A Survey and Study of Handwriting in the Intermediate Grades in Selected Schools in the State of Washington

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A SURVEY AND STUDY OF HANDWRITING IN THE
INTERMEDIATE GRADES IN SELECTED SCHOOLS
IN THE STATE OF WASHINGTON

A Thesis
Presented to
the Graduate Faculty
Central Washington College of Education

In Partial Fulfillment
of the Requirements for the Degree
Master of Education

by
Donald H. Ellertson
August 1957
APPROVED FOR THE GRADUATE FACULTY

________________________
Dan L. Oppleman, COMMITTEE CHAIRMAN

________________________
Eldon E. Jacobsen

________________________
J. Grant
TO MY WIFE, DORIL,

FOR HER

ENCOURAGEMENT AND ASSISTANCE
ACKNOWLEDGMENTS

The writer wishes to express his gratitude to Dr. Dan L. Oppleman for encouragement and guidance in the completion of this paper.

Special acknowledgments to Dr. Jacobsen for assistance with the questionnaire and to Miss Grant for serving on the graduate committee.
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CHAPTER I

THE PROBLEM AND DEFINITIONS OF TERMS USED

The public schools, in preparing children to live in a complex society as is found in the United States, must be constantly aware of the changing needs within their society: a conclusion shared by numerous writers in the field of education. The elements of the broadening curriculum and their values must be considered in light of the total development of the child. As a result, school methods have been changing from the traditional type to those more functional in nature.

The area of handwriting is no exception and this new concept is causing educators to re-evaluate the role of handwriting in relation to the curriculum and to ascertain the practices which, rather than strive for perfection in penmanship, will guide pupils in the development of a legible and reasonably quick method of written expression.

I. THE PROBLEM

Statement of the problem. It is the purpose of this study (1) to survey the general nature of current practices in handwriting of the schools within the state of Washington which are classed as group two and three
according to the Washington Education Association's Thirty-Fourth Annual Teachers' Salary Study; and (2) to determine the relative importance of handwriting in the intermediate curriculum of these schools.

Importance of the study. A survey of the literature reveals there has been considerable criticism of the handwriting program in the present day schools and the following statement by Cole might suggest that some of it is justified:

Handwriting is probably the worst taught subject in elementary school because it is the one least affected by modern research and least likely to be approached analytically.\(^1\)

This assertion selected from the writings of a well-known educator would seem to point up a general need for study in this area.

In handwriting as in other areas of the curriculum the changing needs of the pupils and the development of new practices necessitate periodical evaluation of the program in light of these new considerations. The results of a survey of this type could be used by administrators, supervisors, or teacher committees as a basis for re-evaluation of the handwriting program, and should be supplemented by further study and investigation.

A study of this type could also be used to expose areas in which future studies could be conducted.

**Methods and procedures.** The survey used in this study was conducted through the use of a questionnaire. The questionnaire was developed after a study of the literature and from questions raised during a study of handwriting by a language arts committee in Battle Ground, Washington. Suggestions were also made by principals of this district where the writer is employed as a teacher.

A list of schools was compiled by taking those from districts in groups II and III as shown in the Washington Education Association's Thirty-Fourth Annual Teachers' Salary Study, 1956-1957. Group II consists of smaller first-class districts with over 2,000 enrollment while group III is made up of large second-class districts with over 1,000 enrollment. The area sampled then was districts with a total enrollment of between 1,000 and 20,000.

The names and addresses of schools within the districts selected were taken from the Washington Education Directory, 1955-1956. When the list was completed, every third school was noted and a questionnaire was mailed to it, along with a letter of explanation, and a
stamped self-addressed envelope. A copy of both the questionnaire and the letter of explanation are included in the appendixes. The sampling of every third school was utilized because it was thought the bigger districts containing many schools would get equal representation. The questionnaires were sent to the principals to obtain over-all pictures of the handwriting programs of these schools. A total of 150 questionnaires were mailed.

The questionnaire as used here is a type of normative survey. The practical use of data gathered by this method can be effected by administrators in the solving of problems; according to Good, Barr, and Scates:

> The data coming direct from the field, represent field conditions; they tend to be practical because they grow out of practical situations; and they generally answer the questions of the man in the field because they are likely to be cast in the terms in which he thinks.\(^2\)

The questionnaire method is widely used, and is effective in contacting a large number of people without the time or expense involved in seeing them personally.\(^3\)

According to Lundberg, the questionnaire. . . . "avoids the variety of possibly irrelevent stimuli

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\(^3\) Ibid., p. 325.
involved in personal contact." Also, the fact that the respondents remain anonymous will sometimes produce more cooperation and freedom in answering on their part.

Although no check of actual validity was used, Lundberg infers that validity can to some extent be determined by how well the instrument fulfills the purposes for which it was constructed.

Limitations. The study was designed to survey the handwriting program in the intermediate grades. Although some portions of the study concerned the primary grades, its application to other than the intermediate grade level is limited.

The schools included in the study were of groups II and III as outlined in the Washington Education Association's Thirty-Fourth Annual Teachers' Salary Study. Thus, the results would be of most value to public schools of districts with total enrollments of between 1,000 and 20,000.

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5Ibid.
II. DEFINITIONS OF TERMS USED

Manuscript writing. The more simple, unjoined, print-style writing is referred to as manuscript writing. In this style, all letters can be made entirely by straight lines and circles or parts of circles. Or as a first-grader explained it, "We make our letters all loose. We don't have together writing yet."\[^7\]

Cursive writing. The traditional joined and slanted type of writing is referred to here as cursive writing.

Intermediate grades. The fourth, fifth and sixth grades are included in the classification of intermediate grades, as used in this study.

\[^7\]Frank N. Freeman, "Teaching Handwriting," The Education Digest, XX No. 5 (January, 1955), p. 47.
CHAPTER II

REVIEW OF THE LITERATURE

Handwriting has, at times, been considered an art; but essentially in origin and in present day use it is a tool, utilized by man for self expression.

"History reveals to us that writing developed through man's need to transmit ideas, as well as through his desire to put them into a more or less lasting form."¹

Early man scratched and carved inscriptions on stone and clay tablets so it is fitting that, "The word writing is derived from an old Saxon word writan, meaning to scratch or carve."²

With the aid of better implements and practice, picture forms developed into an alphabet which was passed on from nation to nation and modified until with the Romans the letters reached a form similar to the capital letters printed today.³ Through use the smaller more rounded letters evolved and later, to facilitate rate of writing, slanting and joined letters were used.

²Handwriting Research Institute, Handwriting Made Easy (New York: Noble and Noble, Publishers, Inc.), p. 4.
³Ibid.
These slanting and joined forms were called cursive which means "running or flowing".4

Cursive writing became a traditional part of early American schools and its predominance was not seriously questioned until a form called manuscript was introduced in 1921.5

Manuscript writing was not actually a new type of writing. "The letter forms revived and simplified the very legible print-writing of the medieval monks."6

Manuscript writing in the United States has progressed to the point that much of the literature on handwriting is devoted to a comparison of the merits of manuscript with those of the traditional cursive. The merits and potentialities of these two forms of writing will be discussed in this chapter in relation to their role in the handwriting program of the schools.

I. HANDWRITING PREPARATORY TO THE INTERMEDIATE GRADES

Pupils of the traditional schools were taught the letter forms first, after which they were taught to write

4 Ibid.
6 Handwriting Research Institute, op. cit., p. 5.
words and sentences and attach meaning to their writing. The child did not fulfill his desire to write until he had considerable practice in word forms and, actually, the forming of the word and the expression of meaning were separate acts.7

In the present day school the child starts by writing meaningful words and the forms are developed as he progresses.8

**Manuscript Writing**

In a good percentage of schools, in the United States, both public and private, unjoined manuscript writing is taught first. According to Polkinghorne's study, about eighty-nine per cent begin with manuscript writing.9

**Reasons for using.** There seem to be some quite definite facts to justify the use of manuscript writing in the primary grades. Lee states these to be:

1. It is easy for children to learn because of the simple strokes.

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7Mary Ellen Wood, "Handwriting Then and Now," Grade Teacher, LXX (February, 1953), p. 42.

