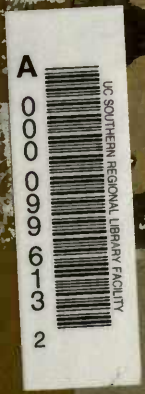

A MANUAL

OF

CURSIVE SHORTHAND

BY

HUGH L. CALLENDAR, B.A.

FELLOW OF TRINITY COLLEGE, CAMBRIDGE.

London: C. J. CLAY AND SONS,
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PREFACE.

HITHERTO the use of Shorthand has been chiefly confined to clerks and reporters: it has not as yet, to any appreciable extent, supplanted longhand for use in ordinary writing.

The reason of this appears to be that the majority of existing systems are either, like Taylor's, deficient in completeness (that is, they cannot distinguish words with sufficient accuracy), or, like Pitman's, involve too many ambiguities and refinements, and cannot be *fully* written at a reasonable speed (see p. 15).

The conditions which a system of shorthand for general use should satisfy, are discussed at some length in the Introduction to the present work. The argument is briefly recapitulated on p. 40, to which the reader is referred for a summary of the claims of 'Cursive Shorthand'.

The chief features of 'Cursive' are facility, completeness, and freedom from refinements; but it must not be supposed that it is therefore wanting in brevity. The ordinary style of Cursive, besides being much clearer, is also much shorter than the corresponding style* of

* It would not of course be fair to compare the ordinary full style of Cursive with the reporting style of Pitman's. I mention the point because I have noticed that Mr Pitman, in a widely circulated pamphlet on Professor Everett's system, compares a short paragraph written in the latter's ordinary style, with the same in the most abbreviated style of Phonography. The two specimens are set side by side "to speak for themselves", without the least hint that the comparison is not a fair one. In the Everett specimen more than 80 vowels are definitely expressed; only three are inserted in the Pitman.

Pitman's. In the reporting style, if equally abbreviated, Cursive has still the advantage in facility and clearness. This point is more fully illustrated in the 'Comparison with Pitman' p. 102, and in the Introduction.

In comparing the two systems it must be remembered that the primary object of Cursive is general utility, and that the present manual is not intended to teach the reporting style. Moreover, Cursive, as its name implies, was invented with a view to being *written* with a '*running*' *hand*, and does not show to advantage in a type-metal cut; whereas Pitman's, being a 'geometric' system, is specially adapted to that mode of illustration, but very difficult to write accurately.

The difficulty of satisfactorily imitating the natural peculiarities of a 'script' system in a type-block is so great that works of this kind are almost invariably illustrated by photolithography. I have all the more therefore to thank the type-cutter, Mr Saunders, whose work in connection with the illustration of shorthand systems is so well known, for the great care and skill he has bestowed on the laborious task of executing the cuts for the present work.

I wish also to thank my friends, Mr H. M. Innes, M.A., Fellow of Trinity College, Mr C. F. Clay, M.A. of Trinity College, and Mr J. B. Holt, B.A. of Christ's, for their kindness in reading proof-sheets, and for many valuable suggestions they have made while the book was passing through the press: having had the advantage of their revision the work should be free from serious errors.

H. L. CALLENDAR.

TRINITY COLLEGE,
CAMBRIDGE,
Dec. 1888.

INTRODUCTION.

ON THE PRINCIPLES OF SHORTHAND.

1. Cursive Shorthand is designed to supply the need of a system sufficiently easy, regular, and legible, for general use, and at the same time brief enough to be adapted to reporting purposes.

The advantages to be derived from a knowledge of shorthand are sufficiently obvious, and are moreover very fully set forth by many other writers on the subject. The principles upon which a good system should be constructed are much less generally understood. I may be pardoned therefore if in publishing a new system I proceed at once to the consideration of the principles it involves, taking it for granted that the reader fully appreciates the benefits resulting from a practical acquaintance with the art, and seriously desires to master it.

The aim of every shorthand inventor has always been to produce a system of writing which should be as brief as is compatible with the conditions that it should also be simple to learn, easy to write, and easy to read. The widest divergence of opinion exists, however, in the interpretation of these requirements. The relative importance to be attached to the qualities of Brevity, Simplicity, Facility, and Legibility, depends in part on the purpose to which shorthand is applied. For reporting purposes brevity is a most essential condition; but for general use legibility is much more indispensable, and a very high rate of speed is comparatively valueless. The reason why shorthand is not more generally practised, appears to me to be that this point is not sufficiently kept in view.

A system adapted for reporting may be more or less un-

suitable for general use. For instance, the system known as *Legible Shorthand*, by Mr E. Pocknell, was specially constructed to secure the greatest possible brevity, and is consequently, as the author himself admits, unnecessarily difficult and delicate for general use. The same remark applies to Pitman's system, which, moreover, is much less regular than Pocknell's. Mr Pitman, however, claims that his system of phonography is, at once, "as legible as longhand and six times as brief"*; and "so simple that a child can master it"†.

In explaining the conditions which a system for general use must satisfy, I have drawn my illustrations mainly from Pitman's Phonography, both because it claims to be the universal system‡, and because from practical experience I am well acquainted myself with its merits and drawbacks.

For convenience of arrangement, the subject is divided into four general headings, (1) Conditions of Facility, (2) of Simplicity, (3) of Legibility, (4) of Brevity. It must however be understood that these conditions are not generally independent of each other: the conditions of brevity are often opposed to those of legibility, which again are dependent on those of facility and simplicity; other things being equal, the more simple and facile a system is, the greater the speed with which it can be legibly written. The suitability of a system for general use, depends, *not* on excessive attention to any one point, such as neatness or brevity of appearance, but on the blending of all the various qualifications in due proportion.

For a brief summary of the claims of Cursive Shorthand as a system for general use the reader is referred to p. 40.

CONDITIONS OF FACILITY AND CLEARNESS.

2. Distinctions of Form. In order that any kind of writing may be scribbled without becoming illegible, too fine distinctions of form must be avoided.

* Tract entitled, "A Persuasive to the Study of Phonography."

† Pitman, Leaflet No. 13.

‡ During the last year or two several articles have appeared in Pitman's Journal, asserting that it is the only system fitted *for general use*, and advocating its adoption to the exclusion of all others.

In my experience, which I find is endorsed by many skilful stenographers, and in particular by Professor Everett, it is impossible in rapid writing to distinguish more than two sizes of character, as in longhand.

Pitman distinguishes *four:* for instance

stands for *you* or *beyond* according to position.

mt as in *might*, *met*, *meeting*, etc.

m as in *me*, *my*, *him*, *may*, *am*, etc.

mtr, *mdr*, or *mthr* as in *matter*, *mother*, etc.

Difference of curvature, by itself, apart from difference of size or direction, is not a safe means of distinction. For instance, the Pitman outline *lr* (*liar*, *lore*, *allure*, *lower*, etc.) differs but slightly in shape from *m* or *mtr*, and is easily mistaken for either if badly written.

Difference of direction is a good means of distinction, provided that too many directions are not recognized. In *Cursive Shorthand* four directions are practically distinguished; the downstrokes / and \, the upstroke /, and the horizontal stroke —. Pitman distinguishes the vertical stroke | from the back downstroke /; each of these strokes however is sometimes awkward; by adopting, instead of them, the intermediate slope / (which may of course have any convenient inclination between the two extremes), an immense gain of clearness and facility is secured.

The forward downstroke \ is certainly less facile than the other directions; but it is waste of material to reject it altogether, as so many script systems do: a better plan is to use it for comparatively rare sounds.

3. Distinction of Thickness. In Pitman's and similar systems, difference of thickness of stroke is employed to distinguish pairs of letters like | *t* and | *d*, \ *r* and \ *rch*, *m* and *mp* or *mb*: it is very difficult in rapid writing to preserve this distinction accurately, even after years of practice.

It is true that the difference of *sound* in many of these

pairs (as between *t* and *d*) is not very great; but the confusion, even in this case, becomes very serious, when more than half the sounds are omitted, so that the writing is not strictly phonetic. In Professor Everett's system, which is very strictly phonetic and literally represents 'talking on paper', confusion of thickness is not nearly so serious as in Pitman's, in which the vowels are generally omitted, and the phonetic principle is otherwise less accurately observed.

In writing with a pencil the distinction of thickness is particularly difficult to give clearly; with a stylograph it is quite impossible to make it at all. Some writers no doubt possess the light touch required to enable them to preserve it in a large number of cases when using pen and ink, but the majority of ordinary folk would probably never acquire the requisite skill. It must therefore, I think, be regarded as a device unsuitable for general use.

Cursive Shorthand uses only two sizes of characters, and does not employ the distinction of thickness. Thus, where Pitman distinguishes the ten* varieties,  *of*,  *all*,  *pt*,  *bd*,  *p*,  *b*,  *pp*,  *bb*,  *bp*,  *pb*: Cursive Shorthand distinguishes only two,  *ĕ*, as in *ell*, and  *ey*, as in *they*: and so on throughout the alphabet. It is therefore, on this account alone, much more easy to write legibly, and much more simple to learn.

It might appear at first sight as though by recognizing five times as many distinctions it would be possible to make a system, say, twice as short. This is by no means the case, even in theory; and as a matter of fact, Pitman's Phonography, as will appear later, is not only not shorter, but actually takes very much longer to write than Cursive Shorthand, when fully written.

* Pitman admits also an occasional treble length in words like *attitude* (p. 35). The additional distinction of position (see p. 31) is applied to many of these signs. Pocknell distinguishes only eight varieties, and does not use ticks standing alone.

CHRONOGRAPHIC EXPERIMENTS.

4. With a view to ascertain for my own edification what sort of combinations were most facile, and what forms could be most clearly distinguished in rapid writing, I put together an electric chronograph capable of recording automatically to the hundredth part of a second the time taken to form any portion of any stroke in any kind of writing. At the Cambridge laboratories we have every facility for this kind of work. The clockwork, electro-magnets, and other parts of such an apparatus being ready to hand, very little has to be specially constructed. The special portions of the apparatus in the present case were made after a design suggested by my friend Mr Horace Darwin; its performance was all that could be desired.

The apparatus was so arranged that by comparing the actual writing with the record on the chronographic cylinder, a complete solution of the time-question could be obtained. A great many experiments were made on various kinds of writing, including specimens of Phonography (Pitman's) by a skilled reporter. Space would not suffice to give a full description of the experiments; only a few of the more interesting results will be incidentally mentioned as the questions arise to which they refer: but to myself the experience thus acquired was of the greatest practical value in the endeavour to establish the present system on a sound basis.

5. Length of Outlines. Among the general results of these experiments we may here mention that, as is evident *a priori*, the actual *length* of an outline has little relation to its *facility*. One often sees estimates of the relative facility of two systems based almost entirely on a comparison of the distances traversed by the pen, whereas the *order* in which a series of strokes is made, and, above all, the way in which they are joined, are a great deal more important than the length or direction of the individual strokes.

In deciding questions of relative facility and in esti-

mating speed, the method of repetition has, I believe, been exclusively adopted by previous experimentalists. It has the merit of simplicity, but the information it affords is not complete and may even be misleading. For instance, in describing a series of strokes, such as  , in succession, the hand and arm are unconsciously placed in the most favourable position for that particular direction, so that, in an experiment thus conducted, it may happen to appear more facile than it really is. The chronographic method has the advantage that the actual conditions of the problem are more closely reproduced; it is possible to determine the exact time corresponding to *each portion* of an outline, and to allow for imperfections of formation, and for loss of time from hesitation or other causes.

A common method of estimating the time required to write any given passage, is to count the number of 'pen-strokes' or 'inflections'. Not to mention the difficulty of fixing definitely the meaning of an 'inflection', this is a very rough and inaccurate method, especially if lifts of the pen are not taken into account*. For instance, on this plan, the combination  might be counted as two pen-strokes, and the combination  as three, whereas in reality the latter is much the more facile.

In comparing different specimens of the *same* system, or of *similar* systems, Professor Everett's rule† would give reliable results, although it makes no allowance for the great differences that occur as regards good and awkward joinings. But in comparing a script with a geometric system, it would be absurdly unfair to the former, because no account is taken of its most essential feature, namely that the majority of the outlines and joinings are easy. No such simple rule in fact can be made to meet this case.

The objection to all such rules is that they cannot take account of *clearness* as apart from *ease* of joining; the easiest

* See the controversy on Shorthand Systems in *The Bazaar*, 1882-83.

† *Shorthand.* May, 1884. 'All round Criticism.' (This is the organ of the Shorthand Society, and must not be confused with Ford's *Shorthand Magazine.*)

joinings are often the most indistinct. The real question is not the making of a number of *marks*, but of *distinctions;* not how briefly a word can be written, but at what speed it can be safely distinguished. A system abounding in outlines that cannot be clearly distinguished unless carefully drawn to scale, and that cannot therefore be written fast without spoiling most of its characteristic features, however neat and brief it may appear in print, is quite unsuitable for general use, and cannot be compared with a system in which such faults are avoided.

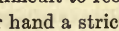
6. Straight Lines versus Curves. It is commonly stated that straight lines are more facile than curves. This is true of a series of straight lines described independently; but the curve often has the advantage in the matter of joining to other characters, for its curvature may generally be varied, especially near the ends, so as to make the joining easier. The most facile directions for straight strokes are the up and down strokes of longhand / /, the horizontal stroke —, and the upstroke /. The backward slope \ is generally awkward unless the arm be held in an unnatural position. The horizontal curves ⌒ ⌣ are the most facile curves; they do not leave the line of writing, and they generally present good joinings.

In Cursive Shorthand the arrangement of the alphabet is such that curves are more common than straight lines: the majority of the strokes are on the slope of longhand writing, and lines in the awkward direction are comparatively rare.

7. Script Systems and Geometric Systems. Since every educated person must learn to write longhand, and generally acquires considerable facility therein, he will evidently find a system of shorthand easier to write, the more closely it imitates the outlines and joinings with which he is already familiar in longhand.

The objection to script systems in general (such as that of Gäbelsberger) is that the distinction between different characters is often too vague and indefinite; they cannot usually be

defined by simple geometrical forms. The outlines resemble a series of flourishes in which the component characters cannot easily be traced; and the points of distinction are often so subtle as to be difficult to recognize even in an engraving.

On the other hand a strictly geometrical system abounds in polygonal outlines, like these  (taken from Taylor, 1786), which are very far from cursive and are difficult to write freely. Again there are several good outlines, such as  , which are common and familiar in longhand, but of which a geometric system cannot make any use proportionate to their facility.

I have endeavoured in Cursive Shorthand to combine the advantages of both methods. The characters of the alphabet are defined as far as possible by simple geometrical forms, but are assigned to the various sounds of the language in such a way that the majority of the outlines are cursive, and as similar as possible to those of longhand. The other class of outlines, however, are not altogether rejected, but are relegated to the representation of comparatively rare combinations of sounds; such as  *Oh-eh*, in *Oäsis*.

8. Blunt Angles. Whenever a blunt angle occurs in an outline there is a tendency in rapid writing either to sharpen or slur it. The great objection to geometric systems is that they abound in blunt angles.

An outline such as  *pk* (Pitman), when written rapidly, *tends* to become  or  (usually the latter), which both mean something totally different. A blunt angle is most difficult to mark distinctly when it occurs before or after a curve in the same direction, as in the Pitman outlines,

 *help'd*,  *flirt*,  *wearer*,  *forum*.

Outlines of this kind, in which the blunt angle cannot be rounded off without causing confusion, become indistinct when written fast.

The chronographic experiments showed that a blunt angle was never correctly given, even by accident, without consider-

able waste of time, and that to mark it with the minimum of distinctness took longer than to make two sharp angles. A sharp angle, such as ⌣, is the most rapid and distinctive joining of all, being slightly superior to a circle between two curves in the same direction, such as ⌒. Two characters joined continuously, like —— *kk* (Pitman) from — *k* and — *k* take little longer to write than one; but such a joining is of no value as a means of distinction apart from the difference of length, if it is not clear from other evidence where one character ends and the other begins, unless, for instance, there is a point of inflection, as in ∼ from ∩ and ∪. In any case two continuous joinings in succession must generally be avoided, as they make the outline indistinct and wanting in sharpness. It is one of the chief merits of Pitman's Phonography that he is enabled to avoid continuous joinings in many cases, and thus to secure greater neatness and sharpness of outline than the majority of geometric systems, by the use of his numerous alternative characters; but, as we shall see, from want of system and regularity in their application, this advantage is only gained at an enormous sacrifice.

In Longhand, when clearly written, sharp angles predominate, two continuous joinings hardly ever follow in succession. Cursive Shorthand aims at utilising sharp angle joinings as far as possible, and avoiding blunt angles, and so arranges matters that wherever blunt angles occur, they may, except in very rare cases, be slurred or sharpened without detriment to legibility.

9. Sloping Curves. Among other generally recognized sources of indistinct outlines are the sloping curves which Taylor and others reject on this ground. It is only in certain combinations that these characters are liable to produce confusion; to reject them altogether is to waste much valuable stenographic material. Pitman avoids the difficulty by using alternative characters for *l*, *sh*, and *r*, besides hooks for *l*, *r*, and *f*; when the natural outline of a word is bad, he writes it some other way. He still retains, however, several outlines

which I should regard as not sufficiently distinct. For instance, it is very difficult in writing to keep the double-sized *f*  *ftr*, *fdr*, or *fthr*, distinct from both  *tf**, and  *fk*, which are outlines having the same length, and similar slope and curvature, without confusing it with some other outline, such as  *pn*. Again *pn*, even in print (see Pitman's publications *passim*), may be often mistaken, when too much flattened, for double-sized *n*  ; and similarly  *rm* for  *ltr*, *ldr*, *lthr*; or *mtr*, *mdr*, *mthr*.

In Cursive Shorthand the bad combinations are almost entirely avoided by the arrangement of the alphabet: the few that remain are eliminated by using alternative characters.

10. Alternative Characters are otherwise objectionable as increasing the complexity of a system and the number of possible ways of writing each word. Systems, however, which do not use them, must submit to the worse evil of indistinct and awkward outlines. Pitman utilises his numerous alternative ways of writing a word, primarily for the purpose of securing good outlines, directing the student generally to choose for himself those outlines that he finds clearest and easiest.

In Cursive Shorthand the number of alternative characters employed is as small as possible. They are used chiefly for the purpose of securing clear outlines: rules are given in every case showing how this is best effected.

11. Lineality. Longhand is perfectly 'lineal', that is to say, every character returns to the line of writing.

In Cursive Shorthand lineality is secured by giving to all the commonest sounds characters which return to the line of writing, such as  *d*,  *b*,  *th*,  *l*,  *r*,  *m*,  *n*,  *nd*; and by using characters which do not satisfy this condition, either for the rarer sounds, as  ,  for *g*, *j*; or mainly as prefixes and terminations.

* See T. A. Reed, *Review of Duployé's Shorthand*, p. 5, end.

12. Use of Symbols. By a 'symbol' is meant a hook or circle or loop attached to a character to signify the addition of some other sound, instead of writing the latter by its proper alphabetic sign. The 'symbols' in a geometric system form a kind of subsidiary alphabet. They are used for various purposes: by Pitman chiefly as alternative characters to provide clear outlines for words of which the full alphabetic form would involve awkward joinings (see § 10).

13. Circles. In Cursive Shorthand the small circle is used initially for *h* (forwards) and *sh* (backwards), and medially in forming a whole class of characters, as ⌒ *f* (*ph*) from ⌒ *p*, ⌣ *th* from ⌣ *t*, ⊂ *ch* from ⊂ *k* (hard *c*). This arrangement is easily learnt, and gives very full employment to a device commonly admitted to be of the greatest utility.

In Taylor's alphabet several characters, such as ⌒ *m* from — *s*, ↖ *b* from ↘ *f* or *v*, ⌒ *p* from | *t*, ↙ *l* from ↗ *r*, are formed by adding circles at the *beginnings* of other characters. Initial circles however are much less facile than medial or final circles; and a circle on a straight stem tends in rapid writing to curve the stem, changing its meaning. A circle between straight strokes in the same direction (thus —○—) is particularly awkward, and liable to be miswritten. The circle is most facile when it comes between two curves, as in ⌣○⌣; or after a curve, as in ⌣⌒⊂ etc.

In a specimen of Taylor taken at random, three-quarters of the circles were found to be initial, the majority were applied to straight strokes, and many of the medial circles were awkward. In Cursive Shorthand circles occur most commonly (i.e. in about 90 per cent. of the cases) at the *ends* of *curve* characters, in which case they are not liable to these objections; initial circles are rare, and awkward circles very rare indeed.

The large circle is used in Cursive Shorthand as a prefix for *con-*, and as a termination for *-tion, -sion*. Used as a prefix it is always written like the circle of the letters *a, d, q*, in longhand, and is therefore extremely facile, and never clashes with the small circle. Pitman appropriates circles entirely to the

representation of *s* and *z*: this hardly gives sufficient scope to so useful a device.

14. Hooks are a very common stenographic device. They are objectionable as limiting seriously the compactness of the writing, because the characters must be made large in comparison, or they may be confused with the hooks. Medial hooks often present awkward, and sometimes impossible joinings. Professor Everett uses hooks very sparingly, and even of the few that he uses he says: "The hooked letters, though neat in appearance, and convenient for leisurely writing, are particularly liable to be spoiled in scribbling". From my own experience of Pitman's system I can fully endorse the Professor's statement. In rapid writing hooks are often so badly formed as to be misread for ticks or circles, and accidental hooks, changing entirely the meaning of an outline, are liable to be introduced in the endeavour to sharpen a blunt angle or ease the hand. If a hook is made too large it may often be mistaken for a half-size character. Pitman uses two sizes of hooks, which considerably aggravates the difficulty.

In Cursive Shorthand very few hooks are used. They are carefully selected, and restricted to cases in which they cannot clash with other characters. They are not applied to straight strokes, because they tend to produce curvature. Medial hooks are entirely avoided except in cases where they facilitate a joining.

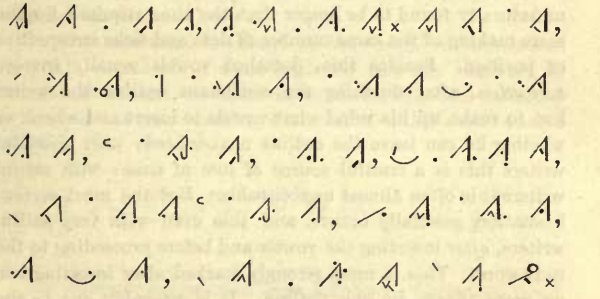
15. Loops. The only really facile loops are those which occur in longhand in the letters  , etc. These are largely used in Cursive Shorthand and give very facile and distinctive characters: for example  *l*, *r*, *ngg* as in *anger*, *ngk* as in *inker, anchor*.

Pitman uses loops for *st, str* in certain cases, applied to the stems of other characters, thus:  *pst*. Thus used they are not generally facile, they often present bad joinings, which have to be avoided by arbitrarily writing the word some other way. They are also very liable to be miswritten, or to curve

the character; compare the Pitman outlines *fst*, *pst*. A strictly geometric system is in its very nature unable to utilise the facile loops adequately.

16. Detached Vowel Marks. Nearly all geometric systems are driven to the use of detached vowel marks, whenever they desire to write a word clearly. These marks consist of dots, dashes, circles and angles (such as . , ı ı o ∨ ∨ ∧ c), which have to be placed carefully in position close to the consonants to which they belong. The position is important because the dot or dash slightly misplaced may mean something quite different.

The following passage*, engraved in Pitman's Phonography, will serve to illustrate both the care with which the detached vowel marks must be located, and the necessity of inserting vowels to distinguish words. The reader should also notice particularly the distinction between light and heavy dots and ticks, and thick and thin strokes.



* The key and explanation of this passage will be found, together with the Cursive Shorthand version, on p. 92. The reader must not suppose that it is an exhaustive list of all the words that can be written with this outline in Pitman's system. A few of them, those that begin with *h* or end with *-ing*, can be written in other ways: but there are several other words (such as *erode, errata, rid, rideau, redo, arrete, radiated*, etc.), which might have been included, having the same outline *rt*, and differing only in detached marks and thickening; and there are large classes of words (such as *riddle*, etc., *ordain, retain*, etc., *rotating, retreating*, etc., *writer, reader*, etc., *roared*, etc.), having outlines, either identical with some of the above, or so similar to them that it would be difficult to distinguish them safely in rapid writing.

The consonant outline of each word is written first, and the vowels are dotted in afterwards in their proper places. This is called 'vocalizing' the outline. The writer has to go over each word twice, in a highly artificial and unnatural order, if he wants to put in the vowels, that is to say, if he wishes his writing to be legible (see § 27).

This very serious and oft-repeated objection is so generally admitted, even by the partisans of Pitman's system, that it would be waste of time to argue the point, were it not that special attention was given to detached vowels in the chronographic experiments, the results of which seem to throw some light on the question.

It is often maintained that a detached vowel mark counts in loss of time only about as much as an extra lifting of the pen. This is very far from true. In addition to the lifting of the pen there is the time occupied in making the stroke or dot and locating it carefully in its proper position. This is not unnaturally found to be longer than the time required for the mere making of the same number of dots and ticks irrespective of position. Besides this, detached vowels usually involve *hesitation:* after finishing the consonant outline the writer has to make up his mind what vowels to insert and where, or whether he can leave the outline unvocalized: with unskilful writers this is a fruitful source of loss of time: with skilful writers it is often almost unnoticeable. But the most serious hesitation generally occurs, and this even with very skilful writers, *after* inserting the vowels and before proceeding to the next word. This is most strongly marked after inserting two or more vowels in one outline. It is probably due to the illogical order in which the vowels are written. The mind momentarily loses its place in the sentence, and has to go back and pick up the lost thread, so as to find what comes next. The result is that the insertion of detached vowel marks always involves such a disproportionate expenditure of time, that they must be omitted in writing at any reasonable speed.

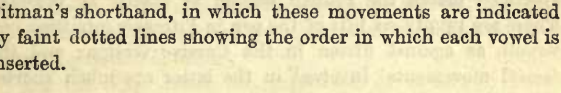
The reader must understand that we are here dealing with very small intervals of time, such as a few tenths of a second:

that it is difficult to take account of such small periods or make any accurate observations upon them, otherwise than by means of an automatic record, which can be read at leisure and compared with the actual writing.

A distinction is theoretically made between a light dot for the short vowels *a*, *e*, *i*, and a heavy dot for the long vowels *ah*, *ay*, *ee*. Practically this distinction cannot be clearly made in writing, and is often badly given even in printed specimens. In the attempt to preserve it the light dot is frequently made so evanescent as to be mistaken for a flaw in the paper or altogether missed; such minute distinctions are very trying to the eyes in reading.

The chief advantage of detached vowels is that they present an appearance of brevity, and look neat, especially in print. They are so inconspicuous that the inexperienced eye does not realize the difficulty of inserting them accurately, and takes no account of the aerial movements of the pen which their insertion involves.

To illustrate what is meant by the 'aerial movements of the pen', we subjoin a short sentence carefully engraved in Pitman's shorthand, in which these movements are indicated by faint dotted lines showing the order in which each vowel is inserted.



The sentence represented is as follows:—"Detached vowel marks always involve disproportionate expenditure of time".

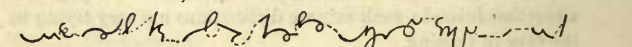
The sounds are written in the following order:—

dtchtea vlowe mr-ksah awlwseh invlvo dsrppr-*shn*toawe ekspndtr-eiyu *of* tmei.

(The italicized letters represent sounds which are expressed, not by their alphabetic characters, but by abbreviations; the hyphens represent indicated vowels, and the spaces lifts of the pen.)

We have followed the *Dictionary** outlines, except that we have ventured to spell the word *expenditure* with a *d*, and to write the word *always* in full. Initial vowels are supposed to be written first for the sake of the logical order, and to save distance traversed. The first vowel in the word *disproportionate* cannot be clearly inserted, and the *r* hook cannot be properly made. The way in which each word is accented can only be marked by inserting small crosses near the accented vowels.

For the sake of contrast we give the same sentence in Cursive Shorthand, written on the same scale.



It is evident that this is not only much briefer, but also more facile and lineal than the Pitman version. Moreover it represents much more accurately the correct pronunciation of the words, and shows in addition exactly how each word is accented. Every sound is fully expressed in its natural order. The dotted lines are therefore not really required, and only serve to confuse the outlines. They are inserted to make the specimen match the Pitman version as exactly as possible. There are twenty-six lifts of the pen in Pitman's (omitting one vowel), as against fifteen in the Cursive version; and the 'aerial movements' involved in the latter are much shorter and easier.

