Experimental typefaces of *William Addison Dwiggins*: Falcon, Charter, Arcadia, and Stuyvesant

Tiffany Wardle

Dissertation submitted in partial fulfillment of the requirements for the Master of Arts in the Theory and History of Typography and Graphic Communication, University of Reading, 2000.

Contents

Acknowledgments

There are many people to whom I am very grateful for the help and assistance that was received while working on this project. The amount of information that was needed to do justice to this topic would not have been acquired without them: Roberta Zonghi, Keeper of Rare Books and Manuscripts and William Faucon, Curator; both representing the Boston Public Library, W. A. Dwiggins Collection, Rare Books and Manuscripts Department; James D. Birchfield and Claire McCann, Manuscripts Librarian both representing The University of Kentucky Libraries, Chauncey Hawley Griffith Papers, Special Collections Department.

I would also like to thank all of those people that assisted me at various, if not all, times during the long process of writing. Especially when it came down to the editing and re-editing of this dissertation. Their patience and hours of assistance kept me alive and afloat.

Archive Sources

WADC

The William Addison Dwiggins Collection, Rare Books and Manuscripts Department, Boston Public Library.

While visiting the Boston Public Library I was able to study the original drawings made by Dwiggins, and read, as well as transcribe from, the collection of correspondence from among others C. H. Griffith, the Type Director for Mergenthaler Linotype Company. Permission was also granted to trace various original drawings of Dwiggins.

CHGP

The Chauncey Hawley Griffith Papers, Special Collections Department, University of Kentucky Libraries. The information cited from this source includes: correspondence compiled and transcribed by C. H. Griffith, drawings, type proofs, and specimens. There was no information found that would lead someone to believe he had further intentions beyond telling the story behind the separate faces himself. These proved invaluable as he had included his own comments and side notes as he transcribed, thus providing his point of view as well. When he would include a thought within a letter from Dwiggins, he placed it within parentheses. When I have quoted these notes, they have been included as Griffith had typed them.

The transcribing was done with respect for what had been written. Such things as underlining, parentheses, ellipses, italics, and brackets appear as they were written. I have added brackets and ellipses as necessary. Photocopies have been included of certain items, including most proofs as it was felt that scanning would only cause further deterioration. All illustrations are referred to within the text as "[figures X]" and photocopies are referred to as "[Sleeve X]".

Introduction

William Addison Dwiggins was a man of many interests, skills, and passions, which included: playwright, puppeteer, marionette maker, costume designer, set maker, author, book typographer, illustrator, and type designer. Many have written about the man and his talents,[1] although few exclusively about his typeface designs. In general, they have concentrated on the types publicly released from the Mergenthaler Linotype Company, and if at all, only briefly discussed the type design experimentation that occurred. The purpose of this dissertation is to provide a close look at four of the experimental type designs that Dwiggins developed with Linotype during their 27 year relationship: Falcon, Arcadia, Charter, and Stuyvesant. Together these demonstrate the essential elements of Dwiggins' ideology and methodology behind letter shapes and type design. Each typeface will be discussed in terms of theory, time, inspiration, process, and correspondence written from those involved.

When John Kristensen wrote the article "The experimental types of W. A. Dwiggins,"[2] he considered Paul A. Bennett's essay "WAD and Linotype" which appeared in Volume 2 of *Postscripts on Dwiggins*, to be "the most important account."[3] Although these two provide the most published information about the experimental work, also to be included in this list are: Walter Tracy's book *Letters of credit* and its chapter dedicated to "The type designs of William Addison Dwiggins;"[4] the writings of Alexander Lawson, including his book *Anatomy of a typeface*;[5] and Gerard Unger's essay "Experimental No. 223."[6] This essay provides a

---

[1] Agner, Dwight, The Books of WAD; a bibliography of the books designed by W. A. Dwiggins (San Francisco: Alan Wolfsy fine Arts, 1977)

[2] Kristensen, John, 'The experimental types of W. A. Dwiggins,' *American proprietary typefaces*, David Pankow ed. (New York: American Printing History Association, 1998)

[3] [ibid.] p. 150.

[4] Tracy, Walter, *Letters of credit: a view of type design* (London: Gordon Fraser, 1986) pp. 174-94.

[5] Lawson, Alexander S., *Anatomy of a typeface* (Boston: David R. Godine, 1990)

[6] Unger, Gerard, 'Experimental No. 223,' *Quaerendo* Volume XI, Number 4, Autumn Edition (1981) pp. 302-24.

detailed look into the history of type design and creation from the first half of the twentieth century through the work of W. A. Dwiggins.

History

The only autobiographical piece that Dwiggins ever wrote was given to Carl Purington Rollins and stated:

> Dwiggins, William Addison, Typographer and Carpenter-Artist; Black and White-Smith. b. Martinsville, Ohio, 1880; Richmond, Indiana, Cambridge, Ohio; Chicago, Illinois, Boston, Massachusetts. Resident Hingham, Massachusetts. Member Boston Art Club, Boston Society of Water Color Painters, the Society of Printers. No school. Secretary, the Society of Calligraphers… that is all.[7]

This was written before he became a designer of type. However, had he written this later, as Jackson Burke pointed out, "there need not have been an added entry to cover his work with type."[8]

Why Dwiggins wrote "no school" is also interesting, because at the age of nineteen, in 1899, he moved to Chicago, Illinois, to study at the Frank Holme School of Illustration. While there he met Frederick Goudy, and under his instruction Dwiggins' "intense interest in lettering"[9] expanded and he began to perfect his talent in working freelance for various advertising companies in the Chicago area.

In 1903, together with his bride Mabel, Dwiggins moved to Cambridge, Ohio. Once there, he started his own press, but it quickly proved financially insufficient for the newly married couple. It was at this time that the Dwigginses received an invitation from Fred and Bertha Goudy, with whom they had become close friends, to join them in Hingham, Massachusetts. While the Goudys soon left for New York, the Dwigginses remained in Hingham.