8Wood, op. cit., p. 42.

2. Children can obtain satisfactory results early without drill on movement or form.

3. The letter forms are so simple that each child can see his difficulty and correct it.

4. The child learns one alphabet for both reading and writing.

5. Even a child with poor muscular control can produce readable results.


7. Children who have written manuscript for a number of years can equal the speed of those using cursive writing and in most cases exceed it.10

Most researchers, such as Freeman, show favorable agreement with these points.11

Methods. In preparation for writing, children should have a chance for expression and appreciation for expression. Because of problems of maturation, the teacher should write the children's ideas in the beginning. In this way, the child has a chance to express himself without being distracted by the writing process and as this progresses so will his desire to do his own writing.12

The child's readiness to write is determined by his pre-school writing instruction and what is known about his maturity level, both mental and physical. Tests


such as the Metropolitan Readiness Tests are thought to be helpful in this process.\textsuperscript{13}

For a child's beginning writing, . . . ."the purpose of writing should be definite, and related to his needs and interests. The process should be simple and easy of accomplishment, with few rules. The result should be a product which gives satisfaction to all parties concerned."\textsuperscript{14}

Primary pupils begin with . . . ."large writing in the first grade and reduce the size gradually in succeeding grades."\textsuperscript{15}

"At the end of the first grade, children are usually able to write their names, all the small letters and the capitals, the numbers which they have needed to use, the names of familiar objects, and simple sentences related to their activities."\textsuperscript{16}

The amount of time spent on handwriting practice varies but many writers would concur with Stewart's statement that:

\begin{thebibliography}{9}
\bibitem{14}Conard, \textit{op. cit.}, pp. 14-15.
\bibitem{15}Freeman, \textit{op. cit.}, p. 27.
\end{thebibliography}
Fifteen minutes a day of concentrated work will, according to research, develop good handwriting if the same care is given to handwriting done at other times. 17

**Materials and instruments.** Materials and instruments used in the primary grades' handwriting program are suited to the bigger writing and become more refined as they go up through the grades. Some schools use chalk, crayons, and then beginner's pencils, moving from the blackboards, to unlined paper, and then to wide lined paper. 18

Polkinghorne found that crayons were quite widely used in the first grade but their use decreased thereafter. Blackboards were used extensively in grades one and two. Beginner's pencils were used mainly in grades one and two, with ordinary pencils getting some use in grade one, considerable use in grade two, and extensive use in grade three. Pens and ink were introduced in a number of third grades. Fountain pens showed only negligible use.

First grades used mainly unruled and inch-ruled paper. Second grades used inch, five-eighths, or one-half


18Beale, *loc. cit.*
inch ruled paper in the majority; while the third grades used equal amounts of five-eighths or one-half inch ruled paper and three-eighths inch ruled paper. 19

Special problems. Handwriting has problems to meet at all levels but most of these problems are first met and have to be resolved to some degree in the primary grades. These problems are mentioned by Conard as left-handedness, poor vision, and poor muscular control. 20

In the consideration of left-handedness, it should be noted that surveys show between five and ten per cent of school pupils are left-handed. 21

"The left-handed child tends to be a special handwriting problem to the elementary school teacher who is usually right-handed himself, teaching a dominantly right-handed system." 22

Freeman suggests meeting the occurrence of left-handedness in the following manner:

The most reasonable position to take is that we should first try to find out by suitable tests whether

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19 Polkinghorne, op. cit., pp. 221-222.
20 Conard, op. cit., p. 15.
the child is much more skillful with his left hand than with his right. If he is not, he should be encouraged, but not forced, to write with his right hand. If he is strongly left handed, he should be encouraged to write with this hand, and then be shown how to do it in the most convenient and comfortable manner. 23

One approach is to have such children assume positions which are the opposite of those expected of right-handed children, with the added caution that the position should be one that is most comfortable to him. Additional requirements are keeping the hand under the line, wrist flat, and pencil pointing toward the left shoulder. The position of the paper is reversed for the left-handed writer. It is also suggested that the writing instrument be gripped a little further from the point and that the point be one that will not dig into the paper easily. 24

Statements in regard to the use of manuscript by left-handers are that: "For children who write with the left hand the letter forms in manuscript are easier to make and the results are more legible." 25

In a summary of studies concerning handedness Shane concluded that:

A good many meritorious, common sense opinions have been advanced in the effort to help the left-handed writer. Suggestions from actual research seem to be less numerous. The number of left-handed children is appreciable, perhaps as high as ten percent. The trait is influenced by a number of elements and does not seem to be directly related to reversals in writing and reading. 26

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23 Freeman, op. cit., p. 22.
25 Conard, op. cit., p. 15.
26 Shane, op. cit., p. 41.
To fulfill the needs of the child with poor or partial vision, Conard suggests:

... Tools which have a thick lead making a good even black line and paper with dull finish of cream or buff color. Letter forms should be large and plain in construction with no joining strokes, while the letters should not be made less than one-fourth inch in height. Much work should be done on the blackboard and easel. 27

Manuscript seems to be one answer to the problem of poor muscular control, ... "for the reason that the separate formation of the letters lessens strain on immature or poorly coordinated muscles." 28

Cursive Writing

Since the advent of manuscript writing in schools of the United States the cursive style is not generally used until the latter part of grade two or the beginning of grade three. In Polkinghorne's study sixty-six per cent of the schools interviewed reported this transition was made in grade three or above. 29 A survey of handwriting in Wisconsin listed fifty-eight per cent as

27 Conard, op. cit., p. 15.
28 Ibid.
29 Polkinghorne, op. cit., p. 220.
making the transition in grade three or above, and thirty-three per cent making the transition in grade two.\textsuperscript{30}

Hildreth says most schools disagree only on when to change but few dissenters from this opinion have urged that a change is neither necessary nor desirable.\textsuperscript{31} Some reasons presented for the continuance of manuscript through the grades and reports of trends in that direction will be presented in the latter part of this chapter. The literature presents these ideas as put forward by opponents of the continued teaching of manuscript:

(1) It is slower and less fluent than cursive writing; (2) it tends towards stereotyped letter form, thus eliminating individuality in writing; (3) it is not generally accepted for use in the business world; (4) children taught manuscript writing might encounter difficulty in reading the cursive writing of their elders.\textsuperscript{32}

Some writings suggest that public sentiment is an important factor on the side of cursive writing. Wagner states:

Cursive style is frequently required in a number of business and legal situations, and considered by many as the acceptable writing style for general


\textsuperscript{31}Gertrude Hildreth, "Should Manuscript Writing Be Continued in the Upper Grades?", \textit{The Elementary School Journal}, XLV (October, 1944), p. 85.

purposes. Children, parents, and the general public, therefore, tend to favor the cursive style, and schools have an obligation to teach it.\footnote{Rosemary E. Wagner, "Writing is For Reading," \textit{The National Education Association Journal}, XLV (December, 1946), p. 556.}

The transition does not seem to effect the ultimate quality of writing. Freeman reports that

Experience based on careful experiment shows that the child can learn cursive writing in the third grade after two years of manuscript writing more easily than he can learn it in the first grade, and the quality of his writing in later grades is equal or superior to that of pupils who started cursive in the first grade.\footnote{Freeman, \textit{op. cit.}, p. 27.}

Children are usually ready to make the change by the beginning of the third grade. By this time they should possess adequate skill in the use of manuscript and be able to read a few simple sentences in cursive.\footnote{Handwriting Research Institute, \textit{Handwriting Made Easy}, \textit{op. cit.}, p. 27.}

Some factors to be considered in the transition are:

(1) Cursive writing has slant—the child needs help in developing proper slant arrangements; (2) the writing instrument is not lifted after each letter in cursive writing—the major problem of making the transition is in helping the child make the proper connectives between letters in forming a word; (3) some letters are not formed the same—the child needs help in making these changes in the formation of letters as naturally and as consistently as possible—the staff of a given school should at least agree to what transition and letter conventions they are going to encourage a child to use; (4) some children may have to learn to read cursive writing. This is
less true the longer the transition period is postponed because of the increasing practice the child will get in reading script.36

One school system gives out spelling lists written in both types of writing during the transition period.37 Others suggest working at the board so individual needs can be spotted quickly.38

Most teachers have found that with periods of fifteen to twenty minutes per day, over a period of four to six weeks, the transition can be made satisfactorily with third and fourth graders. Helping children to continue their handwriting, of course, should not cease after this initial period of specific instruction.39

II. HANDWRITING IN THE INTERMEDIATE GRADES

Handwriting programs in the intermediate grades have not, as a majority, undergone changes comparable to those effected in the primary grades in recent years. However, the philosophy of simplification and function in writing styles is being advocated. One source is quoted as saying: "The trend today is toward a more simple and more legible style of letter formation accompanied by

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36 Herrick and Jacobs, op. cit., p. 273.
37 Wagner, op. cit., p. 556.
38 Clara A. Mork, "From Manuscript to Cursive," Grade Teacher, LXXII No. 4 (December, 1954), p. 32.
39 Herrick and Jacobs, op. cit., p. 274.
direct teaching methods. Such practices stress functional attitudes and skills."40

Cursive

The handwriting program in the intermediate grades follows the transition to cursive writing which is generally completed in the third grade. Components of this program and the program's place in the curriculum, as discussed in the literature, will be presented in the following paragraphs.

Motivation. The trend in motivation, in harmony with the new philosophy, is away from the use of artificial motives, stressing instead the employment of natural motives where possible. Freeman states it in this manner:

It is wise to stress as of first importance the value of doing something well because it enables us to play our part in our society, is useful, and is worth doing well. Competition used in moderation, supplements the other more social motives.41

Reed concludes:

An effective method of motivating handwriting is to give the pupil exact knowledge of his defects obtained from a diagnosis of his work, scale ratings on quality and speed, corrective practice, and knowledge

40Handwriting Research Institute, op. cit., p. 51.
41Freeman, op. cit., p. 9.
of the results of this practice.\textsuperscript{42}

These methods give the pupil a chance to see his progress and the usefulness of his work. Cole suggests the setting up of goals which can be reached and that free time during drill be given those who achieve.\textsuperscript{43}

\textbf{Practice.} Surveys as to methods and time employed in the teaching of handwriting bring a wide variety of responses. Witness this concluding statement from a Wisconsin survey: "As in other schools throughout the United States, there is a great variability of practice in Wisconsin schools as to specific provisions made for handwriting instruction."\textsuperscript{44}

The majority of schools give regular handwriting instruction as opposed to just incidental practice. Polkinghorne's survey shows a percentage of about seventy-six in this respect.\textsuperscript{45}

As to the amount of time to be spent in practice, Freeman advises:

\begin{itemize}
\item \textsuperscript{42}Homer B. Reed, \textit{Psychology of Elementary School Subjects} (Second edition; Boston: Ginn and Company, 1938), p. 300.
\item \textsuperscript{43}Luella Cole, \textit{The Elementary School Subjects} (New York: Rinehart and Company, 1946), p. 204.
\item \textsuperscript{44}Virgil E. Herrick and others, \textit{Handwriting in Wisconsin, op. cit.}, p. 21.
\item \textsuperscript{45}Polkinghorne, \textit{op. cit.}, p. 224.
\end{itemize}
The use of a daily practice period of fifteen minutes is in accord with studies of learning in which the problem of the length and frequency of practice periods has been investigated.

Polkinghorne's study reported an average of seventy-five minutes per week was spent on handwriting. However, the Wisconsin survey reported an average of forty minutes per week. In regard to these studies Herrick states:

There is some reason to believe that seventy-five minutes per week is too high a figure and that the Wisconsin findings may be a better indication of general practice. There is a definite pattern toward reduced time as we move from the primary grades upward.

If properly utilized, these practice periods should contain many opportunities for repetition, but they should be in meaningful situations.

Such drill as is necessary should be directed at


47 Polkinghorne, op. cit., p. 223.

48 Herrick and others, op. cit., p. 20.

49 Herrick and Jacobs, Children and the Language Arts, op. cit., p. 268.

removing difficulties in the individual's writing.\textsuperscript{51} Cole states:

Only diagnosis will reveal the defects; only self-analysis will motivate the pupil; and only individualized drill will provide a remedy.\textsuperscript{52}

This concentrated drill can and should be followed by using the corrected forms in words and sentences.

The relative importance of areas for practice are outlined by one writer as follows:

Since handwriting exists for no other purpose than to be read, one must give primary emphasis to legibility. Speed of writing is next to be stressed because it is of practical value that legible handwriting be produced as rapidly as possible without strain. Quality or appearance is therefore put last, as a desirable but not essential element.\textsuperscript{53}

**Good form.** If the emphasis is to be on legibility then several factors must be stressed because these factors in their totality decide the legibility of a given piece of writing. These factors are: (1) proper letter formation; (2) spacing within and between words; (3) alignment—letters resting on baseline; (4) uniform


slant; (5) line quality.\textsuperscript{54}

Of these factors, letter formation is probably the most important to the legibility of writing. Proper attention must be given to errors in letter formation and the letters e, n, d, t, r, i, a, h, and b need special attention as they are the cause of a great number of the illegibilities.\textsuperscript{55}

Freeman believes that spacing is probably next in importance in the matter of legibility. He states:

The best spacing for legibility is a compact packing of letters in the words and a good space around the words and between the lines to stand out distinctly and to be easily seen.\textsuperscript{56}

One other factor which influences the production of good form is the child's development of rhythm and well-coordinated movements.\textsuperscript{57}

\textbf{Movement and rhythm.} Movement in handwriting, has been the subject of much discussion, particularly in regard to exclusive arm movement as opposed to finger movement. What has resulted is a combination, stressing

\textsuperscript{54}Harold G. Shane, \textit{Research Helps in Language Arts}, \textit{op. cit.}, p. 40; and Handwriting Research Institute, \textit{Handwriting Made Easy}, \textit{op. cit.}, p. 53.

\textsuperscript{55}Freeman, \textit{Teaching Handwriting}, \textit{op. cit.}, p. 28.

\textsuperscript{56}Ibid.

\textsuperscript{57}Ibid., p. 29.
the use of fingers, hand, and arm. Finger and hand muscles are used in letter formation and are guided across the page by the wrist and arm.\(^{58}\)

The handwriting movement is said to be quite complex because of the changing pressure of the fingers on the writing instrument and changes in speed of the writing movement. These speed changes are related to the form of the letters, and as the pupil unconsciously feels these movements he is sensing and developing rhythm in writing.\(^ {59}\)

**Position.** Ease of movement and fluency of writing are enhanced by a comfortable position. Items to be considered in this position are quite generally agreed upon as follows: The pupil should face the desk squarely with hips back in seat and sitting comfortably erect with shoulders slightly forward. The feet should be flat on the floor, the forearms on the desk, the forearm used in the writing process would use the desk for support in its movement. The paper would be placed at a slant, but directly in front of the pupil with the result that downstrokes pulled toward the body would provide the slant.\(^ {60}\)

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\(^{60}\) Handwriting Research Institute, op. cit., p. 56.
The position of the hand is usually palm down with wrist almost flat but not touching the desk. The pencil is held between the thumb and the side of the second finger with the index finger resting on top of the pencil about one inch from the point. The little fingers should be used as runners, and there should be an opening on the outside of the hand which indicates the hand is not turning too much.61

One different point of view was put forth by Thomas who believes the stenographer's grip to be more relaxing and natural.

The stenographer's grip consists of placing the writing instrument between the index finger and the middle finger and pressing gently upward against the instrument with the thumb.