Enough has been said to show that detached vowels are far inferior to joined vowels in point of speed and clearness. This is indeed generally admitted. But after all, so their advocates argue, these detached vowel marks are rarely required. In reporting, they say, only one vowel in every twenty words on the average, is needed to make Pitman notes (if they are well enough written and the subject is not too technical) decipherable without serious errors, with the aid of the memory and the context.

This line of argument altogether misses the point. One vowel in twenty words may be sufficient *for reporting*, if the

* Pitman's *Phonographic Dictionary*, 5th Ed. 1884.

reporter is sufficiently skilful and has succeeded in learning all the conventional outlines. But vowels cannot be thus omitted in Pitman's system without the most serious loss of legibility, such as would make it quite unsuitable for general purposes; and, in point of fact, they are not so omitted in the published specimens of the 'corresponding' style. Taking a printed specimen of this style at random, it was found that, excluding grammalogues and special abbreviations, more than one hundred and sixty vowels on the average were inserted in every hundred words. Some of these vowels, no doubt, might have been omitted if Pitman's Phonography possessed a reliable system of vowel indication: since, however, it does not, it is the more dependent on the aid of detached marks for legibility.

If the young reporter starts with the resolution of omitting all vowels, and is prepared to face the difficulty of reading, detached vowel marks are all very well; there is no difficulty about omitting them, and if he does not intend to use them, he need not waste his time in learning them*. But in shorthand for general purposes vowels cannot be thus neglected, and their expression by detached marks is therefore a fatal objection to the general utility of a system, though, as we shall see, it is by no means the only, or even the chief objection to which Pitman's system is liable.

On the other hand, the expression of vowels by joined characters or 'by mode', is much clearer and does not involve the same disproportionate expenditure of time, so that it is possible to write words in full at a reasonable speed. In reporting at high rates of speed, words cannot be written in full; but it by no means follows that recourse must be had to the wholesale omission of vowels. The expression of vowels in the outline, enables us to employ better and more rational methods of abbreviation.

17. 'Lifts' of the Pen. 'Modes'. The time occupied in lifting the pen and replacing it on the paper, supposing there

* Many systems make no provision for the distinction of vowel sounds. Many Pitmanite reporters never insert them, but trust to memory and context.

to be no hesitation between the words, varies according to circumstances from one- to three-tenths of a second; but is rarely so small as one-tenth. It depends of course on the nature and direction of the movements before and after: the lift involved in travelling *backwards* to dot in a vowel is one of the worst. An ordinary 'lift' takes a little longer than the description of the quickest connecting stroke (not necessarily the shortest), but takes less time than a connecting stroke which involves an awkward joining.

Thus Professor Everett's 'modes' of expressing vowels by lifting the pen and writing the consonants in position, are by no means so slow as Pitman would have us believe. They are in fact very far superior to detached marks in point of speed, facility, and clearness, and possess the further advantage of expressing the vowel in its logical order between the consonants.

In Cursive Shorthand detached dots are used, as in longhand, for punctuation, and to mark abbreviated words. They are also occasionally used as diacritics, like the *i*-dots in longhand.

Expression by mode is employed for various subsidiary purposes, those modes being chosen (Everett's nos. 2, 3, 4) which are always applicable and clear.

CONDITIONS OF SIMPLICITY.

18. A system of shorthand for general use must be simple and easy to learn: few people can afford to spend a lifetime in acquiring it. It is far best in every way that shorthand should be taught, like ordinary writing and reading, at a very early stage; it should therefore be made as simple as possible, and should be independent of the ordinary spelling.

It is difficult to make a system of shorthand at once *simple* and *complete*. It is very easy to secure an appearance of simplicity by making the system incomplete, by suppressing points of difficulty which are certain to meet the student sooner or later, or by giving vague general directions and loosely worded rules; by telling the student for instance to write according to sound, and leaving him to find out for himself how it is to be done, or by giving him several alternative ways of writing a word and leaving him to choose which is the clearest and easiest.

In Cursive Shorthand I have spared no pains to avoid this fault. I have endeavoured to foresee and to illustrate every difficulty which the learner is likely to experience, and to make the rules so definite that any given sound cannot be correctly written in more than one way. I can hardly hope to have completely succeeded at the first attempt, but it is undoubtedly a step in the right direction and will commend itself to all who seriously desire to utilise shorthand for practical purposes.

It is of no use to make a system simple without making it complete and accurate. Systems which, like Taylor's, content themselves with writing the consonants only, may have the merit of simplicity, but will always be found unsatisfactory for any sort of work where accuracy and legibility are essential.

19. Writing by Sound. It is by this time agreed by all good authorities that a system of shorthand to be simple, consistent, and complete, *must be Phonetic*. It must discard the inconsistencies and difficulties of the common orthography. It is almost impossible to make a system represent consistently and simply the endless variety of combinations in the common spelling: but it is quite practicable to represent with sufficient accuracy the comparatively small number of sounds which are used to distinguish words in speech.

In constructing Cursive Shorthand I have made it as strictly phonetic as is practically possible. This not only renders it more complete and self-consistent, but considerably enhances its educational value, especially as a training in correct pronunciation.

The phonetic principle itself is not altogether free from disadvantages. Phonetic spelling, though much simpler than the received spelling, presents some difficulties to beginners, who seldom realise at all accurately how they pronounce, till their attention is specially directed to the subject. Moreover, all people do not pronounce exactly alike; hence slight variations of spelling may arise in a phonetic system corresponding to variations of pronunciation.

In order to minimize these disadvantages, I have published

a separate pamphlet* explaining in considerable detail the phonetic notation and the standard of pronunciation which are adopted as the groundwork of the present system.

One of the commonest objections to phonetic spelling is that it confuses words, such as *write*, *right*, *rite*, which are pronounced alike but differ in meaning and orthography. This objection is not serious, because such words are comparatively rare, and are scarcely more likely to cause confusion in correspondence than in speech. In writing from dictation it is actually a disadvantage to have different outlines for words which are pronounced alike, because it is often impossible to tell, till the end of a sentence, which word is intended.

20. Writing by Alphabet. Further, in order to be easy to learn, a system *must be Alphabetic*. It must be capable of representing all words with neatness and precision by means of a few fundamental forms, the characters of the alphabet, combined according to strict and simple rules. It must not be encumbered with a multitude of arbitrary signs and abbreviations. It must not abound in special exceptions made in favour of individual words. For although such devices impart brevity to the writing, and may be of use to men whose life is spent in reporting, they are an immense tax upon the memory and make a system quite useless for ordinary purposes.

The majority of geometric systems which employ symbols freely, cannot be called strictly 'alphabetic'. For instance in Pitman's,  represents *p*, and  or  *r*, but  represents *pr* as in *person* or *prison:* the symbol representing the *r* is a hook, which not only has no similarity to either character for *r*, but also comes *before*† the *p*. Again,  represents *th* and  *s*, but represents, not *sr*, but *thr*. Moreover all these combinations may have other symbols attached at the end, and may be halved to add *t* or *d*, or lengthened for *tr*, *dr*, or *thr*.

* *Phonetic Spelling*, by H. L. Callendar. Same publishers.

† The use of the initial hooks to add *r* and *l* after a consonant, though strictly speaking illogical, is doubtless a matter of practical convenience at the beginning of a word; but when medial they often join awkwardly and thus entail special devices.

Any such combination must be regarded as a single whole, or 'compendium', and not as being made up of separate characters. The number of such possible compendiums in Pitman's system is very great, and largely increases the mental effort required for writing and reading.

The worst objection to the extensive use of compendiums, unless governed by very strict rules, is the variety of outlines with which the same sound may be written, and the consequent endless hesitation in choosing between the different possible ways of writing a word.

Pocknell (*Legible Shorthand*) does not employ the halving and lengthening principle, and although he uses symbols freely, his method is not liable to the above objections; each letter has a separate recognizable representation, written in its logical order, and used according to strict rules of vowel indication.

Cursive Shorthand is very strictly alphabetic, and avoids the use of arbitrary signs. It employs but few compound consonants, and these are generated by simply combining their component characters in the clearest possible way; the use of these compounds is governed by one strict and simple rule, so that no hesitation can arise from uncertainty as to when they should be used.

CONDITIONS OF LEGIBILITY.

21. The word 'legible' is not used as synonymous with 'decipherable'. The ideal of legibility is that each word when correctly written should be readily and instantaneously distinguishable from every other word without reference to the memory or the context. The more nearly a system approaches this ideal, the greater its claim to rank as 'legible'.

A system which does not express vowels and often includes twenty or thirty words under the same outline, can only be deciphered by guess-work, and cannot with any truth claim to be as 'legible as print'. The context, to which so many stenographers trust, is often a very unreliable means of distinction. As Mr T. A. Reed says: "I am disposed to think that it is possible for any two words, however dissimilar in character or

meaning, to be so placed as to render it difficult to tell by the context which is intended".

SIMPLICITY is one of the conditions of legibility. If a system is too complicated in the number of possible forms and combinations of its characters, or too involved in the application of the rules which determine its outlines, it will be difficult to read in proportion to the intricacy of the mental operations required to decipher it.

FACILITY is another of the conditions of legibility. If a system cannot be written easily, it will probably be written badly, and will therefore be difficult to read.

Under this heading I have already discussed most of the conditions which depend upon sharpness of outline, and on the clearness and ease with which the hand can make the required distinctions between the characters. The conditions which I *now* proceed to consider are important even if the writing be engraved with the greatest skill and care, so that each character is unmistakeable.

The general condition of legibility in a phonetic system is that SIMILAR SOUNDS SHOULD BE REPRESENTED BY SIMILAR SIGNS, and conversely different sounds by different signs. It is one great advantage of a phonetic system that if this condition is observed a slight error in reading or writing will correspond to a slight error in sound, so that the word though wrongly read or written may still be recognizable. On the other hand a considerable difference in sound will correspond to a considerable difference in outline, so that words of different sound will not be likely to clash*. In longhand the forms of the letters have no relation to their sounds, and the writing is less legible than it would have been if any definite phonetic plan had been adopted.

Alternative characters such as bear no resemblance to each other, and especially 'symbols' (as defined in § 12), are objectionable because they violate this principle, in that the same sound is represented by different signs.

* It is a common mistake to suppose that Pitman's system satisfies this condition; very dissimilar words often have the same outline in his 'phonography' (see p. 27, near end).

22. One Word, One Outline. If similar sounds should be represented by similar signs, *a fortiori* the same word, apart from variations of pronunciation, should always be represented by the same sign*. Of equal importance is the complementary principle that different words should be represented by different signs.

These are two most essential conditions of legibility, apart from all question of good or bad writing; but it is undoubtedly very difficult to satisfy *both at once*. This was in fact far the most serious difficulty encountered in constructing the present system.

The variety of material supplied must be sufficient for the distinction of all such words as differ in sound, and at the same time the rules must be made so strict and definite that the same word cannot be correctly written in several different ways. The pages of illustrative matter in the exposition of the present system are mainly devoted to explaining how words should be correctly written, so fully and precisely that all learners may naturally write them alike from the outset. It is not enough to say to the student, 'Here are your characters: select those joinings which you find the best and clearest.' It is necessary to point out definitely in each case which characters are to be used.

23. Most authors are agreed with regard to the importance of distinguishing different words, and, in order to satisfy this condition, they generally provide such a superabundance of material—thick and thin strokes, symbols, detached vowels, and many different lengths and directions of character—that they find it impossible to satisfy the other condition. Sometimes they admit the failure as a misfortune, sometimes they glory in the 'endless variety of possible outlines' without appearing to notice its drawbacks; sometimes they deny that it has any disadvantages, and refuse to recognize the importance of laying down strict rules, and of always writing the same word in the same way.

* Except, of course, as regards simple omission; part of a word may be omitted for convenience in phrasing or abbreviation: this is not the same thing as admitting several different outlines for a fully written word.

On this point we entirely agree with Mr Pitman, who says*: "It is essential to easy and fluent writing that every word should always be written in the same way".

But†: "Seeing that in the Phonographic Alphabet [Pitman's] *s* and *r* have duplicate forms, that *sh* and *l* may be written either upward or downward, that *w* and *y* have both vowel and consonant forms, that *h* may be written by its consonant form (up or down), or by a joined tick, or a dot; also that many groups of consonants may be expressed either by their alphabetic forms or by abbreviations [symbols], it is evident that a large number of words may be written in more than one way." That is to say, in a *very* large number of cases the *same* word may (apart from all variations of pronunciation) be correctly represented (as far as the rules are concerned) by several (sometimes two or three hundred) *different signs*. Not only are these signs *different*, but they bear as a rule not the vaguest resemblance to each other. The hooks, circles, loops, bear no resemblance whatever to the alphabetic characters of the letters *l*, *r*, *f*, *v*, *n*, *s*, *z*, *st*, *str*, which they represent: and to halve the length of a stroke is not in the least like adding *d* or *t* to it.

24. The primary object of this variety is the avoidance of the straggling outlines that arise from the inadequacy of the alphabet (see p. 34). Unfortunately it "opens the door to a diversity of stenographic representation for some words, and casts on the writer the necessity of deciding which form is most convenient"‡. The resulting confusion has been in some measure alleviated by the publication of a *Phonographic Dictionary*, which is intended to relieve the student of the labour of choosing for himself which of several possible outlines is most convenient and correct.

It is one of the chief advantages of a phonetic system that words can be written by ear without reference to the spelling; this advantage is lost when it becomes necessary to learn correct outlines from a dictionary.

* *Manual*, p. 43, § 139 (note). Ed. 1886.
† *Manual*, p. 46, § 153. Ed. 1886.
‡ *Dictionary*, Preface. Ed. 1884.

In this respect there is a close analogy between Pitman's system of shorthand and the common orthography. Just as in learning to spell, the correct spelling of *individual words* must be learnt, so in Pitman's system the student must learn the correct outlines.

In *Phonography* the choice of a correct outline of a word is not made entirely at haphazard, similarly in common spelling there are many elastic and general relations between the sound and the orthography; but the exceptions are so numerous, that you cannot from the analogy of any number of cases deduce with certainty the correct result in any other case however similar.

The difficulty of learning *Phonography*, like that of learning to spell, is consequently very great. In fact, as Mr Pitman himself writes, "Fonography is undoutedly not a thing to be lerned without a littel truble". Most of our readers have probably long since forgotten the weary toil of learning to spell, and will hardly be able to realize the force of our comparison: but Pitmanites, at any rate, who are ardent spelling reformers, will appreciate its full significance.

The number of alternative characters even in Pitman's alphabet is small compared with the number of words in the language. If the usage of the alternative characters were defined by strict rules, a dictionary would not be required. The absence of strict rules, although it makes a system appear simpler at first sight, is in reality attended with serious difficulties, because it compels the writer, if he does not wish to acquire a style peculiar to himself and illegible to others, to learn the correct outlines of individual words.

25. But we have been assuming hitherto that the *Dictionary* in question is a recognised and absolute standard* of correct *Phonography*. If it were so, Pitman's system, like the common orthography, "in spite of its complexity and its many glaring defects"†, would still be a practical system. In reality

* As a matter of fact it is very imperfect. Many of the most puzzling words are omitted, especially those whose outlines are awkward or uncertain.

† *Standard*, Sept. 26, 1887.

the comparison is altogether unfair to the common orthography, for not only is the possible variety of phonographic outline much greater than the possible variety of spelling on any reasonable analogies, but whereas the common orthography is exceedingly strict and definite, the usage of distinction by outline, even among skilful phonographers and in printed specimens, is far from regular and uniform.

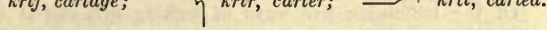
In fact so great is the possible variety of outline in *Phonography* and so elastic are the rules that Mr Pitman has not *after fifty years* succeeded in establishing uniformity even in the text-books published by himself. To take one instance, out of many that might be given; in the *Reporter*, p. 28*, the outline for *cart* (or *according to*) is given as  , which properly stands for a word of the form *kr-t* as *crate;* on p. 43, the outline given for *cart* (also *carat*, *accurate*, and *curate*) is  , which properly stands for a word of the form *k-r-t* as *carrot;* but in the *Phonographic Dictionary* the form given is  , which could hardly be distinguished in rapid writing from  *care* (the latter word may also be written  , like *acre*, *crow*, *occur*).

Again, it is very desirable that in a series of related words the same syllable should always be written in the same way. Here Mr Pitman apparently gives up the attempt to maintain consistency: every page of the *Dictionary* is crowded with illustrations of the disregard of this obvious principle.

Take for instance the word *critic*, which is written  *krtk;* in order to form *critical*, it ought only to be necessary to add the syllable *-al:* instead of that, Mr Pitman writes the first syllable in an altogether different way, and puts a hook before the final *k*, adding nothing at all at the end; the result  *krtkl*, does not in the least suggest the form of the original word *critic*.

* See also *Manual*, p. 46. Ed. 1886. It is necessary to note the particular edition because changes are always being made. I expended in 1887 upwards of 10*s.* on a new set of Pitman's instruction books. I find that several changes have already been made since then.

Or take again the word *cart*, and compare the derivatives;

 *krtj, cartage;* *krtr, carter;* *krtt, carted.*

These are by no means exceptional cases. There would be no difficulty in giving thousands of similar examples.

We do not say that starting with Mr Pitman's methods and materials it would have been possible to achieve a better result: the success attained is probably as great as the fundamental imperfections of his system will admit. He at any rate recognizes the desirability of always writing the *same* word in the same way, though his manner of attaining that end is defective. The *Dictionary* method, even if consistently followed, would involve too much strain on the memory to be of general use.

26. Necessity of inserting Vowels. In the *Phonographic Reporter** we find this "variety of forms with which the same cluster of consonants may be written", quoted, "among the many points of superiority which Phonography possesses over all other systems". It is used "in providing different outlines for such words" as contain the same consonants, "so that they may be distinguished at once without the insertion of their vowels".

Now Pitman's capricious variety of outline, in addition to its other disadvantages, is quite inappropriate to this purpose. For in the case of long words, where the variety is so great as to be absolutely bewildering, the distinction is comparatively seldom required; and in the case of short words containing one or two consonants, where the distinction is most needed, it most hopelessly fails. To take as an instance some words containing three consonants: the combination *krt* can be written in six different ways, three of which are given for the word *cart* (see § 25). To take one of them: the outline  (according to the *Phonographic Dictionary*) represents the dissimilar words *crate*, *accord*, *curt*, *occurred*, *acred*, *create* etc., and if thickened, *great*, *grade*, *agreed*, *augured*, etc., and if the dot for *con* be omitted, as it often is, *concrete*, *concurred*,

* p. 17, edition 1886.

concord; except in '*Dictionary*' writing it might stand for several other words.

Of the remaining five ways of writing *krt*, one is too awkward to be of any use; the other four are used for other words, such as *carat*, *accurate*, *curate*, *cart*, *curt*, *carroty*, etc. This however is a particularly favourable case: the variety of *five* available outlines is unusual in so short a combination; yet even here it is seen to be quite inadequate: it is much more so in the case of shorter words. The cases where it just happens to fit the requirements of the language are exceedingly few in comparison, and are very poor "compensation"* for the trouble and perplexity of choosing between the several different outlines possible for every long word.

It must appear altogether absurd that it should be possible to write the consonant outline of the word *Switzerland* in nearly four hundred different ways; the more so, when we reflect that, after all, the correct outline,  *sts-rlnt*, may still be misread for *as-it-is-your-land*, or *cities-of-Ireland*, or *as-much-as-Ireland*, or *such-as-were-lent*, or something else, according to context, and clearness of writing, and virulence of phraseographic mania.

The natural way to distinguish words containing the same consonants, is to write, or at least to indicate, the vowels.

In Cursive Shorthand we have provided for the facile insertion of vowels by giving them joined characters which are written in their proper order together with the consonants. All words differing in sound are thus naturally distinguished in writing. How a word should be written, or whether to insert a vowel or not, is not left to the option of the student; the correct outline in every case is determined by general rules, so that no confusion of the kind we have described can arise.

27. Vowel Indication. Vowel insertion *alone* is not altogether satisfactory unless supplemented by vowel indication; otherwise, if any vowels are omitted, there is nothing to show

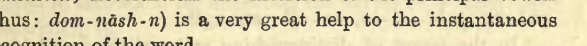
* *Phonographic Dictionary*, Preface.

where they ought to come, and even if all the vowels are inserted there is nothing to show that they are all there.

It is in reading *long words* that a good system of vowel indication, showing at a glance how the consonants are grouped, is of the greatest utility. Indicated vowels may be very freely omitted in long words without risk of actual clashing, because they seldom have precisely the same consonant skeletons. When the vowel sound itself is obscure*, and of no distinctive value apart from its place among the consonants, it is even preferable to omit it, provided that its place can be indicated. Important vowels however should still be inserted as an aid to legibility. For instance, although a knowledge of the language will enable anyone to discover that *d-m-n-sh-n*† can only stand for *domination*, and not for *admonition*, *damnation*, or *dimension;* nevertheless the insertion of the principal vowels (thus: *dom-năsh-n*) is a very great help to the instantaneous recognition of the word.

We have seen that Pitman's method of inserting vowels is bad; in addition to this his appliances for vowel indication are very rudimentary, and are moreover so capriciously employed as to rob them of nearly all their value. His methods of arbitrary distinction by outline must not be confounded with systematic vowel indication.

To return to our previous example; compare the words,



No one can pretend that this is systematic vowel indication. *Courtier* is confused with *creature*, a word of totally different structure. The other words, indeed, are 'provided with different outlines', but this is an instance particularly favourable to Mr Pitman, because the combination *krtr* can be written in fifteen different ways; it contains two *r*'s, each of which can be expressed in three ways, which are *theoretically*

* The fact that more than half the vowels in English are of this kind is probably the origin of the common superstition that *all* vowels can be readily dispensed with. See p. 63.

† It might at first sight be mistaken for *diminution*, which however contains a *y* thus *d-m-ny-sh-n*.

used for the purpose of vowel indication; (1) the hook (*r*), *r* preceded by a consonant; (2) the character ⟍ (-r), *r* preceded by a vowel; (3) the character ⟋ (r-), *r* followed by a vowel. Unfortunately (except that the downward *r*, being an awkward character, is rarely used when a vowel follows) these rules are so little observed in practice that no reliance can be placed on them as a means of vowel indication. (See also p. 103.)

Mr E. Pocknell has undoubtedly rendered great service to shorthand by the stress he has laid on the importance of vowel indication: but I think he goes too far in neglecting vowel insertion. It is true that a great many words are readily recognized by their consonant skeletons, especially if they are not spelt phonetically. No one would find much difficulty in recognizing the words,

Gl-dst-n-, R-nd-lph, C-lq-h--n, Br-ght, sh-rth-nd, phl-gm, t-bl-, d-bt, -n--gh, str-ngth.

In the power of distinguishing monosyllables and short words without the aid of detached vowel marks, by indicating the number and position of the vowels, his system is certainly a great improvement on Pitman's.

But in many cases even the indication of the precise position and number of all the vowels, is not sufficiently suggestive, or fails to show the exact word. It may take some time to guess words like --t-, -g--, b---, -d--, -b--, q----. In the case of short words there is usually a choice of alternatives, unless the exact vowels are written.

To reporters, who from constant practice become familiar with the outline of every individual word, and who can transcribe their notes while the memory of the subject is still fresh, a certain amount of guess-work is not a very serious drawback. But for general use, especially for correspondence and notes of lectures on technical subjects, we require much greater certainty* of reading, and continual guess-work is not to be tolerated. The exact expression of vowel sounds is at once the most direct, simple, and complete method of distinguishing words, and, given joined vowel characters, this can be effected without serious expenditure of time.

* Professor Everett, *Shorthand*, May, 1884.

Cursive Shorthand has not only provided very fully and definitely for the facile insertion of vowels, where they are needed; but has supplemented vowel insertion with a complete system of vowel indication, which shows in every case where vowels do *not* occur. We are thus enabled to omit obscure vowels not only without loss, but with actual gain of legibility. By systematically inserting accented vowels and indicating unaccented vowels, the outline is made to show in almost all cases exactly how the word is accented or divided into syllables*. The facility thus secured in reading long and unfamiliar words correctly at sight, is found to be of the greatest practical value.

28. Positional Writing. The device of writing a word in 'Position' above, on, or through the line, is commonly employed in shorthand for indicating the nature of a vowel without writing it.

In Pitman's system, writing a word 'in position' implies that its accented vowel is one of *five* or *six:* this information is rather too indefinite to be of much use†. Besides it assumes that the rarer vowels are always inserted. In reality the *w* and *y* series of vowels, long and short, and the dissyllabic diphthongs, ought to be included. This would raise the total number of vowels to nearly fifty‡, to be divided among three positions.

The use of position for this purpose, besides being indefinite, is particularly objectionable if the accented vowel does not happen to be initial, because it is illogical to *begin* a word out of position in order to convey information about the nature of a vowel which may come somewhere near the *end.* Position, if used, ought logically to be restricted to the expression of initial sounds. It is thus used in Professor Everett's system;

* Many 'syllabic' systems claim the advantage of showing, by the way a word is written, how it is divided or accented.

† Of so little use that, except for logograms, it is generally neglected.

‡ Yet with all this multitude of signs, no distinction is made between the sounds of the vowels italicized in the words, c*u*rt and c*u*rry, h*air*-oil and h*ay*rick, b*oa* and b*owie*. *Cursive Shorthand* is able to distinguish vowel sounds with much greater accuracy and completeness, although it employs only about one-third of this number of vowel characters.

he writes a word above the line to indicate the omission of an initial circle; below the line to indicate the omission of initial *ă*. This is not only perfectly logical, but also very simple and useful.

The device itself however is open to some objections, which make it in my opinion unsuited for general use. It appears difficult and unnatural to the average student, who generally fails to master it thoroughly. It is not at all a safe means of distinction, unless ruled paper is used. Even then the positions must be strongly marked by putting the words well above or below the line. This seriously violates the conditions of compactness and lineality, and may often make it necessary to shift the hand up or down in the middle of a line, or to write half an outline in a cramped position. In any case much space is wasted, and the writing acquires a straggling appearance, so that the lines are apt to become confused, unless widely separated. It conflicts with phraseography; a word cannot be distinguished by position when joined in the middle of a phrase. For these and other reasons we have made no use of positional writing in *Cursive Shorthand;* we are thus enabled to dispense with ruled paper, and to secure the maximum of compactness, lineality, and phraseographic power.

On the other hand the device of expression by 'mode', that is of writing characters in position with respect to *each other*, requires no ruled paper and is perfectly reliable and distinct. But it should be used in moderation, or it is apt to give rise to straggling and scratchy outlines.

CONDITIONS OF BREVITY.

29. The material at our disposal being thus limited by the essential conditions of facility, simplicity, and legibility; how is it to be utilized to the best advantage in securing brevity?

By brevity we do not mean simply shortness of outline, but rather speed, or shortness of time. The rate at which an outline can be *clearly* written, so as to be unmistakeable for anything else, depends more on its facility than on its length.

30. Arrangement of Alphabet. Subject to the condition that 'similar sounds should be represented by similar signs', it is evident that, in arranging the alphabet, brevity will be best secured by giving the quickest and easiest signs to the commonest sounds, and the clearest and most facile joinings to the commonest combinations.

The sign chosen for any sound should be suitable to its usage, and to the mode of its occurrence in the language. Characters which are facile at the beginning or end of an outline, but join badly elsewhere, should be given to sounds which occur generally as prefixes or as terminations respectively.

It is one great advantage of a 'phonographic' as opposed to an 'orthographic' system, that any given sound, from its very nature, occurs only in a limited number of combinations. Two vowel sounds, for instance, rarely occur together, and the number of common combinations of consonants without intervening vowels, is very limited. It is therefore possible to choose for each sound a character suited to its mode of occurrence. In an 'orthographic' system, on the other hand, in so far as it is unphonetic, the combinations are not governed by any natural law: each letter is liable to occur in every variety of way, and it is more difficult to arrange the alphabet so as to avoid awkward outlines.

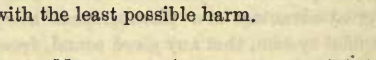
31. Waste of Material. All the available stenographic material should be used up as completely as possible. It should not be possible to change any distinctive feature of an outline without making it mean something different. The ability to write the same sound in many different ways necessarily implies proportionate waste of stenographic material, and a want of definiteness in the meaning of the outlines and in the rules by which they are formed.

If we grant that it is possible in writing to distinguish two sizes of character, a large size and a small size, strokes and ticks, as in longhand, we ought so to arrange our alphabet as to take the greatest possible advantage of the distinction, to use it up completely. In Taylor's alphabet, and in most of the

systems founded upon Taylor, a double or a triple length character stands for a character repeated two or three times, as in — *s* (ass), —— *ss* (assess), ——— *sss* (assizes); these cases occur so rarely that the distinction of two sizes, though it has none the less to be preserved, is practically wasted.