For the next 19 years Dwiggins had a career as a designer and illustrator in advertising. [figures 1, 2] In 1922 he was diagnosed with

---

[7] Burke, Jackson, 'Black and White-Smith: W. A. Dwiggins,' *The Penrose Annual* Vol. 45 (1951) p. 17. The ellipses appear as they did in the article.

[8] [ibid.]

[9] Thomajan, P.K., 'William Addison Dwiggins,' *The American Printer* (September 1950) p. 15.

diabetes.[10] Conceivably it was this diagnosis that prompted him to turn his back on advertising and "make every day count." Dorothy Abbe, a close companion of Dwiggins said, "he resolved thenceforth to satisfy himself."[11] This diagnosis did not keep Dwiggins from remaining in motion throughout his career. He was, in fact, "handicapped by the clock and calendar," and the "twenty-four hour day [was] not long enough." With so many ideas to be realized, he wanted to champion "for a reform in the time system."[12]

The lettering artist

Before Dwiggins began designing type he had already formed opinions and written about both their use and design. In 1919, he wrote an article for the publication *Direct Advertising* about the proper attributes for roman letterforms.[13] He discussed "the graphic signs called letters," and explained, "the qualities of letterforms at their best are the qualities of a classic time: order, simplicity, grace."[14] Close inspection of the illustrations used in the article showed hints of the future letterforms in Caledonia, and there was quite obviously what would become his lowercase 'o' for a type design called Tippecanoe [figure 3]. It would be shown that this same ideology was unaltered through his years as a type designer.

But where did such ability come from? From the sum of his years practicing calligraphy, hand lettering, and typography for books, publications, and advertising.[15] In 1924 he started to design books for

---

[10] At this time it was a life-threatening disease, because insulin was not yet available. Although it soon became available, giving Dwiggins another 33 years.

[11] Heller, Stephen, 'The man who invented graphic design,' *Eye* Volume 6 (1996) p. 30.

[12] Hollister, Paul, 'Note, To be filled in a Corner-Stone,' *W.A.D.: The Work of W. A. Dwiggins shown by the American Institute of Graphic Arts at the Gallery of the Architectural League* (New York: American Institute of Graphic Arts, 1937) p. 8.

[13] Dwiggins, W.A., *MSS by WAD: Being a Collection of the Writings of Dwiggins on Various Subjects: Some Critical, Some Philosophical, Some Whimsical* (New York: The Typophiles, 1947) pp. 39-50. The article from 'Direct Advertising could not be found, but was reprinted in this book.

[14] [ibid.] p. 39.

[15] Within the archives at the Boston Public Library there exists page after page of tracings and ink drawings that demonstrate his ability. In a box labeled "Experimental," there are countless ideas for sans serif and serif types; several examples have his own writing labeling them "news headletter." [figures 9, 10]

Alfred Knopf, the publisher of the Borzoi editions. Using his skills in design and calligraphy, Dwiggins created over three hundred books for Knopf [figures 4, 5, 6]. Dorothy Abbe stated that "the design and execution of hundreds of hand-lettered commissions, however mundane, served as superb training in the anatomy of letter forms."[16]

Through experience, Dwiggins learned to rationalize the shapes of letters and he arrived at an understanding of how they worked together. He realized, "letters as we use them today are modifications or degenerations of pen forms."[17] For instance, in his lettering for *The Christian Science Monitor*, he created type illustrations for various headlines. They would take his drawings, photographically reduce them to size and strip them into the news page. Nevertheless, he was not creating decoration and it was important for his lettering to look like type, not calligraphy.[18]

In addition to skill, he also needed the ability to understand the client's wishes. In doing work for *The Pictorial Review* [figures 7, 8],[19] Dwiggins said he "had to assume that the likes and dislikes are arbitrary, personal, i.e., not founded on knowledge of letter anatomy."[20] This demonstrated an ability to balance his own ideology and methodology with what the client deemed suitable for a given project.

Those that knew Dwiggins personally, admired his work and had opinions about "the formulas by which he endowed words onto paper."[21]

---

[16] Abbe, Dorothy, *William Addison Dwiggins: a talk delivered to the Bookbuilders of Boston, April MCMLXXIII* (Boston: Boston Public Library, 1974) p. 9.

[17] Dwiggins, W.A., (New York: The Typophiles, 1947) p. 42.

[18] Although it is beyond the scope of this essay to discuss his lettering skills in detail, other examples of his skill are the hand-lettered or manuscript books that he so carefully produced. Three samples have been included to further demonstrate his skill. [figures 11, 12, 13]

[19] Although in this instance it would become type, it began as hand lettering.

[20] WADC. This drawings found with this quote did not have reference to a specific company. However, within the box that contained Folio #57xxb and Folio #58xxb, there were some drawings for a script type. Dwiggins had some notes written with these describing the steps of trying to design a script for people referred to as "the powers." A letter was found within the Charter folder from the Kentucky Archives that had drawings that matched this script. In the letter it discussed a script that Dwiggins had been working on for *The Pictorial Review*.

[21] Hollister, Paul, 'Note, To be filled in a Corner-Stone,' *W.A.D.: The Work of W. A. Dwiggins shown by the American Institute of Graphic Arts at the Gallery of the Architectural League* (New York: American Institute of Graphic Arts, 1937) p. 5.

Paul Hollister wrote about more than just Dwiggins' type designs and lettering, but he knew Dwiggins' method could apply to any of his work. In discussing this, Hollister stated:

> He uses literally neither alcohol nor the coffee, but he jumps up and down with each task corked in his skull, and presently there drains off onto paper through his fingers a pattern, a page, a letter, a graph which puts new life into old thoughts.[22]

Others simply stated matter-of-factly that "by long training, letter forms just naturally came to flow from his fingers" and his types were "the crystallization of his own calligraphic hand."[23]

Dwiggins and Mergenthaler Linotype

In 1928, Dwiggins wrote a book titled *Layout in Advertising* [figure 14]. For some time it was considered the definitive book for those interested in advertising, and its audience was not limited to designers and practitioners. His book caught the eye of many people, among them, Harry L. Gage of the Mergenthaler Linotype Company.

