**Sewing Machines** 



**Typewriters** 











# Ing Iypewriters and Sewing Machines **Guidelines for lentify**

# Introduction

The object of this guide is to create an informative record by exploring the essential elements that make up a useful object description. Usually, it is the general 'object description' field that most curators will read, so let's take a look at what this might contain, and how best we can achieve it, for an object from each of two of our categories – sewing machines and typewriters.

# **Sewing Machines**



T.1961.6 Singer oscillating shuttle lock-stitch hand sewing machine, type 12k, 'New Family' model, fiddle-shaped outline, on wooden base with cover. Serial nos. 7695153 – 1957753. Size overall: L45 x W25 x H28 cm. 1887.

Add a note in the note field if you discover further contextual information. For example:

'The original Singer machine (No.5) was uncomfortably heavy and intended for industrial use, but in 1858 the Company brought out a lightweight *Family* machine and in 1865 the more substantial *New Family* machine. In Britain it was known as the 12K and was manufactured from 1865 to 1883, in which time over 4 million were built. In general appearance it resembles the machines manufactured well into the 20<sup>th</sup> century, and was much copied in Germany and to some extent, Britain. The basic price was £4. 4s. (£4.20p), but it was available 'richly ornamented in pearl, 10s. (50p) extra', and in all sorts of cabinets costing up to £20.'

The essential elements:

- 1. Accession number a unique ID essential to locate the sewing machine. [T.1961.6]
- Make [Singer]
- 3. Action [oscillating shuttle lock-stitch]. In this machine the shuttle moves transversely to the direction of the cloth feed.
- 4. Category [hand, or manual]. Use hand rather than 'table-top' which is sometimes confusingly used to imply a treadle model. If the machine is mounted on a frame or in a cabinet, state 'manual treadle' or 'manual cabinet' model. Other categories could be 'electric', 'electronic', 'toy' etc.
- 5. Model [type 12k 'New Family']
- 6. Salient features [fiddle-shaped outline, on wooden base]. If it is a demonstration model with cut-aways, then state this.
- 7. Parts or accessories [with cover]. If there is more than one physical item, such as a cover or tool kit, record this.
- 8. Serial number [7695153 1957753] Always record the machine's serial number(s). If one is not obvious, search diligently for it. Not all machines have serial numbers, for example early 'New Home' American machines, some German machines and several miniature and toy machines frequently do not. On Singer machines the serial number is very useful. Singer numbers can be numeric only, or one or two letter prefix numbers. From this number it is sometimes possible to identify the model, where and when it was made and batch quantity.
- 9. Provenance always record the object's origin, where known, to include associated names of users, owners and makers, and likewise places, of discovery, use, or manufacture etc.
- 10. Dimensions record overall dimensions in the dimensions field of your record. Put unusual dimensions in your object description, for example for a large industrial sewing machine (or in the case of typewriters, an extra-long carriage).
- 11. Date made [1887]. Or put a date range if you are not quite sure.
- 12. Condition and completeness if the machine is in pristine unused condition, or in very poor condition, then say so in the general description. This should also be entered in the 'conservation' field of your database, if applicable. Likewise, if you notice something is obviously missing, such as the needle, the handle, or anything else that affects the quality of the machine, record it.

Occasionally treadle models are encountered minus their treadles, leaving the machine without any base whatsoever.

# Q & A

Q. The name of the make has worn off the machine. How can I identify it?

A. Some makers' names are stamped on applied metal roundels or badge plates. These can be missing. Others are transfer printed, usually across the arm or on the base of the machine. Hand machines were often carried by gripping the arm and ones that have seen a hard life can have their decoration including the maker's name transfer completely worn away. Flick through the literature to see if you can spot the design. Most makes are relatively distinctive and with a little experience you can soon get a feel for the different looks of the various makes.

Q. I have a maker's name but don't know what model it is. How can I find the model? A. Look up the maker's models in the literature to see if you can spot it.

Q. I have a make, model and serial number but how do I find out when the machine was made? A. For Singers look up the serial number at <a href="http://www.singerco.com/support/serial\_numbers.html">http://www.singerco.com/support/serial\_numbers.html</a> If it is just numbers it is probably pre-1900. One letter and two letter prefixes then a number will be after 1900 and you can look up where and when it was made, along with model confirmation and batch quantities, for most Singers. All the extant serial number lists are published. The records for a

few Singer serial numbers have been lost. For other makes there are limited serial number listings giving dates of manufacture in Brian Jewell's 'Antique Sewing Machines' (Costello, 1985) for a dozen or so of the larger makers.