**Left-handedness.** The position of the left-handed pupil is similar to that of the right-handed pupil, with, of course, the reversal of slant of the paper and of positions of the arms. Some researchers have been quoted as recommending that: "The left-handed writer who finds the forward slant difficult be allowed to write with a

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61 Handwriting Research Institute, *op. cit.*, p. 61.

backhand slant."

Special equipment and attention to lighting are stressed with the aim of making the left-handed child's writing situation as comfortable and normal as possible. However, Herrick states:

Much work needs to be done here to give the teacher and the left-handed child the help he needs.  64

Other factors regarding left-handedness have been discussed earlier in this chapter in relation to problems of handedness in the primary grades.

Materials, instruments, and systems used. Pupils of the intermediate grades have in the majority refined their writing skills to the point of using adult materials and instruments. The regular three-eighths inch ruled paper and ordinary sized pencils are used. Pen and ink exceed the use of pencils in grades five and six and fountain pens average about half as much use as the pen and ink.  65 However, the Wisconsin survey which is more recent than Polkinghorne's survey, shows that the fountain


64 Herrick and Jacobs, op. cit., p. 28.

pen was used much more than pen and ink and the ball-point pen was used as much as the pen and ink. 66

In regard to the traditional pen and ink, Cole states very emphatically what seems to be the opinion of many:

Since penmanship is a practical tool and not an art, it is more sensible to train children to write well with the implement they will use than with a school pen, an implement they will not use if they can help it. 67

Traditional systems of handwriting are still used in many schools and the ovals, push pulls, and other drills are not consistent with the present philosophy of handwriting. Systems, as used here, refers to commercial systems of handwriting which, according to one survey, were used in 110 schools of the 168 respondents. 68 If the majority of schools are using commercial systems then it would seem that these commercial companies are to some extent determining the handwriting programs in the schools. However, if as Freeman suggests, many teachers are not adequately trained to teach handwriting; 69 then these systems if prepared by experts in the field would

68 Polkinghorne, op. cit., p. 222.
69 Freeman, Teaching Handwriting, op. cit., p. 31.
definitely be of advantage.

Some schools use locally developed systems or
guides or a combination of local and a commercial system. The Wisconsin survey revealed that four per cent of the schools responding used a local system, six per cent used a combination of local and commercial systems, and fourteen per cent did not use a system.70

Correlation. The literature indicates that a number of schools combine handwriting in some method with other subjects.71 Wagner, speaking of New York's handwriting program made these statements:

The program is based on the belief that handwriting should be taught in an integrated program of language arts. Spelling and handwriting are closely linked.72

An interesting study was made by Thompson who set up an integrated course combining spelling and handwriting. An experimental group was taught by the integrated method while control groups used standard procedures. The experimental group showed a marked improvement as compared to the control groups. Standardized tests were used to

70Herrick and others, op. cit., p. 32.


72Wagner, "Writing is for Reading," op. cit., pp. 555-556.
measure the progress. This could not be considered proof but it is an interesting indication.73

Correlation is not limited to using practice material from other subject areas; the quality of handwriting in other parts of the curriculum should be given attention also. Reading seems to be a natural choice for correlation, especially in the primary grades, and spelling as quoted here and according to research is one of the main reasons for correlation.74

More research such as that conducted by Thompson should be of great value in determining the extent of correlation. Another factor to be considered is the increasing scope of the elementary school curriculum and the resulting lack of time for teaching of all subjects in separate periods.

**Measurement and evaluation.** There are many opportunities in the area of handwriting for measurement and evaluation. These methods of evaluating are not only for determining progress of students, but also for diagnosing and correcting faults, and in many cases the effectiveness of the teaching job can be measured too.


Quality scales generally emphasize legibility but also judge writing for its pleasing appearance. Three of the most common of these commercially prepared handwriting scales which showed wide use in the Wisconsin survey as those developed by Ayres, Freeman, and West. Scales of this type generally use specimens of varying degrees of quality for the basis of measurement.

Handwriting scales can be developed locally by teachers but the writer has found no evidence that this practice is being widely used.

Nor does research disclose any scale for the strict purpose of measuring legibility. Cole used the following method for determining legibility in one instance:

At both the beginning and end of the work the children copied the same short printed list of words. These lists were scored by checking each letter whose formation was not perfect. The legibility score was the total of these incorrectly-written letters.

Measurement of speed is usually accomplished by ascertaining the number of letters written per minute in a memorized piece of material, over a two or three minute

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75Freeman, Teaching Handwriting, op. cit., p. 30.
76Herrick and others, op. cit., p. 34.
period.  

Standards of speed are not used to a great extent. "The problem is to help a child relate and control the speed of his writing to the quality level appropriate to the legibility and social standards essential to the writing task of the moment."  

Self-evaluation has merits for improvement within the handwriting class, but also teaches the pupil to be critical of his handwriting in all situations. Through the use of models or scales of handwriting and checklists of possible errors, pupils should be able to effectively evaluate their work.

Evaluation by the teacher of writing in all areas should, of course, be continuous and corrective measures suggested where they are needed.

Manuscript

In the majority of schools, where cursive is taught in the intermediate grades, manuscript writing is used for posters, maps, and similar projects.

According to the Wisconsin survey a few schools

78 Ibid., p. 464.
79 Herrick and Jacobs, op. cit., p. 277.
teach both manuscript and cursive. 81

As stated earlier, some believe that manuscript writing should be used exclusively and Polkinghorne reports that about eighteen per cent of the schools responding to the survey do teach manuscript all through the grades. 82

Carter reports on the Brookline schools where pupils are taught manuscript through the intermediate grades. Children are taught to write a cursive signature and they will teach the children cursive after grade six if the parents so desire. 83 Complaints were later received started by a child not being able to read a letter from his parents.

There are conflicting reports as to the merits of the two styles as shown by research. Hildreth states:

There is considerable evidence that with adequate attention to manuscript writing in the upper grades, manuscript writing is, on the whole, much superior to cursive writing in legibility and that it is fully as rapid. 84

81 Harrick and others, op. cit., p. 13.
82 Polkinghorne, op. cit., p. 220.
84 Gertrude Hildreth, "Should Manuscript Writing Be Continued in the Upper Grades?", op. cit., p. 88.
However, Leavitt's concluding statement seems to be indicative of general thought on the manuscript and cursive styles of writing:

The studies would indicate that from the point of view of speed, quality, expression, spelling and reading, manuscript writing should be taught and used in the primary grades. The present data might indicate that cursive writing is superior after the third grade, but more study will have to be done on the problem before one system can be proven to be more advantageous than the other for use in the higher grades.

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CHAPTER III

THE RESULTS OF THE SURVEY

The data presented in this chapter are based on a survey, as described in Chapter I, wherein questionnaires were mailed to one hundred fifty schools. Of these schools, which were limited to smaller first class districts and larger second class districts, one hundred eighteen or 78.6 per cent completed and returned the questionnaire.

These returns have been evaluated, first in their totality, to present the general nature of handwriting programs in the schools sampled. This method readily lends itself to comparison with national surveys and other state surveys on handwriting or as a basis of comparison and evaluation for local districts or schools.

The responses were also tabulated according to the various enrollment groups as represented in Table 1. As the table shows, the majority of the schools, 75 per cent, are represented by two enrollment groups. Because of the lack of distribution on the lower and upper ends of the scale the returns will not be presented in full on a group by group basis. However, deviations within these groupings and possible trends will be noted.

The respondents showed a wide variation as to the
<table>
<thead>
<tr>
<th>Enrollment</th>
<th>SchoolsReplying</th>
<th>Per Cent</th>
</tr>
</thead>
<tbody>
<tr>
<td>1- 50</td>
<td>2</td>
<td>1.7</td>
</tr>
<tr>
<td>51- 150</td>
<td>7</td>
<td>5.9</td>
</tr>
<tr>
<td>151- 300</td>
<td>12</td>
<td>10.2</td>
</tr>
<tr>
<td>301- 500</td>
<td>45</td>
<td>38.1</td>
</tr>
<tr>
<td>501- 750</td>
<td>43</td>
<td>36.4</td>
</tr>
<tr>
<td>751-1000</td>
<td>6</td>
<td>5.1</td>
</tr>
<tr>
<td>over 1000</td>
<td>3</td>
<td>2.5</td>
</tr>
</tbody>
</table>
number and the groupings of grades within their schools. Of the many groupings represented, the one-to-six arrangement proved the most common among schools contacted. There seemed to be no value in tabulating the returns according to grade groupings, however, it should be noted that some schools contained only the intermediate grades or only the primary grades and thus could not respond to all the questions.