In the book, Dwiggins asserted that the "typefounders will do a service to advertising if they will provide a Gothic of good design."[24] Impressed by this statement, Gage wrote to Dwiggins on February 25, 1929, and asked, "what do you mean 'good design?' And having defined it, would you like to illustrate it? And if so would you like to see it cut?"[25] Gage and the others at Linotype must have been aware of the market demand, and had been searching for a designer to produce a sans serif for them.

Two days after he received the letter from Gage, Dwiggins responded. He mentioned the typefaces Futura and Kabel [figure 15, 16] from Germany, and the new sanserif designed by Eric Gill [figure 17] that had yet to be released in the States. He said that "these new faces [were] fine

---

[22] [ibid.] pp. 6-7.

[23] Ruzicka, Rudolph, 'W. A. Dwiggins, Artist of the Book,' *More Books: The Bulletin of the Boston Public Library* (June 1948) p. 209. Ruzicka was referring to the typeface Electra.

[24] Dwiggins, William Addison, *Layout in Advertising*, first Edition (New York: Harper and Brothers Publishers, 1928) p.24. It should be mentioned that in the revised edition of this book, released in 1948, he had removed this plea. In America the term 'gothic' was used to describe sans serif typefaces.

[25] CHGP. Letter from Harry L. Gage to WAD, dated February 25, 1929.

in the capitals and bum in the lower-case," and he was not sure if "you [could] make a gothic that is good in the lower-case." However, he agreed and said, "I should like to go into it with you very much."[26] With this same enthusiasm, he endeavored to create type throughout the remainder of his life.

By May of 1928, Gage had visited Dwiggins in Hingham and discussed the details of a gothic type that would be designed.[27] Soon after this visit, Gage wrote to C. H. Griffith, the Typographic Director for Linotype, discussing how "keenly [Dwiggins] desired such a co-operative arrangement with a type founder or composing machine company."[28]

They had also discussed the terms for an exclusive relationship with Linotype, wherein Dwiggins would become not only a type designer, but also act as a consultant for various other type design projects. Apparently, Dwiggins had been in conversation with Melbert B. Cary, Jr. discussing the possibilities of designing a sans serif type for the Continental Typefounders Association.[29] However, this time, as in future occasions, Dwiggins' health would keep him from travelling too far abroad. In 1929, at the age of 49, Dwiggins started on a new facet in his career, that of a type designer.

Starting in July 1929, under contract with Linotype, he received $208.33 per month.[30] That month he also showed $1000.00 extra from Linotype deposited in his work journal. This journal ended in May of 1934 and the last "Lino" entry was April 12.[31] In 1929, Gage had estimated a yearly cost of $7000.00,[32] this included three typeface designs per year and up

---

[26] CHGP. Letter from WAD to Harry L. Gage, dated February 27, 1929.

[27] This 'gothic type' is what became Metro. [figure 18]

[28] CHGP. Letter from Harry L. Gage to CHG, dated May 13, 1929.

[29] This is confirmed by the mention of Cary in this letter, and also from Alexander Lawson's Book *Anatomy of a typeface* (Boston: David R. Godine, 1990) p. 332.

[30] WADC. The information concerning deposits and monies involved were transcribed from "Work Journal #5: 1918-1937." The entries appeared under the heading "Lino" within his journals.

[31] Based on the organization of the entries, and the contract under which he worked with Linotype, it could be assumed that deposits were regular.

[32] CHGP. Letter from Harry L. Gage to Chauncey H. Griffith, dated May 13, 1929.

to ten experimental cuttings.[33] Dwiggins also did various design projects and worked as a consultant that resulted in extra money not included in the contract. As late as 1956 they had again renewed his contract.[34]

Type design and experimentation

Throughout the 27 years of his working with Linotype, it was always a team effort. Dwiggins would have an idea, get some trials down on paper and pass them on with appropriate comment. "Griff," as Dwiggins referred to him:

> … would telephone his reaction often, or sometimes write, and give counsel on the purpose of such a face, its fitness for function, and its possible place in the typographic roster.[35]

While only five faces were ever released to the public from this team, there were also many experiments done, all based on an idea Dwiggins had for improving some part of the typographic roster at Linotype.[36]

By definition, the word *experimental* leads to a misunderstanding of the types that were not released by Linotype. Every design deemed suitable for experiment, or in other words for trial cutting, by Griffith and Dwiggins was given an experimental number for referencing purposes.

---

[33] WADC. There was no proof of payment found to confirm this. There was also receipt from Mergenthaler for $297.00 in May of 1937, but it could not be coordinated with anything from within the work journal.

[34] While a dated contract could not be found, there was an undated contract contained in the W. A. Dwiggins collection at the Boston Public Library. This contract is referred to in a letter dated February 18, 1954, Dwiggins became an independent contractor and was no longer an employee of Linotype. Refer to Appendix A for the complete transcription.

[35] Bennett, Paul A., ' WAD and Linotype," *Postscripts on Dwiggins* 2 Volumes (New York: The Typophiles, 1960) p. 215.

[36] To date, the experiments with Linotype number 16. Included in this list: Charter Exp. 222, Arcadia Exp. 221; Newsface Exp. 223; Falcon Exps. 70, 249, and 266; Winchester Exps. 264, 264a, 287; [Revised] Arcadia Exps. 265 and 287; Tippecanoe Exps. 268 and 283; Stuyvesant Exp. 274; Experimentals 267A and 267D, based on Times Roman; Experimental 289, based on Cheltenham; Adventure Exp. 288; a humanist sans serif referred to as Experimental Nos. 10, 11A, and 11B; three of Greek design that were not assigned experimental numbers: Argo, Jason and Stentos; and a roman face called Alexandria based on Greek Modelling. Arcadia was only counted once, as it is believed that when Dwiggins started work on the face the second time they were based on some of the original ideas. The humanist sans was a design previously started with Melbert B. Cary, Jr., president of Continental Typefounders Association. This list does not include the typewriter experiments done with International Business, Remington Rand Inc., Underwood Elliott fisher Company, or United Business Services. Nor does it include a script type he was developing with American Type Founders based on his hand lettering from the book *WAD to RR*. Neither does it include his stencil letters nor his musical notation types.