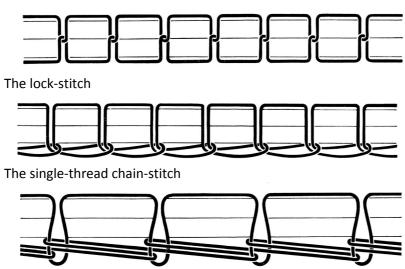
Q. I have a Singer, but the serial number is not present on the machine. How can I tell which model it is?

A. With the machine in front of you, go to <a href="http://www.sandman-collectibles.com/id-singer-machines.htm">http://www.sandman-collectibles.com/id-singer-machines.htm</a>, answer a few questions about the presence or not of a few features and their position on your machine and by deduction it will lead you to your model with an image against which you can check your machine is the same.

Q. How can I find out the mechanism type for my machine?

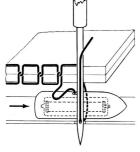
A. Slide back the bobbin well cover and very gently turn the machine to see if you can identify what's happening. Don't worry too much if you are not sure. The literature will usually tell you whether the machine is a boat shuttle, rotating hook or looper-type action and whether it is a lock-stitch or chain-stitch machine.

### **Stitches**

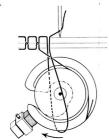


The double-thread chain-stitch

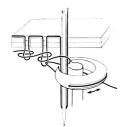
# **Mechanisms**



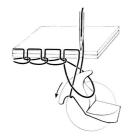
Lock-stitch made with a shuttle as in the early Singers



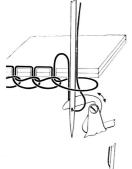
Lock-stitch made with a rotating hook as in the early Wheeler and Wilson machines



Double thread chain-stitch with oscillating looper as used in the early Grover and Baker machines



More secure chain stitch with a twist using a rotating hook as in the early Willcox and Gibbs machines



Single thread chain-stitch with a looper as in the Weir machine



Singer oscillating-hook lock-stitch.

The hook which enters the needle-thread loop, oscillates about a vertical axis through just over half a revolution. The bobbin is supported by a stationary holder and is located off centre, so that the hook is able to carry the needle thread over and under it, in order to bring about the interlocking of the two threads.

# Some makes of sewing machine you are likely to come across:

# Some makes of sewing machine you are less likely to come across:

Biesolt & Locke Andrews
Bradbury Babcock

Frister & Rossmann Blodgett & Lerow Grover & Baker Dietrich

Grover & Baker Dietrich
Howe Faudels
Jones Godiva
Kimball & Morton Invicta
Pfaff Judkins

Royal Knickerbocker
Seidel & Naumann Nussey & Pilling

Singer Reid
Thomas Robinson
Vickers Shaw & Clark
Wanzer Squirrel
Weir Taylor-Bird
Wheeler & Wilson Weed

Willcox & Gibbs Whight & Mann

Wilson, Newton Yasui

## Reading

There are many books on sewing machines. The following are useful:

- Carter Bays 'The Encyclopedia of Early American & Antique Sewing Machines' 3<sup>rd</sup> edition, Collector Books, Kentucky 2007.
- K.R. Gilbert 'Sewing Machines', HMSO London 1970
- Carol Head 'Old Sewing Machines', Shire, reprinted 1984
- Brian Jewell 'Antique Sewing Machines', Costello 1985

# **Typewriters**



T.1934.193 Maskelyne 'Victoria' model 3, down-strike grasshopper action, 3-row qwerty keyboard with differential spacing, invented and produced by John Nevil Maskelyne and his son, serial no. 1522, 1897.

You may want to add further contextual information as a note. For example:

John Nevil Maskelyne (1839-1917) of Cheltenham was Britain's foremost magician, deceptionist and illusionist during the 1870s and 1880s, performing all over the country, but notably in London where he enjoyed a famous and long-running tenancy at the Egyptian Hall in Piccadilly from 1873 to 1904. Having first trained as a watchmaker, Maskelyne was a brilliant engineer and mechanician, and went on in the 1870s to devise ingenious life-like automatons, or mechanical figures, to complement his magic shows and illusions.

His son (Nevil) and grandson (Jasper) were also noted magicians, and it was with the former he devised and invented the first grasshopper-action type-bar typewriter in 1889. In the first two models the type rested on an upward facing ink pad from which the type-bar 'hopped' on to the top of the platen. This Model 3, known as the 'Maskelyne Victoria' produced in 1897, was even more spectacular. The ink pad was reversed, to face downwards with the type resting up-side down against it. Pressing a key lowered the type slightly from the ink pad and then launched it towards the paper on the platen, performing a somersault to strike the paper the correct way round landing on the top surface of the platen.