Numerous comments were added on spaces provided after the various questions of the survey. The general tone of these comments will be presented where it may further the understanding of the results as tabulated.

In considering the results of a questionnaire type survey as recorded here, it should be noted that the findings expressed represent a two-fold interpretation. The sources queried interpret the questions in light of their varied experiences and their answers in turn are evaluated by the person conducting the survey. An attempt has been made to note any area where the degree of interpretation involved might have a noticeable effect on the results.

I. PRACTICES IN EARLY HANDWRITING EXPERIENCES

Two items concerning handwriting on the primary level were included as being preparatory to information
requested on the intermediate grade level.

**Initial instruction.** In response to a question concerning beginning writing, one hundred thirteen or 95.8 per cent of the schools, replied that manuscript writing is used for initial instruction in the first grade. Two schools reported they used both manuscript and cursive writing, and the remaining three did not answer as they have intermediate grades only.

**The transition.** The transition or changeover from manuscript to cursive writing is effected in the third grade in ninety-one of the schools queried, or 77.1 per cent. Nineteen schools make the transition in grade two and six schools reported the changeover took place in both grades. Two schools did not answer. Comments indicated that at least ten of the schools making the transition in the second grade do so in the last half of the year with only one reporting it to be effected in the first half of the second grade.

II. PRACTICES RELATIVE TO THE PLACE OF HANDWRITING IN THE CURRICULUM

A survey of the methods of presenting handwriting instruction and the time allotted to this instruction was used here to determine handwriting's place in the
Methods of presentation. In response to a question as to the place of handwriting in the curriculum of the intermediate grades, fourteen schools indicated that handwriting was taught as a separate subject only. Twenty-three schools indicated that it was included through planned integration with another subject or subjects. The majority of the schools, seventy-eight in number, or 66.1 per cent, reported they employed a combination of these two methods in their handwriting programs. Only one school reported that handwriting was not included in the curriculum, while two had primary grades only.

A follow-up question was used to ascertain with what subjects the integration would take place. Planned integration as listed in the questionnaire was meant to include some application of handwriting methods, however, comments on the follow-up question seem to indicate that some did not interpret it in this manner. Many commented that handwriting was integrated with all subjects or stressed in all written work. It appears that these respondents were referring to a more incidental type of instruction rather than planned integration. Of those reporting, twenty-eight listed integration with all
subjects.

Schools reporting integration with just one, two, or three subjects, listed spelling as the subject most used for integration with handwriting, with sixty-three so indicating. Language was second in preference with thirty-five indicating this area, while eighteen checked reading. As these were listed separately and not within groups reporting integration with all subjects, they should be at least indicative of trends in this area.

It was noted that only one school out of twenty-one in the groups of three hundred or less pupils, taught handwriting as a separate subject.

**Time allotment.** The amount of time given to the practice of handwriting other than incidental instruction seems to vary considerably even within schools. Many principals reported this variation, with six saying they could not estimate the time utilized. Eighty-six schools replied that from one to two hours a week was spent in practice. Eleven schools used two to three hours a week and one school from three to four hours.

Responses indicated that the table of hours asset up in the questionnaire could well have included a step listing from thirty minutes to one hour. As it was, twelve stated that they spent less than one hour a week
in handwriting practices and others in checking the one to two hour bracket commented that the time spent was closer to one hour. It is conceivable that some who may have been using less than one hour could have checked the one to two hour bracket, that being the nearest to their situation.

III.  PRACTICES IN THE USE OF SYSTEMS AND MATERIALS IN HANDWRITING

A consideration of handwriting practices must of necessity include information as to commercial systems and locally prepared guides of handwriting being utilized. These systems and guides appear to be the patterns in handwriting practices and thus could dictate to some degree the areas of emphasis and methods employed. Measurements in handwriting will also be considered in this section.

Commercial systems and local guides. Of the schools queried, seventy-two do use a commercially prepared system either as a guide for their work or in the form of a workbook. This amounts to 61 per cent, as shown by Table II, leaving 39 per cent or forty-six schools answering in the negative.

Table II also reveals that fifty-two schools had
TABLE II

COMMERCIAL SYSTEMS AND LOCALLY PREPARED GUIDES
AS INSTRUCTIONAL AIDS FOR THE
TEACHING OF HANDWRITING

<table>
<thead>
<tr>
<th>Kind of Practice</th>
<th>Schools Reporting</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Number</td>
</tr>
<tr>
<td>Commercial Systems</td>
<td></td>
</tr>
<tr>
<td>Used</td>
<td>72</td>
</tr>
<tr>
<td>Not used</td>
<td>46</td>
</tr>
<tr>
<td>Locally Prepared Guides</td>
<td></td>
</tr>
<tr>
<td>Used</td>
<td>52</td>
</tr>
<tr>
<td>Not used</td>
<td>64</td>
</tr>
<tr>
<td>Did not respond</td>
<td>2</td>
</tr>
</tbody>
</table>
a locally prepared guide for handwriting available to their teachers. Sixty-four schools did not have one available and two schools did not answer. However, comments indicate that work is being done in this area, that is organizing guides or revising those currently being used. Six schools stated that they were in the process of formulating guides while others reported having just completed them. Eleven schools specified that they were using the guide prepared by King County.

In an attempt to determine if the use of a commercial system was a factor in the use or non-use of locally prepared guides or if there was any correlation between the use of these systems and handwriting scales, these areas were re-evaluated.

As diagrammed in Table III, those questionnaires with affirmative answers as to the use of systems and those in the negative were tabulated separately as to whether guides or scales were used. Of the seventy-two schools using commercial systems, twenty also used guides, but fifty of them did not, with two not answering. Forty-six schools indicated they did not use commercial systems and in these the trend of guide usage is reversed. Thirty-two indicated yes and fourteen no.

That 69.4 per cent of those having commercial systems did not have local guides and conversely, 69.6 per cent
TABLE III

THE USAGE OF HANDWRITING SCALES AND LOCALLY PREPARED GUIDES IN RELATION TO THE USE OR NON-USE OF COMMERCIAL SYSTEMS

<table>
<thead>
<tr>
<th>Kind of Practice</th>
<th>Commercial Systems</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Used</td>
</tr>
<tr>
<td>Locally Prepared Guides</td>
<td></td>
</tr>
<tr>
<td>Used</td>
<td>20</td>
</tr>
<tr>
<td>Not used</td>
<td>50</td>
</tr>
<tr>
<td>Did not respond.</td>
<td>2</td>
</tr>
<tr>
<td>Handwriting Scales</td>
<td></td>
</tr>
<tr>
<td>Used</td>
<td>36</td>
</tr>
<tr>
<td>Not used</td>
<td>28</td>
</tr>
<tr>
<td>Did not respond.</td>
<td>8</td>
</tr>
</tbody>
</table>
of those not having commercial systems did have locally prepared guides, would seem to indicate a correlation between these factors.

On the other hand, similar evaluations of commercial systems and the use of handwriting scales showed very little correlation.

The respondents who indicated they did use a commercially prepared system of handwriting were asked to specify the system in use. The systems most used by those answering were Rice, Zaner-Bloser, and Palmer. A complete list of those reported and the number are included in Table IV on page 45. This question did not specify systems in the intermediate grades and at least one system (Scott, Foresman) is used in the primary grades only. Also, it should be noted that some of the schools answering used more than one system so the total here will be greater than the number of those answering in the affirmative as to whether they did or did not use a commercial system.