Even those typefaces that were publicly released were first known under experimental numbers.[37]

Dwiggins had many ideas for type, but realized "that his experiments in letter design [meant] nothing unless they [were] actually cut."[38] Linotype must have noted his enthusiasm for type design, and knew it was in their best interest to include his various experiments within the contract. Gage suggested that they should "agree to cut trial characters of any face that [Dwiggins] may propose."[39]

It was not due to a lack of effort, or desire, that these types were never completed for the public. Within the history of their relationship, Dwiggins and Griffith enthusiastically went about designing type, but it always had to be both appropriate and useful for the typographic roster at Linotype. As a team, they shared the process; Griffith made suggestions to enhance the design, and Dwiggins constantly offered his ideas on such technicalities as fitting. As late as 1947, listed as "new faces to come"[40] in a brochure for an exhibition honoring American type designers, not only were Electra, Caledonia, and Eldorado shown, but also some of the experimental types.[41]

Although the redirection of resources at Linotype for the Second World War and the onset of photocomposition hindered the release of and need for the experimental designs; it was more likely the failing health of Dwiggins and the retirement of Griffith from Linotype that stopped them from being publicly released.

---

[37] This included two of Linotype's most successful faces, Electra (Experimental No. 55) and Caledonia (Experimental No. 78).

[38] CHGP. Letter from Harry L. Gage to CHG, dated May 13, 1929.

[39] CHGP. Letter from Harry L. Gage to CHG, dated May 13, 1929. Gage suggested this amount be "not more than ten such trials a year."

[40] *American type designers and their work: 1947-1948* [Exhibit Catalogue] (Chicago: R. R. Donnelley, 1947) p. 10.

[41] This list included some of the typefacess never publicly released.

Experimental No. 70

The typeface Falcon began out of Dwiggins' desire to "see how successful [he was] at drawing a face in the large scale of [Linotype's] tracings."[1] Dwiggins had rationalized that "the closer [he could] get to the machine the better." Up to this point, he had only been sending ink drawings at 120-point size.[2] These new outline drawings were the size that the drawing offices at Linotype produced. Griffith explained this as "the dimension of standard factory working drawings, scaled approximately sixty times one ,[3] whereas the usual procedure of type designers [at this time was] to work to the scale of ten times one , or letters which are about two inches high."[4]

It had been only 3 years since they began their working relationship, and these drawings, labeled "Cambridge,"[5] served two purposes for Dwiggins, the first:

> You will understand that I am not trying to short-circuit any of your shop operations in sending drawings of this kind. The closer I can get to the machine the better the result. Subtleties of curves are important … and if I can make drawings that can be used in the large size I have got one step closer to the machine that cuts the punches. The drawings may not be as sharp as you require, but the intention of them is plain enough, I think. They are not tracings; the forms are worked out on the sheets and then reduced to fine line boundaries. They are made free-hand without French curves.[6]

This demonstrated both the degree to which Dwiggins was intent on being involved in all aspects of designing and producing type, and the method by which he did so. Because of previous experience both as

---

[1] CHGP. Letter from WAD to CHG, dated April 1932.

[2] Dwiggins always referred to this as 10 x [times] 12-pt.

[3] One being equal to twelve points.

[4] CHGP. Explanatory note added to a letter from WAD to CHG, dated April 1932. Griffith continued: "In transferring characters from the lesser scale to shop drawings by our draughtsmen there is always the possibility, by the use of French curves, of losing subtle nuances of curves and line in the original. The large scale has the further advantage of enabling the artist to control his line dimension with great precision, for a dimension of .001 of an inch in the finished type character is represented as one-sixteenth (.060) of an inch on the large drawing … . This experiment was entirely successful, and thereafter all WAD's drawings were made on the large scale."

[5] Although Griffith noted that officially it was known as Experimental #70.

[6] [ibid.]

calligrapher and lettering artist for various publications, type design was a natural progression for him.

Experimenting with a new method of design, the second "purpose" behind sending these scaled drawings, was that of a type experiment:

> The face is my own pet old-style that I use when hand-lettering an old-style. It is not a copy of any particular face. It will have characteristics that range it with various existing faces, but I think that it will separate far enough from the ones you will think of to make it a specific font with its own individuality, texture and style.[7]

Dwiggins mentioned the relationship his own lettering had to the drawings. Doing so confirmed a point previously mentioned that from the beginning he had drawn very heavily from his own hand-lettered style in designing type. Although not specifically mentioned as a third "purpose," Dwiggins wrote at the end of the letter: "Bruce Rogers [said] you can't draw a face of type in this way—i.e., large scale outlines. I should like to see."

During late spring and summer of 1932, as Dwiggins continued to play around with "Cambridge," Griffith remained uninterested in the experiment. In May, by way of response to the three test characters [Figure 19] that were cut, Dwiggins said, "there is a new face here with [a] highly individual look—and yet sound Old-style."[8] Sending new drawings for a few of the test characters, Dwiggins wrote in June, "you will do with this material what you choose, of course: put it away or cut test letters. I wanted to get it off my chest while the ideas were going good."[9] Dwiggins finally made a full pitch for his idea in August:

> A word on 70: It may not strike you as a particularly needed face, but I have an idea in suggesting it. Your Garamond is a weak sister;[10] if 70 stands up to what I hope, it will supply a color and style that will do what your Garamond should have done. The individual characters seem smart and stylish; if they combine well the face ought to be a smooth reader. I have tried in the 70 for a fluid; 'molten', face—suave, and running along like melted lead … . The 70 is a kind of letter

---

[7] [ibid.]

[8] CHGP. Letter from WAD to CHG, dated May 27, 1932.

[9] CHGP. Letter from WAD to CHG, dated June 22, 1932.

[10] Griffith noted here that he was not referring to Linotype's "Garamond No. 3."

