difficulties in deleting detail on the zinc plate. But the disappearance of the largest of the huts seems more likely to be attributable to careless tracing, because it survives on the six-inch. The disappearance of the path within parcel 188 may be excused by the directive of 1893 that paths in gardens were no longer to be shown; but the disappearance of the two windlasses seems to be another tracing error. As for the truncation of the name to “Windlas”, one wonders how this could have got through the checking process. There seems little doubt that re-zincographing grew more sloppy as the years passed.

Another example of an error providing extra information occurs on the 1888 state of Suffolk 84.10 (available on the NLS site) and concerns foreshore areas. OS practice was that areas of foreshore in each parish should be computed so that the totals could appear on the table of parishes on the county index sheet; but they were not printed on the individual sheets, nor were parcel numbers allocated for anything below the High Water Mark. On this sheet, the individual areas have been stamped as though they were normal parcels, so one can learn the exact area of The Horse Sands, a sandbank in the middle of the River Deben. Curiously, there is nothing on the map to indicate whether it belonged to Felixstowe or to Bawdsey: one needs to look at the next edition to learn that.

Perhaps it is not the most exciting of errors, but it does cast a little light on area-computation practice.

### ***Were there undated reprints?***

During the decade around 1890, changes to marginalia, and in particular to headings, came every couple of years. They are listed at Appendix 1. There were changes on the face of the map too: in particular, there were four generations of stamp employed for isolated deciduous trees - the type of tree most easily checked.

The addition of areas to the face of the map comes mostly in 1885, with a very few sheets receiving them in 1884 and the sheets around Bury St Edmunds still lacking them in 1886. Initially they are not given when the parcel number is in the margin. (The area of a parcel straddling a sheet edge only appears on the face of the map on the sheet deemed to contain the middle of the parcel.) That at least was the intention: but if area computation had not started on an adjoining sheet, parcels extending into that sheet could not have their area given, regardless of where their centre lay. In such cases, a note to this effect was inserted bottom-left and the areas were stated in the margin of that adjoining sheet when it was published. It was all a bit messy, and was made more so by the note sometimes being omitted when it was required and sometimes appearing when it was unnecessary.

No sheets were found bearing dates 1889 or 1890: publication was complete and there are hints that the few reprints required had been brought forward to clear the decks for the Lancashire and Yorkshire replots. By 1892, it is clear that policy had changed, so that areas were given under all parcel numbers, whether on the map or in the margin.<sup>5</sup>

If a sheet was re-zincographed, the draughtsmen followed the conventions current at the time. Thus, with so many changes in such a short period, one can date a sheet to within a year or two on its style alone. This is quite useful when cataloguing sheets in poor condition when the part of the margin bearing the key dates may have been lost. It also means that any re-zincographed sheet that did not bear a reprint date would stand out as anomalous - unless it was re-zincographed within a year or two of first publication, something that would only happen if the OS had massively underestimated the demand. Accordingly, we can be fairly confident that all re-zincographed sheets do bear a reprint date.

### ***Urban sheets and Heliozincography***

As mentioned earlier, for urban areas the zinc plates were retained, so a reprint only required the normal process of preparing an existing plate for printing. Marginalia were updated to reflect new current standards, at least partially; but no changes were made within the neatline. In consequence, reprints can appear anomalous, for example because the tree stamps had been superseded by the date of the reprint; indeed for Suffolk such anomalies may be the only evidence

---

<sup>5</sup> With one minor exception: if a parcel whose centre was deemed to lie on another sheet crossed the sheet edge in multiple places, its number was given in the margin at each place but the area was only given once.

we have that the plate was retained. It is of course perfectly possible that there are facsimile reprints with no (or no new) reprint date, though it seems more likely that the practice of dating reprints that had been adopted for re-zincographed sheets was used likewise for the relatively few urban sheets. Actually it does not matter greatly: whereas identifying re-zincographed sheets is important, identifying such facsimile reprints is of little significance.