Comments show that some are considering the use of commercial systems, some are considering a change of systems, and others state the use of these systems is optional in their schools.

It was interesting to note, in tabulating by enrollment groups, that eight of the nine schools with enrollment
### TABLE IV

**COMMERCIAL PREPARED SYSTEMS AND SCALES EMPLOYED IN THE HANDWRITING PROGRAMS**

<table>
<thead>
<tr>
<th>Kind of Practice</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Handwriting Systems</strong></td>
<td></td>
</tr>
<tr>
<td>Kittle</td>
<td>1</td>
</tr>
<tr>
<td>New Laurel</td>
<td>1</td>
</tr>
<tr>
<td>Palmer</td>
<td>16</td>
</tr>
<tr>
<td>Peterson</td>
<td>3</td>
</tr>
<tr>
<td>Rice</td>
<td>34</td>
</tr>
<tr>
<td>Scott, Foresman</td>
<td>6</td>
</tr>
<tr>
<td>Stone and Smalley</td>
<td>2</td>
</tr>
<tr>
<td>Zaner-Bloser</td>
<td>16</td>
</tr>
<tr>
<td><strong>Handwriting Scales</strong></td>
<td></td>
</tr>
<tr>
<td>American (West)</td>
<td>1</td>
</tr>
<tr>
<td>Ayres</td>
<td>10</td>
</tr>
<tr>
<td>Freeman (Zaner-Bloser)</td>
<td>8</td>
</tr>
</tbody>
</table>
between one and one hundred fifty reported the use of commercial systems. Only two of these schools used local guides. The number of schools in this group is too small to give an accurate picture, but it might be an indication of what would be found in surveying a larger group.

**Handwriting measurements.** Measurements in handwriting generally consist of those measuring quality and speed of writing. Legibility is usually measured only as a part of quality. Measurements of quality in the form of handwriting scales and the extent of their usage were investigated in this survey as were measurements of speed.

Forty-two schools or 35.6 per cent reported that teacher-made scales were utilized. As shown in Table IV, others indicated the use of commercial scales such as those devised by Ayres, Freeman, and West. The number of these scales used is also shown in the table. Fifty-one replied that measurements of quality were not used in their schools, this amounting to 43.2 per cent of those responding. Some schools reported use of more than one scale. The number and per cent of those scales of quality are outlined in Table V.

Comments in regard to measurements of quality suggest that the teacher-made scales item was marked as including
# TABLE V

**MEASUREMENTS OF QUALITY AND SPEED AS INSTRUCTIONAL AIDS FOR THE TEACHING OF HANDWRITING**

<table>
<thead>
<tr>
<th>Kind of Practice</th>
<th>Schools Reporting</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Number</td>
<td>Per Cent</td>
</tr>
<tr>
<td><strong>Measurements of Quality</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Used</td>
<td>59</td>
<td>50.0</td>
</tr>
<tr>
<td>Not used</td>
<td>51</td>
<td>43.2</td>
</tr>
<tr>
<td>Did not respond</td>
<td>8</td>
<td>6.8</td>
</tr>
<tr>
<td><strong>Measurements of Speed</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Used</td>
<td>6</td>
<td>5.1</td>
</tr>
<tr>
<td>Not used</td>
<td>108</td>
<td>91.5</td>
</tr>
<tr>
<td>Did not respond</td>
<td>4</td>
<td>3.4</td>
</tr>
</tbody>
</table>
locally prepared scales included in local guides. Others reported using samples of varying quality of the children's work as a scale for comparison. A few respondents who did not employ scales in measuring commented that teacher judgment as to neatness and legibility was used in the evaluation of handwriting.

Measurements of speed in writing were revealed to be used in only six schools out of the one hundred eighteen included in the survey, as shown in Table V. This would seem to imply that there is not undue concern about the speed of handwriting in these schools, nor much emphasis placed on it.

IV. PRACTICES IN SPECIAL AREAS OF CONSIDERATION

Findings concerning practices which necessitate special provisions or considerations and those practices which are related to the handwriting program but are not an integral part of it, will be presented in this portion of the chapter.

Left-handedness. Special considerations or provisions for left-handed children in the handwriting program have been the subject of much discussion. As an indication to the treatment of the problem in schools surveyed, 77 schools or 65.3 per cent reported that
special consideration is given to left-handed pupils. Thirty-three replied in the negative and eight did not indicate.

At least thirty-five comments were written in the space provided after this question. These indicated that instruction is given as to proper position of body, reversing the angle of the paper, position of hand, proper grip on pencil, and proper letter formation. One school stated that it followed special instructions in the manual pertaining to left-handers while many added that no attempt is made to change the pupil's handedness at any time. Proper light for the left-handed was considered with one suggesting their sitting in the reverse (side) to right handers. Another respondent added that special desks are furnished. Several schools reported only that these children received individual attention or teacher supervision, one stating that some teachers felt inadequate in this area.

Follow-up on manuscript training. To determine if manuscript writing, as learned in the primary grades and replaced by cursive writing in the transition, is carried over and reinforced in the intermediate grades the schools were questioned as to the degree of follow-up, if any, in this area. Sixty-two schools, representing 52.2 per cent of those queried, replied that some type of follow-up
was carried out in their schools. Fifty-one schools answered in the negative and five did not indicate.

Numerous comments accompanied the answers to this question. These would indicate that this follow-up is not carried out as a formal part of the curriculum. Instead, this continuance of manuscript usage reportedly takes place in art where lettering is required, in mapwork, for displays and bulletin board work, and for poster work and charts. One school commented that, many use manuscript writing who have difficulty with cursive, while another replied it was used in spelling particularly. Others reported that their teachers were urged to maintain this skill.

These findings would seem to be encouraging to the many who believe that a skill worthy of two or three years of practice, should after that time be given further consideration and use.

**In-service training.** Two questions were included in the survey in reference to teacher preparation in handwriting. Although this area would not be considered a part of handwriting practices, its influence on the over-all handwriting program can be readily seen.

One method which can be utilized locally in training or re-training teachers is the in-service education program
in any of its several forms. The schools contacted by this survey were questioned as to whether they used any type of in-service training in connection with handwriting. The response indicated that thirty schools or 25.4 per cent were making use of some type of in-service education, while eighty-seven schools, 73.8 per cent were not. One school did not answer.

It is encouraging to note that two schools commented they were planning in-service work for next year, while many others who answered "no" suggested that they had in-service work in previous years, or that handwriting was discussed in faculty meetings.

Of those answering "yes", four indicated that training was given by primary and elementary supervisors or specialists. Others related the use of grade level meetings and bulletins as part of their in-service training.

Opinions as to teacher preparation. It would be difficult in this type of survey to determine the amount of specific training in handwriting of the teachers involved. However, it was thought that some indication might be gained by obtaining the opinions of principals as to the preparation of teachers. The principals were asked whether they felt that teachers on the average had
received adequate training for the teaching of handwriting in the elementary grades. Of those questioned, forty-two principals answered yes, sixty-four (54.2 percent) answered no, seven answered yes and no, and five did not indicate.

The reasons for the yes and no answers were expressed in comments on this question. These people stated that primary teachers were usually well trained, but that intermediate teachers have often had no specific training. Others agreed with this but answered no on the basis of teachers on the average.

Other opinions were that young teachers were not being as well trained in this area as was the case in previous years. Some stated that training institutions should put more stress on handwriting. Two respondents suggested that prospective teachers be required to earn a writing certificate before graduating.

V. COMMENTS AND OPINIONS CONCERNING HANDWRITING

The last question on the survey requested comments as to practices being employed in the teaching of handwriting and opinions concerning the place of handwriting in the intermediate curriculum. These comments are summarized in the list that follows:

1. Several schools noted that less emphasis is being placed on handwriting than in previous years.
One suggested that it was given the least consideration of any key subject, but expected a change of emphasis in the near future. Some believe that one reason for the lack of emphasis on handwriting is the crowded curriculum, with handwriting becoming incidental or overlooked. Handwriting, it was commented, seems to be stressed more in the primary grades.