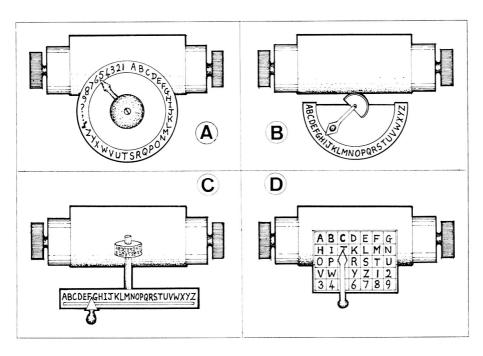
The design was perhaps too ingenious and despite producing near print-like quality copy (largely due to the use of an ink pad), the machine could neither stand up to rough use nor be manufactured cheaply. Consequently, only small numbers were made, and even fewer sold. Maskelyne models 1 and 2 are sought after by collectors, but it is the model 3 with its somersaulting type-bar which is the most desirable and highest prized of all typewriters. Rare and valuable.

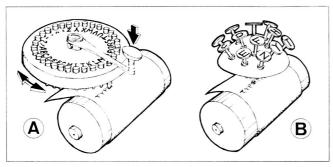
# The essential elements:

- 1. Accession number [T.1934.193]
- 2. Make [Maskelyne]
- 3. Action [down-strike grasshopper action]
- 4. Category [type-bar]
- 5. Model ['Victoria' Model 3]
- 6. Salient features [3-row qwerty keyboard, splayed quadrant type-basket in front of the platen, differential spacing] If you are not sure about salient features, refer to the make and model in the literature.
- 7. Parts or accessories [none]
- 8. Serial number [1522]
- 9. Provenance [John Nevile Maskelyne and his son (Nevil); see notes entry]
- 10. Dimensions [overall dimensions can be entered here; also weight the Maskelyne is a metal-rich machine and therefore heavier than most of a similar footprint]
- 11. Date made [1897]
- 12. Condition and completeness [good, complete]

Most typewriters, particularly the early ones are usually one of two designs: **index** or **keyboard**. **Index** machines work by using a pointer to select the letter to be typed. **Keyboard** machines work by selecting the letter by using a range of keys, either one character per key or, through the use of a shift mechanism, more than one character per key, and the keys are usually connected to type-bars to produce the print.

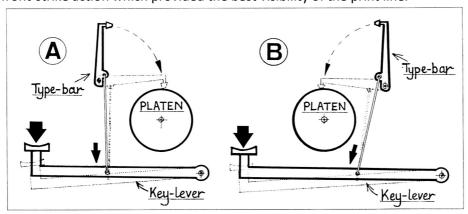
**Index machines** are divided into (A) circular-index typewriters, (B) semicircular-index typewriters, (C) linear-index typewriters and (D) square- or rectangular-index typewriters.



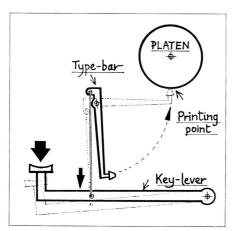


(A) Circular-index type-plunger action as used on the Hughes. (B) Radial type-plunger action as used on the Hansen and Lambert machines.

**Keyboard type-bar machines** are usually classified by the motion of the type-bars from rest to reaching the paper. For example, up-strike, up-strike grasshopper, down-strike, down-strike grasshopper, front-strike, oblique front-strike, etc. Some of these actions are shown below. To see more action types refer to the literature below. By 1940 most typewriters had adopted the familiar front-strike action which provided the best visibility of the print line.

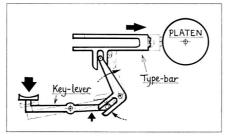


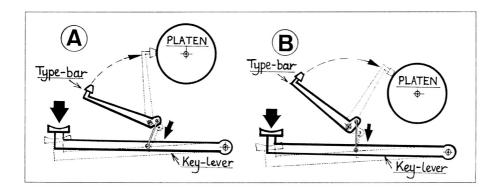
Down-strike actions: (A) from the front – Royal Bar-Lock, Imperial'B', Salter No. 10; (B) from the rear – North's, Waverley.



←Up-strike type-bar action, such as in the Sholes and Glidden, Caligraph and Smith-Premier.