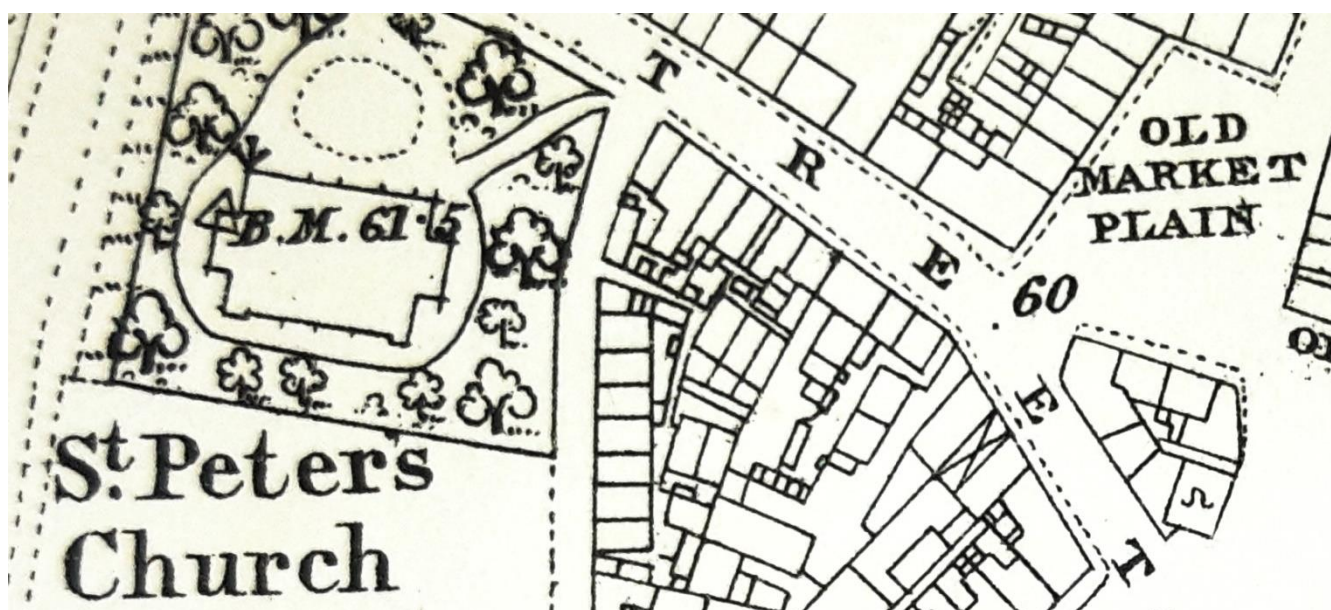


Figure 6 Sheet 10.4 - reprint of 1898.

Figure 6 shows an urban-type reprint of part of Lowestoft, made in 1898. The quality of the printing leaves a lot to be desired: note the blotches on the lettering of OLD MARKET PLAIN and the frightful smudge by the tree in the NE part of the churchyard. It is hardly as though the plate had seen much use, compared to the massive print-runs for the Popular Edition one-inch in the next century; perhaps the Survey was still developing its skills in lithography.

It seems that the superintending officer recognised that he had a problem with this plate because, when a further reprint was needed in 1904, 50 copies were printed by heliozincography. This had new marginalia but in other respects the image was transferred to a new plate photographically from a previous printing. The sheet can be seen on the NLS website; it still lacks areas, so the books of reference for Lowestoft and at least one of the surrounding parishes must have been kept on sale.

This is the only instance I have found within a sample of 216 NLS sheets, of one described as a “reprint by heliozincography” but there were six reprints by “Direct Helio”.<sup>6</sup> Figure 7 shows the imprint on one such sheet. The ‘Direct Helio’ line is distinctly blacker than the rest, and the lettering is quite elegant: note the curved serif to the ‘1’ and the curlicue to the ‘2’. The line would appear to have

<sup>6</sup> The essential difference between photozincography and heliozincography was not so much the (optional) use of sunlight for the latter, but rather that the former process formed an image on transfer paper, the latter on the sensitized plate itself. See WA Seymour, *A History of the Ordnance Survey*, 1980, 200.

been added to a printed sheet which was then photographically transferred to zinc, the rest of the marginalia being undisturbed. All six Direct Helio reprints have marginalia of the form that had been standard since 1896; presumably what we have in each case is a photographic reproduction of a post-1896 re-zincograph.