In Cursive Shorthand this wasteful use of the two sizes is avoided by the arrangement of the alphabet; and the distinction is utilized in other ways so as to make the alphabet complete. At the same time the sound represented by the small size character, is in each case so related to that represented by the large size, that confusion of size, if it occurs, may be attended with the least possible harm.

32. Some 'Methods of Abbreviation'. We have already pointed out certain objections to the use of symbols. These devices are commonly known as 'methods of abbreviation'. To take a favourable example from one of Pitman's pamphlets: the full alphabetic form of the word 'misrepresentation' in Phonography, *omitting all vowels*, is the first of the following cuts:



If we introduce hooks for *r* and *shn*, and put circles for *s* and *z*, it reduces to the second form, which is somewhat shorter and clearer, thanks particularly to the circles which replace the awkward *s*, *z* characters. This example will suffice to show how necessary these 'methods of abbreviation', with all their attendant disadvantages, are to a purely geometric system. The necessity arises from the inadequacy of the alphabet; there is no remedy for it, but an entirely new departure.

Pitman has two special 'methods of abbreviation'.

(1) The addition of *t* or *d* is implied by halving the length of a character: (2) *tr* or *dr* or *thr* (in most cases) by doubling it. Halving a stroke is a very real source of brevity, especially as the characters which Pitman assigns to *t* and *d* are perpen-

dicular strokes, thin and thick || , which if used to any great extent, would cause many of the outlines to descend too far below the line, like *attitude* , compare *byadtiut* (*beatitude*). Given Pitman's arrangement of characters*, there is no choice but to have some other means of expression for these letters: the halving principle however has many disadvantages. If it is necessary to distinguish *four* different lengths of character, it is waste of material to use two of these lengths almost exclusively for the representation of a single pair of letters, and that in such a way as to leave it generally uncertain which of the two is intended.


may stand for *mtr* (matter) or *mdr* (madder) or *mthr* (mother or may there).


for *ppn* (pippin) or *pntr* (painter) or *pndr*† (ponder) or *pnthr* (panther).


rpt for rapid or wrapt.

Moreover in rapid writing these distinctions cannot be rigidly observed; half length strokes are written so as to be mistaken for ticks or full length strokes, and full length strokes for half length or double length. The confusion produced in this way, by the accidental insertion or omission of countless *t*'s and *d*'s, is one of the worst sources of illegibility in Pitman's system. It is the natural consequence of such a reckless disregard of the fundamental principle, that similar sounds should be represented by similar signs.

And yet we have seen it stated that "the halving principle is one of the happiest devices in the whole history of shorthand"‡. It is true that later in the course of the same article the writer says of Phonography: "To be legible it must be written with care. This necessity arises from its brevity; and its use of light and heavy, halved and double

* Compare the arrangement of Everett's alphabet, in which horizontal strokes are assigned to these common sounds.

† The *Manual* and the *Dictionary* are at variance on this point, as on many others.

‡ *Enc. Brit.* Edition IX. Article 'Shorthand'.

length strokes". An admission of this kind, at the end of an article devoted to an indiscriminate eulogy of Pitman's system, is very significant.

33. Where several of these methods of abbreviation happen to conspire, we obtain exceptionally short outlines. "Among the many points of superiority" (mentioned above, p. 27) which Pitman claims for his system over all others, we find first, "the great concentration of consonant power in the simplest mathematical forms". He instances outlines like  *strfs* (*strives*),  *sdrshns* (abbreviation for *considerations*);  *prnt* (*print*),  *frnt* (*front*, *friend*).

It is a common device in comparing two systems to select words of this sort, which happen to have exceptionally short outlines in one but not in the other. Such outlines as the above are very attractive to the inexperienced eye, and look well in advertisements; but are often so exceedingly difficult to write clearly that the gain in brevity is more apparent than real. As Mr Pitman himself says with reference to the hooked and looped forms of which beginners are so fond: "The briefest outline to the eye is not always the most expeditious to the hand"*; and again: "In selecting one out of two or more possible forms for any word, the student must recollect that great ease in writing, and, consequently, the saving of time [and, he might have added, legibility], is not secured by using hooked and grouped, and especially half-sized, letters, on all possible occasions; but he must learn to make a judicious selection. He should choose a long, easy and legible form rather than a short and cramped one"†.

That the elaboration of such highly concentrated abbreviations is an exceedingly fascinating and seductive mental recreation, we do not for a moment deny: but they are too complicated to be extemporized; each combination must become *individually* familiar before it can be profitably used. As Professor Everett says: "There is a certain pleasure doubtless

* *Manual*, p. 46, § 153. Ed. 1886.
† *Id.*, p. 36, § 129.

in carrying out an elaborate system of rules for writing concisely, when we are not hurried, but are able to make all the contractions at our leisure. But in proportion as we lose simplicity, and depart further from mere alphabetic writing, the writer will be liable to find himself unready when instant action is required". (See also § 20.)

34. Phraseography. Another common method of saving time is to join words together in phrases continuously without lifting the pen. In a strictly phonetic system (like Professor Everett's), where the outlines represent sounds rather than words, this does not make the writing illegible in so far as it does not alter the sound. But in a system which is not phonetic, it often happens that joining two words together makes the outline of some different word. Phraseography is then a great source of illegibility and hesitation. In such systems word division is just as essential to legibility as in ordinary print. Even in a purely phonetic system phraseography should not be too freely employed. The knowledge that each separate outline stands for a separate word, is of great assistance in deciphering a sentence if badly written. Abbreviated words in any system should not be joined together, except in very common phrases, such as '*of the*', which, even if they clash with words, are so soon learnt that they may be used with safety. The more common a 'phrase' is, and the closer the connection of the words it contains, the better.

Pitman lays great stress on phraseography; in fact, he says: "In no other system has this plan of joining words together been so fully carried out". But since in *Phonography* all the words are abbreviated by the omission of their vowels and otherwise, words cannot be freely joined together without clashing. Only *known* phrases can be used safely. An unfamiliar phrase may be quite illegible. The student has to learn admissible phrases from a phrase-book, just as he has to learn correct outlines from a dictionary.

35. Abbreviation by Omission. The 'method of abbreviation' *par excellence* which is common to all systems of

shorthand, is that of omission; the first step is generally to omit all the vowels; the next only to write the first two or three consonants of each word. The following is an exact transcription of one of Taylor's specimens.

-t s b b b rtrs f mr t n rdr t- kkn -mn ndstr prf s s- kntrfd -t t r d- fd s nt t- b prkrd wt m pns n lbr.

This is sufficiently hard to make out as it stands; in actual writing several of the letters would be uncertain which would add considerably to the difficulty.

A reporter who has to transcribe his notes while the subject is still fresh in his memory, can put up with a great deal of illegibility and abbreviation by omission: but for ordinary purposes of correspondence, and for cases where the original notes (untranscribed) are required to be read easily at any distance of time, perfect legibility is the most essential point, and the words should not be too much abbreviated.

The best methods of abbreviation are those which are familiar in longhand. Indicating terminations of long words, especially of words that are often repeated, omitting unimportant connecting words, and similar methods, are very largely used in reporting, and are much preferable, for general use, to the wholesale omission of vowels, or the use of hundreds of arbitrary abbreviations, such as still disfigure systems of shorthand. It is true that nothing can be easier to read or to write than an arbitrary word-sign, *when once it has become perfectly familiar.* But such word-signs, if they happen not to be familiar, are absolutely illegible, and the difficulty of learning them, except in special cases, is so serious that they can only be of general use to professional writers.

36. Reporting. For the purposes of Verbatim Reporting, abbreviation by omission must be freely employed in any system, but facility and discretion in the use of it are only to be acquired by diligent practice.

If the coveted art of Verbatim Reporting could be so easily acquired as many unscrupulous advertisers would have us believe, it would not be so highly valued. Its very value

proves its difficulty. The following statement of Mr Edward Pocknell, a very well known reporter, will be read with interest by those who wish to know the real experiences of a man of undoubted ability in the modern school of reporting.

"The statements often published ever since the art flourished about learning to write 100 words per minute, in any system, in a few weeks, or in two or three months, with a practice of an hour a day, are simply ludicrous to those who have had any experience. The *principles* of a good system may be acquired as fast as the student pleases to read them; but reducing them to PRACTICE is an essentially different thing. The author [Mr Edward Pocknell], after two years' daily practice of Lewis's system, in his early professional career, could not write 100 words per minute; and on abandoning that system for Phonography, which he also practised daily, sometimes at long spells, as a Reporter of Speeches for the Press, three years passed before he could write 140 words per minute. This statement is made in the assurance that the experience of other practising writers has been the same."

Of a certain system we have seen it stated that the reporting style may be acquired in twelve hours; but beginners in Cursive should not be discouraged if they find that, though a month's practice will enable them to write it with greater facility than longhand, a much longer apprenticeship is required for *verbatim* work.

37. It is not unlikely however that, wherever *verbatim accuracy* is required, human agency will in a few years be superseded by mechanical.

The well-known 'Phonograph' does verbatim reporting automatically, and therefore not only far more cheaply but also more accurately than the most skilled artist. The 'Phonographic' records have to be transcribed and put into shape for the press, like any ordinary verbatim reports, but it is much easier to transcribe by dictation from a 'Phonograph', which delivers five to ten words at a time, than from the best shorthand notes.

But for the great majority of private purposes—such as correspondence, copying, and taking notes of lectures—where transcribing is out of the question, and legibility is more essential than speed, the phonograph will never supersede shorthand. In fact there is every indication that the popularity of the art in the future will increase. It seems to me therefore that it is a mistake, in constructing a system, to attach so much importance to brevity as to sacrifice to it any considerations of legibility and simplicity.

CLAIMS.

38. To recapitulate briefly the argument of the Introduction, I claim that Cursive Shorthand is a good system, and suitable for general use, for the following reasons:—

(1) Because it is easy to write:—

It uses only two sizes of character. It does not employ the distinction of thick and thin strokes, or of positional writing, so that it can be written equally well with pen, pencil, or stylograph, and on ruled or unruled paper.

It is very cursive and lineal, and similar to longhand, and avoids indistinct joinings and awkward geometrical outlines.

The vowels are written in their natural order, by joined characters like the consonants. Detached dots are rarely used, and only for subsidiary purposes, and need not be carefully located.

(2) Because it is simple to learn:—

It is strictly 'alphabetic', and does not use 'symbols' or arbitrary signs.

It is strictly phonetic, and avoids the inconsistencies of the common orthography.

The rules are simple, definite, and free from exceptions.

(3) Because it is easy to read:—

Its legibility is due partly to its simplicity, to the facility and clearness of its outlines, and to the scientific arrangement of the alphabet; partly to its completeness—all words differing

in sound are naturally distinguished in outline, and the rules are so definite that the same sound cannot be correctly written in more than one way. Besides this, there is a complete system of vowel indication, and the outline is made to show, in nearly every case, how the word is accented.

(4) Because it is as brief as is compatible with the above conditions:—

The given material is not wasted, but is used up as completely as possible, and disposed in the most suitable manner. It can be scribbled as recklessly as longhand, and is about three times as brief when fully written (see also p. 102).

Cursive Shorthand, in addition to the above qualifications, possesses great advantages for educational purposes. Besides being strictly phonetic, it is also very regular, systematic, and complete; thus it not only improves the pronunciation, but affords a valuable mental training.

I do not think that there is any system at present before the public which combines all these qualities in so high a degree and in such suitable proportions.

ORIGIN OF CURSIVE SHORTHAND.

39. The present system was founded on my reminiscences of an American pamphlet, the title and description of which (taken from Dr Westby Gibson's admirable *Bibliography of Shorthand*) are as follows:—A Brief History of the Art of Stenography, with a proposed new system of Phonetic Shorthand, by William P. Upham. Essex Institute, Salem, Mass., U.S.A. 1877. [Large 8vo. Two plates, containing 48 alphabets, from John Willis, 1602, to Thomas Towndrow, 1837. viii. and 120 pp., including 10 plates.]

Lest I should appear in what follows unduly to depreciate the value of Upham's work, I may say at the outset, that I owe much more to him than to any other author, and that I found his system so far superior to Pitman's for general purposes that, although I had spent some two years in learning the latter, I at once abandoned it in favour of Upham's system.

The latter, like Cursive Shorthand, was designed to supply the need of a system for general use. It discarded the distinction between thin and thick strokes, and the use of detached vowel marks. Its alphabet was based on a very complete phonetic analysis, and provided signs for all the necessary sounds. The distinction of two sizes of character only, was employed throughout. In all these fundamental points we have made no change. But in one sense Upham's system was incomplete. Some of the characters of his alphabet were inadequate, and gave rise to awkward combinations entailing special devices. Among the worst were the following:—

< *h*, ∧ *w*, ∨ *y*, ⌐ *l*, ⌐ *r*, ⌐ *ng*,

sh, *zh*, *ch*, *j*;

ă, (down) *ĕ*, (up) *ŭ*, (down) *ēe*, (up) *o͞o*, *i*.

The remaining characters of his alphabet, with a few exceptions, were much the same as in Cursive Shorthand, but differently arranged.

The loop characters ℓ ℑ were devoted to *f*, *v*, *th*, and the large and small circles to *z* and *s*. The device of expression 'by mode' was not used. The short vowels were distinguished 'by character', a method very fruitful in bad outlines, since most of the short vowel characters would not join clearly in several combinations. The method of vowel indication consisted in the use of a large number of special compound consonants; many of these were objectionable as not containing their respective primaries; thus,

tr from ∪ *t* and ⌐ *r*, *pl* from ∩ *p* and ⌐ *l*,

nt from ∫ *n* and ∪ *t*, *mp* from ∫ *m* and ∩ *p*,

kr from ⊂ *k* and ⌐ *r*, *ngg* from ⌐ *ng* and (*g*,

kw from ⊂ *k* and ∧ *w*, etc.

There were also many arbitrary non-alphabetic signs for common words, prefixes, terminations, and phrases; the dis-

tinction of three positions was arbitrarily applied to several of these signs.

40. In laying the foundations of Cursive Shorthand the 'alphabetic' principle (§ 20) was adopted as opposed to the 'ideographic'. Arbitrary compounds and arbitrary word-signs were therefore rejected wholesale. A great saving of stenographic material was effected by giving the downward tick / to *s*, *z*, and using the device of adding the small circle to the mutes, ∩ *p*, ∪ *t*, etc., to form the corresponding sibilants ∩ *f*, ∪ *th*, etc. The loop characters ʃ, ʃ were then assigned to *l*, *r*. Hooks were used at first for *w* and *y*.

The alphabet of Cursive Shorthand thus took shape on the first of January, 1887. The hooks for *w* and *y* were soon found to be particularly objectionable, especially when medial, and the device of expression 'by mode' was, after various trials, applied to these characters. This device was found to be so satisfactory that its use was extended to purposes of vowel indication.

Meanwhile many changes were made in the vowel alphabet, especially in the expression of the short vowels. The characters for *ng*, the reverse loops ʃ ʃ for *l*, *r*, the alternatives ↄ) for *t*, *d*, were added to the consonant alphabet. The system of vowel indication was completed and simplified in such a way as to render the meaning of every outline more precise and definite, and the writing consequently far more legible.

Awkward and indistinct outlines were carefully hunted out, and eliminated by the application of suitable rules to the usage of the alternative characters: these rules were made strict, instead of permissive, so that the same sound could not be correctly written in several different ways.

The above changes are more extensive and fundamental than might appear at first sight: of the characters of the alphabet less than a quarter remain unchanged in meaning and usage; and although Cursive Shorthand still bears a strong superficial resemblance to its precursor, the change in spirit and significance is so great as to entitle it to rank as a new system.

PHONETIC SPELLING.

41. Cursive Shorthand is very strictly phonetic: words are written as they are spoken and not as they are spelt. The common spelling is so complicated and so full of inconsistencies that it is impossible to construct a simple and consistent system of shorthand except on a phonetic basis.

In order to separate as far as possible the difficulties which are purely phonetic from those of the shorthand itself, we employ a simple Phonetic Notation (distinguished throughout by the use of thick, or Clarendon, type) which enables us to make our statements about sounds sufficiently brief and definite, and to represent very accurately the sounds which the shorthand characters are intended to express.

It is more fully explained and illustrated in a small pamphlet* on Phonetic Spelling, which the student of Cursive Shorthand will find very useful.

42. The phonetic alphabet, if we include the letter **x** for **ks**, contains 30 letters, namely the 26 of the old alphabet and 4 inverted letters **ʌ**, **ɔ**, **ɻ**, **ɥ**. The letters **ɻ**, **ɥ** are used for the two varieties of *th* heard in *thin* **ɻin**, and *then* **ɥen**. The letters **ʌ**, **ɔ**, are used for the vowel sounds in the words *butter*, **bʌtɔ**; *comer*, **kʌmɔ**.

The letters **c**, **j**, **q**, represent the sounds *sh*, *zh*, *ng;* as in the words *vicious*, **vicɔs**; *vision*, **vijɔn**; *singer*, **siqɔ**. The soft sound of *ch*, as in whi*ch*, is the compound **tc** (*tsh*). The soft sound of *g*, as in *g*entle, is the compound **dj** (*dzh*). The letter **j**, *zhay*, has the sound of the French *j*, as in *j'ai*. The sound of *qu*, as in *qu*een, is **kw**. Hard *ch*, as in *ch*aracter, is **k**.

The remaining 23 letters have their usual meaning.

The vowels **a**, **e**, **i**, **o**, **u**, when not followed by **ɔ**, **w**, or **y**, represent the sounds of the accented short vowels, as in the words *pat*, *pet*, *pit*, *pot*, *put*.

* *Phonetic Spelling*, by H. L. Callendar. Same publishers, price 6*d*.

The letters ɔ, w, y, are used for the unaccented short sounds of the vowels eɔ *er*, uw *oo*, iy *ee*, respectively.

The long vowels and diphthongs are represented by 'digraphs' (double letters). Each digraph is formed by affixing ɔ, w, or y, to one of the six letters a, e, i, o, ʌ, u.

The following are required in English:—

aɔ as in *there, fared.*		ey as in *they, may.*		ow as in *how, now.*	
eɔ ,, *her, word.*		iy ,, *we, see.*		ʌw ,, *low, note.*	
oɔ ,, *laud, lord.*		oy ,, *boy, oil.*		uw ,, *you, who.*	
ʌɔ ,, *ah, tars.*		ʌy ,, *my, eye.*			

43. The Phonetic Alphabet should be learnt by saying the names of the letters in the following order:—

Mutes; p *pee*, b *bee;* t *tee*, d *dee;* k *kay*, g *gay:*
Hisses; f *ef*, v *vee;* ɧ *eth*, ɥ *thee;* s *ess*, z *zee;* c *shay*,
Trills; l *el*, r *re:* [*zhay:*
Nasals; m *em*, n *en*, q *ing:*
Sighs; h *he*, w *oo*, y *ee:*
Vowels; ɔ *ĕr;* a *at*, e *et*, i *it;* o *ot*, ʌ *ŭtt*, u *ŏŏt.*

44. The Capital, Script and Italic forms of the new letters are as follows:—

Letters.	Capitals.	Italics.	Script Forms.
ɧ (*thin*)	Θ ɧ	*ɧ θ*	𝒽 𝒶
ɥ (*then*)	Δ ɥ	*ɥ δ*	𝒹 𝒹
ʌ (*but*)	Λ ʌ	*ʌ ɒ*	𝒱 𝓋
ɔ (*butter*)	Ω ɔ	*ɔ ɘ*	𝒬 ℴ

THE COMMON ORTHOGRAPHY.

45. The ordinary spelling of a word is frequently misleading as to its sound: we therefore append a few practical hints which will assist the beginner to deduce the correct phonetic spelling from the common spelling in many cases.

(1) Omit mute, or silent, letters.

For example, the italicized letters are not pronounced, and are therefore omitted, in the following words:

Mute *e*. believ*e*d, bless*e*d (blest), liv*e*, siev*e*, lat*e*, leag*ue*.

Mute *gh*. thou*gh*, ri*gh*t, cau*gh*t, etc.

Miscellaneous. dam*n*, lam*b*, *phth*isic, *ps*alm, empty, *k*now, *k*nig*h*t, phle*g*m, ya*ch*t, lick, *w*ritten, *h*onour.

(2) A letter is often doubled in the common spelling to indicate a short vowel, and a mute *e* is often added to indicate a long vowel. These devices are not required in phonetic spelling or in shorthand, where long and short vowels are distinguished by other means. For instance, one letter only would be written in each of the following cases:

bet*t*er, sin*n*er, poppy, merry (compare very, bury) sel*l*, kis*s*, ad*d*, buz*z*. i*r*religious, i*m*measurable, i*n*nate, co*n*nect, Bacc*h*us.

(3) In common spelling some consonants change their sound according to their situation. For instance:

g is hard in *give*, *get*, but stands for **dj** and **j** in *gentle*, *judge*.

c stands for **k** as in *cat*, for **s** as in *city*.

In the phonetic alphabet the letter **c** is used only for the sound *sh* as in *ocean*, *vicious*, *chaise*, *suspicion*, *sufficient*.

ch stands for **k** as in *character*, and for **tc** as in *church*.

t stands for **c** (*sh*) as in *nation*, for **tc** as in *nature*.

s stands for **z** as in *busy*; for **c** (*sh*), as in *sugar*, *sure*; for **j** (*zh*) as in *pleasure*, *vision*.

ph stands for **f** as in *phonetic*, for **v** as in *nephew*.

n stands for **q** (*ng*) as in *ink*, *finger* (compare *singer*).

ng for **q** in *hanger*, for **qg** in *anger*, for **ndj** in *danger*.

th has three distinct sounds; the sharp sound **ϰ**, in *thin*, *thigh*, *wreath*; the dull sound **ɥ**, in *then*, *thy*, *wreathe*, the compound sound **th**, in *pot-hook*, *short-hand*.

This list is not intended to be exhaustive but contains most of the common variations.

(4) Words of different meaning, pronounced differently, are often spelled alike; such words are distinguished in phonetic spelling. On the other hand words spelled differently are often pronounced alike; such words are not distinguished in phonetic spelling.

bow, bow (also *bough*) and baw.

live, liv (verb), layv (adj.), as in *live-stock*.

use, yuws (subst.), yuwz (verb) (also *ewes*, *yews*).

lead, led and liyd. *tear*, tyeə and taə.

(5) A letter is sometimes sounded in pronunciation which is not indicated in the common spelling. The commonest example of this is the 'parasitic *y*' before the vowel *u* (you), as in the words *beauty*, *few*, *cure*, *suit*, *mute*, *union*, *human*; *y* is also commonly heard in words like *here*, *fear*, *pier*, *peer*.

(6) The common spelling is generally misleading as to the vowel sounds. The best way to find the phonetic or shorthand equivalent for any given vowel, is to think of the key words, and try with which of them the given vowel rhymes. See § 48.

The letter *r* in the common spelling when immediately followed by a consonant, indicates one of the ə vowels. It is not trilled and should not be written by the phonetic r (*re*), or its equivalent, the shorthand loop character, because the first principle of phonetic spelling is to omit *mute* letters. The corresponding ə vowel completely expresses the exact sound without the addition of the r: to write the r (trill), when it is not pronounced, is simply to write the word wrongly, and might often cause it to be confused with some different word.

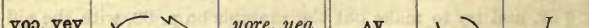
CURSIVE SHORTHAND.

46. In setting to work to learn the shorthand, the beginner should start with §§ 47, 48, 49, on the Alphabetic Words and Mnemonic Aids, and should then read the General Directions, § 52, and try to make out the example on p. 88, with the aid of the Alphabetic Table, so as to gain a general idea of the system before attempting to master its details.

Sound.	Character.	Common Equivalents.
CONSONANTS.		
p, b		*p, b*
t, d		*t, d*
k, g		*c ch k, g* hard
f, v		*f, v*
ϑ, ȝ		*th*
tc, dj		*ch, j g* soft
s, z		*s* (*c* soft), *z*
c, j		*sh, zh*
el, ly		*l*
ry, ery		*r*
em, my		*m*
en, ny		*n*
iq, iqɔ		*ng*
hoɔ, hey		*hoar, hay*
woɔ, wey		*wore, way*
yoɔ, yey		*yore, yea*

Sound.	Character.	Examples.
SHORT VOWELS.		
a, e, i — y		*pat, petty, pit*
o, ʌ, u — ɔ	–	*pot, butter, put*
LONG VOWELS.		
aɔ		*air*
eɔ		*her*
oɔ		*or*
ʌɔ		*are*
ow		*how*
ʌw		*owe*
uw		*you*
ey		*way*
iy		*we*
oy		*boy*
ʌy		*I*

SPECIAL COMPOUND CHARACTERS.



47. Notes on Alphabetic Table. The student should not attempt to learn this table as it stands; it is only given for reference, and as exhibiting a general view of the alphabet.

The consonants / s, ⌒ z, ⌒ ıq (*ing*), are written downwards.

The vowels ⌒ y, ⌒ ɑɔ, ⌒ uw, ⌒ oɔ, ⌒ ow are written upwards.

The first characters ∪, ⌣; ∿, ⌣, are generally used for t, d; ϗ, ɥ (*th*), respectively.

The sighs, w and y, are expressed, initially by hooks and ticks; medially, by 'mode' as explained in §§ 56—58.

The short vowels a, e, and ı; o, ʌ, and u, are distinguished when necessary, by dots or 'mode' [§§ 77, (3); 79].

The upward tick ⌒ is used for a, e, ı, and y, *except* when disjoined, and in the cases defined on p. 68, in which the downward tick gives a clearer outline.

48. Alphabetic Words. Most of the characters, when standing alone (when not associated with other characters to form what are technically termed 'outlines'), are used to represent certain common words called the 'Alphabetic Words'. Each word is chosen to suggest, when possible, the usage as well as the sound of the corresponding character. They are very useful as key words, and should be thoroughly learnt.

For exercises thereon, see pp. 88, 108.

Vowels.

⌒ and	⌒ way	⌒ I	⌒ air
⌒ of	⌒ owe	⌒ we	⌒ Ay!
– a, an	— year	⌒ are	⌒ or
ı the	/ one	⌒ you	⌒ how

The straight ticks ⌒ ⌒ ı when standing alone are arbitrarily used for the words *and, of, the*, respectively.

The unaccented short sound of the word *ă*, in phrases like '*such ă man*', is identical with the neutral vowel ɔ (*ĕr*).

The character – ɔ is also used for *an*.

The curved characters ◡ *I*, ◠ *we*, ◜ *are*, ◡ *you* should be made slightly longer than the straight ticks. They are written sloping, and are not so deeply curved as **p**, **t**, **k**.

The downstroke / standing alone is the figure **1**, and is used for the word *one*. The tick / **s** is not used standing alone; it would clash with the vertical tick | *the*.

CONSONANTS.

⌒ pea	⌒ for	⌒ will	⌒ as, has
⌒ be	⌒ have	⌒ loo	⌒ is, his
⌒ to	⌒ think	⌒ from	⌒ who, self
⌒ do	⌒ them	⌒ very	⌒ selves
⌒ at	⌒ hath	⌒ him	⌒ 1st
⌒ had	⌒ with	⌒ me	⌒ into
⌒ key	⌒ which	⌒ in	⌒ hand
⌒ give	⌒ joy	⌒ no	⌒ circumstance.

These will be found very useful in learning the alphabet; they are not merely convenient abbreviations.

Some of them contain or imply preceding or following vowels. The forms / *me* and / *in* are obtained by simply joining the vowel ⌒ **y** (*ĕĕ*) after **m** and before **n**. The character / **em** is only used when a short vowel precedes **m**. The character / **ny**, used for the word *no*, always implies a following vowel, but not generally *ō*: at the end of an outline the vowel implied is **y**, as in *many*.

Both the characters for **r** require following vowels. The character ⌒ (*re*) is used when a vowel does not precede, in forming combinations like *fr*, as in *from:* the character ⌒ (*ery*) implies a preceding vowel, as in the word *very*. The character ⌒ (*loo*), requires a following vowel: if no vowel is written the sound *ōō* **uw** is implied in certain cases, see § 77 (1).

The **z** characters for *is*, *as*, being written downwards, cannot be confused with *are*, *you*, when joined to other characters. When standing alone, they should be made longer and steeper,

more like the q (*ing*) characters , which are not used for alphabetic words. The words *his*, *has*, are distinguished, if necessary, from *is*, *as*, by prefixing a circle; thus, *his*, *has*.

The characters c, *sh*, and j, *zh*, consist of small circles, turned in opposite directions at the end of an s tick. The s tick is generally omitted and the circles are directly attached to vowel stems (§ 84). The character j, when standing alone, is used as an abbreviation for the word *such*.

The small h circle, standing alone, is used for the word *who*, huw; as a suffix, for the word *self*; as in *itself*.

The double circle is used to add *s* to circle characters (see § 83); and for the word *selves*, as in *yourselves*.