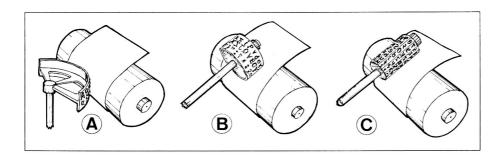
Thrust-action type-bar as used in the Wellington, Empire and Adler.  $\boldsymbol{\downarrow}$ 





(A) Front-strike type-bar action (Underwood 5); (B) Oblique front-strike action as in the Ideal.

# Type elements and keyboards

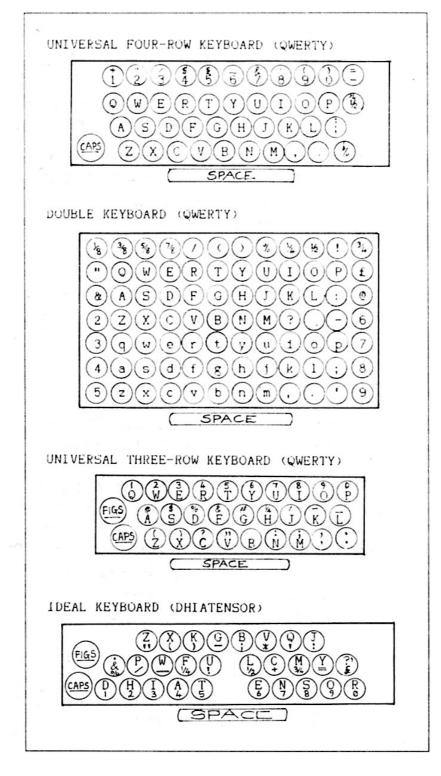


There are three type elements you are likely to encounter: (A) type-sector (shuttle); (B) type-wheel; and (C) type-sleeve.

There are four keyboard variations you may come across:

- 1. The 4-row QWERTY keyboard, offering upper case by means of a single shift, known as the 'universal' keyboard. Developed in the 1870s through Sholes and Glidden and later Remington.
- 2. The double QWERTY keyboard with 8 rows, which avoided the complication of a shift mechanism but only by using twice the number of keys and type-bars. The early Smith-Premiers, Yösts, Bar-Lock.
- 3. The 3-row QWERTY keyboard, a compressed version with double-shift, offering three characters per key widely adopted for portables because it economised on weight and space by reducing the number of type-bars and key levers.
- 4. The 3-row DHIATENSOR keyboard with these letters forming the bottom row, with a double shift, known as the 'ideal' keyboard, challenged the QWERTY for a time and was available on the Blickensderfer and Hammond machines and some others as an option to the universal keyboard.

# **Keyboard variations**



Some makes of typewriter you are likely to

encounter:

Imperial

Lambert

Mignon

Oliver

Monarch

Some makes of typewriter you are less likely to come across:

Adler Blickensderfer Bar-Let Corona Hall Hammond IBM Archo
Bennett
Elliott
Fitch
Ford
Fox
Gardner
Hood
Keystone
Maskelyne
McLoughlin

North's

Olivetti Sholes and Glidden

Remington Stearns
Smith-Corona Stoewer
Smith-Premier Waverley
Underwood Williams
Yöst Zimmer, Zinke

# Reading

The following books will be a great help to you in identifying typewriters:

- Michael H. Adler, 'The Writing Machine a history of the typewriter', George Allen & Unwin, 1973.
- Michael H. Adler, 'Antique Typewriters From Creed to QWERTY', Schiffer, 1997.
- Wilfred A. Beeching, 'Century of the Typewriter', BTM Publishing, 1990 edition.
- G. Tilghman Richards, 'The history and development of Typewriters', HMSO 1964.
- Duncan James, 'Old Typewriters', Shire, 1993

# **Documentation standards for Accredited Museums**

If your museum is registered as an Accredited Museum by the Museums, Libraries & Archives Council (MLA), you should always try to reach the minimum standard cataloguing fields in your object record documentation, laid down by the SPECTRUM standard. The SPECTRUM standard of cataloguing prescribes the following fields in any museum object record as mandatory fields:

- Object number
- Number of objects (i.e. items)
- Object name i.e. Object name type = simple)
- Brief description
- Acquisition method
- Acquisition source
- Acquisition date
- Entry number
- Normal location
- Location date
- Current location

If you are using a computer system, it will usually be possible to set up the programme to validate these fields and only accept a new record if they have been filled.

**David Woodcock** - Subject Specialist Advisor, NMS\STICK Project 'Old Tools, New Uses'
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