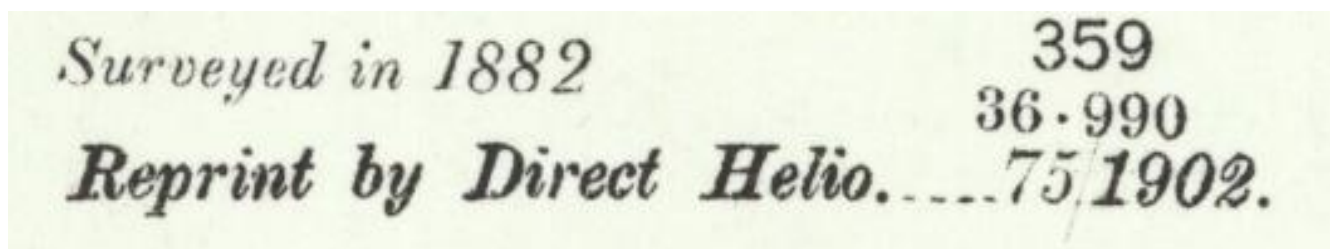


Figure 7 Direct Helio imprint on sheet 10.7.

A decision is recorded, apparently from soon after 1886,<sup>7</sup> that any plan that would cost more than £2 to trace for a new edition by zincography should instead be reproduced photographically from an existing impression. Nevertheless, in Suffolk one finds re-zincographed sheets as late as 1893. After that date, the method of reproduction is not stated, but most of the reprints until the end of the century seem likely to be by re-zincographing.

### **Colouring**

Most maps were sold after hand-colouring. Indeed, of the Sales collection of some 300 sheets only 15 (5%) were uncoloured. None of these fifteen sheets bore a stamp. In contrast, 83% of the coloured sheets bore a stamp. Four stamps are found:

- (a) Office of Works embossed date stamp: the same stamp that is found on engraved maps, the date always being in the range April 1881- Sep 1882.
- (b) Office of Works 'Coloured' stamp in black ink, with a number and letter.
- (c) Board of Agriculture embossed date stamp: the same stamp found on engraved maps, the date always being in 1890.
- (d) Board of Agriculture embossed 'Coloured' stamp, with a letter and number.

(a) and (c) are illustrated elsewhere.<sup>8</sup> (b) and (d) are shown in Figures 8 & 9. What is perhaps surprising is that, on these maps, the standard embossed date stamps appear to be used in exactly the same way as the 'Coloured' stamps, but only within limited date-ranges.

To understand this better, the Sales collection was grouped according to the year of publication, and the stamps found in each group were compared. It is easiest to give the conclusions first and then to set out the data that support them.

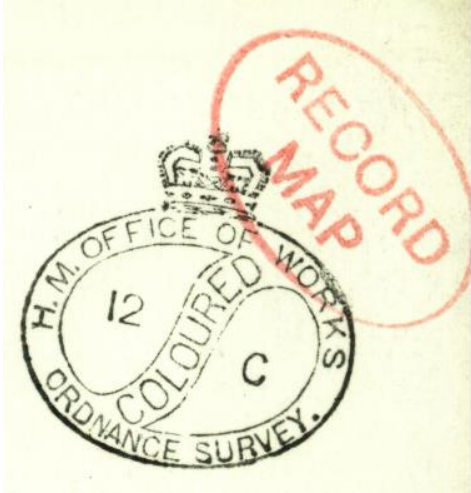
Thus it appears that, initially, stamp (a) was applied after colouring. In September 1882, concern perhaps arose that this practice would lead to an

<sup>7</sup> WA Seymour, *A History of the Ordnance Survey*, 1980, 185.