The compound characters pt, kt, st, sp, nt, nd, are only used when no vowel intervenes between the components in each case. It would be a bad mistake to write st for *city*, or kt for *cat*. There are a few other compound consonants of less importance, formed in a similar way by combining their components. (§§ 80—89.)

By enlarging the circle of c, j to add the syllable on, we obtain useful forms for the common terminations *-tion*, *-sion:* as ind-keycon, *indication;* okeyjon, *occasion*. (§ 85.)

Initially the large circle is used for the prefix kon, *con*, as in kontrə, *contra;* konsistent, *consistent*. (§ 82.)

When disjoined it is used for the prefix *circum;* and when standing alone, for the word *circumstance*.

49. Mnemonic Aids. The characters of the alphabet are best learnt by actual practice in reading and writing, by the constant use of the alphabetic words, and especially by noting the relations between the characters and the sounds they represent (§§ 50, 51). But the beginner unacquainted with phonetics will probably find the following mnemonic associations most useful at the outset.

The character c for k (hard *c*, as in *cat*) is simply the letter *c* without the dot.

The character ⌒ for **p**, and the related characters for **b**, **f**, **v**, curve *up*:— **p**, **np**.

The character ⌣ for **d**, and the related characters for **t**, **ɹ**, **ɥ**, curve *down*:— **d**, down.

The characters  for **m**, **n**, are portions of the letters *M*, *N*.

The character  **ŋqɔ** (*inger*) for the 'back-nasal', is the character  **n**, written backwards, with the ɔ-tick (–) added.

The loop characters  for **l** and **r**, may be associated with the longhand script forms  .

The character ◡ *th*, is formed from the character ⌣ *t* by adding a small circle at the end, just as in the ordinary spelling the letter *h* is added to *t* giving the digraph *th*. Similarly the other circle characters may be associated with the ordinary spelling, in which their sounds are often represented by the digraphs *ph*, *ch*, *sh*, etc., if we regard the modifying circle as corresponding to the letter *h*. Thus:—

ph, ⌒ , **f**; *ch*, ↄ , **tc**; *sh*, ↄ , **c**; *nth*,  , **nɹ**; *sth*, ◡ , **sɹ**.

RELATIONS BETWEEN SOUND AND SIGN.

50. The forms of the characters are chosen so that similar sounds may be represented by similar signs.

Distinctions of Size. The first sixteen consonants are arranged in natural pairs; **p b**, **t d**, **k g**, **f v**, **ɹ ɥ**, **tc dj**, **s z**, **c j**. The members of each pair are very closely related in sound. In technical language the first member is said to be 'breathed', and the second 'voiced'. The corresponding difference in the characters (except **s z**, **c j**) is one of size.

The small size characters ⌒ **p**, ◡ ɔ **t**, ↄ **k**, ⌒ **f**, ◡ ə **ɹ**, ↄ **tc**, belonging to the 'breathed' or 'whispered' articulations, are made a little less than half the size of the corresponding 'full', or 'voiced', sounds ⌒ **b**, ◡) **d**, (**g**, ⌒ **v**, ◡) **ɥ**, (**dj**. In the case of **s z**, **c j**, it is more convenient to make the distinction in other ways. The tick for **s** is straight, for **z**

curved; and the circles for c and j are turned respectively,  c backwards, and  j forwards (clock-wise). (§ 55.)

The breathed varieties of l, r, m, n, w, y, are practically non-occurrent in English, and of little importance.

The short vowels are expressed by ticks; the long vowels, by curves and strokes.

51. Distinctions of Direction. Each consonant character involves a down-stroke or a back-stroke which can be thickened: each vowel character an up-stroke  or a cross-stroke  with a motion of traverse along the line.

The sloping vowels should not be written steeply, but at an angle of 30° to the line: thus, 30°. The vowel curves should be slightly curved and sloping; for instance, oɔ should be written not which would be confused with b.

The directions assigned to the characters depend on the organs by which they are produced.

The general relations are exhibited in the annexed table*:

Organs	Names	Directions	Characters
Lips	Labial	Upwards	∩ p, ◠ f, / m
Teeth and Gums	Front or Dental	Downwards	∪ ɔ t, / n, / s
Back palate	Back or Guttural	Backwards	(k, (g, (q

Similar relations hold of the vowel characters.

Labial, or w-vowels, upwards;  aw,  ow,  uw.

Front, or y-vowels, downwards;  ey,  ay,  iy.

Neutral, or ɔ-vowels, end horizontally;  eɔ,  oɔ,  aɔ.

* This classification is necessarily rough.

GENERAL DIRECTIONS FOR WRITING.

52. Writing Materials. The prettiest and most accurate results are obtained with pen and ink on ruled paper; but for all practical purposes Cursive Shorthand may be equally well written on plain paper with a pencil or stylograph.

In Learning to Write, it is important as far as possible to avoid writing words incorrectly; at first therefore the student should never hurry, but should draw every character carefully and deliberately, so as to avoid forming bad habits. Speed will come by practice. In taking notes the student should on all possible occasions use those words, especially 'alphabetic words,' with the correct outlines of which he is already familiar: important and unfamiliar words should at first be always written in longhand; if written hurriedly, before a good style has been acquired, they will probably be written incorrectly, and may be difficult to read afterwards.

In Learning to Read, the student should particularly avoid spelling words out by the ordinary names of the longhand letters, which are often no guide to the sound. Ultimately a habit is acquired of recognizing words by their outlines without spelling them out, or even pronouncing them; in the meantime, if a word must be spelt out, it is best to write down the equivalent of the shorthand outline in phonetic notation, and then try to pronounce it, putting in the vowel e in place of 'indicated' vowels. (§ 67.)

53. In writing, the characters representing the sounds of a word are all joined together in their proper order, forming a continuous whole, technically called an 'outline'. The pen is not lifted from the paper except as required by the 'Mode of Hiatus' (see § 74).

The relative sizes of large and small characters must be carefully maintained, just as in longhand. The actual size of the characters may be varied according to circumstances, such

as the goodness of the light and the writing materials. The minuteness of any kind of writing is limited by the size of the smallest characters. Since in Cursive Shorthand the small size may be made as small as you like, and the small circle may be reduced to a dot, the writing may be made very compact indeed. This is often convenient in marginal notes and like cases (§ 107). The beginner should not attempt this at first. The best general rule is to make the small characters ⌒ ∪ ( ) – as small as they can conveniently be made—say from $\frac{1}{10}$th to $\frac{1}{20}$th of an inch long, as in ordinary longhand writing—and the large size ⌒ ∪ ( ) — *at least* twice as big. The tick / s should be kept as short as possible, not more than one-third of the length of / n.

The way in which the characters are joined, in almost every conceivable combination, is very fully illustrated in the succeeding pages. The student is advised to write down every illustration as he comes to it, and to compare the phonetic key with the outline, and with his own pronunciation, in each case, so as to learn to distinguish accurately the sound belonging to each character.

Wherever alternative characters are given for any sound, it is not optional to use either in any given combination. Which of two alternative characters is to be used, is determined either by rules of vowel indication or by considerations of clearness and facility.

The simplicity and phonetic strictness of Cursive Shorthand alone render it possible to provide a complete set of rules to meet all cases. This not only saves the student the trouble and perplexity of choosing for himself which of two characters is preferable, but also secures uniformity of style among writers of the system.

Great pains have been taken in illustrating the rules to choose the most suggestive examples. In addition to this a series of progressive exercises has been appended, which are arranged in such a way as to show what characters are to be used in each case.

54. Angles of Joining. In joining two characters, if the second begins in the same direction as the first ends, the joining is not marked by an angle or break but is said to be 'continuous'; as in — keɔ, *cur*, from c k and — eɔ. Similarly kawt, *coat*; kow, *cow*; p-t; -kt.

In many cases, where a very blunt angle (greater than 135°) would naturally occur, if the exact geometrical forms of the characters were followed, no angle need be made in actual writing, provided that the component characters are clearly distinguishable, as in gr-t, *great*, from .

This does not apply to blunt angles between straight strokes as in the case of *coercion* and *oasis* (§ 63).

The angle need not be marked in the combinations eyd, *aid*; bey, *bay*; eyt, *eight*; pey, *pay*; but should be marked after ∪ and ◡ and before ∩ and ⌒, as in taw, *toe*; awf, *oaf*; *potato*.

Blunt angles of 120° or less should generally be marked, but may be slurred or rounded off, as in the annexed cuts.

dowt, *doubt*; kaɔ, *care*; oɔdɔ, *order*.

Angles less than a right angle are generally sharpened:

diyp, *deep*; not ; suwn, *soon*; not .

Sharp angle joinings are the clearest. The alternative characters are used so as to secure sharp angle joinings wherever possible. Continuous joinings are speedy but not always clear. Outlines such as d-beyt, *debate*, involving continuous joinings, are wanting in sharpness, and if written fast are difficult to write neatly. They occur very rarely in Cursive Shorthand.

When a character ending in a circle is joined to a following character, the circle is described by a continuous movement of the pen, ending in the direction in which the second character begins so that there is no break or angle; compare the words:

ɥey, *they*; dey, *day*: foɔ, *fore*; poɔ, *pore*; tcaɔ, *chair*; kaɔ, *care*: ɥ-t, *that*; d-t, *dot*.

In a few cases, those in which the circle ends in the opposite direction to the beginning of the next character, a sharp angle is made after the circle, as in

 gr-f-k, *graphic;*  senço, *censure.*

INITIAL H, C (*SH*), W, Y.

55. H, C. The small circle used for initial h, is turned forwards  , in the same direction as that in which the hands of a clock move. The small circle used for initial c (*sh*), is always turned backwards  , counter-clockwise, in the same direction as the longhand letter *c* or *o*. The sound j (*zh*) does not occur initially in English (see § 84).

 *head,*  *hell,*  *hut,*  *he,*  *hen,*
 *shed,*  *shell,*  *shut,*  *she,*  *shin,*

 *hare,*  *hurt,*  *hoar,*  *hark,*
 *share,*  *shirt,*  *shore,*  *shark,*

 *hoe,*  *hoot,*  *hay,*  *high,*
 *show,*  *shoot,*  *shay,*  *shy.*

The vowels are omitted in the words *shall,*  *should.*

In practice, the word *she* may be written straight; thus,  . It need not be curved unless joined to following characters.

Initial h is omitted in the words *how, house;* and the circle is turned backwards in the word *his* (p. 51).

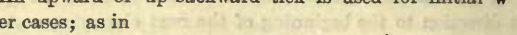
Medial h is rare; the forward circle generally joins badly between two characters. The h circle may never be joined after consonants; and may never be turned backwards. It may be joined after vowels if it falls naturally outside an angle; as in

 ahead,  *ahoy;* compare  *ashore,*  *ashame.*

56. w. A forward hook is used for initial w, before forward curves; as in *weave,*  wook, *walk:* and in the following common words, from which the vowels are omitted;

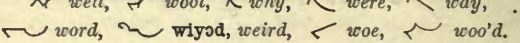
 *what,*  *would,*  *when,*  *went,*  *whence.*

An upward or up-backward tick is used for initial **w** in other cases; as in



The **w** may generally be omitted, or expressed by 'mode' (§ 58), in the words, *was, whether;* also in *were, way, won't.*

57. Y. The downward tick ⟍ is used for initial **y**; as in



It is joined by an upward tick before a downward vowel; as in the words *yea, yare.*

Initial **y** is omitted before the vowel **uw**, $\overline{oo}$, as in **yuws**, *use* (subst.); **yuwz**, *use* (verb); initial $\overline{oo}$, without the **y**, occurs only in the word *ooze*, which is written as in § 62.

If great precision is required, the **y** tick is used, followed by the **y**-mode; thus, **yuwx**, *youth;* **yuwl**, *yule.*

The **y** in *year* may be omitted, or expressed by 'mode' (§ 58).

Vowels following **h, w,** and **y**, are always written like initial vowels (§ 69, Exercise V.), except that the short vowels **a, e, i**, are written ⟋ upwards after ⟍ **y**. After **w** and **h**, they are written ⟍ downwards before upstrokes and backstrokes, or if not joined to a following character.

The ticks are used for initial **w** and **y**, only before vowel characters.

58. MEDIALLY **w** and **y** are expressed by 'MODE OF HIATUS', that is to say, by lifting the pen, leaving a small interval or 'hiatus', and starting afresh, above for **w**, below for **y**.

Thus in the outline ⟍ **kwey**, *quâ;* the **w** is expressed by beginning the ⟍ **ey** a little above the end of the ⊂ **k**.

Similarly in ⟋ **hyuw**, *hue;* **adhyeɔ**, *adhere;* the **y** is expressed by beginning the vowel below the **h** circle.

The sound **hw**, *wh*, the 'breathed' **w**, is similarly expressed by using the **w**-mode after the **h** circle; thus,

 **hwaɔ**, *where;*  **hwey**, *whey.*

But the distinction between *w* and *wh* is not generally maintained in English speech; it is therefore sufficient, except when it is desired to imitate a peculiarity of pronunciation, to write *w* in all cases for *wh*.

The **y**-mode is most commonly required before the vowel *ū* **yuw** (*you*), as in the words

 **byuwty**, *beauty;*  **pyuw**, *pew;*  **syuw**, *sue.*

The **w**-mode is chiefly required after **k**, **t** to express the combinations **kw** (*qu*), **tw**, thus:

 **kwiɔ**, *queer;*  **iykw-l**, *equal;*  **akwyes**, *acquiesce.*

 **twayn**, *twine;*  **dwel**, *dwell;*  **swaɔ**, *swear.*

It may be observed that, in the **w** and **y** modes, the characters are written in position as though the ticks were inserted: thus,  **ɔwey**, *away;*  **ɔyeɔ**, *a year.*

They should be made to overlap each other slightly, when possible, to show their connection more clearly.

The ticks are good initial characters, but if used medially would often present awkward joinings: in rapid writing the modes generally give clearer outlines.

Initial hooks can only be used safely in the special case selected, namely the forward hook before forward curves. Other hooks, such as  ,  ,  , though they can be easily distinguished *in a cut* from  *co,*  *pay,*  *cow,* would cause serious clashing in actual practice.

LONG VOWELS.

59. By the terms 'Long vowels' and 'Short vowels' are to be understood the sounds given in the Alphabetic Table under those headings.

Long vowels are expressed in almost all cases by writing their characters in their proper sequence.

The vowels ɔ, — eɔ, ɑ, aw, ɛ, ey, o, oɔ, ɔ, ow, ɔ oy generally present good joinings, and require no alternative characters. (See Exercises II., III., p. 108.)

The characters ɛ aɔ, ɛ aɣ, i iy, ɔ uw are likely to give the student most trouble at first. They involve curves on the awkward slope ɛ, which sometimes present bad joinings, and therefore require alternatives. (Exercise IV.)

60. The character ɛ aɔ joins well after upstrokes, l, and back-circle characters:

ɑ naɔ, *ne'er;* ɔ paɔ, *pair;* l laɔ, *lair.*

After the downstrokes, s, m, sp, and after forward circles, such as f, h, the character i is used, as in

n spaɔ, *spare;* l maɔ, *mare;* ɔ faɔ, *fair.*

61. aɣ. The character ɛ *I* is generally used for the sound aɣ, as in the following words:

l r-laɣ, *rely;* ɑ d-naɣ, *deny;* l *like;* ɛ *dine.*

ɔ baɣ, *by;* ɛ aɣs, *ice;* ɛ aɣz, *eyes;* ɛ aɣiq, *eyeing.*

It is straightened to ɛ after a downstroke, or forward-circle.

ɛ saɣn, *sign;* l maɣ, *my;* ɔ faɣ, *fie.* (§ 73, end.)

The character ɛ is lengthened to ɛ, and ɛ to ɛ before an upstroke.

ɛ *type;* ɑ *ripe;* ɛ *I've;* l *mile.*

After ɛ aɣ, and ɛ aɔ, the consonants t, d, ŋ, q, are written ɔ ɔ ɔ ɔ respectively (Exercise IX.); after all other vowels the characters ɔ ɔ ɔ ɔ are used. (§ 81.)

ɔ aɣqɔ, *either;* ɛ waɣt, *white;* ɔ *I'd;* ɛ aɔd, *air'd.*

The character ɛ is used after circle h, but is shortened to ɛ before a consonant downstroke; thus,

ɛ *high,* ɛ *Hine,* ɛ *height,* ɔ *hide.*

62. UW, IY. The full forms ⌒, ⌒ are written before backstrokes ᑕ **k**, ᑐ **g**, ᑎ **z**, ᑌ **q**.

ᘺ **wiyk**, *week;* ᘻ **iyz**, *ease;* ᓬ **siyiq**, *seeing.*

ᓭ **yuwkɔ**, *Euchre;* ᓯ **uwz**, *ooze;* ᐽᓰ **hyuwdj**, *huge.*

The second stroke of ⌒ **uw** is always omitted in other cases.

ᔑ **suwp**, *soup;* ᔓ **dyuwp**, *dupe;* ᔨ **kuwl**, *cool.*

ᖻ **ɹruw**, *through;* ᖽᓚ **yuwt-l-ty**, *utility;* ᐩᘐ **fyuw**, *few.*

The second stroke of ⌒ **iy** is reduced to the tick / before downstrokes, and is omitted before upstrokes.

ᓗ **siyt**, *seat;* ᓬ **siyn**, *seen;* ᓗ **siyst**, *ceased.*

ᑮ **kiyp**, *keep;* ᑮᓰ **tciyf**, *chief.*

The vowels, **uw** after ᐨ ᐪ, and **iy** after ᖵ ᐪ ᐩ, are not written, but expressed by '*Mode of Hiatus*'. (§ 77.)

The sounds ⌒ **uɔ**, ⌒ **iɔ**, as in *poor*, *peer*, are better replaced, except in words like *wooer*, *seer* [§ 77 (2)], by the approximate sounds ⌒ **oɔ**, ⌒ **yeɔ**, which are more easily written and give clearer outlines: as ᐩ‿ **fyeɔ**, *fear.*

The word *your*, in particular, should be written ⌒ **yoɔ**, not ⌒ **yuwɔ** (*ewer*), to distinguish it safely from ⌒ **owɔ**, *our.*

63. TWO LONG VOWELS IN SUCCESSION. Two long vowels rarely follow one another without an intervening consonant. The following are a few examples (see also Exercise XXV.):

ᖾ **hʌyeytɔs**, *hiatus;* ᐞ **ʌweysys**, *Oäsis.*

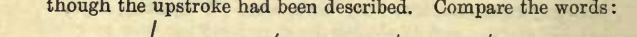
ᖻ **ɹruwowt**, *throughout;* ᑮ **kʌweɔcɔn**, *coercion.*

ᖷ **lyʌwlyɔn**, *Aeolian;* ᐯ **ʌyʌwtɔ**, *Iota.*

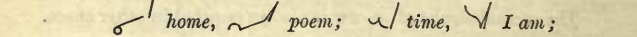
For cases where one or both of two vowels in succession are short, see §§ 75, 77, *Mode of Hiatus.*

64. The characters ᐨ ᖵ are not used for **l** and **r** respectively, after vowel characters. (§ 86.)

The upstroke of the character / em represents a short vowel (§ 87). It is omitted after long vowel characters. The downstroke / is not joined, but is written in position as though the upstroke had been described. Compare the words:



home, poem; time, I am;



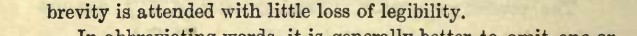
meum, seem; suum, assume.

65. Long Vowels are Rarely Omitted. Long vowels, especially when accented, are the most audible of sounds, and are the most important in distinguishing words in speech. In shorthand, long vowels may only be omitted in very common words and terminations, such as are sufficiently distinguished by their consonants, and cannot clash with the full outlines of other words and phrases, so that the gain of brevity is attended with little loss of legibility.

In abbreviating words, it is generally better to omit one or two final consonants, and to keep the accented long vowels. The latter remain audible in speech long after the consonants, so that, if we retain them, the habits of interpretation which have been already acquired in listening to spoken discourse, will then avail us in reading abbreviated shorthand.

The vowel **ey** may be much more frequently omitted than any of the other long vowels. The gain thus secured in sharpness and compactness of outline, by the omission of the awkward slope, is often great; and the loss of legibility is relatively small, because **ey** is a very common vowel and closely related in sound to **e** (§ 73).

The common termination *-ate* is generally long in verbs; but is so common that the vowel may always be omitted in words of more than two syllables, provided that its place is indicated and that a clearer outline is secured by its omission; as in the words,



accommodate, agitate, fascinate, operate.

The outlines of all the common words from which vowels may be omitted are given in the list on pp. 106, 107; and are collected for reference in Exercise XX.

SHORT VOWELS.

66. It is a marked peculiarity of the English accent that some syllables are strongly emphasized or accented, and others slurred or pronounced with very little force. The sounds of the *accented* syllables are most clearly given in pronunciation, and are most important in distinguishing words. A short vowel in an *unaccented* syllable tends to lose its distinctive features, and to pass into a neutral voice murmur.

More than half the vowels in English are short and *unaccented*. The function of such a vowel is chiefly to mark the arrangement of the consonants. In speech words are distinguished not by the *sounds*, but rather by the *places* of their unaccented short vowels. If therefore the place of such a vowel among the consonants be *indicated*, it is fully and adequately expressed, and need not be written by character.

This method of treating the unaccented vowels, enables us to mark the way in which a word is accented, and is one of the chief features of the present system. The beginner will perhaps fail at first to appreciate its full importance. He may find some difficulty in the distinction between accented and unaccented vowels, because, although it is one of the most essential distinctions in speech, it is not recognized in the common spelling. For a fuller explanation of the difference, he is referred to the pamphlet on *Phonetic Spelling* beforementioned (p. 20), in which the subject of the expression of accent is discussed and illustrated in considerable detail.

67. Vowel Indication. A *short* vowel is indicated at the junction of each pair of consonants, unless its absence is specially implied by one of the methods given below. (§ 71.)

At the beginning or end of an outline no vowel is implied (unless written), except in the special cases mentioned below (§§ 69, 70). Initial and final vowels are generally written.

A vowel indicated in a shorthand outline is denoted by a hyphen in the corresponding Phonetic Key.

68. Accented Short Vowels. Short vowels when accented are often of importance in distinguishing words by their sounds. The words *pat*, *pet*, *pit*, *pot*, *put*, for instance, are distinguished solely by the sounds of their short vowels.

The accented short vowels are divided into two groups: (1) the **y** (*ĕ*) group, **a**, **e**, **i**; (2) the **o** (*ĕr*) group, **o**, **a**, **u**.

The vowels **a**, **e**, **i**, are all three represented by either of the *ĕ*-ticks, ◝ or ◜; the vowels **o**, **a**, **u**, by the *ĕr*-tick, – **o**.

The upward *ĕ*-tick is to be used except in cases where the contrary is expressly stated. (See p. 68, end.)

The distinction between **a**, **e**, and **i**, and likewise that between **o**, **a**, and **u**, is made by 'mode' of writing in a way which will be explained later. For the present **a** and **i** will be written (and should be pronounced in reading) as **e**, which is intermediate in sound between them: and similarly **o** and **u** will be written, and should be read, as **a**. The legibility thus secured is found to be amply sufficient for all ordinary purposes, and the further distinction is readily added if precision is required. (§ 79.)

69. Initial Short Vowels. The tick – is used for **o**, **a**, or **u**; ◝ or ◜ for **a**, **e**, or **i**: the *ĕ*-tick is written ◝ downwards before upstrokes and backstrokes, ◜ upwards before downstrokes and **c** *sh*. (See Exercise V.)

happy; *us*; **az**, *was*; *it*; *if*.

ato, *utter*; *on*; *egg*; *Ezra*; *ell*.

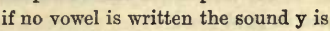
The sound **o** is implied by a hook before the characters **p**, **b**, **f**, **v**. The character – should be written if the vowel is accented, **o**, **a**, or **u**. (See § 80.) Initial *ă*, when unaccented, as in the words *appear*, *above*, *about*, is generally pronounced **o**, but is best written as **a**, with the *ĕ*-tick and not with the hook; and similarly in the prefix *ad-*.

upón, *off*, *offénce*, *óven*, **apyeo**, *appear*.

The character **ery** implies a preceding vowel; if no vowel is written the sound **o** is implied. Compare the words,

r-ndj, *range*; **or-ndj**, *arránge*; **ar-ndj**, *órange*.

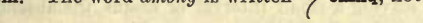
The nasal compounds cannot be pronounced without a preceding vowel: if no vowel is written the sound y is implied.

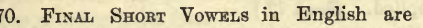


The upward *ĕ* is not joined before m, we use the form em. The word *among* is written  emʌq, not  enʌq.

70. Final Short Vowels in English are always unaccented. We distinguish only two varieties, which are denoted by the ticks – ɔ (*ĕr*) and ˊ ˋ y (*ĕĕ*): final *ă* in common spelling always stands for the sound ɔ.

Examples of final ɔ (see also Exercise VI.):

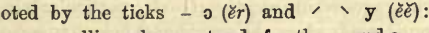




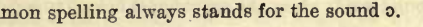
Final y is written ˋ down after upstrokes and backstrokes, ˊ up after downstrokes.  footy, *forty;*  ʌysy, *icy.*

Downwards after backward circles, upwards after forward circles; as in acy, *ashy;*  tʌtcy, *touchy;*  efy, *Effie.*

Upward y is written as a hook after ᶜ k, (g; as in,

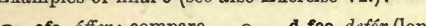


Final y is implied, and need not be written, after the characters l y, r y, ery, n y; ɔ is written.

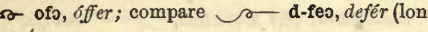


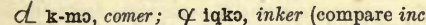
71. Medial Short Vowels. A short vowel in the middle of an outline is *indicated* at the junction of each pair of consonants, unless its absence is specially implied by one of the following methods.

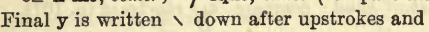
(1) By the use of the compound characters.

Compare 

(2) By certain of the alternative consonant characters.

Compare 





The usage of the alternative consonant characters is very fully illustrated in §§ 80—89.

(3) By the 'Mode of Hiatus'.

The joining of two consonant characters generally implies an intervening short vowel; if they are not joined but written side by side, leaving a small interval or hiatus, the absence of a vowel is implied. (See § 77.)

Since all the common compounds are specially provided for, this mode is only required in *exceptional cases;* particularly in the case of compound words where the consonants belong to separate syllables: e.g.  **fitf-l**, *fitful;*  **text bak**, *textbook.*

 *hand-maid,*  *first-class,*  *out-do.*

 *short-hand;* compare *shortened* (p. 107).

Compare  **d-z m-l**, *dismal;*  **d-s-m-l**, *decimal.*

This use of the mode of hiatus is exactly analogous to word-division. A compound word is divided where vowel indication requires it, but the parts are written close together to show their connection. (Exercise XXIII.)

72. Rule. Unaccented Short Vowels are Omitted whenever they can be Indicated.

This is the fundamental rule of vowel insertion and omission, and includes all the others. (Exercise XVII.)

In some cases the consonant characters cannot be clearly joined without a vowel tick: an intervening vowel cannot then be indicated, but must be written. (Exercise XVIII.)

The tick / s on account of its shortness cannot be joined continuously to downward characters: when s is followed by a downward character the intervening vowel, if any, is always written.

 *sister,* (not  **into**);  *assesses;*  *sot.*

When a vowel does not intervene the mode of hiatus is used, unless a special form is provided for the compound.

 *Elsie,*  *snare,* *small,* compare  *stare.*

The insertion of a vowel tick after characters like  **ndj**,

ery, is required to give a good joining before c k, / s; and generally before and after backward strokes.

wishers; histŏric; Paris; injury.

In many other cases, especially between downstrokes, as *mud*, and after circle characters, as *fat*, the insertion of a vowel tick, though not essential to clearness, makes the outline easier to write fast.

Medially the distinction between the *unaccented* vowels o and y is generally unimportant: it is therefore sufficient to indicate such a vowel, or if it cannot be indicated either character may be used; for instance, in the word *person*, the sound o in the termination son may be written / y, because the ĕ-tick joins more clearly and easily.

73. Accented Short Vowels are Written.

The insertion of *accented* short vowels serves two purposes; (1) to distinguish words, (2) to mark the accent.

(1) When the characters o and y represent *accented* vowels, the difference of character is often useful in distinguishing words. The distinction is most important in the case of monosyllables and rare words. (Exercise VII.)

In the case of common words such as readily suggest themselves, especially connecting particles, and words which are commonly slurred or unaccented in speech, indicated vowels are generally omitted. This not only possesses the advantage of brevity, but also serves to distinguish them from rarer words, which are fully written. (See Exercise XXI.)

Thus we write *but* (not), *not*, *this*.