2. Though some schools noted the lack of emphasis, one believed handwriting was beginning to get more attention because of popular criticism. Whatever the reason, many schools reported they are aware of inadequacies and are striving to find the correct approach. One school reported an evaluation of its program with the aim of improving it and possibly. .."integrating it with other subjects, especially spelling and language arts." Others reported that they were studying their handwriting programs with plans of changing systems of handwriting. Three of these schools have the Rice system presently, but as one stated . . . ."I do not feel that the old Rice or Palmer systems justified the time they took . . . ." Still others reported on having adopted new systems or plans for in-service education next year.

3. As to what direction these reported improvements are taking handwriting practices, one suggests that it appears to be moving away from the integrated program to a use of both the integrated and separate subject approach. At least ten others commented that a separate period for handwriting should be included in the curriculum. Some also stress a definite amount of time set aside or a definite number of periods a week. These periods, a few stated, are needed to develop proper letter formation, height, slant, and relaxation in writing.

4. Certain schools suggested the importance of insisting on good handwriting in all subjects with the opportunities for meaningful handwriting experiences which these areas offer.

5. Reported more often than any other factor, was the stressing of legibility. Neatness, fluency, and comfortable position were also indicated for points of emphasis.

6. In regards to other practices, two schools suggested that the transition period be delayed until
the latter part of the third grade, or that the transition time be lengthened. One of the schools reasoned that . . . . "cursive becomes the only writing used before good form can be established."

7. One school was reported to be experimenting with "finger fitting" pens and using a formalized program. Another stated that a very complete guide had just been completed after a year of research and study. A helpful guide for classroom teachers, The New England School Development Council's Handwriting Today, was highly recommended by one source.

8. In the area of motivation, one principal states that showing his interest in a class's handwriting improvement seems to produce an upgrading of work by both teachers and pupils. Another school uses a different type of motivation, that is, giving certificates at the end of the year for the most improvement in each grade.
CHAPTER IV

THE SUMMARY AND CONCLUSIONS

The purpose of this study has been to survey the general nature of current practices in handwriting within a group of schools in the state of Washington and to determine the relative importance of handwriting in the intermediate curriculum of these schools.

A study in the area of handwriting could of first importance be utilized as a basis for re-evaluation of handwriting programs by administrators, supervisors, or committees within a school or district. Also a survey would fulfill a need for general study in an area which has received considerable criticism from educators as well as parents; and would expose areas for future study and investigation.

I. SUMMARY

Review of the Literature

A review of the literature reveals that handwriting has at times, been considered an art; but essentially in origin and in present day use it is a tool, utilized by man for self expression. Originating from man's need to transmit ideas, handwriting progressed from the early
scratched and carved inscriptions, through the development of an alphabet, the gradual modification of letter forms, and finally to the joining and slanting of letter forms into the cursive style writing of today. Manuscript writing, taken from the print-writing of the medieval monks, was introduced in the United States in 1921 and is now an important part of the handwriting program.

**Handwriting preparatory to the intermediate grades.** Reviewing the literature in regard to early handwriting experiences, it was found that in the present day school the child starts by writing meaningful words and the letter forms are established as they are needed. The large majority of schools use manuscript writing for initial instruction because of the simple strokes suited to immature muscles, its similarity to the reading alphabet, the early accomplishment of satisfactory results, and other related reasons.

The materials used are suited to the larger writing employed in initial instruction with the size of writing, materials and instruments decreasing as the child moves up through the primary grades.

There are special problems in handwriting to be met on the primary level and of these, left-handedness
seems to be the most frequent in occurrence. Tests are performed with those showing a left handed preference to determine which hand they are more skillful in using. If they show more skill with the left hand or object strongly to changing they are usually given instructions similar to those for right handers in the matter of form, but the positions of the body and the paper are reversed. Left-handers seem to find manuscript writing easier.

The transition from manuscript to cursive style writing is effected in the second grade by some schools, but the majority make the changeover in grade three. The transition is said to cover an average of from four to six weeks in time.

Handwriting in the intermediate grades. The literature pertaining to the intermediate grades observes that the trend on this level is toward a more simple and more legible style of writing.

Surveys as to methods and time employed in the teaching of handwriting receive a wide variety of responses. However, a majority of the schools surveyed do give regular handwriting instruction as opposed to incidental practice. An appropriate time allotment as evidenced through both practice and investigation is a daily period of fifteen minutes. However, some believe
that seventy-five minutes a week is considerably over the actual average time spent on handwriting.

Primary emphasis in practice periods is placed on legibility, with speed next to be considered, and quality or appearance desirable but not necessary. Drill, where used, is usually aimed at removing individual difficulties. Two factors considered to be most important to the legibility of writing are proper letter formation and proper spacing; while other factors are alignment, uniform slant, and line quality.

Movement in handwriting is a compromise between exclusive arm movement as opposed to finger movement. The finger and hand muscles are used in letter formation and are guided across the page by the wrist and arm. A natural, not tense, grip on the writing instrument is suggested and body position should be comfortable.

In the area of materials, instruments, and systems it is stated that pupils in the elementary grades have refined their writing skills to the point of using adult materials, that is, ordinary sized pencils and the regular three-eighths inch ruled paper. As the use of fountain pens and ball point pens increases the pen and ink are used less and less.

The ovals and push pulls, and the traditional systems which emphasized them, are still evident in many schools, but new commercial systems which are more consistent with
present philosophy are being utilized. The majority of schools do use commercial systems, while others use locally developed systems and some use a combination of the two. A small percentage of schools do not, according to surveys, make use of any system, either commercial or local.

The literature indicates that a sizable number of schools combine handwriting in some method with other subjects. One of the main areas for correlation is spelling while reading is used considerably, especially in the lower grades. Practice material is also taken from other areas of the curriculum and likewise handwriting is stressed in all subjects where writing is employed.

Evaluation in the handwriting program is used not only to measure progress but also for diagnosing and correcting faults. Methods of evaluation are commercially and locally developed handwriting scales, teacher judgment, and pupil self-evaluation. Handwriting scales measure quality and generally utilize specimens of varying degrees of quality for the basis of measurement. Measurements of speed, which are not too widely used, are accomplished by ascertaining the number of letters per minute in a memorized piece of material, over a two or three minute period. Methods of self-evaluation have diagnostic merits within the handwriting class but also
teach the pupil to be critical of his handwriting in all situations. Teacher evaluation of handwriting in all areas should be continuous, and corrective measures suggested where they are needed.

Manuscript writing is used for posters, maps, and similar projects in the intermediate grades where cursive is the predominant style of writing. A few schools continue manuscript writing through the grades and much of the literature on handwriting makes mention of the relative merits of manuscript and cursive and gives reasons why manuscript should or should not be continued through the grades. The reports of research are conflicting but conclude that for the present manuscript writing should be taught and used in the primary grades and cursive writing utilized after that time, however further study is needed in this area.

Methods and Procedures of the Study

Through the use of a questionnaire a study was conducted within a group of schools in the state of Washington to survey the current practices in handwriting and their relation to the curriculum of these schools.

To a sampling of the group, one hundred fifty in all, questionnaires were mailed. Of these schools, which were limited to smaller first class districts and
larger second class districts, one hundred eighteen or 78.6 per cent completed and returned the questionnaires.

The returns were tabulated in their totality to present the general nature of handwriting programs in the schools sampled. Other tabulations and evaluations were made in order that correlations or deviations in certain areas might be shown and to indicate possible trends.

The Results of the Survey

For purposes of showing the results of the survey, the study was divided into five sections: (1) Practices in early handwriting experiences, (2) practices relative to the place of handwriting in the curriculum, (3) practices in the use of systems and materials, (4) practices in special areas of consideration, and (5) comments and opinions concerning handwriting.

The results are summarized within these divisions.