<sup>8</sup> R Hellyer & R Oliver, *The First Ordnance Survey Map*, 2015, 105.



unacceptable divergence from the customary use of the stamp to indicate the date of *printing*; a different form of stamp should therefore be used. Until this stamp was ready, sheets went out (or went into stock) unstamped.



*Figure 8 Office of Works 'Coloured' stamp along with 'Record Map' stamp.*



*Figure 9 Board of Agriculture 'Coloured' stamp.*

By October 1883, the new stamp had arrived. The numbers indicated the month, the letter the year, following a simple code in which 1883 was A and so forth – see Appendix 2. This continued until 1890, when the Survey's sponsoring department changed to the Board of Agriculture. There is no evidence this time for a halt to stamping; but this was a period of little activity on Suffolk - I have already suggested the decks were cleared for Lancs & Yorks. Once again, the new 'Coloured' stamps took longer to arrive and use was made, briefly, of the ordinary date stamp, notwithstanding the fact that it was being applied to sheets *printed* several years earlier. The sequence of year codes continued unchanged, despite the switch to placing the letter before the numbers. The system then remained unchanged until at least 1904.

The strongest evidence for this comes from the practice of colouring a large proportion of the print run shortly after publication. Thus, of the maps published in 1881, 70% of specimens bear an embossed date, and were coloured before July 1882. Consequently, on the maps published in a particular year, the forms of stamp used in that year and the following tend to predominate. After 1887, there are at most a handful of reprints in any particular year, even including the NLS sample, which has a higher proportion of late reprints. Hence one cannot argue directly that (say) J was the letter code for 1892. One can nevertheless observe the absence of letter codes provisionally assigned to dates prior to the printing date;<sup>9</sup> by the time we reach 1904 (V), this is quite a telling argument.

<sup>9</sup> Actually, the occasional instance has been noted of sheets coloured late in the year before publication. This might represent the building of stock prior to launch. But there was also a degree of vagueness about publication year: for 75.16, a publication date of 1884 was given initially, 1885 at the 1891 reprint, 1884 again at the 1895 reprint.

On this basis, I have estimated the proportion of the print run that was coloured in the year of printing or the following year, for each of the years 1881 to 1886. To do this, I have shared out the unstamped copies between 1882 and 1883 in the ratio 1:3 to reflect the gap in dates, and I have apportioned Office of Works ‘Coloured’ stamps with illegible letters in proportion to the stamps with legible letters. Results are given below.

Date	1881	1882	1883	1884	1885	1886
%	74	81	63	81	100	78

In effect, we can say that four-fifths of the print run was coloured soon after printing, any variation from year to year being merely a fluke of what specimens found their way into the Sales collection. The consistency of these results also serves to confirm the correctness of the decodes given in Appendix 2.

For later years, the number of reprints in the Sales collection was too small to form a useful sample. Accordingly, the NLS sample of Record Maps was used to examine the years 1892-99. For this period, 63% of the coloured sheets (17/27) were coloured within a year of the reprint date. Given that Record Maps represent the stock remaining when the sheet was superseded, we expect a higher proportion of top-up colourings. Thus this is consistent with about four-fifths of the print run continuing to be coloured more or less immediately. From 1900 onwards, data are limited but there does seem to be an increase in the proportion of uncoloured states among the Record Maps. There is little evidence of top-up colouring - but the remaining life of the edition was so short that this is to be expected. The increase in the proportion of uncoloured maps may suggest a revised policy of colouring only one or two copies when needed, in order to avoid wasting effort on copies that would never be sold.