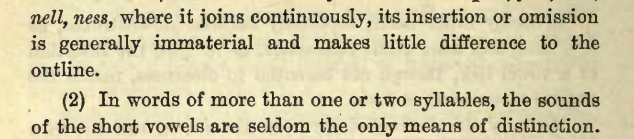
Compare *bet*, *net*, *thus*.

In short words and in cases where the accent does not require marking, the ĕ-tick, for a, e, or i, may sometimes be omitted. To distinguish such words from words containing o, a, or u, it is sufficient always to insert the latter; and if an accented vowel has been omitted, it should be pronounced as e in reading.

The upward ĕ-tick should never be omitted between downstrokes, in words like *pet*, *set*, *let*, *met*, when it gives a clearer

outline. It may nearly always be omitted after t, d, ʞ, ɥ, tc, dj, when followed by downstrokes, especially n, az, or aq. (See Exercise XIX.) In some other syllables such as *pell, fell, rell, nell, ness,* where it joins continuously, its insertion or omission is generally immaterial and makes little difference to the outline.

(2) In words of more than one or two syllables, the sounds of the short vowels are seldom the only means of distinction. But in this case the insertion of accented vowels is useful in a different way, namely in marking the accent. This often makes a word much easier to read, especially if it is a rare word, or if it is accented in an unusual way.

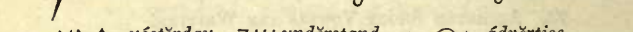


The insertion of a vowel tick gives no information about the accent in cases, such as those of § 72, where its insertion is required on other grounds. The insertion of an unaccented vowel, when not required, is misleading; it is in all cases better simply to indicate a short vowel than to insert it wrongly.

Downward E-tick. The cases in which the downward *ĕ*-tick is used medially for a, e, or i, are as follows:—

It is always used before p, b, f, v, except after p, b, y.

Before other characters which require it initially (namely, backstrokes and el, § 70), it is only used after characters which require it finally (namely, back-circles and t, d, § 68), and after k, g. (Exercise VII.) Thus,



It may be noticed that the downward tick is never used after the characters ⌒ ⌒ \ , or before the characters ⌣ ⌣ ⌣ ⌣, under any circumstances; and that the cases in which it represents one of the short vowels a, e, and i, can never clash with those in which it is used for the long vowel ay (§ 62).

MODE OF HIATUS.

74. The Mode of Hiatus consists in lifting the pen and leaving a small interval between two characters instead of joining them together. It is chiefly used in the expression of the rarer and more difficult combinations of sounds.

There are two sizes of interval: the small interval, or hiatus, which is made as small as possible; and the large interval, or word-space, which must be kept sufficiently large to be easily distinguished from the former.

There are three modes. In the first or **w**-mode (1), the second character is commenced above the end of the first; in the second or **o**-mode (2), on the same level; in the third or **y**-mode (3), below.

75. BEFORE A VOWEL CHARACTER, or an implied vowel, modes (1) and (3) indicate **w** and **y** respectively. (Ex. XXII.)

In phrases and compound words, **w** and **y** are generally expressed by mode. Mode (2) is used before the **h** circle.

not yet; I would; d'you; towards.

b-h-nd, *behind;* **b-yond**; **b-weyl**, *bewail.*

The unaccented short vowels **y** and **w** (*oo*), when immediately followed by another vowel, become truly consonantal, and are expressed by mode, especially in terminations: for convenience the **w**-mode is extended to the representation of all such terminations as *-ual*, *-uum*, *-uous*, etc., where the *u* is unaccented, and represents the compound sound **yw**.

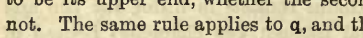
Indian; sodium; **kryeycon**, *creation.*

usual; continuation; valuable; vacuum.

76. MODE OF HIATUS BEFORE OR AFTER A TICK. In the **o**-mode after a tick, the next character is begun nearer the middle than the end of the tick; in the **w**-mode, above the upper end; in the **y**-mode, below the lower end; and similarly before a tick.

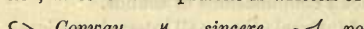
mishap; **syuw-t**, *suet;* **swiyt**, *sweet.*

The end of the character **n** is for these modes considered to be its upper end, whether the second stroke is inserted or not. The same rule applies to **q**, and the **n** compounds, **ns**, **nt**. Similarly the beginning of an **m** is considered to be its lower end, whether the upstroke is written or not. [§ 77 (3).]


Conway, *sincere*, *poignant*, *minutiae*.

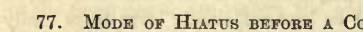
77. Mode of Hiatus before a Consonant Character.

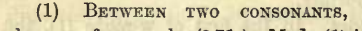
(1) Between two consonants, mode (2) implies the absence of a vowel. (§ 71.) Mode (1) is used for terminations, see pp. 85, 92; mode (3) for unaccented *ŭ*, **yw**, as in the words,


populate, *occupy*, *amputate*, *voluble*.

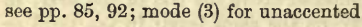
After the characters **ry**, **ery**, **ny**, which necessitate a following vowel, mode (2) is used to express the vowel **iy**.

If no character follows, a dot is used.

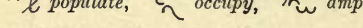

niy, *knee*; **niyl**, *kneel*; **niyd**, *need*.


riy, *re*; **riyd**, *read*; **riym**, *ream*.

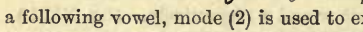
Similarly **uw** is expressed by mode (2) after **el**, **ly** (as suggested by the alphabetic word *loo*) (see § 86):


gluwm, *gloom*; **luwod**, *leeward*; **hal-luwyo**.

In monosyllables (except *knee*, *re*) the dot may be omitted, because the vowel is necessarily long.

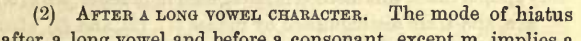

fluw, *flew*; **θriy**, *three*.

In other cases a dot at the end of a word is used as a general mark of abbreviation (see § 94); and the use of the second mode between two consonants in cases where, owing to the exigencies of pronunciation, a vowel *must* intervene, implies the vowel of the alphabetic word, generally the alphabetic word itself in a compound (see § 91); thus,


form, *join*, *peace*, *keys*, *bees*.

But except in initial syllables, and in the case of **iy** after the characters **ry** and **ny**, and of **uw** after **ly**, it is generally better to write the vowel character. (Exercise XXV.)

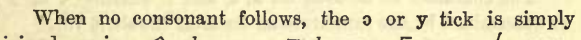
(2) AFTER A LONG VOWEL CHARACTER. The mode of hiatus after a long vowel and before a consonant, except **m**, implies a short vowel. Modes (1), (2), and (3), are used to distinguish the unaccented vowels **w**, **ɔ**, **y**; but the distinction is generally of little importance, and need not be very carefully observed: the sound **w** does not occur in this way in English. (Ex. XXIV.)



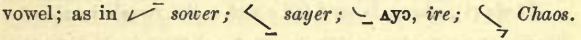
When no consonant follows, the **ɔ** or **y** tick is simply joined: as in *showy*, *shower*, *wooer*, *seer*.

If the vowels do not join clearly the mode of hiatus is used; the **w**-mode after an **w** (*oo*) vowel; the **y**-mode after an **y** (*ee*) vowel; as in *sower;* *sayer;* ayɔ, *ire;* *Chaos.*

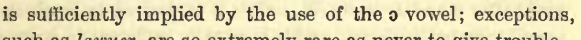
When an **ɔ**-vowel is immediately followed by another vowel, **r** is usually sounded, but the character **ery** need not usually be written, unless great precision is required, because the **r** trill is sufficiently implied by the use of the **ɔ** vowel; exceptions, such as *lawyer*, are so extremely rare as never to give trouble.



The distinction between the sounds *awer* and *aw*, as in *drawers* and *draws*, *cores* and *cause*, is not commonly made in conversation; but may be marked in shorthand by adding **ɔ**;



An *accented* short vowel, following a long vowel, is written, if required to mark the accent;



(3) AFTER A SHORT VOWEL CHARACTER and before a consonant, the three modes are used to distinguish between the accented short vowels. (Except before **m** (Exercise XV.), and in very special cases, this method is never used in practice, see §79.)

a, **e**, and **i**, are distinguished by modes (1), (2), and (3), after the *ĕ*-tick: **o**, **ʌ**, and **u**, similarly, after the *ĕr*-tick; thus,

pat (1), *pet* (2), *pit* (3); *pot* (1), *put* (3).

swim; **swam**; **swam**, *swum*; **swon**, *swan*;

sham, *Shem*, *Ham*, *Hymer*, *Shyman*.

princéss, *princes*; *présent*, *presént*.

The character to be used for **a**, **e**, and **i**, whether ↖ or ↗, is determined by the same rule as for final vowels (§ 70).

An accented short vowel is always immediately followed by a consonant so that this method cannot clash with the expression of **w** and **y**.

Mode (1), *above*, is used for *a* and *o*, the vowels in *above*.

78. In actual practice the Mode of Hiatus may often be dispensed with. This is generally the case with the distinction between **a**, **e**, and **i**; **o**, **ʌ**, and **u**. The hiatus need never be made after **e** and **ʌ**, mode (2), unless it is desired to mark the accent very particularly; and it is usually sufficient to write **e** for **a** and **i**, and **ʌ** for **o** and **u**.

In long and common words the refinements of vowel indication, involving the mode of hiatus, may be often neglected without much danger to legibility.

For instance the outline represents **apriyceyt**, which is an intelligible, though not a perfect pronunciation of *appreciate*. The full form **apriycyeyt** involves hiatus twice. (§ 84.)

Similarly **p-t-k-lɔ**, **op-t-n-ty**, **n-tr-l**,

ed-keycon, **br-k-f-st**, **k-lk-l-t**,

are sufficiently suggestive of *particular*, *opportunity*, *natural*, *education*, *breakfast*, *calculate*, though not strictly correct.

It is not intended to recommend the writing of words incorrectly, but simply to illustrate the fact that the system is so constructed that the neglect of such refinements of accuracy, does not make the writing illegible.

After common prefixes, like *ad*, *ob*, *ab*, which are rarely followed by a vowel the mode of hiatus need not be used,

 *adverse*,  *diverse*,  *abdicate.*

Similarly before common terminations and inflections, especially *-s*, *-'d*, the mode of hiatus may often be dispensed with, if great precision is not required. Cases like the following are exceedingly rare, and would be almost invariably distinguished by the context:  *hatch'd* and *hatchet;*

 *ridg'd* and *rigid;*  *prints* and *prentice.*

The first word in each case should, strictly speaking, be written with hiatus.

79. When two characters have been joined together by mistake, in a case where the mode of hiatus should have been used, the following correction marks are employed. Mode (1) is indicated by a dot placed above the character which should have been separated; mode (3) by a dot below. The omission of medial **h** is marked by a small circle; the simple hiatus, mode (2), by a vertical tick. These marks are sometimes useful for purposes of revision, when accuracy is required.

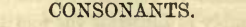
 *pit,*  *pat,*  *apprehend,*  *it'did'not.*

The consonants **w** and **y** are generally important for the recognition of a word, and should always be expressed by mode where they occur; they should not be habitually omitted in writing and dotted in afterwards. On the other hand, the distinction between the short vowels is seldom essential; it may therefore be generally neglected in writing, and may be made afterwards by dot if necessary.

These dots are very seldom required except in rare words, or in unfamiliar proper names, or in passages, like that on p. 92, where the context happens to be of no use in indicating the right word. They need not be placed with any greater accuracy than the *i* dots in longhand. (Exercise XXVI.)

CONSONANTS.

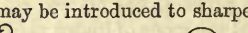
80. P, B, F, V. In joining these characters after vowels, except **uw**, **ow**, **y**, the angle should be marked. A hook may be introduced to sharpen the angle, as in


hawpt, *hop'd;* *over.*

This hook is used to imply the vowel **o**, not only initially, but also in syllables. After the downstrokes **s**, **m**, **l**, the hook becomes a loop; and the character **a** need not be inserted unless the accent requires marking. (Exercise VIII.)


tub, *cup*, *shove*, *sup*, *muff*, *love.*

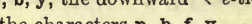
Except after **p**, **b**, **y**, the downward ˋ ĕ-tick is always used for **a**, **e**, **i**, before the characters **p**, **b**, **f**, **v**.


cap, *map*, *lap*, *rap*, *tap*, *pap.*

Compare the outlines of *ripe*, *type* (§ 61).

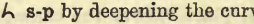
The compound **sp**, as in *lispt*, *suspicion*, is distinguished from **s-p** by deepening the curve of the **p**.

Similarly in the compounds **mp**, **mf**, **mb**; **p**, **f**, and **b**, might be written , , , respectively; but the distinction is of little importance, because cases like *map* and *imp* are sufficiently distinguished by the vowel preceding the **m**: the characters may therefore be simply joined, as in the following examples;


ember, *import*, *emphatic*, *camp*, *camp'd.*

81. T, D, H, Ч. These characters are used for **t**, **d**, **h**, **ч**, except in the special cases mentioned below. They generally present the best joinings, and they do not leave the line of writing.

The characters *at*, *had*, *hath*, *with*, are chiefly used for the corresponding alphabetic words, and in phrases and compounds containing them; such as,


within, *without*, *withhold*, *herewith.*

They are also used after the long vowels **ay**, **ao**. (§ 61.)

The character ⌣ or ⌢ AY may be omitted, except initially and in the syllables ⌣ *kite*, ⌢ *fight*, being implied by using the special characters; thus, ⌣ *sight*, ⌢ *quite*,

⌢ *bite*, ⌣ *guide*, ⌢ *provide*, ⌣ *tied*, ⌢ *night*,

⌣ *mighty*, ⌣ *lighten*, ⌢ *pride*, ⌢ *defied*, ⌢ *neither*.

After other vowels these characters are not used.

⌢ *earth*, NOT ⌢; ⌢ *ought*, NOT ⌢; ⌢ *out*, NOT ⌢.

The characters ɔ ə are used in forming the compounds **pt, kt, ft, pɪ, kɪ, fɪ.**

⌢ *active*, ⌢ *rack'd*, ⌢ *apt*, ⌢ *oft*, ⌢ *depth*, ⌢ **f-fɪ**, *fifth*.

After these characters and **aq** (§ 89), final **y** is written downwards, the inflections *-eth*, *-ed* are added thus, ə), and *-ing* by the cross stroke (§ 91).

⌢ *writeth*, ⌢ *writing*, ⌢ *acted*, ⌢ *invited*.

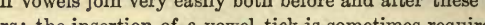
The character) **d** is also used in forming the auxiliaries ⌢ *could*, ⌢ *would;* and for the terminations *-hood*, *-ward;* the **w** being expressed by 'mode'.

⌢ *wayward*, ⌢ *forward*, ⌢ *hardihood*.

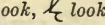
The compound ⌢ **st** is formed by joining / **s** and ⌣ **t**; the upstroke of the **t** is brought up to the level of the top of the **s** for the sake of lineality, and the combination is made straighter and narrower to avoid confusion with **k**; if **st** were written ⌣ **st**, simply joining the characters, confusion would probably occur. The compound ⌢ **nd** is similarly formed from / **n** and ⌣ **d**, and ⌢ **nt** from / **n** and ⌣ **t**.

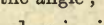
82. ⌢ K, ⌢ G, ⌢ TC, ⌢ DJ. The tops of these characters should be well curled over in writing, like the top of a long-hand *c*, to distinguish them from straight characters like ⌢ **st**, ⌢ **nt**. Compare ⌢ **k-m**, ⌢ **st-m**.

All vowels join very easily both before and after these characters: the insertion of a vowel tick is sometimes required to make the joining easier (§ 72);


took, book, look, suck, sack.

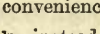
In joining **c k** after **/ s** in the compound **sk**, a hook may be introduced to sharpen the angle; 
Esk, skit, sky.

The common compound **x** is simply written **ks**: if a vowel intervenes, it is inserted, as in 
kiss, cusp.

In the prefix **ex**, the initial vowel is omitted if unaccented; as in, 
expéct; compare 
éxtant, exténd, éxercise.

The prefix **kon** is for convenience written **o** before downstrokes, such as **/ s, c k**; instead of writing 
k-n, and using the mode of hiatus.

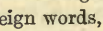
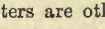
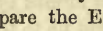

constant, concúr, condition, consider.

The **n** character is added to the circle before upstrokes and vowels; as in, 
confér, connect. (Exercise X.)

The special forms
are given to the compounds **tc, dj**, which are very common in English. The true guttural sibilants only occur in foreign words, such as *Loch, Ich.*

The backward characters are otherwise appropriate to **tc, dj**, because these sounds are often etymologically descended from corrupted gutturals; compare the English '*church*' with the Scotch '*kirk*', or the Italian *c*, pronounced as *ch*, **tc**, with the Latin *c*, pronounced as *k*.

83. **/ s, ⌒ z.** The alternative characters for **z** are required to facilitate joinings. The general rule is to use ⌒ when disjoined, and after vowel characters except **uw, ow, oy**, and upward **y**. (Cp. **q**, § 89, and see Exercise XI.)

The distinction between **s** and **z** is most important at the beginning or end of a word: compare, 
séal, zeal; 
pressures, **precos**, *precious;* 
this, 
q-z, *these.*

Medially the distinction is neither so important nor so easy to preserve: the straight tick, as in *easy*, may generally be used for the **z** sound, just as the letter *s* is used in the common spelling; but if great precision is required, the tick can always be curved for **z**, especially in words which are spelt with a *z*, such as, *wizard*, *stanzas*, *frenzy*.

s, z Inflections. The sounds **s** and **z** occur so frequently as terminal inflections that special provision is made for this case. The inflective *s* is expressed by a hook after **p, b, t, d, q.**

apes, *adds*, *acts*, *wings*.

After circles and **ery**, the hook forms a double loop; thus,

lives, *ashes*, *ages*, *actions*, *hurries*, *themselves*, *thinks*, *thanks*, *circumstances*.

After **k, g, st, z, nt, nd, l**, the **s** or **z** character is simply joined.

books, *lists*, *eggs*, *hands*, *ells*, *assizes*.

After **m, sp**, the mode of hiatus is used, as *stems*, *wisps*.

Special forms are given to the common terminations **ns**, *nce*; **nz**, *ns*. Compare the words,

fens, *fence*, *fenc'd*, *fancy*, *fancies*, *fancied*, *funny*, *finésse*, *happinesses*.

The character **d** is joined continuously after **ez**, for the *-ed* inflection, as in *suppos'd*, *analyz'd*.

These special forms should be restricted to terminations; in other cases the combinations are rare, and the mode of hiatus should be used.

instead, Wenz dey, *Wednesday*; *wisdom*. *subsidy*, eq zayyty, *anxiety*; NOT eqz ety.

84. c, ɔ. The circle of c (*sh*) is always turned backwards, in the same direction as the longhand letter *c*; that of j (*zh*) (and of *h*) forwards, in the same direction as the loop of the longhand letter *j*. (See § 55.) (Exercise XII.)

The character ɔ is used for c, after k, g, and when disjoined; cyer, *sheer;* riyc, *riche* (Fr.); kecyeɔ, *cashier.*

Otherwise the s tick is omitted, and the small circle, turned backwards, is directly attached to vowel stems; thus,

harsher, masher, machine, Russia, lash.

vicious, spacious, dish, push, pish.

Short vowels before and after c are written like initial and final vowels. Initially, the ĕ-tick is written upwards before c.

The circle c is for convenience turned the other way in the common phrases, *shall be, shall have;* in the word *such;* and in the termination *-ship*, as in *worship, kinship.* The circle c is also used in forming the convenient abbreviations, m-c, *much,* ec, *each.*

The consonants s, t, etc., when followed by y, are often corrupted to c, tc, etc., in conversation; in cases where both pronunciations are equally common, that should be chosen which gives the clearest and most suggestive outline.

issue; virtue; hosier; exposure.

future; picture; scripture; indenture.

temperature; n-tcɔ, *nature; procedure.*

Compare *fortune; factious; pressure.*

When c is combined with a consonant, no vowel intervening, the mode of hiatus is used, except after l and n, and before t, to which the circle may be directly joined;

eqcɔs, *anxious; up-shot; off-shoot.*

f-n-nc-l, *financial; Welsh; wisht; astonish'd.*

The form ⌒ is used for the compound **ntc**, as in *inch*, ⌒ *pinch*, ⌒ *bencher;* compare ⌒ **eyncont**, *ancient.*

The form ⌒ is used for the compound **ndj**; as in the words, ⌒ *hinged*, ⌒ *angel*, ⌒ *engine*, ⌒ *changes.*

The sound **j** is very rare in English, except in the compounds **dj**, **ndj**. It occurs chiefly in the terminations *-sion* **-jon** (see § 85), and *-sure* **-jo**, as in *pleasure, treasure, leisure;* the latter is written thus; ⌒ **ejo**, *azure;* ⌒ **mejo**, *measure.*

85. **con**, **jon** (*-tion*, *-sion*). (Exercise XIII.) The large circle is turned 'backwards' for **con** (except after **k**, **aq**, **oo**), 'forwards' (clockwise) for **jon**. After long vowels (except **iy**) the circle is turned on the stem of the character; thus,

⌒ *station*, ⌒ *emotion*, ⌒ *exertion*, ⌒ *solution*, ⌒ *occasion*, ⌒ *caution*, ⌒ *collation*, ⌒ *collusion.*

After short vowels and **iy**, the **con** circle is written as an independent loop, like the longhand letter *o*, and is not turned on the stem of the vowel; thus, ⌒ (NOT ⌒) *session.*

The downward *ĕ*-tick is omitted before the circle, as in *petition*, below. Compare the **con** and **jon** circles;

⌒ *concussion*, ⌒ *petition*, ⌒ *coalition*, ⌒ *depletion*, ⌒ *concision*, ⌒ *vision*, ⌒ *collision*, ⌒ *lesion.*

After a consonant, if no vowel intervenes, the circle is turned directly on the stem of the character; it is turned 'forwards' after **k** and **aq**; thus,

⌒ *exception*, ⌒ *question*, ⌒ *emulsion*, ⌒ *exemption*, ⌒ *tension*, ⌒ *action*, ⌒ *distinction*, ⌒ *function.*

The large circle is most convenient as a prefix or termination; it does not always join well in the middle of an outline.

In adding inflections and terminations vowels should be inserted where they facilitate joinings; cp. ⌒ *passionate*, ⌒ *impassion'd*, ⌒ *intentional*, ⌒ *questionist;* but the

mode of hiatus should be used if the joining does not happen to be clear and easy. The *-ing* termination is added with the cross-stroke (§ 91), and the *-s* inflection by a small circle or hook (§ 83); the character) is used for the *-ed* inflection after the forward circle, as in *cautioned* or *occasioned.*

This circle should only be used for the sounds **con, jon,** when they represent the substantival termination.

Adjectives, such as *Persian, sufficient*, are written alphabetically.

86. L, R. The loops **l, r,** can be written either forwards, **ry**, **ly**, in the direction of the hands of a clock; or backwards, **el**, **ery**, 'counter-clockwise'. The difference of appearance produced is sufficient for the purpose of vowel indication. Forward **l** and forward **r** indicate the absence of preceding vowels, and are used in forming the compounds **pl, fl, sl,** etc., **pr, tr, kr,** etc. (See Exercise XIV.)

plate, slight, cry, pry, actress, Henry, shrine. Compare *pellet, silt, perry, aspirate.*

Special forms are given to the compounds **kl, gl**; thus,

clay, glad; compare *cull, gull.*

Backward **el**, is written like the longhand *l*, but with a more open loop. It is written half-size to indicate the absence of a vowel after it, as in the combinations **lp, lf, lk, ls,** etc.

wealth, self, help, pelt, old, milk.

Compare the words, *rĕalm, relúme.* [§ 77, (1).]

The mute *r*, which occurs before a consonant in common spelling, as in *art, short*, indicates one of the **o** vowels, and is not written with the loop character. The loop characters represent the trilled **r**, followed by a vowel, as in *red, herring.*

Backward **r**, **ery**, is used after vowels; as in the words,

curry, tomórrow, airy, weary.

Forward **r**, **ry**, may be used if the preceding vowel is 'clipped' in conversation, as in the words,

p'raps, *sep'rate*, *diff'rent*, *emp'ror*.

Some dialects trill the *r* in words like *art*, *short*, before a consonant. This peculiarity of pronunciation may be indicated, if desired, by inserting the character , written half size to indicate the absence of a following vowel, as in *art*.

87. M. The character **em** is used to *indicate* a preceding short vowel; in all other cases the downstroke **m** is not joined, but is written so as to end near the end of the preceding character. (Exercise XV.)

s-m, *some*; **k-m**, *come*; **m-m-ry**, *memory*; *amúd*.

SAOM, *psalm*; *time*; *germ*; *came*; *smoke*.

In rare words the particular short vowel should be specified, as in, *mummery*, *Tam*, *Pym*. [See § 77 (3).]

The word *man*, and the unaccented termination **m-n**, are written , without a vowel tick between the **m** and **n**; thus,

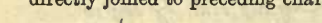
human, *woman*, **wim-n**, **men**, *German*.

When a vowel does not intervene between **m** and **t** or **d**, the characters are joined, giving the forms **emt**, **emd**, which are analogous to **nt**, **nd**, but are written above the line, like **em**: the upstroke is omitted, unless a short vowel precedes. The form **emt** is most commonly used as an abbreviation for the termination *-ment*, which is usually written *mt* in longhand. *empty*, *sentiment*, *intimate*.

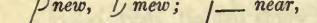
dimm'd, *seem'd*, *momentous*, *implements*.

argumentative, *parliamentary*, *amusement*.

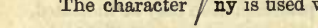
88. N. The downstroke of **n** differs from that of **m** in beginning on the line instead of ending on it, and in being directly joined to preceding characters. Compare


new, mew; near, mere; none, mem.

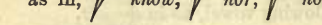
The character **ny** is used when **n** is followed by a vowel; as in,


know, nor, now, nay, another.

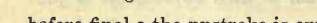
The angle in the combination **nɔ** is rounded off; but before final **ɔ** the upstroke is omitted; compare,


numb; nut; **m-nɔ**, *manner;* **inner;** **onɔ**, *honour.*

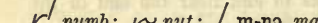
The compound **-mn-** is written , as in *omniscient,*

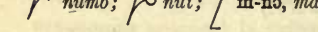

chimney: **m** is joined after **n** thus, *animal, enemy.*

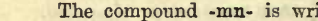
The upstroke of **n** is omitted if no vowel follows. The prefixes *in, un,* are joined before upstrokes.


unborn, inverse, cp. *universe, initial.*

89. Q (*ing*). The character , called **ɑq** (*ung*), is used after vowels, except upward **y**, **uw**, **ow**, **oy**, in which cases the other curve **aq** is used. (Exercise XVI.)

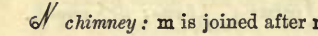

sowing, saying, dying, sawing,


vowing, toying.


tɑq, *tongue; sung, bung, lung, rung, thong.*

The opposite curve , called **aq** (*ang*), is used after upward **y**, and after most consonants, especially **z**, **p**, **l**, **nt**.


sang, bang, rang, gingham.

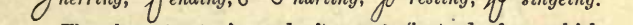

sizing, shilling, hunting, supping, watching.

living, halting, thing, ding, washing.

By omitting the first and third strokes of ɪqɔ, we obtain the back upward flourish ɪq (*ing*). This character is only used for the participial termination *-ing* after certain consonants, especially t, nd, r, and back circles.

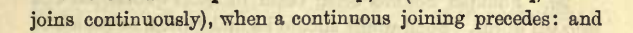
herring, ending, hurting, resting, singeing.

The character ɪq is used after p, b (instead of aq, which joins continuously), when a continuous joining precedes: and similarly aq instead of ɪq after t, d.

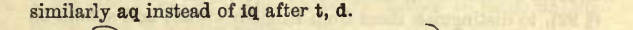


hooping, (NOT) *waiting.*

When the uninflected word ends in one of the characters s, r, m, n, q, y, ɔ, ɔ t,) d, the termination *-ing* is expressed by the cross-stroke (see § 91). After an ɔ vowel the use of the cross-stroke implies r; when no r is heard, as in *sawing*, the character ʌq should be used.



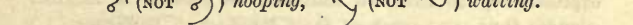
hurrying, pitying, innings, longingly, riding.



cursing, aiming, offering, dyoorɪq, *during.*

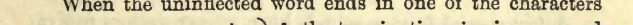
The characters ɪq, aq, ʌq, are very suitable as terminal flourishes, but do not join well to following signs.

Short terminal inflections may be joined as follows;

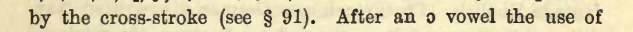


singer, stringy, stingeth, wingéd, longish.