> that I have many times wanted for certain kinds of book texts. It has no tricks, nor conspicuous oddities, but I think may show up quite subtile [sic] aristocratic qualities if I have managed the blend right.[11]

Griffith commented that these drawings, after cutting, "did not blend satisfactorily, as expected in WAD's letter."[12] [Figure 20] However, and in spite of this, Dwiggins was undeterred. He responded with a numbered list of thoughts on the "old-style" experiment. Two of the three ideas were revivalist in notion:

> (1) Make a new Garamond based on the French source that inspired the present Garamonds; and make a letter that will be in every way an A-No.1 face of that model, better than Goudy's and A.T.F. and all of them.
>
> (2) Attack along the Cloister trail: go back to Italy and romance, and do somewhat as Monotype did with Poliphilus—make a face that would be romantic to the nth power, dripping with the essences of the First Great Years.[13]

The third idea listed could be viewed as the first turning point in the experiment. Dwiggins said, "with a mind influenced by memories of 'old-style' letter anatomy meet the machine—design a sharp-finished old-style." [Figure 21] He described it as "a letter that moves with the old-style curves, but everything is sharply finished—no brackets, no puddles."[14]

Dwiggins sent some drawings along with this message not knowing quite what would happen, wondering if it might be "too dazzling for human eyes." But also thinking it could create "an entirely new page texture, crisp and vigorous and stimulating." His resolve was set on making something new. He knew that without some kind of innovation, the 70 could only be viewed as a revival or "just another old-style." At the end of the letter however, perhaps jokingly and hoping for a quicker response, he closed the letter with the usual 'Dwiggins-esque' remark:

---

[11] CHGP. Letter from WAD to CHG, dated August 5, 1932.

[12] CHGP. Letter from WAD to CHG. Comment referring to the letter dated August 5, 1932.

[13] CHGP. Letter from WAD to CHG, dated July 11, 1935.

[14] [ibid.] In this same letter Dwiggins had written, under "idea no. 2," "that the calligraphic secret of romantic letters is *flowing ink*—ink that puddles, and flows back from one line to another making round *flowing* contacts and pools and puddles … . The puddling quality is what is left out of the modern cuttings … . The 'puddle' of romantic type might be thought of in connection with changes in planographic printing where the printing ink *flows* on a surface instead of being *stamped* in."

> You can put this essay and the tracings into the file, and pull them out and talk about them some time when you get interested and the weather is cool.[15]

Experimental No. 249

July 22, 1936, Dwiggins wrote to Griffith acknowledging that although he had made several attempts with 70 over the years, it "never seemed to [him] enough different from existing faces, nor 'nervous' enough to justify its being finished." Dwiggins submitted a list of "musts" that this type design contain, along with drawings that were "individual enough to step away from its relatives and to promise a specific new texture."

> Must be compact set without hurting legibility. Must have enough color to work on smooth paper, and in newspaper advertising. Must be an A-No.1 letter anatomy. Must have 'running' quality, so that the letters solder themselves together into words. Must have no Tricks. Must beyond all (for our purpose) be different enough from similar existing faces to justify its existence.[16]

Dwiggins believed he had created a design that followed that list. He could not be sure of how different it was until after he had seen it on the page, but he compared it to Garamond and Cloister. Dwiggins did not agree with any kind of historical revivalism and neither did Griffith. However, he needed to be able to place the old-style that he was designing within the typeface range at Linotype so Griffith could visually understand what he was doing. "Shapes narrower, more snap than Garamond in curves, and a little lighter than Garamond. Pretty close in color, maybe, but action and detail different [from Cloister]."[17] Dwiggins submitted in this letter that perhaps one solution to simply reviving an old font would be to "introduce little trade-mark effects that look like a more

---

[15] [ibid.]

[16] CHGP. Letter from WAD to CHG, dated July 22, 1936.

[17] [ibid.]

'nervous' tune."[18] This is when Experimental 70 became Experimental 249, and it received the name Falcon.[19] Griffith noted:

> Further to the development of the ideas expressed in the foregoing (July 22, 1936) letter, WAD submitted drawings of new characters, filed with the original in order, which were cut and shown on Proof No. 1, 5-26-39, as Experimental No. 249.[20]

Dwiggins realized what he needed to do. He did "take the 'old-style' shapes as a starting point," but applied a different method of getting there. Until now, it was assumed that the drawings submitted to Linotype were done at 60 times 12-point or 720-point size,[21] because there was not mention of either ink drawings or stencils within the correspondence. However, proof that he did work in this manner does exist from several other projects.

At this time, Dwiggins had been creating drawings, or what he referred to as "abstract ornaments," that were "trade mark" in there effect. Sharp, crisp, and non-conformist art [Figure 22, 23] that served as decoration in the books he designed and the magazines for which he illustrated. He described them as "severe, steel-spring, conic-sections curves: junctions sharp and square." He took this process and applied it directly to his "old-style" type design. "I submit," he said of it, "that the result is an entirely new feeling in type—a machine-age interpretation of a classic theme. My bet is that the sharp finish will not trouble legibility—[this] point can be settled only by trial, of course."[22]

In 1937, Dwiggins wrote a letter in response to a question put to him by Rudolph Ruzicka on the matter of type design. In 1940, slightly expanded, Dwiggins published this letter.[23] It served as an excellent

---

[18] [ibid.]

[19] The name Falcon, Dwiggins explained, derived from looking at the lowercase letters. "[They] somehow make me think of the word *Falcon*—something keen and swift and high-flying." Although in later correspondence Dwiggins said it was due to the "beaks" that the serifs possessed.

[20] CHGP. Letter from WAD to CHG. Comment referring to the letter dated July 22, 1936, and the letter that followed, dated February 11, 1937.

[21] It is impossible to give a definite size in which Dwiggins worked because both he and Griffith have also said that he worked in 64 times 12-point. For consistency, 60 times 12-point, or 720-point, will be used as this is the size that Griffith used in the CHGP.

[22] CHGP. Letter from WAD to CHG, dated February 11, 1939.

[23] Dwiggins, William Addison, *WAD to RR: a letter about designing type* (Cambridge, MA: Harvard College Library, Department of Printing and Graphic Arts, 1940)

example of the steps he took in designing Revised Falcon 249, as well as other designs.[24] Although Griffith previously mentioned that Dwiggins' experiments in drawing to 60 times 1 size had been successful, and quantities of drawings in this size existed, it proved that Dwiggins continued to draw at 10 times 12-point size, or 120-point, dimension [Figure 24].