The ability to date the colouring was useful in investigating the bands of colour used to delineate ‘town areas’ within which separate parcel numbers are not given. The Concise Guide notes an instruction of 1889 that these bands were to be in yellow; but an example had turned up of a town band drawn in carmine. Further investigations produced more carmine bands.<sup>10</sup> Bands in yellow, or rather the yellowish brown used for roads, were also found. By knowing the year codes, it was possible to say that the sheets with carmine bands were coloured in 1885 or 1886, with one having an illegible Office of Works stamp, so only dateable to 1883-90. The sheets with the yellow bands were coloured 1895-1902. Thus the instruction of 1889 needs to be understood as ‘use yellow *henceforth*’.

Town bands may be something where individual counties show a degree of divergence. A cursory examination of some Norfolk towns threw up three sheets<sup>11</sup> coloured in 1900-2 where the band was missing altogether, although other Norfolk sheets were found with a yellow-brown band. The number lacking bands seems too high to be explained by casual error.

---

<sup>10</sup> Suffolk 13.12, 48.16, 74.14, 81.12.

<sup>11</sup> Norfolk 5.8, 63.10, 78.3.

### ***The FIRST EDITION stamping***

The new marginalia introduced 1896 included a very prominent 'FIRST EDITION' top-centre with the date of original publication. It can hardly have helped sales to emphasize that the maps were now over ten years old and to imply they were about to be superseded (though that was almost ten years away in most cases). What lay behind it may perhaps be the suggestion made before the Hayes-Fisher Committee that Stanford preferred to sell purchasers an outdated hand-coloured plan when a new (but of course uncoloured) edition was available, because of the greater price of the former.<sup>12</sup> This FIRST EDITION heading seems to have been considered sufficiently important to be applied to some existing stock, apparently by stamp. The quality of the stamping is often very good, so it is worth noting the three ways this stamp can be recognised as such.

1. The map will not have a Legend box bottom left.
2. Between 'EDITION' and the date is (usually) a comma instead of a space.
3. The date given is that of survey rather than publication.

Going through the sample of NLS Record Maps, it appeared that about 8% of the pre-1896 maps were stamped in this way. This is something of a mystery: what determined the favoured (or disfavoured) 8%? It has nothing to do with sheet number, which one could understand if someone had started working through the maps in stock and then the order had been rescinded.

All the sheets seen with this stamp had been coloured no later than 1895. More significantly, there were maps in the Sales collection with Coloured stamps of 1899 and 1901 but lacking 'FIRST EDITION' (in any form). So whatever was being done was abandoned within a couple of years. We still have the challenge of explaining how the great majority of maps in stock in 1896 (and still unsold a decade later) escaped being stamped. The most likely explanation is to suppose that the Survey maintained a bulk-stock store, separate from the store ready for distribution. A typical print run, by the time these were recorded, was 30; print runs on first publication were probably larger. Hence the initial batch of coloured maps might number 25. One can conceive of arrangements for the ready-to-issue store which could hold 2 or 3 copies of each sheet but not 25. When the ready-to-issue store ran out, another handful would be fetched from the bulk store where access was rather less convenient; if this exhausted the bulk-store stock, that would be the time to initiate a new order for another batch to be coloured. I hypothesize that in 1896 the maps in the ready-to-issue store were given the FIRST EDITION stamp, but the idea of stamping this was abandoned not long after. That would certainly explain how it came about that a relatively small proportion of the maps in stock at that date received a stamp.

---

<sup>12</sup> Seymour, 1980, 196.

### **Record Maps**

The manner in which the OS ran its map store may at first sight seem uninteresting but it is actually very pertinent to understanding Record Maps. When a sheet was superseded, a certain number of specimens<sup>13</sup> were kept as Record Maps for sale at an elevated price to purchasers who particularly wanted the old edition. It is commonly assumed that these must necessarily have been of the final printing. That assumes that the OS rotated stock in the same way that a supermarket does. But maps do not go off; and it is somewhat easier to add a new batch to the top of a pile than to insert it at the bottom. The arrangements hypothesized in the previous paragraph have the merit that stock is rotated automatically.