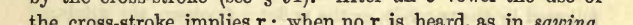
In the middle of a word, the mode of hiatus is used; as in *kingdom, singsong, longhand.*



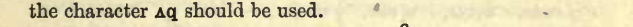
But the common compounds qk, qg, qt, qd, qɪ, are written with the ɪqɔ character; the ɔ-tick is omitted, and the following character is directly joined after the upstroke of the q; thus,



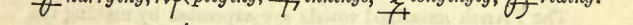
yqkɔ, *inker;* yqgɔ, *anger;* yqt, *ink'd;*



yqɪ, as in *length;* yqd, as in *wing'd.*



England, language, angry, longer.



quinquangular, wrinkle, cp. *functional.*

The compound ŋ **ndj** (soft *ng*), as in **d-ndjo**, *danger*, must not be confused with **q** or **qg**, as in *hanger, anger*.

The prefixes *in, un*, before **k, g**, are often assimilated in sound to **iq, aq**, but are preferably written by mode of hiatus:

inconstant, *unkind*, *increase*.

90. Foreign Sounds often occur in short quotations and isolated words. Such words should be underlined, or italicized (§ 92), to distinguish them from English words; and should be expressed by as close an imitation as possible in English sounds: thus, *peur*, *je*, *Wien*, *Vienne*.

A few special foreign sounds have no satisfactory equivalents in English. The French *u*, or German *ü*, is written **iy**, followed by the **w**-mode, or the **w** dot. Compare the words,

vous, *vie*, *vue*, *une*, *deux*, **trwaɔ**, *trois*.

The French nasalized vowels are expressed by making the next character (**q** if final) intersect the vowel; thus,

pain, *bon* (cp. *bonne*), *comment*, *long*, *longue*.

The character **j** is used for **j** in French words, such as,

ruwj, *rouge*; **jwaɔ**, *joie*; **jeɔn**, *jeûne*.

German *ch* is written with the **h** circle, followed, before a vowel, by the **y**-mode, as in *Bach*, *mädchen*.

The 'breathed' **l**, heard in Welsh words, like *llan*, may be distinguished by prefixing the **h** circle; thus, **hlan**, *llan*.

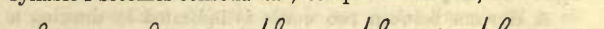
91. Inflections. In adding inflections the outline of the original word should be altered as little as possible.

With abbreviated words the mode of hiatus should be used.

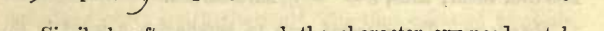
once, *one's*, *oneself*, *whose*, *whom*, *whoever*.

gives, *given*, *P's and Q's*, *joys*, *enjoy*.

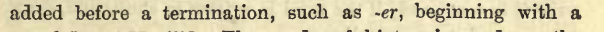
In adding inflections to words ending in *-ple*, *-ble*, *-fle*, etc., the character **el** should not be changed for **ly**, although the syllabic **l** becomes consonantal; compare the words,



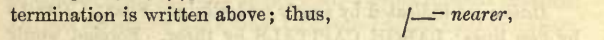
Similarly after an **o** vowel, the character **ery** need not be added before a termination, such as *-er*, beginning with a vowel [see § 77, (2)]. The mode of hiatus is used, or the termination is written above; thus,

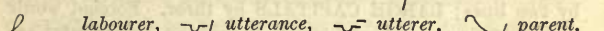


A word may always be divided in the middle and the termination written above, mode (1), provided that it does not interfere with the expression of **w** before vowels (§ 75). This is especially convenient in the case of terminations which tend to go too far below the line;

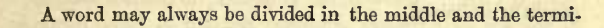


The common participial termination *-ing* is added by a cross-stroke through the last character of the word; the adverbial termination *-ly*, similarly, by a cross-tick. These marks should always be used in the case of alphabetic or abbreviated words: a tick is added for the plural.

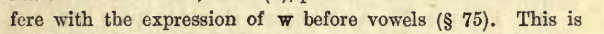


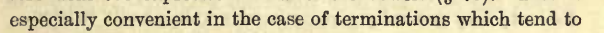


This method should not be used for the sounds *-ing*, *-ly*, except when they represent inflections.

Thus: 

In adding the **s** and **d** inflections to words ending in the downward **y**, the character **y** is omitted; in similar cases upward **y**, and **o**, are retained. Compare the words





PUNCTUATION, ETC.

92. Stops may all be written in the usual way; but in rapid writing, punctuation is best effected by leaving spaces.

A Hyphen between two words is indicated by drawing a line over them; thus,  *hard-earned.*

Emphasis. The clearest way to emphasize a word is to write it in longhand; if the word is written in shorthand, draw a line round it, or underline it.

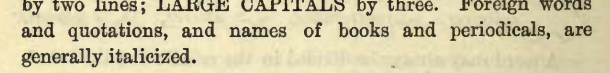
Italics are indicated by singly underlining; Small Capitals by two lines; LARGE CAPITALS by three. Foreign words and quotations, and names of books and periodicals, are generally italicized.

To erase a word, draw two parallel lines through it.

93. Figures. The Arabic figures should be made large and distinct; they generally give no trouble unless badly written.

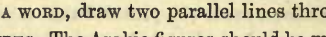
In writing round numbers, the abbreviations,  for *thousand*,  for *million*, will be found convenient: but it is clearer and quicker to add two noughts to a number than to abbreviate the word *hundred*.

94. Initials are marked as in longhand by placing a dot after them. The following signs are used:—



Some, as *r*, represent the sound of the name of the longhand letter; others, as *c*, the sound with which the word usually begins.

An Initial Capital is marked by a short tick struck through the first character or written close below it; thus,



The exact spelling of a proper name, whether *Smythe* or *Smith*, *Browne* or *Brown*, is often important. Unfamiliar proper names should in this case be written in longhand.

PRACTICE.

95. The art of shorthand writing is in the main a mechanical art; to attain thorough excellence in it practice alone is necessary, but practice is essential. Shorthand is of little practical use until it can be written and read without conscious effort and hesitation. The time required to attain this degree of proficiency will depend partly on the simplicity of the system and on the intelligence of the learner; but no amount of intelligence is of any avail without diligent practice. At least an hour a day should be devoted to the mechanical act of writing, till it becomes no longer an effort but a pleasure.

A good method of practice is the following: Take a printed specimen, read it through carefully, referring to the key if necessary; then try to write it from the key without referring to the copy. Compare the result with the copy, and rewrite several times words incorrectly written.

When sufficient accuracy and facility have been attained by copying practice, in order to acquire speed the student should take every opportunity of practising from dictation. Copying practice is of little use in acquiring speed.

Practice in reading shorthand is just as essential as practice in writing. The student should make a point of reading everything he writes, not immediately, but after an interval of a week or two; and should not be satisfied till he can read his writing quite as easily as longhand at any distance of time.

The best kind of reading practice is afforded by correctly printed specimens of unfamiliar matter. This tends to improve the style of writing, and prevents the possibility of guessing words from a reminiscence of the subject.

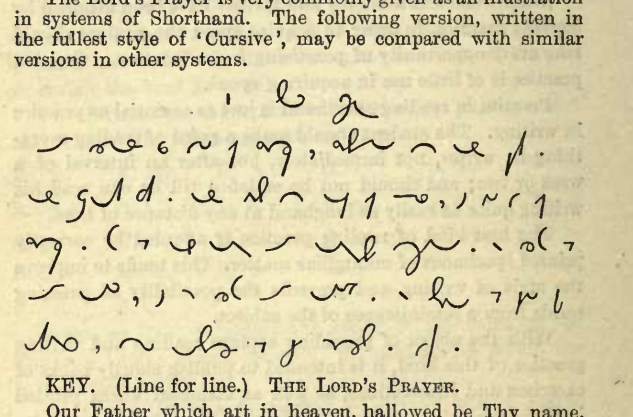
With the object of providing copious reading and writing practice of this kind, it is intended to publish shortly books of exercises and illustrations, as well as standard works printed in the 'Cursive' character. Meanwhile the preceding examples and instructions, with the progressive exercises p. 108, will enable the student to attain such certainty and ease in reading and writing as to make shorthand, not merely a pleasant recreation or an idle accomplishment, but a time-saving expedient of real practical value.

96. SPECIMENS OF WRITING.

At the outset of his practice, say after reading §§ 38—52, and before proceeding to learn the rules for writing, the student is recommended to analyse the following easy example with the aid of the alphabetic table. He must expect to meet with a few points which he cannot as yet fully appreciate, but he will find that the majority of the outlines present no difficulties. By way of writing practice he should take a paragraph from a book or newspaper, picking out all the alphabetic words and writing down the characters that represent them. He should not attempt to write unfamiliar words, till he has worked carefully through the whole of the exercises on §§ 53—91, and has acquired a fair knowledge of writing by sound and of the usage of the various characters.

THE LORD'S PRAYER.

The Lord's Prayer is very commonly given as an illustration in systems of Shorthand. The following version, written in the fullest style of 'Cursive', may be compared with similar versions in other systems.

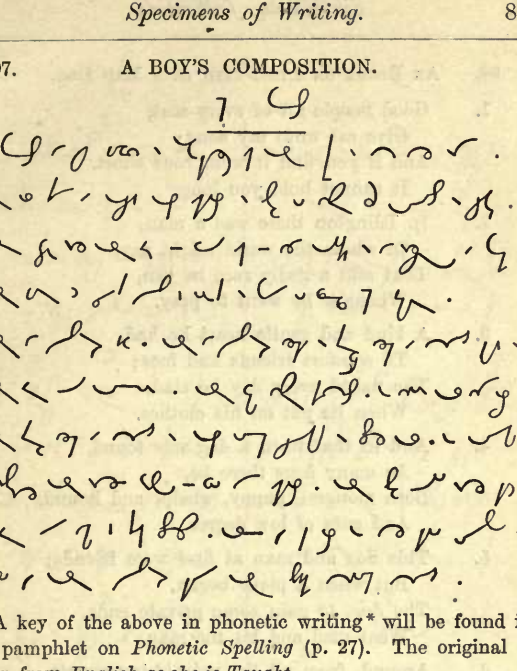


KEY. (Line for line.) THE LORD'S PRAYER.

Our Father which art in heaven, hallowed be Thy name. Thy kingdom come. Thy will be done in earth, as it is in heaven. Give us this day our daily bread. And forgive us our debts, as we forgive our debtors. And lead us not into temptation, but deliver us from evil. Amen.

(Capitals are not marked. The second vowel in the word Amén should have been inserted, since both syllables are accented.)

97. A BOY'S COMPOSITION.



.A key of the above in phonetic writing* will be found in the pamphlet on *Phonetic Spelling* (p. 27). The original is taken from *English as she is Taught.*

KEY. ON GIRLS.

Girls are very stuckup and dignified in their manner and be have your. They think more of dress than anything and like to play with dowls and rags. They cry if they see a cow in a far distance and are afraid of guns. They stay at home all the time and go to church on Sunday. They are al-ways sick. They are al-ways funy and making fun of boy's hands and they say how dirty. They cant play marbles. I pity them poor things. They make fun of boys and then turn round and love them. I don't beleave they ever killed a cat or anything. They look out every nite and say oh ant the moon lovely. Thir is one thing I have not told and that is they al-ways now their lessons bettern boys.

* The spelling of the original has been imitated, here and there, both in the phonetic and shorthand versions.

98. AN ELEGY ON THE DEATH OF A MAD DOG.

1. Good people all of every sort,
Give ear unto my song;
And if you find it wond'rous short,
It cannot hold you long.

2. In Islington there was a man,
Of whom the world might say,
That still a godly race he ran,
Whene'er he went to pray.

3. A kind and gentle heart he had,
To comfort friends and foes;
The naked every day he clad,
When he put on his clothes.

4. And in that town a dog was found,
As many dogs there be,
Both mongrel, puppy, whelp, and hound,
And curs of low degree.

5. This dog and man at first were friends;
But when a pique began,
The dog, to gain some private ends,
Went mad and bit the man.

6. Around, from all the neighb'ring streets
The wond'ring neighbours ran,
And swore the dog had lost his wits,
To bite so good a man.

7. The wound it seem'd both sore and sad
To every Christian eye;
And while they swore the dog was mad,
They swore the man would die.

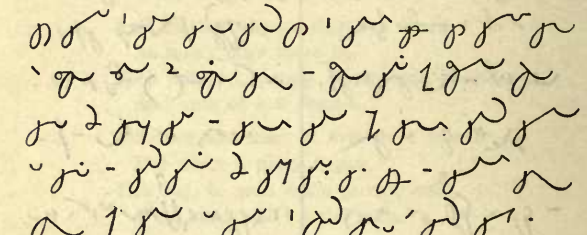
8. But soon a wonder came to light,
That show'd the rognes they lied,
The man recover'd of the bite,
The dog it was that died.

Oliver Goldsmith.

99. A Crabbed Collection of Monosyllables. The following passage*, or something like it, was read by Mr Rundell at a meeting in the presence of several shorthand writers of various systems:

"Ryde wrote the rude reed, reading aright the ready writing. Wright wrought a rod, and hurried ahead, at a horrid rate, a harried rat, in a harrowed arid rut, with a rotten root, a reedy rood, on the ruddy Reading road, to rot a ratting rad with a written writ, re riding a rowdy raid, arrayed in red, to rout the irritating riot of rutting roes."

It is almost needless to say that everyone was beaten by it, except Professor Everett, "who took it down at a very decent speed, and read it accurately, not knowing the meaning of it." Such passages present no difficulties in Cursive Shorthand. The following is the complete version of the above:



This can be written by a skilled hand in about half a minute (that is to say almost as fast as the words themselves can be *distinctly* articulated); and at the same time so clearly that anyone who knew the system, could read it correctly at sight without having ever heard the original.

A version of the same in Pitman's Phonography, is given as an illustration of the use of detached vowels, on p. 13.

It will be noticed that the outlines in the Pitman version are nearly all alike, but for the presence of certain little dots and ticks, which *look* very neat and harmless, but which *are* most annoying in practice; in reading, because they are so inconspicuous and indistinct; in writing, because it takes so long to insert them with the care and accuracy necessary to distinguish the words correctly.

* I have since discovered that the original passage, as read by Mr Rundell, was less elaborate.

METHODS OF ABBREVIATION.

100. Cursive Shorthand is about three times as brief as longhand, and can be written in full, by persons of average skill, at the rate of between 80 and 100 words a minute, without any of the outlines being spoilt. Higher rates of speed are best attained, not by more hurried scribbling, but by methods of abbreviation.

In reporting, abbreviation by omission must be employed to a large extent in any system. The manner and degree of abbreviation must always depend largely on individual discretion and on special circumstances. It is impossible to give hard and fast rules to meet all cases. The subject will be more fully developed in a subsequent work: meanwhile a few general principles and illustrations are appended, which will enable the intelligent student to attain considerable brevity and speed with very little loss of legibility.

Words are, in general, best abbreviated, as in longhand, by omitting the terminal portions. The full expression of vowels in the outlines, enables us to employ this simple method of abbreviation to a far greater extent in Cursive than is possible in most other systems.

A single comprehensive method, like this, is much more useful in practice than a long list of special contractions.

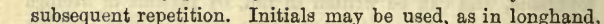
A word thus abbreviated is marked, as in longhand, by a dot at the end. The last character or two may be written over the dot, thus,  .[7] adv*antage*ous, if required to show the part of speech or the inflection: in this case the dot may generally be omitted, especially if the word is obviously an abbreviation.

The best words to abbreviate in this way are long words in which the first syllable or two suffices to show the meaning; as in the following examples, in which the portions to be omitted are italicized;

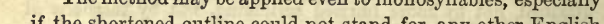
anta*gonist*, bap*tism*, benev*olent*, eccle*siastical*, extrav*agant*, manu*facturing*, plenipo*tentiary*, philan*thropic*, unan*imous*.

If a long word occurs several times in the same passage, it should be written in full the first time (unless it is a common word), but may generally be abbreviated with safety on each subsequent repetition. Initials may be used, as in longhand, for words or names that are constantly recurring.

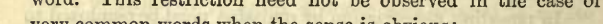
The method may be applied even to monosyllables, especially if the shortened outline could not stand for any other English word. This restriction need not be observed in the case of very common words when the sense is obvious:



It is especially advantageous to omit long, common, or meaningless terminations, such as *-ful, -able;* more particularly such as if written would be separated from the rest of the outline by the mode of hiatus. The dot may be placed above or below to indicate **w** or **y**; thus,



A substantival termination may be indicated by a small circle disjoined, when it does not clash with the suffix '*self*'. An adverbial termination is indicated by a double dot; thus,



The following adverbs, and the corresponding adjectives, etc., may be conveniently abbreviated as shown by the italics:

absolutely, characteristically, essentially, extraordinarily, generally, immediately, originally, particularly, practically, probably, publicly, respectively, severally, sufficiently.

Unless the termination is very long it should be written in full. The termination of the word *consciously*, for instance, can be written nearly as fast as the double dot, but it is worth while to abbreviate **koncyencosly**, *conscientiously*, provided that the meaning is otherwise clear.

Abbreviations familiar in longhand may be safely used as a rule in shorthand: for instance,

Magazine, advt (advertisement), Govt (government), examination, ppose (purpose), amt (amount), abt (about), Monday, February, etc.

* It should not, of course, be used for the *negative* termination *-lessness.*

The following are particularly common and convenient:

M^r^, Messrs, M^rs^, Miss, Misses, D^r^,

Reverend, Ld. (Lord), honourable, member.

The common termination *-nce* may be indicated, as in longhand, by s *-ce*, written above; thus,

difference, advance, cp. advantages.

101. Special Abbreviations. A prefix or initial syllable which is common to several words, does not make a clear abbreviation unless its use is restricted by special convention to some particular word, preferably the commonest word containing it. The most suitable word in each case will depend on the kind of work in which the writer is employed: the following will be found of general utility, and may be taken as typical examples:

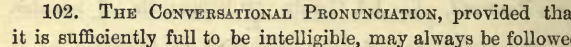
advantage,	Christian,	objects,	signify,
advt,	character,	objects,	opinion,
different,	strength,	subject,	awful,
difficult,	principal,	several,	speak,
defendant,	plaintiff,	public,	English.
general,	religion,	language,	N^o^.

It is a common device to omit the middle of a word and join the termination directly to the prefix. This method must be used with great caution, and can only be applied safely to known cases which do not clash with unabbreviated words: such as,

acknowledge,	influence,	notwithstanding,
opportunity,	interest,	nevertheless,
consideration,	question,	publication,
constitution,	information,	generation.

There is no limit to the number of logograms that may be formed on this plan. They are useful for reporting, but should be avoided in ordinary writing.

102. The Conversational Pronunciation, provided that it is sufficiently full to be intelligible, may always be followed in abbreviating words, whenever it gives a clearer and easier outline. This method is particularly useful in the formation of phrases. In conversation, if a consonant ends one word and begins the next and no pause is made between the two, the articulation is not repeated in speech, but one is made to do double duty. In such cases the consonant need not be repeated in shorthand. Examples of conversational pronunciation:

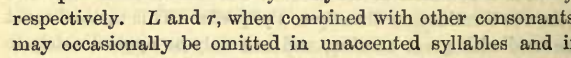


some more, ought *to be*, must *be*, *can* not, more'n (more *than*), better'n (better *than*), as *soon as*, as long *as*, as far *as*, so *as*.

With respect to the omission of vowels the student is referred to the remarks in § 65. The strict rules for vowel insertion should always be followed in the case of rare words, and, if such words are to be abbreviated, they should be abbreviated in the regular way.

Consonants may be omitted, as in metrical writing, in the words *e'er*, *e'en*, *o'er*, and in similar cases.

When several consonants come together in a single syllable one of them may sometimes be omitted without much loss. The prefixes *trans-* and *self-* may be written *tras-* and *sef-* respectively. *L* and *r*, when combined with other consonants, may occasionally be omitted in unaccented syllables and in very common words, as in chil*d*ren, pub*l*ic, app*l*ication, int*e*rest, instruction, cont*r*adict, ful*f*il. A common prefix may sometimes be omitted if the word is clear without it; thus *con* and *com* may be omitted in the words, *com*pletion, *com*bustion, *com*municate, *com*parative, *con*clude, *con*fident, *con*scious, and some others. These methods must however be used with great caution, and are not recommended to beginners. Examples are,



self-respect; instruction; transact; completion.

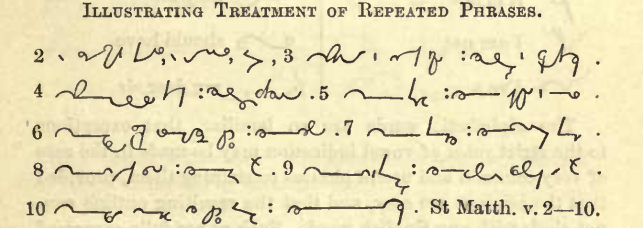
103. Omission of Connecting Words. In note-taking, as in telegraphic despatches, when the sense is more important than the actual words in which it is expressed, connecting words and phrases may be very freely omitted. If the leading words and ideas are skilfully selected and noted down in their proper order, the connecting links may be readily supplied afterwards. It is better to omit a few unimportant words, and to write the leading words clearly, than to abbreviate them in such a way as to render all alike indistinct. As Mr T. A. Reed remarks: "Misreadings are quite as likely to arise from outlines closely resembling one another not being kept sufficiently distinct, as from the noninsertion of words".

Skill in the application of this method can only be acquired by practice in note-taking. Those who have been accustomed to taking notes in longhand, will find no difficulty in applying it to shorthand.

An omission of several words is marked, as in longhand, by a series of dots. The number of dots in a short omission, may be the same as the number of words omitted.

If a phrase is repeated several times in the same passage, the first word or letter only should be written at each repetition, followed by a long dash, to which, for greater clearness, the termination of the phrase may be attached, if desired. Common and familiar phrases may be treated in a similar way.

Illustrating Treatment of Repeated Phrases.



St Matth. v. 2—10.

PHRASEOGRAPHY.

104. Time is often saved by writing whole phrases, like single words, without lifting the pen except as required for the 'mode of hiatus'.

Initial and final short vowels may be frequently indicated in this way, by joining the consonants; and initial w and y may be expressed by mode instead of being written.

A reckless use of phraseography, however, is strongly to be condemned. Only such words as are closely connected in sense may be joined together; and the conditions of correct vowel indication, of facility and lineality, should be satisfied. The conversational pronunciation may generally be followed; but it is desirable that the outline of each component word should remain unaltered, so as to be separately distinguishable. The following are a few typical examples:


I cannot


I shan't


you do not


we'll not


you are not


it is not


I am not


I've a


in part


in all that is


so that it is


by that


there is


they are

should have


my dear sir

The alphabetic words are so familiar, that exceptions to the strict rules of vowel indication may be made in the case of very common and useful phrases containing them, provided that the joinings are easy, and that the resulting outline cannot clash with any English word. Such as are fully expressed may be freely joined; but the words, *and*, *of*, *the*, *from*, *very*, *think*, *them*, *give*, can only be joined in special cases.

(1) PHRASES CONTAINING *a, and, of, the, for, to,* ETC. The ɔ-tick may be used for *a*, and either of the *e*-ticks for *the*, after alphabetic words, and at the ends of several common phrases;

and the	by a	by the	to be
of the	to a	to the	to do
and of the	in a	on the	to have
and are	as a	from the	to give
and is	with a	with the	forgive
is as	up a	have the	unto
as is	for a	for the	undo

with a view to the, with regard to the,

for ever, forbid, forget, cp. forego.

(2) AUXILIARY PHRASES.

would be	we have had
will be	we shall have
it has been	may have
let us be	may be
should be	ought to be

(3) NEGATIVE PHRASES. The negative in auxiliary phrases may often be implied by INTERSECTION.

cannot have	may not be
should not do	had not been

(4) Miscellaneous Examples.


as if it were


as it is


d'you think


I think I was


to think that


I wish to be


I shall be able to do that


in order to do so

everybody

Many other phrases may be formed on similar analogies. Short phrases may be directly derived from longer ones: from the phrase *in all that is* may be derived the useful phrases *in all, all that, that is, all that is, in all that.* On the analogy of *by that*, we may write *by this, by these, by those, by their*, etc.; on the analogy of *would be*, we may form *can be, could be, might be, had been, would have, could have*, etc.

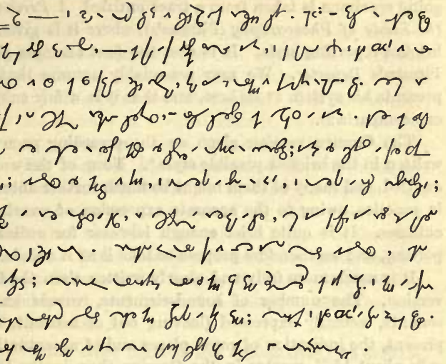
In phrase-forming, the conversational pronunciation may always be followed (§ 102). Connecting words, such as *and, or, of, the*, etc., may be freely omitted in common phrases; but if the remaining words are abbreviated, it is generally better, instead of joining them, merely to write them closer together so as to show their connection.

Phrases beginning with words, such as *that, with*, whose outlines are characteristic, are particularly to be recommended, because they are at once recognized as phrases, and cannot possibly be mistaken for words.

An important use of phraseography is to indicate the connection of words. By joining together in phrases only words that are closely connected in sense, we may not only save time, but also secure greater legibility.

The student should exercise the greatest caution at the outset in his use of phraseography: he must remember that abbreviated words cannot be freely joined without danger of clashing; that time is not saved by joining words which join awkwardly or indistinctly; that phrases which are so long that they cannot be written easily without shifting the hand, can be written more clearly and quickly if divided; and that only very common phrases are likely to become sufficiently familiar for fluent writing and reading.

IN ABBREVIATED STYLE WITH PHRASEOGRAPHY.



KEY.

CHARACTERISTICS OF THE AGE.—The peculiar and distinguishing characteristics of the present age are in every respect remarkable. Unquestionably an extraordinary and universal change has commenced in the internal as well as the external world,—in the mind of man as well as in the habits of society, the one indeed being the necessary consequence of the other. A rational consideration of the circumstances in which mankind are at present placed, must show us that influences of the most important and wonderful character have been and are operating in such a manner as to bring about if not a reformation, a thorough revolution in the organization of society. Never in the history of the world have benevolent and philanthropic institutions for the relief of domestic and public affliction; societies for the promotion of manufacturing, commercial and agricultural interests; associations for the instruction of the masses, the advancement of literature and science, the development of true political principles; for the extension in short of every description of knowledge, and the bringing about of every kind of reform, been so numerous so efficient and so indefatigable in their operation as at the present day. We do not say that many of the objects sought by these associations, are not extravagant and impracticable, but we do say that it is impossible that such influences can exist without advancing in some degree the interests of humanity. It would be idle to deny that notwithstanding all these beneficial influences, a great amount of misery exists; but it is only the natural consequence of great and sudden changes. Let us hope that in this instance at least it may be but the indispensable preliminary stage in the cure of a deep seated disease.

105. Comparison with Pitman. The subject of the foregoing specimen is taken from a tract entitled, *A Persuasive to the Study of Phonography* (Pitman's), where it is given in the briefest reporting style. It is also the first example given in Pitman's *Reporter*. We may reasonably assume that it represents his system at its best, and that it is a fair subject for our comparison.

The Cursive version given on the preceding page is not written in the briefest possible style*. None of the words are omitted, and many of them might be much further abbreviated in practice, owing to the accurate expression of vowels in the outlines. It is quite brief enough however for ordinary reporting, and we therefore propose to take it as it stands.

It is much more fully and clearly written than the Pitman version. The number of sound-elements, vowels and consonants, actually expressed (leaving out of account, for the present, the indication of vowel places and of accentuation), is *only* about 15 % greater in the Cursive than in the Pitman; *but* whereas in the former they are nearly all simply and definitely rendered by their alphabetic characters, in the latter nearly half (upwards of 40 %) are more or less uncertainly implied by methods of abbreviation.

Not only is the actual number of sounds expressed in the Cursive larger, and the mode of expressing them simpler and clearer; but the selection of the sounds is also more rational; those sounds being chosen, whether vowels or consonants, which are most useful for the recognition and distinction of the words.

More than one hundred and twenty of the most important vowels are written by joined characters according to rule. Besides this, the exact places of about one hundred and fifty others are indicated, the quality as well as the place of the vowel is generally shown, and the absence of vowels in all other cases is correctly† implied. The meaning of every out-

* The plate was executed a whole month before the idea of making the comparison was entertained.

† Except in one or two very obvious phrases, such as *have been*.

line is thus rendered so definite that guess-work is practically eliminated.