It also demonstrated another of Dwiggins' techniques of type design: his stencils. [Figure 25] That Dwiggins utilized not only stencils, but he also continued to use pencil, pen and ink, did cause some confusion. Neither correspondence from the Chauncey Hawley Griffith Archives in Kentucky, nor that from the W. A. Dwiggins Collection in Boston made clear the dates at which Dwiggins commenced using his stencil technique for the Falcon designs.[25] The word "stencil" did not appear in the correspondence from Kentucky until March 11, 1939,[26] and the correspondence from Boston did not begin early enough to verify any dates.[27] The correspondence indicated the stencils had been used at least as early as July 21, 1937, by which time he had begun drawings on Experimental No. 249. However, it was understood from the original date of the letter to Ruzicka, and the reference to his "abstract ornaments," the stencil technique was not used on the earliest version of Falcon, known simply as Experimental No. 70. Dwiggins' illustration technique was derived from the stencils,[28] therefore, in the letter of February 11, 1937 in which he discussed the Revised Falcon 249, he had used stencils in order to arrive at the desired effect.

The stencil technique for his illustrations was created by using the stencil as a pattern. For example, he would drill a set of holes into a stencil and use that same set multiple times to create the desired effect.

---

[24] In a typescript of the correspondence sent to C. H. Griffith from W. A. Dwiggins, there is a section entitled "The beginning of Experimental No. 249. Revised Falcon."

[25] WADC. These stencils are kept within the archives in Boston. They are not dated.

[26] CHGP. Letter from WAD to CHG, dated March 11, 1939, Dwiggins mentioned studies "of a sharp-finished old-style project, inspired by your enlargement of stencil letters."

[27] WADC. The correspondence for Falcon from this collection did not begin until May 31, 1939.

[28] This could also serve as a reason that others who have written about Falcon, such as Paul A. Bennett, do not consider Experimental No. 70 as part of the Falcon story, as it was previous to Dwiggins' experimenting with stencils. Although from the transcript, Griffith clearly considered Experimental No. 70 to be the first stage of the Falcon design.

[Figure 26, 27] Dwiggins applied this same idea to his type designs. He would create an arch, for instance, and this same arch would be used to establish uniformity in all those arches found in the various letters of the alphabet. [Figure 28, 29] In the letter written to Ruzicka, he explained:

> In making Falcon I tried another scheme for arriving at the characteristics of the first-run experimental letters. I cut stencils in celluloid–a long and a short stem, the 'n' arch, and a loop—*twice* the size of twelve point—pretty small!—and constructed letters from these elements by stenciling.[29]

Dwiggins continued, with every succession of the face, to give reason and explanation for the design. It was in Dwiggins' articulate nature that he explained exactly what had been done with each progression, both to Griffith and to himself. In April 1939, discussing the latest drawings of Falcon, he described his inspiration as:

> … Something brisk and colorful to set a tale like *Treasure Island* in, e.g., picturesque, romantic, north-west wind, blue-sky, sea horizon, wide spaces, going somewhere new and thrilling. It is calligraphic—but not so much to be troublesome. The sharp finish will get it away from all the 'art' old-styles, I think, the ones that [George W.] Jones loves—more nervous, more snap.[30]

In this same letter, Dwiggins outlined the details of design for Falcon 249, such as fitting and sidebearing requirements, serif structure, and the nature of the italic and its relation to the roman. He had "kept close to the action of the 24-point stencil" that he had previously created, which Griffith had photographically enlarged for him. These enlargements had shown him the details that he looked for in the "old-style" experiments, "much better than any of [his] 10 times 12-point drawings—grand swing to the arches, and a fine loop for the round letters." He also mentioned that the "weight of the serifs will be a part of the style if [they could] get it right," and the technique would be the means whereby he applied this

---

[29] Dwiggins, William Addison, *WAD to RR: a letter about designing type* (Cambridge, MA: Harvard College Library, Department of Printing and Graphic Arts, 1940). p. 2.

[30] CHGP. Letter from WAD to CHG, dated April 23, 1939.

style. For the serifs, he looked for something "sharp thin-seeming," and that would be "contrasting with the stems."[31]

The italic in mind, Dwiggins desired a character along the lines of the Fell type. However, he realized the duplexing requirements would cause some problems, because the roman was not as narrow as the Fell in structure. Griffith explained duplexing:

> … Corresponding characters of roman and italic, or roman and black face, are on the same matrix and of [the] same width, e.g., as in typewriter letter bars—called "duplexing."[32] [Figure 30]

At the end of the letter, Dwiggins mentioned the two test characters that he had sent along with the others. In designing the capital letters for Falcon 249, Dwiggins had applied a technique that he referred to as "the 'M' formula."[33] The "M" stood for "marionette." He explained this as "the entasis in the stems [would not be] got by curves, but by straight lines meeting at an angle."[34] In a letter he wrote the next day, he took the idea one step further:

> Singular thing about available book faces: how nearly the caps are all alike—you can almost use any set of caps with any lowercase without anybody noticing.
>
> Means that caps do not have much relation to their associated lowercase—a kind of tradition for type caps *per se* has been established and never departed from. Lowercase varies, but caps do not. Caps ought to vary, too, according to the specific action of the specific face. Yes, yes.
>
> I send some experimental caps for Falcon that have the same action as the lowercase. Chief departure from the above-mentioned tradition is in modeling of loops. They get away from the stem with a half-thick stroke [Figure 31] instead of a point [Figure 32], which last is a modern-face motion. The

---

[31] [ibid.] In designing Experimental 223, one of the designs never to be publicly released, Dwiggins wrote he needed a word to "describe a certain attribute of letter-shapes." He came up with the word "action." Refer to Appendix C for the transcription and illustrations to which this corresponds.

[32] CHGP. A note written by Griffith in September 1956 in response to a letter from WAD to CHG, dated April 23, 1939.

[33] The marionette formula is something that Dwiggins repeatedly used in most, if not all, of his type designs. Because of this, it is important to understand the formula and how it applies to Dwiggins' type designs. See Appendix B for the complete transcript of this formula.