A comparison was made between sheets in the Sales collection and the Record Maps on the NLS website to check that the Sales maps were not only of no later a printing than the Record Maps but also of no later a colouring batch. Because there were relatively few reprints among the Sales collection, the first check was undemanding. The second check threw up a single counter-example, a copy of 67.11 coloured in Jan 1895. The NLS specimen was published in 1882 but bore no colouring stamp so was presumed to have been coloured in the period 1882-3. However, the NLS copy also bore an embossed stamp from the Ancient House Bookshop, Ipswich; a couple of sheets had already been noted bearing this stamp (*Figure 10, below*).



*Figure 10 Bookshop embossed stamp.*

So what we have here is a bookshop return that has been taken in to the Record Map store; it might well have been sitting on the shelves in Ipswich from 1883

---

<sup>13</sup> The 'Dublin Instructions' in the CCS Archive say just one, but Record Maps seem too numerous for this to have been the normal rule.



until 1906.<sup>14</sup> This is in the nature of an exception that proves the rule. It is probably safe to assume in 99% of cases that a Record Map is the latest printing (and the latest batch to be coloured) but not all bookshops were so free with their embossed stamp as the Ancient House, so we should be alert to the possibility that an older state somehow found its way to the Record Map store. We should also be alert to the possibility that the stock of uncoloured sheets might be exhausted and require a reprint while coloured sheets of the older printing remained; no evidence has been found that this ever occurred, but without a thorough cartobibliography such evidence is unlikely to appear.

On the assumption that the 216 Record Maps examined are representative of the Suffolk sheets at the end of their life, we find that 71% of sheets did not need a reprint. Furthermore, of the coloured sheets that did not go to a reprint, 49% had been coloured within 2 years of their publication date, the other 51% having been coloured later. It was suggested earlier that about 80% of the initial print run was coloured within the first year or two. It follows that  $0.71 \times 0.51 = 36\%$  of sheets achieved lifetime sales of more than 80% of their initial print run but managed to avoid the need for a reprint. Given the massive uncertainties in demand for this series, that indicates an outstandingly good process for setting print runs.

### ***The Six-inch***

Until 1880 the six-inch had mostly been engraved, with a degree of generalisation especially on the early sheets, where small buildings are frequently omitted. The six-inch is still worth inspecting, because generic garden ornament is used more widely than the surveyed garden detail on the 25", giving a more complete picture of that category of land use. The early sheets use a double line for watercourses, even where the 25" has a single line, and this can sometimes resolve ambiguity about whether a line represents a stream or a fence. Minor features may be copied 'by eye', and their exact orientation can be untrustworthy.

From 1881 to 1889, the six-inch was generally<sup>15</sup> produced by photographic reduction of the 25" fair drawings. Initially, this required names, in particular, to be excessively large on the 25" drawing so that they would be legible on the six-inch, but from mid-1882 names on the drawing, along with tree-ornament, were in cobalt so that they would not photograph.<sup>16</sup> This is the period when almost all the Suffolk six-inch sheets were drawn. From 1889, the six-inch was drawn on blues of a photographic reduction, but generalisation was introduced once again. Thus, for an eight-year period, the six-inch allows us to see the fair drawing of which the 25" is merely a tracing. It will not show us interior subdivisions of buildings because buildings were filled in black; nor will it show us the detailed trackwork on railways, as this was redrawn; but for everything else it offers a

---

<sup>14</sup> That superseded maps should be returnable was a recommendation of the Olivier Committee in 1914; so perhaps these sheets were actually on the shelves at Ipswich until after 1914.

<sup>15</sup> A desire to keep adjacent sheets in the same style caused the continuation of engraving beyond 1880.

<sup>16</sup> Seymour, 1980, 178.

check on the accuracy of the 25-inch tracing. Of course, from a four-fold reduction printed by lithography, it can be difficult to make out the finest detail. Nevertheless the clarity of image one needs to decide whether a particular 25-inch tracing is an accurate copy of the original is less than if one is trying to interpret a blurred six-inch image by itself.