Practices in early handwriting experiences. A summary of responses as to early handwriting experiences show that 95.8 per cent of the schools use manuscript for initial instruction, while two schools use both manuscript and cursive, and three did not answer as they have intermediate grades only.
The transition, it was indicated, takes place in the third grade in 77.1 per cent of the schools. With the exception of two who did not indicate, the remaining schools change from manuscript to cursive writing in grade two.

Practices relative to the place of handwriting in the curriculum. Most schools favored a combination of methods in presenting handwriting, that is teaching it as a separate subject and through planned integration also. Fourteen of the 118 schools responding teach handwriting as a separate subject only and twenty-three schools use the method of planned integration. The main area of integration was spelling, with language and reading next in preference.

The time allotted to handwriting was from one to two hours per week in the majority of schools queried. Many commented that the time spent was closer to one hour.

Practices in the use of systems and materials in handwriting. A commercially prepared system of handwriting was reported in use in 61 per cent of the schools responding. It was also revealed that fifty-two schools of the 118 queried had locally prepared guides available for their teachers. Some schools use both the commercial systems and local guides for their handwriting programs,
but the trend seems to be toward not having local guides where commercial systems are used, and this trend of guide usage is reversed where commercial systems are not utilized. The commercial systems which were reported most often were the Rice, Zaner-Bloser, and Palmer systems, in that order. The use of these commercial systems in some of the schools reporting is optional.

Measurements of quality in the form of handwriting scales are used in 50 per cent of the schools reporting. The majority of scales used are teacher-made. Of the commercial scales in use, those designed by Ayres, Freeman, and West were reported.

Measurements of speed seemed to be considered of little importance to those responding, as only six of the 118 schools reported their use.

Practices in special areas of consideration. A question in regard to left-handedness revealed that 65.3 per cent of the schools surveyed gave some special consideration to left-handers in the handwriting program. Many comments as to techniques used in this area were received.

Follow-up training in manuscript writing, not usually formal in nature, was reported by 52.2 per cent of the schools. Follow-up was reported through lettering in art work, for displays and bulletin board work,
charts, posters, and similar projects.

Schools which are giving assistance to teachers in the form of in-service training in handwriting, amount to 25.4 per cent of the schools. Others reported plans for in-service work in this area within the near future.

Opinions of principals, reporting as to whether elementary teachers on the average were adequately trained in handwriting, revealed that 54.2 per cent felt that teachers had not received adequate training. It should be noted that these were opinions only and concerned teachers on the average. Comments included on this question revealed that some principals believed more stress should be put on training in this area by teacher training institutions.

Comments and opinions concerning handwriting. The comments were too numerous and varied to present a complete summary here. However, they seem to bring forth some general thoughts on the handwriting program. Less emphasis on handwriting in previous years was noted with many reporting they felt their programs to be inadequate. Several schools seem to be in the process of evaluating their programs and searching out the best approach to the teaching of handwriting. A need for definite periods of practice as well as integration was felt to be necessary.
The stressing of legibility was reported more often than any other factor, with some reporting emphasis on neatness, fluency, and comfortable position.

II. CONCLUSIONS

1. Manuscript writing is used predominantly for initial instruction in handwriting in the schools surveyed.

2. The transition from manuscript to cursive writing is effected in the third grade of approximately 77 per cent of the schools reporting.

3. Handwriting instruction is presented as both a separate subject and through planned integration in the intermediate grades of the majority of schools.

4. Where planned integration is used, the subjects most used for integration with handwriting practice are, in the order of their use, spelling, language, and reading.

5. The average time allotted to handwriting in the intermediate curriculums is between one and two hours.

6. Commercial systems of handwriting are used in some form in 61 per cent of the schools responding.

7. The commercial systems most widely used are, in the order of times reported, the Rice, Zaner-Bloser, and Palmer methods.

8. The survey indicated that slightly less than half of the schools replying had locally prepared guides
in handwriting available for their teachers.

9. Measurements of quality in the form of handwriting scales are used by half of the schools reporting with the majority of the scales being teacher-made.

10. Of the one hundred eighteen schools surveyed, only six reported the utilization of measurements of speed in their handwriting programs.

11. A good majority of the schools indicated that special consideration is given to left-handers in the area of handwriting.

12. Approximately half of the schools queried stated that some follow-up on manuscript training, not necessarily formal in nature, was given.

13. The use of some form of in-service education in connection with handwriting was reported by one-fourth of the respondents.

14. A slight majority of principals of the schools surveyed believed that elementary teachers on the average had not received adequate training for the teaching of handwriting.
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C. PAMPHLETS


APPENDIXES
APPENDIX A

(The Questionnaire)
Kindly check all items in the series which apply to your school.

1. How many pupils are enrolled in your elementary school?
   (a) enrollment 1 --- 50
   (b) enrollment 51 --- 150
   (c) enrollment 151 --- 300
   (d) enrollment 301 --- 500
   (e) enrollment 501 --- 750
   (f) enrollment 751 --- 1000
   (g) enrollment more than 1000

2. Number of grades in your school.
   (a) Grades 1-6
   (b) Grades 1-8
   (c) Kindergarten - 6
   (d) Kindergarten - 8
   (e) Other

3. What type of handwriting is used for beginning writing in the first grade of your school?
   (a) Manuscript
   (b) Cursive
   (c) Other

4. If your answer to question three is manuscript, when do you effect the changeover to cursive?
   (a) second grade
   (b) third grade
   (c) fourth grade
   (d) do not change
   (e) comment

5. Is there any follow-up on manuscript writing in your intermediate grades?
   (a) Yes
   (b) No
   (c) Comment

6. What is the place of handwriting in the curriculum of your intermediate grades (grades 4, 5, 6)?
   (a) Separate subject
   (b) Planned integration with other subject or subjects
   (c) Both of above
   (d) Not included in the curriculum
   (e) Other
7. If integrated, with what subjects?
   (a) Spelling
   (b) Reading
   (c) Other

8. What is the average amount of time per week devoted to handwriting, other than incidental instruction, in your intermediate grades?
   (a) 1 to 2 hours
   (b) 2 to 3 hours
   (c) 3 to 4 hours
   (d) 4 to 5 hours
   (e) More than 5 hours

9. Is a commercially prepared system of handwriting used either as a guide or in the form of a workbook?
   (a) Yes
   (b) No
   (c) Comment

10. If the answer to question 9 is yes, what system or systems are used?
    (a) Authors or publishers

11. Is a locally prepared guide for handwriting available to your teachers?
    (a) Yes
    (b) No
    (c) Comment

12. Is any type of in-service training in connection with handwriting offered to your teachers?
    (a) Yes
    (b) No
    (c) Comment

13. What measurements of quality of handwriting are used in your intermediate grades?
    (a) Ayres Scale
    (b) Freeman Scale
    (c) Gray Scale
    (d) Teacher-made Scales
    (e) Not used
    (f) Other
14. Are measurements of speed of handwriting used in your elementary grades?
   (a) Yes
   (b) No
   (c) Comment as to type of measurements

15. Do you give any special consideration to left handed pupils in your handwriting program?
   (a) Yes
   (b) No
   (c) Comment

16. Do you feel that teachers on the average have received adequate training for the teaching of handwriting in the elementary grades?
   (a) Yes
   (b) No
   (c) Comment

17. Any comments as to practices you are using in the teaching of handwriting or opinions as to the place of handwriting in the intermediate curriculum will be appreciated.

APPENDIX B

(The Letter Which Accompanied the Questionnaire)
March 28, 1957

Dear Sir:

The attached questionnaire is part of a survey being made under the guidance of Central Washington College of Education. The survey is being made to determine the place of handwriting in the curriculum of a group of elementary schools in the state of Washington and the methods and materials employed in its teaching.

Since the survey is based on a selective sampling, your report will be vitally important to the validity of the results and your cooperation greatly appreciated.

Upon your request a copy of the results of this survey will be sent to you.

In order to facilitate the tabulation of the results we would appreciate having this questionnaire returned by April 20, 1957.

Thank you for your cooperation.

Sincerely,

D. H. Ellertson

Enclosures:
  Questionnaire
  Stamped Envelope