[34] [ibid.]

> Falcon lowercase is very much this way, so why not the caps, if it can be done without being arty. If it comes out arty, no go.[35]

Dwiggins desired to be innovative in all he did; this kept him separate from most other type designers of that day. Until someone, such as Griffith, explained to him why something did not work he seemed to refuse to recognize this as fact and continued to apply his methodology to the letters.

The first proof of 249 was completed on May 26, 1939 and Dwiggins was pleased. He wrote to Griffith upon receipt that they were "all that [Griffith] said it was—a natural."[36] He explained to Griffith the effect for which he had hoped, and why this was so important:

> Foot Serifs on lowercase, I aimed to have a sharp thin serif. Question is: are they too thin? … I don't want to lose the acid quality of a thin foot—don't want 'em to come out thick and blunt.[37]

He was so confident in Falcon, barring some minor adjustments, he suggested they "go to the expense of turning [his] thin papers into working drawings, just to have them safe."[38]

Because Dwiggins designed for a system that used duplexing, and as it was also the order in which Linotype generally worked, the italic design would not begin until the roman design was completed. However, this time in addition to proofing four of the roman characters, three lowercase and one capital, they also cut a lowercase italic '*n*'. Concerned that the style of the italic be appropriate with the roman, and could tell that this first test had not been successful. Dwiggins explained:

> … Needs straight lines in it somewhere, and also needs color in the arches at the top to go with the blob of color in the roman [Figure 33] at the top of the letters—don't know quite how to get it. The Fell has color there [Figure 34], but the Fell letters are too narrow for duplexing. A round arch doesn't

---

[35] CHGP. Letter from WAD to CHG, dated April 24, 1939.

[36] CHGP. Letter from WAD to CHG, dated May 29, 1939.

[37] [ibid.]

[38] [ibid.]

> carry the right color [Figure 35] and seems to belong to the modern formula.[39]

May 31, 1939, Griffith responded to the interest shown by Dwiggins as to the serifs and the italic:

> Before experimenting further with the serifs … I will have proofs made up on calendered book stock. It is my feeling that these foot serifs should be held as light as possible, consistent with sharp printing, so as to obtain advantage of maximum contrast with the stems. Certainly we cannot use brackets.
>
> With regard to the italic what I had in mind … was to avoid the loose appearance which I find so objectionable in our regular Baskerville Italic. I do not anticipate any trouble finding a solution. I should like to see, however, a little more contrast between the italic and roman in the Falcon than we had in the Caledonia.[40]

You would suppose that a lettering artist would be concerned only with relationships of the letters or words that they have drawn. But a type designer must be concerned not only with the letters as single units, but also the many combinations in which they will appear in usage. Such was the case with Dwiggins. A good example of this concern appeared in a letter he sent to Griffith after reviewing proof no. 3:

> One point I'd like to have your eye-result on at this stage—we pared down the 'd' stem to .01325 because the assembled lines made [it] look heavy to me at [that] spot… also, 'h' in the proof is .01375 in this region. In 'dh' seen together the 'h' stem is appreciably heavier than the neighboring stem of 'd'. This will occur also in 'dk' (and what else?) The 'dm', etc., combination does not show this, the stems of 'm' and 'n' at this point measuring .0135. Now, to my eye, this variety in weight is good, making a ripple in the line of letters, giving a kind of written look to the line. But I ask you, is there going to be too <u>much</u> ripple—I am not saying there is, I am asking <u>you</u>.
>
> My word would be: let her ripple, but if you think not, now is the time to catch it.[41]

For Dwiggins to see the visual effects of the details, and intelligently comment on them in a way that Griffith's understood, was not out of the

---

[39] CHGP. Letter from WAD to CHG, dated May 29, 1939.

[40] WADC. Letter from CHG to WAD, dated May 31, 1939.

[41] CHGP. Letter from WAD to CHG, dated July 22, 1939.

ordinary. This was standard practice. Although it might be asked why Dwiggins worried about such combinations as 'dh,' 'dk,' and 'dm,' as they rarely occur, at least in the English language.

Still in the early proofing stages of Revised Falcon 249, Dwiggins started thinking over the figures. In type design, the points and figures are equally important to the letters of the alphabet. As he designed type, he always seemed to have the book typographer in mind. August 3, 1939, he wrote to Griffith and asked:

> Numerals: Old-style? or lining? or both? (both—CHG). I'd like, in my selfish way, to have old-style for book work, but I suppose old-style is out for general use. (Both styles always provided in old-style faces—CHG).[42]

Griffith responded, skeptical from previous design efforts made on figures, and shared his thoughts and experience on this subject:

> With regard to the numerals, I am sure we shall require both the old-style and modernized (non-ranging and ranging). I hope, however, that we can get a good sturdy roman figure. I had so many kicks about the figures in Caledonia that I am becoming a little bit dubious about radical departures from conventional lines. The 3 and 5 excite more comment than the others. I look over the A.T.F. Bulmer, but these figures are too decorative. We have had more trouble with the figures in the Scotch face than any other, principally because of their irregularity and movement. Figures are hard enough to read at best, and unless they are restrained to the utmost degree and blend completely with the test they are apt to make the page spotty.[43]

As it happened, Griffith chose not to go forward on the figures until the upper and lowercase drawings were finished. He did, however, set up a printed proof in late September of the typeface thus far completed. Griffith sent the smaller text sample to Dwiggins for his approval:

> I should like to have a more extensive [test] and am therefore setting a signature from twelve to sixteen pages of a normal size book page … . This will give about five minutes continuous reading. I want to get the reactions of several

---

[42] CHGP. Letter from WAD to CHG, dated July 22, 1939.

[43] WADC. Letter from CHG to WAD, dated August, 8, 1939.