The illegibility of the Pitman version is largely due to its disproportionate deficiency in the expression of vowels. Only ten vowels are inserted in the whole passage. There is scarcely any attempt at vowel indication. The downward *r*, indicating the absence of a vowel after it, is only used four times, out of twenty-two cases in which it is theoretically required. The loop for the compound *st* is only used five times out of twenty. The hooks for the *l* and *r* compounds are used as often as not (22 times out of 45) when vowels intervene. Even when carefully engraved, the Pitman is, therefore, far from legible. When written at a moderate speed, many of its essential refinements* of length, thickness, and position, are lost or obscured, and in hurried writing it often becomes quite undecipherable.

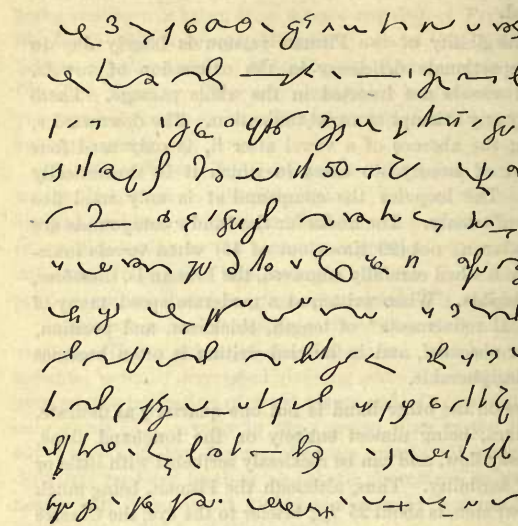
Cursive on the other hand is not one quarter† as delicate. The outlines, being almost entirely on the longhand slope, have an easy flow, and can be recklessly scribbled with little or no loss of legibility. Thus, although the Pitman, being much less fully written, is about 25 %‡ briefer to the eye, the Cursive is so much easier to the hand, and involves so much less mental effort, that, given equal skill, it can be written in the same time, not only with far fewer mistakes, but with incomparably superior legibility.

* In this connection, the remarks of the ablest practical exponent of Phonography, Mr T. A. Reed, are interesting and instructive. In criticising a briefer system than Pitman's, he says: "This [the counting of inflections] is by no means a conclusive test. There are inflections and inflections. Twenty easy inflections may be written more rapidly than a dozen difficult ones with awkward joinings....The *easy flow* of a system is one of its most important practical elements....Greater precision is needed in regard to the size and slope of the letters....These peculiarities are necessarily unfavourable to speed and ease in writing, and greatly detract from the value of the system to the professional shorthand writer, to whom all undue niceties and refinements are a thorn in the flesh". See also Introduction, pp. 3, 4, 6, etc.

† See Introduction, p. 4, near end.

‡ Estimated by Prof. Everett's rule, Introduction, p. 6.

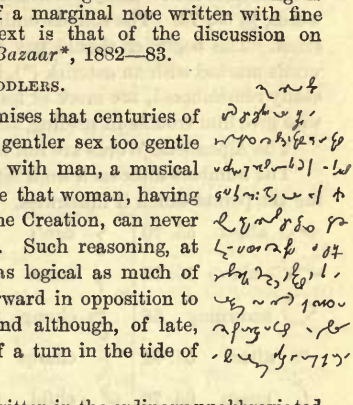
106. Facsimile of Ordinary Writing (Natural Size).



KEY.

There are three ways in which the conditions or characteristics of the time may be said to affect us. They modify belief, they modify society, and they modify the private personal life of every one of us. The preacher who stands forth at the present time as the ambassador of Christ, cannot, I think, use the same confident language he would have used some fifty years ago. I do not mean that he ought to do less, or would do less, for the cause of Christ's religion, but, if I may put the case as it appears to my own mind, it is that if he be honest with himself and the congregation to which he speaks, he will not venture to say, "This is true: there is no sort of doubt about it; it is what I believe, and what you are all bound to believe". But let him rather say—at least it is what I would rather say to you—my belief is inexpressibly dear to my own soul: it is the one thing which arms me against temptation, and illumines my path, and makes life for me worth living. And as that is my intimate experience, is it not right and naturally inevitable that I should deeply and dearly desire it to be yours?

107. Marginal Notes. Cursive can be written in a small space much more clearly than longhand. The following is a facsimile (natural size) of a marginal note written with fine glass stylograph. The text is that of the discussion on shorthand systems in *The Bazaar**, 1882—83.



Fair Fiddlers.

"Starting from the premises that centuries of subordination have left the gentler sex too gentle to compete on equal terms with man, a musical casuist might possibly argue that woman, having played second fiddle from the Creation, can never make a first-class violinist. Such reasoning, at all events, would be quite as logical as much of that which has been put forward in opposition to violin teaching to girls; and although, of late, there has been something of a turn in the tide of ——"

The above specimen is written in the ordinary unabbreviated style; there would be no difficulty in writing it much more briefly and minutely if desired. The process by which the block was produced has perhaps hardly done justice to the original. Some of the outlines are a little spoilt; though not enough to render any of the words uncertain.

The student should not endeavour to write too briefly or minutely at the outset. To abbreviate clearly requires considerable experience. He should be content, for some time, to practise a full and unabbreviated style, dividing nearly all the words. From the first he should use all the special outlines for common words contained in the list on the next page, but should at first confine himself strictly to that list, writing all other words in full. In his early practice of phraseography he should observe the rules of vowel indication very carefully. As he progresses and acquires greater facility and precision in the application of the rules, he may gradually adopt all the abbreviations and phrases contained in the illustrations and exercises, and may proceed to form others on analogous principles; but it is essential that he should be able to write any word correctly *in full* without hesitation, before he attempts to make abbreviations for himself.

* A book of selections from this controversy, with illustrative cuts, edited by T. Anderson, under the title of *Shorthand Systems*, is published by L. Upcott Gill, 170, Strand, W.C.

108. Alphabetic List of Common Words. The following outlines illustrate chiefly the indication of vowels in common words, §§ 65, 73. The sounds omitted in each word are italicized. The beginner should pay special attention to the ten words marked with an asterisk (*), because their forms, though easily remembered, are more or less arbitrary, and may otherwise give him trouble in reading, the first time he meets them.

The Alphabetic Words are not included in this list.

The numbers after each word refer to the sections explaining the points which it illustrates.

 about 65. 70

 above 70. 73

 according 65

 after 65. 81

 again 65. 70

 against 65. 70

 among 70. 87

 amount 65. 87

 anger 79. 89

 arrange 65. 70

 because 65

 been 48. 65

 before

 behind 65. 75

 between* 65

 body 73

 but 73

 call 65

 can't 65

 cause 65

 change 65. 84

 charge 65

 child 65. 86

 combine 65

 come 73. 87

 could* 73. 81

 did 48. 73

 does 48. 73

 done 48. 73

 each* 84

 enough 73

 every 70. 100

 except 73. 81

 find 65

 form 64. 77 (1)

 general 73

 gentleman 100

 glory 86. 100

 gone 73

 great 54. 65

 half 55. 65

 his* 48. 55

 high 55. 61

 however 102

 indeed 65. 70

 ink 70. 89

 ink'd 70. 89

 join 77 (1)

 judge 73

 jury 65. 86

 just 73

 kind 65

 lady 65

 land 73

 late 65

 laughter 65

 length 73. 89

 long 73. 89

 lord 65

 maintain

 man 73. 87

 manner 73. 88

 many 48. 73

 mind 65

 month 49. 73

 moreover 100

 move 65

 much* 73. 84

 name 65

 native 65

 nature 65. 84

 neither 81

 never 73

 none 73. 88

 not 73

 nothing 73

 other 73

 people 65

 perfect 54. 65

 purpose 65

 *pleasure** 84

 proof 65

 put 73

 quite 81

 rather 100

 read 77 (1)

 right 81

 shall 55. 73

 shan't 55. 65

 she* 55

 short 65

 should 55. 73

 same 65

 somewhat 73

 sometimes 100

 something 87

 spirit 73. 86

 stage 65

 state 65

 still 73

 such* 73. 84

 than 73. 79

 then 73

 thanking 89

 that 73

 themselves 48

 these 65. 83

 this 73. 83

 thing 73. 89

 thought 48. 65

 till 73

 was 56

 went 56

 whence 56

 whether 56

 whosoever

 wilt 48. 86

 without* 81

 would* 56. 81

 young 57. 73

 your 57. 62

PROGRESSIVE WRITING EXERCISES.

The Outlines of words printed in italics are to be found in the previous pages. The numbers refer to the sections.

I. Alphabetic Words in Alphabetic Order (see § 48).

A, air, an, and, are, as, at, Ay, be, circumstance, do, first, for, from, give, had, hand, has, hath, have, him, his, how, I, in, into, is, joy, key, loo, me, no, of, one, or, owe, pea, self, selves, such, the, them, think, to, very, way, we, which, who, will, with, year, you.

II. Joined Characters; Long Vowels and Consonants (§ 54).

Sharp Angle Joinings:—eɔ, irk, sir, spur, search, urge. oɔ, pore, bore, lore, more, sore, pork. aɔ, ark, arch, pa, mar, bar, lark, Sark. ow, *out* 81, (h)ouse. aw, oak, own, owing, low, so, soak, mow. ey, ache (*k*), age, aitch. oy, boy, loin, point.

Angles sharpened:—ow, bough, sow, mouth. aw, oath, ode, oat, Po, beau. ey, ape, ace, *day* 54, say. oɔ, core, gore, corn, gaunt, gorse, course. aɔ, car, gar, aunt. (See also Exercise VIII.)

Angles slurred:—eɔ, learn, *earth* 81, earn, stir. oɔ, *order* 54, *ought* 81. aɔ, art. ow, owl, down, loud, *now* 88. aw, *toe* 54, dough, *know* 88. ey, *nay* 88, ail, lay, ray, may, main. oy, oil.

Continuous Joinings:—eɔ, *cur* 54, *girl* 97, earl. oɔ, all, *nor* 88, tore, door, roar. aɔ, tar. ow, *cow* 54, gown, row. aw, *coat* 54, go, old, goal. ey, *pay*, *bay*, *eight*, *aid* 54, paid, bade, kay, gay, gate. oy, toy.

Circle Joinings:—eɔ, fur. oɔ, *fore* 54, four, jaw. aɔ, far, jar. ow, found, thou, vow. aw, foe, Jo, though. ey, fay, jay, *they* 54.

III. Initial H, SH, W, Y, before Long Vowels (§§ 55—57).

eɔ, *hurt*, heard, herself; *shirt*, shirk, sherd; *word*, work, worst; *year*, yearn.

oɔ, *hoar*, hall, horn, horse; *shore*, shawl, shorn; *walk*, wall, worn; *yawn*, yawl.

aɔ, *hark*, heart, hard; *shark; yard*, yarn.

ow, *hound* 98; shout.

aw, *hoe*, hone, host; *show*, shown, shoal; *woe*, woke; yoke.

ey, *hay*, halo, haste; *shay*, shake, shape; wake, waste.

IV. Long Vowels having Alternative Characters (§§ 60—63).

aɔ, ⟍, *share* 55, *yare* 57, *ne'er*, *pair*, *lair* 60, *stare* 72, bear, tear, dare, *care* 54, their, there, *chair* 54, rare.

◟, *spare, mare, fair* 60, sair, *hair, hare* 55.

ay, ◟, *shy* 55, *sty* 71, *rely, deny, like, dine, by, ice, eyes, eyeing* 61, shine, wise, wind, pie, tie, die, guy, thy, thigh, lie, nigh, rye.

◝, *sign, my, fie, Hine* 61, *exercise* 82, *assizes* 83, vie, mine, sigh, size, vice, mice, spies, spice.

◝, *type, ripe, I've* 61, while, wife, wipe, rile, life, isle.

◝, *high* 55, *mile* 61, hive, hypo-, cypher, file, viper.

uw, ◞, *soon* 54, *soup, cool, through* 62, *woo* 56, *shoot* 55, shoe, pooh, too, coo, coot, jute, rue, root, moot, coop.

yuw 58, *beauty, pew, hue, sue* 58, *dupe, few, utility* 62, suit, hew, *youth, yule, use* 57, *new, mew* 88, cue, lieu, due, stew.

◟, *Euchre, ooze, huge* 62, duke, -fuge, -buke, puke, fugue.

iy, ◝, *deep* 54, *weave* 56, *keep, chief* 62, eve, sheep, heap, weep, tea, sea, fee, lea, leap, cheap.

◡, *seat, seen, ceased* 62, *yeast* 57, weed, eat, east, heath, feed, seen, lean, meat.

◡, *ease, seeing, week* 62, seize, eke, siege, seek, leech, meek, league, liege, leak.

uɔ=oo, ◜, *your* 62, poor, sure, door, floor;

(y mode) pure, cure, lure, mure.

iɔ=yeɔ, *fear* 62, *mere, near* 88, peer, pier, beer, tear, dear, gear, fear, veer, cheer, jeer, leer, rear, real, idea, cohere.

iyɔ, *queer* 58, *weird* 56, seer, panacea, Dea, Lear, career.

uwɔ, *ewer* 62, hewer, sewer, shoer, wooer, fewer, newer.

owɔ, *our* 62, (h)our, power, bower, tower, dower, cower, shower, sour, lour, vower.

ayɔ, higher, hire.

SHORT VOWELS.

V. Initial Short Vowels (§ 69).

Er-Tick:—*ahead, ahoy, ashore, ashame* 55; odd, *occasion* 48, occur, *on, us* 69, *unto, undo* 104; *was* 69, *wash, wood, wool, won* 56, want; hollow, *hut* 56, hutch, hunt, hung, hug, hull, hush; *shut* 56, shun, shock; *yacht* 57, yon.

Upward E-Tick:—add, *adhere* 58, ado, *ash* 83, ass, atone, atune; essay, *issue* 84, *in* 48, *it* 69; hat, *head, hen* 55, hang 89; shadow, *shed, shin* 55; *wet, win* 56, wind, *wing* 83, *wish* 84, *wisp* 83, west; *yap, yell* 57, yellow, *yes, yet* 57, *yester* 73.

DOWNWARD E-TICK:—*about*, *above* 108, abode, account, affair, afore, ago, *appear* 69, appoint, averse, avow, avoid, ally, alike, along, alloy, aver; ebb, echo, edge, *egg*, *ell* 69, etch, *Ezra* 69; hack, *hallow* 96, hatch, hedge, heifer, *hell* 55; *if* 69; shallow, *shell* 55, ship; web, wedge, *well* 56, whip, whiz, wick, wig, witch.

VI. FINAL SHORT VOWELS (§ 70).

ER-TICK:—*utter* 69, under, shutter, metre, water, waiter, voter, theatre (ϑyeoto), odour, Sparta, parlour, purser, whisper, labour, mica, *contra* 48, *wisher* 72, weaver, ever, author, savour, sofa, *measure*, *Russia* 84.

UPWARD Y:—*happy* 69, *Effie*, *duckie*, *buggy*, *icy* 70, racy, juicy, *fancy* 83, mercy, saucy, hussy; army, *enemy* 88; abbey, shabby, heavy, ivy; shaky, hockey, turkey; alley, holy, woolly.

DOWNWARD Y:—*forty* 70, *city* 71, pity, heady, gouty, hasty, hearty, party, shady, witty, woody, weighty, ready, eddy, (ha)ndy, *empty* 87; *ashy*, *touchy* 70, washy, marshy, fishy; worthy, earthy, clergy, orgie.

VII. MEDIAL ACCENTED SHORT VOWELS (§ 73).

O, A, U:—pot, pod, bud, pug, *book* 82, *buggy* 70, butcher, budge; totter, *took* 82, touch, toss, tush, ton, tun, *tongue* 89, duck, dog, dutch, dodge, dull, dun, dong; cut, cud, cog, cock, *cusp* 82, *cull* 86, gut, gush, *gull* 86, gun; fuss, foot, fudge, fun, full; *thus* 73, *thong* 89, thorough, Thug; just (adj.), *sot* 72, sud, *suck* 82, sully, sun, *sung* 89; lot, *luck* 82, lug, loss, lodge, *lung* 89; ruck, rut, rug, rust, run, *rung* 89; mutter, mother, mothy, muck, mug, must, mull, *among* 69; knot, knock, notch, knoll, nun; stuck, stung.

UPWARD E:—*After* **p**, **b**, **y**; *pap* 80, bab, *yap* 57, bevy, pet, *bet* 73, bed, peck, beg, peg, pithy, pitchy, pill, bell, *yell* 57, perry, berry, yarrow, pen, ben, *bang* 89, pest, best, bent, bend.

Before **t**, **d**, **ϰ**, **ɥ**, **s**, **n**; debt, dead, death, cat, cad, *kiss* 82, kist, ken, *cash* 84, *get* 70, giddy, gan, gas, gash, *fat* 72, fed, *fen* 83, vesta, vent, let, led, less, lend, rat, red, rest, rent, *net* 73, Ned, nest, set, said, saith, says, centre, send.

Other cases; fact, fag, fetch, fell, villa, fish, ferry, fang; lack, lag, latch, lily, lash, ling; *sack* 82, sedgy, sell, *sing* 89; *rack* 81, rag, ridge, rally, rash, *ring* 89; knack, nag, niche, knell, gnash.

DOWNWARD E:—*Before* **p**, **b**, **f**, **v**; *tap* 80, tabby, deaf, *cap* 80, cabby, gap, fib, chap, jabber, *sap* 73, sieve, ship, *lap*, *rap*, *map* 80, nap.

Other cases; kick 73, keg, *kill* 73, gill, carry, catch; tick, tag, *tell* 73, dell, ditch, dig, *attack* 73, Dick, tarry, stitch, stick, *text* 71; *thick* 73, thatch, thill, Jack, Jill, check, *chill* 73, cherry, attach, attack, stick.

CONSONANTS.

VIII. HOOK BEFORE P, B, F, V (§ 80):—*hop'd, over* 80, *opened* 73, arbour, harpy, harpist, sharp, sharper; *upon, off, offence, oven* 69, *offer* 70, obey, obtain, obtuse, office, *opportunity* 78, oppóse, oppréss, hobby, hop, shop, *shove* 80; *tub, cup* 80, cuff, pup, top, fop, chop, rub, dove, cover, duffer, rough, knob; *sup, muff, love* 80, suffer, sub, mop, mob, luff, lob, lop.

SP:—*lispt, suspicion* 80, *wisp* 83, *cusp* 82, asp, wasp, hasp, spat, speck, spell, spend, spark, spirt, spear, sphere, spoke.

IX. SECOND CHARACTER FOR T, D, H, H (§ 81).

COMPOUNDS PT, KT:—apt, oft, depth, fifth, after, optic, hop'd, adapt, adopt; act, fact, active, rack'd, doctor, attack'd, lock'd, aspect; left, safety, naphtha.

AFTER AY, AD:—*either, white, I'd, height, hide* 61, *kite, fight, mighty, sight, quite, bite, guide, provide, tied, night, light, pride, defied, neither* 81, *slight* 86, writer, spider, decide, divide, wide, tight, chide, writing, title, tidy, Fido, abide, tithe, writhe.

air'd 61, dared, cared, laird, shared, spared, fared.

TERMINATIONS:—*writeth, acted, invited* 81, *singeth* 89, cautioned, occasioned 85, *hardihood* 81, priesthood, sisterhood, widowhood; *forward, wayward* 81, homeward, *towards* 75.

X. SK, EX, KON (§ 82):—*skit*, skin, husky, whiskey; sceptic, skill, skip, sketch; *Esk*, escape, *sky*, scout, scope, skew, rescue, scholar, Scot: ask, askt, cask, mask, mask'd, desk, dusk, husk, tusk, musk, mosque, eschew, squaw, skied.

Expect, extant, extent, exercise 82, *exemption, exertion* 85, excite, exalt, excess, excise, excuse, exert, expend, expert, *exposure* 84, expression, extension; wax, axe, access, accept, accent, *books* 83, tusks, masks, next, fixt, sixth, vexed, mixed.

Constant, concur, condition, consider, confer, connect 82, *concussion, concision* 85, *contra, consistent* 48, *inconstant* 89, reconcile, concern, converse, conspire, continue, convey.

XI. DISTINCTION BETWEEN S AND Z (§ 83):—*seal, zeal; this, these; precious, pressures* 83; *thus* 73, *others* 108; *ice, eyes* 61; price, prize; dice, dies; mace, maze; villous, villas.

Wizard, stanzas, frenzy 83, buzz, nozzle, puzzle, hazard, hazy, mazy, Lizzie. Cp. *Easy*, busy, daisy, noisy.

INFLECTIONS:—HOOK; *apes*, *adds*, *acts*, *wings* 83, sings, its, things, orbs, sides, sights, loads, aids, shades, hopes, gifts, sobs, adopts, lungs, songs, meetings, weights, facts.

CIRCLE; *lives*, *ashes*, *ages*, *actions*, *hurries*, *circumstances*, *themselves*, *thinks*, *thanks* 83, ourselves, yourselves, sphinx, lynx, occasions, stations, wishes, riches, injuries.

CHARACTER; *books*, *lists*, *eggs*, *hands*, *ells*, *assizes*, *stems*, *wisps* 83, prints, friends, looks, mists, bugs, dogs, tells, wells, sizes, exercises, prizes, ends, comes, lists, mems.

COMPOUNDS NS, NZ; *fens*, *fence*, *fenced*, *fancy*, *funny*, *fancies*, *fancied*, *finésse*, *happinesses* 83, finéssed, finest, fewness, fatness, fineness, finis, fines, fauna, fenny, funny, fences.

ZD; *supposed*, *analyzed* 83, pleased, used, sized, dazed.

XII. C, J (§ 84). CHARACTER *ɕ*; cash, casher, *cashier*, gash, bookish, *sheer*, Neish, *riche*.

CHARACTER *ʃ*; (French words) *rouge*, *joie*, *jeûne* 90, Je, J'ai, J'irai, bijou.

BACK-CIRCLE. Ash, hash, wish, wisher, fisher, *masher*, rasher, *pressure*, fresher, *pish*, uppish, sheepish, fishy, *lash*, relish, apish, abash, militia.

Precious 83, *vicious*, pernicious, ambitious; leash, specie, species, specious, *sufficient* 85, efficient, physician.

Dish, wettish, judicious, seditious, politician, commercial, *Persian* 85, tertian, luscious, *spacious*, gracious, capacious, cretaceous, Croatian, ocean; Asia, *minutiae* 76, Scotia, *harsher*, cautious, martial, social, judicial, official, special, nasturtium.

Hush, *wash* 56, washy, blush, bushy, *push*, *Russia*, usher, washer.

Wished, *astonished*, finished, varnished, relished, dished; *Welsh*; *financial*, essential, potential, sententious, penitentiary; *ancient* 84, *censure* 54.

Ship, *worship*, heirship, fellowship, scholarship, ladyship, *kinship*, sonship, membership, partnership.

ntc. Inch, hunch, haunch, *pinch*, punch, lunch, wrench, quench, tench, branch, bunchy, *bencher*, venture, century.

ndj. *Hinged*, *angel*, lounge, spongy, stingy, dingy, *engine*, dungeon, avenger, *orange*, *arrange*, *range* 69, stranger, *danger* 89, *changes* 84, injure.

ejə. *Azure*, *measure*, leisure, pleasure, treasure, embrasure (y-mode in derivatives, such as *glazier*, *brazier*, *hosier*, *seizure*, *exposure* etc.).

XIII. Terminations con, jon (§ 85). *Station, collation* 85, *indication* 48, *creation* 75, relation, nation, oration, citation, vacation; *emotion*, devotion, potion; *exertion*, version, assertion, emersion; *caution*, portion, torsion; *depletion*, (com)pletion, *lesion; solution*, revolution, constitution; *collusion*, illusion, fusion; *occasion*, invasion, persuasion, abrasion; corrosion, explosion.

Concussion, concession, mission, passion, fashion, position, *coalition*, volition; *pet(i)tion, cond(i)tion* 82, add(i)tion, sed(i)tion: *concision, collision, vision*, derision, division, decision.

Exc(e)ption, conc(e)ption, descr(i)ption; *question*, suggestion, (com)bustion; *emulsion*, revulsion, expulsion; *exemption*, ass(u)mption, redemption; *t(e)nsion*, att(e)ntion, dist(e)nsion, ext(e)nsion, pension, mention; *action*, auction, faction, -j(c)ction, d(i)ction, concoction, suction; *dist(i)nction*, ext(i)nction, sanction, *function*, junction. (See Ex. XIX.)

XIV. l and r. Forward $\int$ r:—*try* 71, *cry, pry, actress, Henry, shrine* 86, bray, dray, fray, gray, stray, spray, scrape, screw, shrew, entry, already, cavalry, enrich, enrage.

P'raps, sep'rate 86, *operate* 65, *different, emp'ror* 86, corp'ral, fav'rite, *neighb'ring* p. 91, *temp'rature* 84, av'rage, ev'ry, corréct, gen'rous, dext'rous, wondrous, wondring, fact'ry.

Backward $\int$ r:—*airy, weary* 86, *Tory* 71, gory, starry, hero, era; vary, Mary; dreary, furore; Sarah, Laura, Dora, Aurora; zero (yeo), Nero; Cairo, Irish, spiral, desirous, desireth, admirer.

curry, morrow 86, *Surrey* 70, hurry, worry, *perry* 86, merry, yarrow, arrows, error, horror, orator, origin, *orange* 69; thorough, Harry, hurrah; *historic, Paris* 72, parish; *injury* 72, fishery, missionary.

history 71, votary, *parliamentary* 87, *aspirate* 86, *spirit* 108, emery, *misery* p. 101, necessary, surround, resurrect, nursery, celery, butchery, plethora, marine; contrary, temp(o)rary.

arrange 69, array, arrear, *around* p. 91, arrive, aright, arose, arrest, arouse, awry, oration.

Forward $\int$ l:—*plate, slight* 86, slay, slow, splay, splice, blow, blur, flay, *flow* 71, lovely, wifely, comely, assembly.

Backward $\int$ l:—Compounds kl, gl; *clay, glad* 86, clear, cloud, glow, glory, close, glare.

Amply, ampler, coupling 91, simply, singly, ugly, affably, fully, early, surly, really, mentally, verbally, graphically, finally, formally, holy, belly, coolie, woolly.

CROSS-TICK -LY:—*idly, gent(leman)ly, prettily, only, verily, utterly, kingly* 91, *longingly* 89, happily, bitterly, beggarly, fairly, fairily, freely, merely, surely, lawlessly, piteously 75, neatly 77(1), outwardly 81, oddly, deadly, kindly, lately 108, gaily, duly, solely, firstly, coolly, wholly, formerly.

HALF-SIZE L; *wealth, self, help, pelt, old, milk, silt, realm* 86, healthy, shelf, bulb, felt, held, told, silk, elm, illume, sailed, furled, world, field, yield, seal'd, mild, cult, fault, salt, elbow.

XV. M, N (§§ 87, 88). CHARACTER / M:—*me* 48, may, *my* 61, make, *mew* 88, *more* 108, *mere* 88, murmur, *mare* 60, *mile* 61, moke, maul: *smoke* 87, *small* 72, *Psalm, time, came, germ* 87, *home, seem, assume* 64, tomb, doom, *ream* 77 (1), dream, foam, palm, calm, storm.

AFTER SHORT VOWELS DISTINGUISHED BY MODE, § 77(3);—*swim, swam, swum, sham, Shem, Ham* 77, hem, hymn, *mummery, Tam, Pym* 87, Pam, hum, humble, hemper, hamper, thumb, *numb* 88, cam (cp. come), Sam, sum (cp. some), comma (cp. comer), lamb, dam, jam, gem, gum, crumb, cram, cream 77(1), slam, slim, ram, rim, rum, glum, glim, gloom, bomb.

CHARACTER / EM:—am, *among* 69, *amid* 87, amiss, amuse, ammonia 75, *amount* 108, amend, *ample* 91, amble, ambition; emery, emerge, emetic, eminent, *emotion* 85, *empty* 87, embrace, embody, employ, emperor; ember, *emphatic* 80, imagine, immerse, immortal, immure, imbue, impend, impatient, implant, *important* 80, imply, imprint, nymph, lymph.

Poem, I am, suum, meum 64, deum, Hyam, geometric, diamond, triumph, Siam, diem, museum, vehement.

Memory, some 87, -gram, *camp, camp'd* 80, drachm, *come* 87, combat, committee, compact, compound, nominal.

COMPOUNDS MT, MD:—*empty* 87, exempt, tempt, warmth, *something, sometimes* 108; *seem'd, dimm'd* 87, limb'd, deem'd, assumed, timed, form'd 77.

Sentiment, momentous, implements, argumentative, parliamentary, amusement 87, elementary, augment, experimental, instrumentality. (In words, such as *augmént, laménт, cemént*, in which the termination *-mént* is accented, it should be written in full.)