To illustrate the process, Figure 11 a & b show part of 74SW, (a) being the 'First Edition Without Contours' (1884) and (b) the normal edition (1889). In addition to acquiring contours (though there are none on this small extract) the latter has acquired rouletting on Holbecks Park (in the western part of the extract) and a name, "Tinker's Lane" which was perhaps left off in error in 1884. In other respects the matter within the neat lines is exactly the same. (The building above 'Corn' of 'Corn Mill' has acquired a white spot in its building fill, but I regard this as a printing imperfection rather than a change in drawing.) Every name is in exactly the same place; every tree symbol is exactly the same. Clearly the two maps are based on the same photographic image.<sup>17</sup> Figure 11 c & d show 74.14, as issued in 1885<sup>18</sup> and as re-zincographed in a reprint of 1900. The observant may note that, in addition to areas and new tree stamps, (d) has acquired a superfluous 'i' to Toppesfield Bridge. (c) has a carmine band around the town area of Hadleigh; on (d) it is yellow-brown.



Figure 11a Six-inch without contours.



Figure 11b Six-inch with Contours.



Figure 11c 74.14 as published.

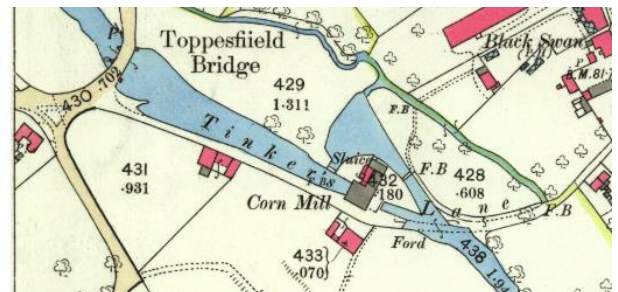


Figure 11d 74.14 re-zincographed.

<sup>17</sup> Capt Sankey refers to contours being cut on the negatives.

<sup>18</sup> It is striking that the six-inch could appear a year in advance of the 25-inch on which it was based. This was perhaps caused by delay with area-calculation.

Whereas solid lines on the six-inch appear to be used unaltered from the 25-inch, broken lines were widely subject to deletion. Looking at the road junction SW of Toppesfield Bridge, one sees that the broken lines bounding the carriageway have been deleted; this was general practice. In contrast, the broken line separating the carriageway from the little tongue of land that projects into the river has been retained. Broken lines of paths often have alternate dashes deleted (or perhaps appeared on the fair drawing with much larger gaps than when they were traced); minor paths in gardens are sometimes deleted altogether. There is, however, no sign of complete redrawing; even though the width of a narrow path may, when photographically reduced, be so small that the separate sides are barely discernible, this is not interfered with.

Names have been typed on the six-inch with occasional omissions where the detail would be too congested: for example the 'Sluice' by the mill, or the 'P' behind the cottages that face Toppesfield Bridge. Tree symbols are stamped, so far as possible in exactly the same position as the tree symbols on the 25-inch. Indeed, close inspection is necessary to see that they are not a photographic reduction from the 25-inch.

The positioning of the six-inch's trees in the field between "Toppesfield" and "Malthouse" is particularly interesting. They appear to be a copy of those on the 1900 version of the 25-inch, despite being stamped sixteen years earlier! What seems to have happened is that in 1885 names were typed in advance of ornament, and "Toppesfield Bridge" on 74.14 was extended into that field, so that there was no room for the trees in its eastern part. In contrast, the six-inch kept the name south of the minor watercourse, so there was space for the trees. Evidently the man doing the stamping for the six-inch (and likewise the man stamping the re-zincographed version of the 25-inch) was working from the fair drawing - the document numbered (5) at the very start.

If one examines the building immediately to the right of the 'n' of 'Black Swan' one sees a very small outhouse at its rear, coloured carmine on Fig 11c and uncoloured on Fig 11d. (The reader may wish to check the image on the NLS site to confirm the latter statement.) This is par for the course: the colouring of small outhouses can be a bit erratic. The user who is particularly concerned to establish whether such an enclosure was roofed should consult multiple copies, ideally copies with different colouring dates.