MN:—*m(a)n* 87 (cp. men), *m(a)nner, m(a)my* 108, *human, woman, women, German* 87, sermon, *Shyman* 77(3), yeoman, footman, chairman, madman, seaman, common, comment, lemon, salmon, demon, ermine.

omniscient 88, omnivorous, omnibus, *chimney* 88, gymnasium, calumny, indemnity, amnesty, condemnation.

TERMINATIONS NY, NER:—journey, attorney, cony, pony, tiny, horny, downy, puny, stony, shiny; *any* 70, penny, fenny, whinny; honey, *funny* 83, money; Germany, harmony, colony, agony; guinea.

Minor, China, *honour* 88, donna, *inner* 88, dinner, sinner, Hannah, Lena, lamina.

The combinations  AWN,  MAW, must be distinguished from the characters  em,  ny, respectively. The angle in the combination  NAW, may be straightened out in practice; thus,  , in the words *know*, *knows*, *known*, *knowing*, *noble*, *note*, *notice*, etc.

XVI. ING (§ 89). CHARACTER AQ:—*sowing*, *saying*, *dying*, *sawing*, going, knowing, drawing, pawing, *seeing* 62, sighing, maying;

tongue, *sung*, *bung*, *lung*, *rung*, *thong*, among, gong, dong, stung, Hong-Kong, clung, flung.

CHARACTER  AQ:—*sang*, *bang*, *rang*, *gingham*, wing, *th(i)ng*, *d(i)ng*, *king*, fang, t(i)ng, fling, cling, *sting*, harangue, meringue; *sizing*, losing, parsing, *shilling*, *hunting*, *supping*, *watching*, *washing*, *living*, edging, *halting*, *waiting;* hoping, keeping, sobbing, loving, offing, holding, pushing; *vowing*, suing, hewing, *toying; coupling* 91, ailing, darling; aiming, coming, seeming, foaming (or cross-stroke after **m** if clearer).

CHARACTER  IQ:—*ending*, *hurting*, *herring*, *resting*, *singeing*, *hooping* 89, *thanking* 108, reading, sitting, meeting, st(a)nding, stooping, cooping; fishing, wishing, changing; cursing, nursing, racing, loosing (or cross-stroke after **s** if clearer).

CROSS-STROKE:—*being*, *doings*, *thinking*, *having*, *giving*, enjoying, *innings*, handing; *hurrying*, *pitying*, *longingly*, *riding*, *writing*, *cursing*, blessing, using, opening, *aiming*, carrying, whinnying, inviting, lightening, adapting, acting, mentioning; *suffering*, *airing*, hearing, soaring, *during*, wearing, daring, glaring, measuring, wondering, neighbouring, *uttering*, hiring, showering, scouring; fancying, fencing.

CHARACTER  IQO; COMPOUNDS QK, QG, QT, QD, QH:—ink, shrink, wink, sink, zinc, *inker*, anchor, hanker, conquer, *England*, *language*, anguish, unguent, *angry*, hungry, *longer*, ingot, *wrinkle*, ankle, uncle, inkling, tinkle, angle, dangled; *ink'd* 108, distinct, instinct, link'd, defunct, adjunct, unctuous, thank'd, rank'd; banged, wrong'd, *wing'd*, long'd, *length* 108, strengthen.

XVII. Unaccented Short Vowels Indicated, but not Written:—

Shórtened 71, ópened 73, fórtune 84, spácious 84, fallácious, lúscious, Pérsian 85, Asian, górgeous (cp. gorges 83), húman 87, climate, árdent, mérchant, éarnest, círcuit, aúdit, úrgent, cértain, pérfect, caútious (c), púrchase.

Debáte 54, defér 70, reláte, dictáte, remóte, retúrn, devóte, belief, exért, extént 82, expóse, expórt, exc(é)pt 108, expénd, exhórt, divide, polite, delight, decide, denied, marine, revérse, relúme 86, renéw, salúte, surróund, caréer, bestów, devóur, despáir, deláy, declare, supplý, minúte (cp. mínute), papá, regárd, repórt; arráy, aroúnd, oppóse, entice, indúce.

Attic 73, étiquette 73, ábbot 73, ádept (cp. adápt), sénate (cp. sent), sábbath, wómen (wim) 87, shílling 89, chállenge, órange 69, érrand, hátchet 78, préntice 78, justice, hóstess, rigid 78, lócket (cp. lock'd), óven 69, péllet 86, cómet (cp. commit), mérit, mágic, gr(á)phic 54, tippet (cp. tipp'd), rápid (cp. wrapt), rábbit, rábid, óffice, préface, límit, thícket, cúrrent, déafen, wéapon, háppen.

Depénd 73, defénd, detách, finésse 73, Thibét 73, becóme, begín, canál (cp. cánnel), reláx (cp. rélics), requést, defect, corrúpt, entráp, intend, intrúst (cp. interest), indént, suggést.

D(é)cimal 71, ánimal 88, hónesty, ápathy, áttitude, áppetite, édify, cértify, excellent, militant, cómpany, cómbatant, affable, móveable (move 108), végetable, týpical, árticle, lógical, métrical, statistical, political, metropólitan, penetrability, stability, solidity, accómmodate 65, ágitate 65, íntimate 87, últimate, conjugate, rélative, ádjective, árguméntative 87, orthógraphy, stenógrapher, pátrimony, cústomary, military, history 71, mémory 87, aspirate 86, náturalist (*natcr-l-st*), ignorant, guárantée, cápital, éthical, áccuracy, bénefit, féathery, éxpeditious.

Yésterday 73, únderstand, ádvertise, permit 73, éxercise 82, interdict, appertain, próperty 73, liberty, póverty, shépherdess, Sáturday, módern, éastern, páttern, góvern; éffort 73, cómfort (come 87), forgét 104, forbíd, forbóre, pärticular 78, ópportúnity 78, reformátion, púrport, próverb, surprise, niggard.

XVIII. Unaccented Short Vowels Inserted to Facilitate Joinings:—

Before and after the S-tick:—acid, assets, asses 72, fancies 83, happinesses 83, Alice, person 72, présent 77 (3), subsidy 83, consequent, p(ur)pose 108, possess, beside, gazétte, pursuit.

After Ery, Ndj:—engine, dungeon, injury; hemorrhage,

horizontal, character, historic, Paris, correspondent, origin, lyric, satiric, satirist, ferrous, oracle, courage, America.

BEFORE AND AFTER C AND CON:—parish, cherish, flourish, nourish, perish, apish, machine 84, vicious 84, precious 83, sufficient 85, passionate 85, missionary, questionist 85, factious 84, anxious 84, ancient 84, physician, species, treasury, proportionate, abolitionist.

AFTER ↄ) :—sceptic, peptic, practise, practical, lighten 81, whiten, afternoon 108.

XIX. E-TICK OMITTED IN CASES WHERE THE ACCENT NEED NOT BE MARKED (§ 73) (The words in brackets are written with the A-tick):—Ten (ton), tent, 'tis, test, ting, tend, den (dun), dent, *d(e)cimal*, *d(i)smal* 71, *d(i)ng* 89, dazzle, dizzy, sting, steady (study), *st(ea)d* 83, st(a)nzas 83, stand, stet, intend, indent, *t(e)nsion*, *int(e)ntion*, *dist(i)nction* 85, petition, *than*, *thank*, *that*, *then*, *this* (*thus*), *thing* 108 (thong 89), thin, thither, pathetic, *gent*, *general* 108, (John), Jenny (Johnnie), jet, chat, January, chance, gender, jest, suggest, Jack.

Miscellaneous; Scripture 84, except 108, exception 85, living 89 (loving 80), never 108, spirit 108, ninny (nonny), river, financial 84, p'raps, particular 78, description, February, Nancy, preface, graphic 54, prediction (cp. production), next.

XX. OMISSION OF LONG VOWELS (§ 65): Long vowels are omitted in the following common words, the outlines of which will be found in the list on p. 106: OW, about, amount, without; OO, because, cause, according, call, lord, short, thought; AO, after, half, laughter, can't, shan't, charge; EO, purpose, perfect; IY, been, between, indeed, people; AY, behind, bind, find, kind, mind, child, combine, scribe; UW, Jury, proof, prove, approve, move, remove, super-.

The vowels AO, AW, OY, are always expressed.

Omission of EY:—again, against, arrange, range, strange, change, danger, great, lady, late, nature, same, stage, state.

Termination -ate:—dedicate, indicate, *accommodate* 65, liquidate, mitigate, assimilate, decimate, *fascinate* 65, terminate, *operate* 65, execrate, tolerate, *agitate* 65, meditate, cogitate, reinstate, sulphate (cp. sulphite 81), irate, commemorate, indicator, navigator, testatrix. (Note; This termination is generally short in adjectives and substantives.)

EY should also be omitted in the termination *-ization*, as in nationalization, crystallization, etc., the outlines being formed by simply turning the *-tion* circle on the final *z* of nationalize, crystallize. The vowel should be inserted after C, KT, PT, and

in dissyllables when accented: as in, *appreciate* 78, vitiate, negociate, associáte (omit y after c in these words), narráte, dictáte, co-optáte.

XXI. Short Vowels are omitted (§ 73) in the following common words; the outlines will be found on pp. 106, 107; the words in brackets are distinguished by the insertion of their vowels.

Above, another, body, but (bet), come (cam), become, did (dead), does, done (dun), enough, except accept, gone (gun), judge, just, land (lend), length, long (ling), man (men), manner (manna), many (Minnie), month, none (nun), not (net), nothing, other, put (pot), shall (shell), should (shod), some (sam), still, till tell, until, young, when (pen pun).

MODE OF HIATUS.

XXII. Before a Vowel:—

Mode (1) W (§§ 58, 75); *qua, queer, equal, where, whey* 58, *quite* 81, *quinquangular* 89, quote, equation, equip, quick, quality, quart, square, squirt, vanquish, relinquish, distinguish, anguish, *language* 89, unguent; Gwen, Guadafui, guano, Guatemala, Puebla, Buenos, bivouac; *acquiesce* 58, requiem, aqueous, obsequious; twirl, twist, twin, twain, twice, dwell, dwarf, thwack; *sweet* 76, swallow, sway, swear, swore, swung, swan, persuade; away, aware, await, bewail, beware, noway, nowhere, nowise, midway, highway, *half*way 108, *Conway* 76, *length*ways 108, always, *other*wise 108, *wayward, forward* 81, *towards* 75, inward, outward; Darwin, Spurway, *herewith* 81.

Terminations -ual, etc. (*U unaccented, character ⌣ omitted*);—*usual, continuation, vacuum, valuable* 75, Mantua, Mantuan, annual, manual, virtual, actuate, actuary, J(a)nuary, unctuous, virtuous, conspicuous, spirituous, influence, valuation, situation, residuum, menstruum.

Mode (2), before H; *mishap* 76, priesthood, *behind* 75, rehearse, *adhere* 58, *shorthand* 71, *longhand* 89, *withhold* 81, *mädchen* 90, inhale, unhealthy.

Mode (3), Y; abuse, acute, argue, due, adieu, duty, *issue, virtue* 84, *minutiae* 76: *creation* 75, foliation, mediation, permeation, conciliation, appreciate; *sheer, cashier* 84, *sincere* 76, idea, cohere, Jehu, Mayhew; Appii, embryo, Romeo, Antonio, signor, *poignant* 76, Naenia, Mercutio, folio, studio, nuncio, ratio, meow, piano (pyeonow).

Terminations; future 84, departure, overture, stature, furniture, *temperature* 84, culture, posture, texture, mixture,

gesture, *picture* 84, lecture, structure, *procedure*, *hosier*, *exposure* 84, composure, seizure: *India* 75, mania, hernia, saviour, warrior, easier, copier, pannier; obvious, piteous, odious, impious; *sodium* 75, premium, idiom, opium; *christian* p. 91, lenient; idiot, immediate, Juliet; lineal, cordial, spaniel, nausea, carrier, collier, happiest, easiest, atheist, medieval, polyanthus.

XXIII. Hiatus between Two Consonants, § 77 (1):—

Mode (1) is used for terminations and abbreviated words (§ 100).

Mode (2), Absence of Vowels; Ezra 69, Elsie 71, tipsy, Betsy, wisps, stems, comes 83; snare 71, snore, small 71, smoke 87, realm 86, dismal 71; anxious 84, noxious, nuptial (-cəl), factious 84, anxiety 83, igneous, recognize 91, dogmatic, alma, pigmy.

Compound Words; fit-ful 71, sight-less, sad-ness, king-dom 89, wis-dom 83; hand-maid 71, short-hand 71, long-hand 89, first-class 71, up-shot 84, off-shoot 84, text-book 71, out-do 71, sing-song 89, night-shirt, bank-rupt; ab-scissa, dis-content, in-stead 83, in-constant 89, in-crease 89, un-kind 89, sub-sidy 83, Wednes-day 83, ab-sent, vice-roy, fine-ness.

Mode (3), Unaccented U (yw); popŭlate 77, speculate, accumŭlate, calculate, rivŭlet, popŭlar, particŭlar, angŭlar, emŭlous, amputate 77, occupy 77, sextuple, voluble 77, luxury 91, augury, penury, argument 87, education, consecutive, educate, tabulate, accurate, suppurate, supreme, superior, soluble, picturesque, usury, bureau, impudent, statute, diminutive, manufactury, vólume (cp. vellum), furore.

XXIV. Short Vowels following Long Vowels, § 77 (2).

Unaccented Short Vowels:—Ω-Mode; *scion*, science, ion, iron, *acquired*, quiet, fired, riot, proprietor, pious, pioneer, diary; violate, violin, violent, hyaline, denial, pliant, renewal, brewery, theory, aerate, dial, dual, royal, coward, nowadays, Lewis, Joachim, æon, pæan, European, Zion.

Y-Mode; *society*, piety, anxiety, variety, proprietor, gaiety; deity, vehicle, vehement; coexist, heroic, heroine, poesy, poetry; annúity, continúity, gratúitous, suet, *ruin*, *vowel*, towel, fuel, jewel, Jewess, voyage, deify, neozoic, Owen, soloist, theist, highest, nihilist, knoweth, doeth, sayeth.

Final Short Vowels:—Downward Y; *showy*, shadowy, doughy, bowie, boughy, dewy, boyish, cowish, shrewish, yellowish.

Upward Y; clayey, wheyish, skyish, Jewish, rawish.

Ω; *sower*, boa, lower, Iowa; gayer, *sayer*, layer; *ire*, fire, desire, quire, Shire, Messiah, liar, lyre, esquire, Isaiah, Noah; *drawer*, sawer; *lawyer*, sawyer, bowyer.

ACCENTED SHORT VOWELS:—*Aeólic*, *aérial*, *zoótomy*, *biólogy*, *chaós*, poétic, tuition, duénna, diágonal, minuét, triénnial, priórity, theódolite, de-óxidize, fiásco, neógraphy.

HIATUS AFTER Ω VOWELS IMPLYING R. (N.B. Strictly speaking, in all these cases, the character ℘ ery should be written because the r is pronounced: its omission must be regarded merely as a convenient abbreviation, but is always to be recommended in the case of derivative words when the r is not sounded in the primitive.)

MODE (1), TERMINATIONS; *labourer*, *nearer*, *utterer* 91, hearer, sharer, scorer, poorer, sorer, murderer. (Also abbreviation for termination *-nce*, see below.)

MODE (2) (implying ro); *parent* 91, coherent, occurrent, different; electoral, scriptural, floral, choral, Europe (yoo); (character / s disjoined) dangerous 89, murderous, coniferous, onerous, odorous, venturous, rapturous, chorus, porous, sonorous, serous; (character / joined) serum, Sarum, forum, quorum, decorum; *utterance* 91 (full form), difference, interference, coherence, endurance, occurrence (abbreviation for termn. *-nce*, character / s, mode (1), see § 100); honorary, horary; considerable, sufferable, transferable, answerable, colourable, *honourable* 100, measurable, adorable, curable (the termn. *-able* is generally added by a dot; § 100). Similarly in derivatives of words ending in *-ire*, such as *desirous*, *desirable*, *desireth*, *desiring*, if the o is retained the r should not be written.

MODE (3) (implying ry); *series*, heiress, peeress, tutoress, murderess; *nearest*, fearest, queerest, florist, purist, purest, aorist; poureth, careth, heareth; purity, maturity, security; (character ɾ) bearish, boorish, currish, moorish, feverish, gibberish.

COMPOUNDS; herein, thereon, whereas, thereabouts, thereat, thereof (v), whereupon, whereunto, where'er.

BEFORE A VOWEL, Y-MODE:—laborious, glorious, gloria, curious, Laureate, historian; superior, inferior, exterior, serious, period, experience, criterion, imperial, material; various, variable, agrarian, area, Aryan, barium; seignorial, centurion.

XXV. HIATUS BETWEEN TWO CONSONANTS IN CASES WHERE A VOWEL IS NECESSARILY IMPLIED, § 77 (1):—

NIY; *knee*, neat, *knead*, *kneel*, needle, neophyte, niece, beneath, unique, nominee, magnesium.

RIY; *re*, *read*, *ream*, real, reason, re-assert, re-export, region, reaper; *three*, scree, free, freedom, freeze, degrees, agreed, breeze; *increase* 89, *appreciate* 78, creature, screecher, wreath, trio, Grecian, pre-arrange.

LUW; loom, *leeward*, *halleluia* 77, *relume* 86, illume, luminous, lose, loose; *flew*, flue, flume, fluor, fluid, fluent, -fluous, -fluity, -fluence; *blew*, blue, bluer, bluey, bluish, bluely, blueness, bloom, ablution; *clue* 86, -clude, -clusion; *glue* 86, glued, *gloom* 77.

ALPHABETIC WORDS; pea, P's, peas (2), peace (3), piece, peat, peep, pique, peak; B's, bees, beat, bead, beak, beef, beach, beast, bean, how-be-it; keys, keyhole, keystone, keyboard, keyed, gives, given, giver; joys, joyful, joyous, rejoiced, enjoyed, join, joint, joined; form, perform, reform, forward, forfeit, formality (the mode should not be used in *fore*, *forth*, *forge*, *ford*, *fort*, *fawn*); whose, whoever, whom, whosoe'er.

TWO LONG VOWELS IN SUCCESSION (§ 63):—*hiatus*, *oasis*, *throughout*, *coercion*, *Aeolian*, *Iota*, aorta, Phæacia, *howe'er soe'er* 108, we are, *you are*, *they are* 104, they all, *he ought* 106, hyena, inchoate, Croatian, theorbo, Iona, Iowa, coordinate, coheir, coeval, co-aid, Leo, de-odorize, Iago, noyau, payee, Noachian, tea-urn, Lehigh, Ohio, heigho, ha-ha, Yahoo.

XXVI. VOWEL DOTS. The following words should be dotted to distinguish them from those in brackets:—

W*a*nder o (wonder A), *a*nterior (interior), *a*pologue (epilogue), *a*liment (element), *i*mmigration (emigration), *i*rruption (eruption), pos*i*tion (possession), l*a*tter (letter), *a*ccept (except).

The following cases would, as a rule, be sufficiently distinguished by the context, but should be dotted in careful writing.

Shot (shut), hock (hook), itch (etch), will (testament, cp. well), whack (wick), wag (wig), bog (bug), tongs (tongues), dock (duck), don (dun), cock, cook, folly (fully), sot soot, lock (luck), rot (rut), knot (nut), pack pick, pig (peg), bill (bell), pin pan (pen), band (bend), kit (cat), fan (fen), vista (vesta), lad (led), lass (less), writ (rat), rad (red), wrist (rest), knit (net), sat sit (set), sinned (send), sang (sing), rig rag, rang (ring), tap tip, lap lip, rap rip, nap nip, tack tick, stack stick, taxed (text), chick (check), till (tell), than (then), wad (wood), laughed (if pronounced *laft*, cp. left).

The dots should never be omitted in rare words, and unfamiliar proper names.

XXVII. Initials (§ 94). Write out the alphabet of initials several times, distinguishing particularly U. and Z., C. and Q., M. and N.

A.R.A., B.A., M.A., D.D., D.C.L., F.R.S., F.G.S., F.R.A.S., F.Sh.S., H.R.H., T.R.H., U.S.A., H.I.M., Q.C., J.P., M.P., K.G., K.C.B., K.C.S.I., V.C., H.M.S., R.A., R.N., R.E., R.H.A., S.P.G., C.E.T.S., S.P.Q.R., S.P.C.K., N.W., S.E., E.C., W.C., Y.M.C.A., M.C.C.

J.W.L., G.V.H., S.A.H., F.B.R., D.A.H.A., W.V.W., W.R.B.R., T.G.R., St J.P.A., R.F.F.J., H.J.J., P.P.H., Ch. G.J., N.L.B., E.H.W., A.W.G., F.C.J., W.C.H., M.T.J., M.I.E., B.B.A., F.K.J., G.F.A., S.J.J., T.G.H., D.C.Ll., D.F.S., C.J.A., P.A.N., W.H.H.T.

XXVIII. Abbreviations. Abbreviate the following words as indicated by the italics.

Abbre*viate*, abs*olute*, ackno*wl*edge, admi*nistrat*or, admi*nistrat*rix, adv*antage*, advance, adv*ertisement*, altog*ether*, antago*nistic*, archiep*iscopal*, appro*priate*, Bankr*upt*cy, bapt*ism*, benig*nant*, benev*olent*, ben*éficent*, Capt*ain*, cath*olic*, cha*racter* (*-istic*), chr*istianity*, conside*ration*, const*itution*, construction, corresp*ondence*, coun*cil*, couns*el*, D*ifference*, d*ifficulty*, def*endant*, defence, dest*itution*, destruction, distingu*ish*, dis*charge*, dyn*amo*, Eccles*iastical*, enor*mous*, episc*opalian*, esq*uire*, estab*lish*, ev*idence*, examin*ation*, exec*utor*, exec*utrix*, expen*sive*, extraord*inary*, extrav*agant*, extingu*ish*, Fam*iliar*, femin*ine*, F*ebruary*, financ*ial*, G*eneral* (-ization), gen*eration*, gov*ernment*, I*gnorance*, imm*ediate*, impērtur*bable*, impract*icable*, impreg*nable*, incog*nito*, indefat*igable*, indig*nant*, indiv*idual*, ineffic*ient*, in*fluence*, in*fluential*, in*formation*, inst*itution*, instruction, intel*ligible*, Juris*prudence*, Know*l*edge, Langu*age*, learn*ĕd*, Ma*gazine*, mag*nificence*, manufac*ture*, mathe*matical*, micro*scope*, mem*ber*, mort*gage*, Natur*al* (tc), not*withstanding*, O*bject*, ob*jection*, observ*ation*, obstr*uction*, opin*ion*, opport*unity*, orig*inal*, Parl*iamentary*, part*icular*, peculiar, perh*aps*, perp*endicular*, philan*thropic*, phon*etic*, plenipot*entiary*, pl*aintiff*, pos*itive* (**poz**), poss*ible* (**pos**), pract*ical*, preserv*ation*, pr*incipal* (-le), prob*able*, pub*lication*, Q*uestion*, Recog*nize*, rel*igion*, relin*quish*, resig*nation*, rep*resent*, respe*ctive*, responsi*bility*, Satisf*actory*, self*evident*, sev*eral*, sig*nify*, sig*nificance*, sp*eak*, sp*eech*, str*ength*, sub*ject*, subj*ection*, subord*inate*, subst*itution*, substructure, suspe*ct*, Transcr*ibe*, Yest*erday*.

XXIX. Omission of Final Consonants after Long Vowels (see §§ 65, 100):—fa*il*, ava*il*, rai*l*way, roy*al*, loy*al*, soi*l*, oi*l*, sma*ll*, at-a*ll*, a*l*most, a*l*ways, a*l*so, dar*ling*, dea*l* (in phrases),

feel, fool, rule, smile, beguile, juvenile, volatile, fertile, puerile, fragile, mercantile (omit *l* generally in termination *-ile*); time, came, fame, James, terms, Psalm, home, at-*home*; north, south, forth, worth, both, further, father, rather, brother; vary, glory 107; scope, life, chief, belief, believe, relief, relieve, deceive, deceit, strive, contrive, derive, arrive, deprive, observe, preserve, reserve, deserve, gave; most, post, least; please, Jesus, mean, deed, succeed, recede, precede, proceed (AW), concede, exceed; large, church; guard, regard; point, appoint.

XXX. TERMINATIONS FUL, ABLE. Final l may be omitted in these terminations; as in, able, enable, unable, disable, table, stable, noble; affable, capable, conceivable, corruptible, forcible, moveable, peaceable, possible, practicable, probable, syllable, tolerable, visible; Beautiful, gleeful, joyful, merciful, sinful.

Unless the character b or f joins easily and clearly, the dot should be used, especially if the mode of hiatus would be required in any case; as in, account*able*, action*able*, admir*able*, agree*able*, censur*able*, claim*able*, combust*ible*, comfort*able*, habit*able*, honour*able*, laud*able*, leg*ible*, memor*able*, miser*able*, modifi*able*, observ*able*, obtain*able*, pay*able*, pitiable, profit*able*, punish*able*, question*able*, soci*able*, tame*able*, teach*able*, unspeak*able*, variable (mode 3), valu*able* (mode 1); aw*ful*, change*ful*, delight*ful*, hand*ful*, hope*ful*, mind*ful*, peace*ful*, power*ful*, spite*ful*, success*ful*, thank*ful*, thought*ful*, trust*ful*.

XXXI. SMALL CIRCLE, SUBSTANTIVAL TERMINATIONS. This should be restricted to compound terminations ending in *-ness*, which are common in Old English; such as, variableness, (mode 3), reasonableness, unanswerableness, nobleness, forgiveness, expressiveness, thankfulness, skilfulness, wilfulness, fancifulness, bashfulness, hopefulness, sinfulness, fretfulness, artfulness, joyfulness, thoughtfulness, manfulness, carefulness, righteousness (3), consciousness, bounteousness (3), riotousness, virtuousness (1), foolishness, boyishness, boorishness.

In abbreviating substantives ending in *-ty* such as *peculiarity*, *probability*, *legibility*, the *-ty* is written over.

The compound U st may be used in writing the unaccented termination *-sity;* as in, adversity, atrocity, audacity, capacity, curiosity, electricity, monstrosity, necessity, velocity.

XXXII. TERMINATION -NCE (§ 100).

Difference, advance, vengeance, affiance, clearance, appearance, utterance, perseverance, endurance, defence, acceptance, acquaintance, contrivance, observance, allowance, licence, science, conscience, evidence, pronounce, expense. Similarly, different (t), evident, ancient, sufficient, advanced (st), acquaintances (ses), infancy (sy), sufficiency, buoyancy, decency, fluency.

XXXIII. *A* AND *The* PHRASES. The articles *a* and *the* should generally be joined after prepositions, conjunctions and auxiliaries;

The is joined as an upward tick after:—above, across, all, among, and, are, as, be, been, before, between, by, can, does, during, even, for, has, have, if, in, is (ƨy), on, o'er (ooy), shall, since, than, till, up, upon, was (ʌsy), when, within.

The is joined as a downward tick after the words:—about, after, against, at, behind, beneath, beyond, but, called, could, except, from, had, hath, how, into, not, of, out (of), round, should, so, that, think, though, thought, through, throughout, to, toward, under, unto, what, with, without, would.

A may be joined after any of the above words, except *o'er*, *after*, *under*, which end in ɔ.

XXXIV. AUXILIARY PHRASES. The words *have* and *be* should be joined after *can*, *could*, *may*, *might*, *must*, *ought-to*, *sha(ll)*, *should*, *will*, *would*. The words *had*, *been* and *become*, should be joined after *has*, *have*, *hath*, *had*. The words *do* and *think* should be joined after *shall*, *should*, *will*, *ought-to*.

In all cases words involving similar joinings may be attached in phrases of this kind; thus, *believe*, *become*, *be able to*, present the same joining as *be*; *take* joins like *think* and *do*.

The following words join well after *be*;—this (that etc.), thought, done, proud, pleased, proposed, probable, felt, feared, foreseen, found, afraid, vain, called, considered; words beginning with **p**, **b**, **f** or **v**, also join well after *have*.

XXXV. NEGATIVE PHRASES. The word *not* may be joined after *be*, *can*, *do*, *have*, *m(ay)*, *should*, *shall*, *will*. The phrases, *does not*, *has not*, *mus(t) not*, *was not*, are written on the analogy of *it is not*. The negative may be expressed by a cross-stroke after *will*, *shall*, *had*, *should*, *would*, *could*, *might*, *ought to*.

INTERSECTION. Before *be*, *been*, *have*, *do*, *mean*, *say*, *think*, and similar words, the negative is generally expressed by intersection, especially after the auxiliaries, *can*, *could*, *may*, *might*, *will*, *would*, *shall*, *should*, *ought*, *must*, *had*, *have*, *do*. In phrases, such as *should not be*, *ought not to be*, where intersection is awkward, the second word is written close below the first; the negative itself should be written if great precision is required.

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