### ***Summary***

It may be useful to set out what has been learned for the benefit of the map user who is not interested in the minutiae of how these maps were drawn.

First, in the great majority of cases, it is sufficient to look at the survey date bottom left and treat the map as a snapshot of what was on the ground at about that date.<sup>19</sup> Only if the user is determined to extract every scintilla of available information or if he suspects a minor drawing error need he read further.

---

<sup>19</sup> "about" because a year might elapse between field examination and the final signing-off of the survey and, whilst some changes might be incorporated through having been spotted at that final stage, others might not.

In that last case, if the map he is consulting is a reprint, he should seek a different zincographing; the easiest option will be to consult a copyright-deposit copy, which will normally be of the initial print run. If the map he is consulting has no reprint date, so is of the initial printing, he should check the NLS website to see whether they have a reprint. Further search is quite likely to be fruitless: 70% or so of maps were never reprinted. And if the NLS has an original printing with Record Map stamped top-right, he can be almost certain that there were no reprints. But he can still look at the six-inch (which is worth doing even if he has located multiple zincographs). Although photographic reduction will have led to some blurring of detail, and the blacking-in of buildings will have destroyed other detail, the original image photographed may have been superior to what he sees on the 1:2500.

### ***Other Counties***

I believe that most of the conclusions reached in this paper will be applicable to other counties commenced after 1880 - but not to the 'replotted' counties, for which photozincography was introduced. The main exception concerns the six-inch, whose utility is much reduced after 1889, when it was wholly redrawn. It is, however, incumbent on the reader who is interested in other counties to check his material. No doubt sundry oddities will emerge. At the very least, this article has, I hope, demonstrated that the 1:2500 is by no means as straightforward as has sometimes been assumed.

### ***Before 1880***

Early sheets were subject to railway revision and, in some cases non-railway revision. This is not always mentioned in marginal notes.<sup>20</sup> Embossed date stamps do at least help in dating copies. The observation of a map bearing an 1879 embossed date *and* an Office of Works 'Coloured' stamp has led me to suppose that the date stamps were applied immediately after *printing* right up to 1879; but more evidence is needed to confirm this.<sup>21</sup>

What is apparent is that none of the conclusions reached about practices after 1880 can be assumed to apply before that date.

*See appendices overleaf, p28.*

---

<sup>20</sup> See the summary of Alan Godfrey's talk, 17 March 1990, in *Sheetlines*, 27, 17.

<sup>21</sup> The NLS site has a copy of Peebles-shire 18.10 with an embossed printing date of 1858 and a Nov 1883 Coloured stamp, demonstrating that the application of Coloured stamps when colouring pre-1880 stock that had originally been left uncoloured seems to have been standard practice.



### ***Appendix 1 - Changes to Marginalia 1884-96***

1884: names of parishes were dropped from the heading, and the county moved across to replace them, in the form **Suffolk** (Eastern Division).

1886: new Divisions briefly appear in the title, following the 1885 Representation of the People Act.

1886: Divisions dropped from title entirely.

1886: **Suffolk** moved to top-right

1887: note explaining areas appears bottom right.

1888: Prices moved to bottom right, replaced bottom-centre by “All rights of reproduction reserved”; area note moved to top left.

By 1892: ‘Suffolk’ and ‘Sheet’ in capitals.

1894-5: area note dropped

1896: redesigned bottom margin with Legend box; FIRST EDITION with publication date appears top centre - but this might also be stamped on earlier sheets.

After this date there were no more changes.

### ***Appendix 2 – Year codes on ‘Coloured’ stamps***

A 1883	F 1888	K 1893	P 1898	U 1903
B 1884	G 1889	L 1894	Q 1899	V 1904
C 1885	H 1890	M 1895	R 1900	
D 1886	I 1891	N 1896	S 1901	
E 1887	J 1892	O 1897	T 1902	

*Illustration credits: John King for figures 1, 4, 9, 11c; CCS website for 11b; National Library of Scotland, the remainder.*