> people on the 'flicker' potentiality. From what I have seen of it it doesn't bother me.[44]

He did not critique the letters this time, but did mention minor problems that needed adjusting on the lowercase 't' and 'o' characters. He felt "the color texture of the page is very pleasing and full of warmth and action, above all there is nothing like Falcon in our entire line of faces."[45] The working drawings of the upper and lowercase, that had been completed previous to printing the proof, were sent along with the proof to Dwiggins:

> The first look at the pages … made me a little ill. But close and prayerful study showed me where the cure was to be applied. The face is so promising in general that I think it is worth coddling.[46]

Dwiggins agreed with Griffith as to the two lowercase characters, and added the 'g' and the 'r' also to be fixed:

> The 'g' needs an entirely new swing and balance to make it ride with the other round letters—the ones I made are more 'modern face' than old style, and it is interesting to see how that 'modern' feeling fights the other letters. The 'o t r' need more room to swing in, too narrow and mean.[47]

After reading through many of the archives, fitting seemed always to be something that would keep Dwiggins preoccupied, even more so than the actual letter shapes. With Falcon, it was no different. "But here is the main point, and I feel pretty sure about it: the flicker and rattle comes from a missfire in the fitting." Within the transcript, next to this statement, Griffith replied, "He is off the beam here."[48]

> Here is a case where that ratio I was talking about—stem: counter: interval—is highly important. If it can be hit upon it will make all the difference in the world in the smooth action of the design.[49]

---

[44] WADC. Letter from CHG to WAD, dated October 2, 1939.

[45] [ibid.]

[46] CHGP. Letter from WAD to CHG, dated October 5, 1939.

[47] [ibid.]

[48] [ibid.]

[49] [ibid.]

He continued to theorize about an ideal ratio that could be used. He assumed, after he studied the drawings, that the sidebearings were measured from the outermost edge of the character to the matrix edge. Griffith pointed out that this was wrong, "sidebearings in general practice [were] measured from stem, disregarding serifs and other projections." Dwiggins continued to break down the intervals, or what he perceived they should be, for several more of the characters. He hoped to find a "laboratory's 'optimum' in fitting interval all through." But, in general, he was pleased with the outcome and found it to have "good muscular movement in the good characters," and the "color to be … right." [50] As of December 6, Dwiggins continued to study the proof previously sent him:

> I have been sopping up impressions from your Falcon pamphlet (11-29-39). It is a grand way to get a strangle-hold on a new face. The letter shapes are just about dead right.
>
> About fitting I have a strong urge: a little more air … . I may be goofy about all this, but I have a strong hunch that a little more air would do wonderful things to the flow of the line.
>
> In general I think we are close to a fine letter—the weight is right, and the shapes throughout seem first chop.[51]

Sending new drawings that replaced the 'g,' 'o,' 'r,' and 't' characters, Dwiggins had had more time to find fault in a few more character fittings and made suggestions. The 'g' character was redrawn again in March 1940, as were the 'r' and 't' characters. The "action" of these, as Dwiggins saw it, would be improved.

The necessity to have short descenders on the 'g,' 'p,' 'q,' and 'y' characters in order that they fit on the 12-point body had also concerned Dwiggins. In previous correspondence, Griffith explained this:

> The caps 'J' and 'Q', non-ranging figures, parentheses, brackets, various reference marks, and all other characters except the five lowercase descenders, would be better if made on 12-point body as you have provided. This would greatly simplify manufacture, without affecting the face, if we should be called upon to supply normal descenders for casting on 12-point body, as we have been required to do for Electra,

---

[50] [ibid.]

[51] CHGP. Letter from WAD to CHG, dated December 6, 1939.

> Caledonia and Fairfield. In fact I have established this procedure as standard practice in connection with all faces which are originally made with long descenders.[52]

Griffith explained that this was carried through, and these characters were supplied with both long and short descender, those with long descenders were considered alternate characters.

On May 10, 1940, Dwiggins sent a letter to Griffith entitled "Causerie on Fitting, In Time of War! Hitler Begins His Spring Festival."[53] He admitted that his previous ideas on fitting were not correct, but could not understand that there was not an ideal method to be found:

> I take it, from our letter and talks at various times, that the question of Fitting is in some way an uncomfortable subject in your department. Possibly there is a conflict of opinions in the various departments about fitting—or something—I do not know just what—that makes the consideration of the problem a thing to be side-stepped as long as possible. At any rate it seems to be a hazy region in the technic [sic]—a place where everybody is uncertain just how to get about it … in spite of all this, each time I spend half-hour's study of our little Falcon, in the various proofs, I am the more convinced that the way to turn that face into a hum-dinger is to find the inevitable fitting that derives from the weights and proportions of the characters.
>
> I know that you agree with me because it is your own baby: That the eye alone can determine—that it can't be reduced to a numerical formula. I am all for that. But I can't give up the search for some system of attack that will help the eye—a method of comparison and deductions via the eye that will say what to do first and what to do next.[54]

In transcribing the correspondence, Griffith responded to some of the items mentioned in Dwiggins' letter. Griffiths' comments demonstrated the respect that he had for Dwiggins:

> This essay portrays with great clarity the philosophical processes of WAD in the pursuit of an ideal—incisive, logical, indefatigable—in the face of traditional technics. He once characterized himself as the new convert with a yen to march right up to the altar and handle the sacred relics himself. In the opening of this essay he announces his purpose …

---

[52] WADC. Letter from CHG to WAD, dated October 2, 1939.

[53] CHGP. Letter from WAD to CHG, dated May 10, 1940.

[54] [ibid.] See Appendix D, for this letter in its entirety.

> … and in reference to my theory opposing a numerical formula for fitting … [he] did not give up the search for the elusive formula of numerical fitting during the whole of the Experimental No. 249 effort, and explored every conceivable avenue of approach to it.[55]

On May 10, Griffith also sent remarks to Dwiggins on proof no. 5. It seemed they were of the same mind, as Griffith also discussed the fitting. As of yet, he was not "pleased with the present status of the fitting on this face."[56] Proof no. 6 did not see much improvement, and Griffith still did not want "to take the final jump"[57] until after the fitting issue had been resolved. August 8, 1940 Dwiggins responded to Griffith's concern:

> This galley (Proof No. 6) [Figure 36] makes me feel okay about the fitting … I can't see the … trouble you complain of; but go ahead: dicky around.[58]

Work had begun on the Falcon italic, and they had apparently looked through existing designs, including Janson and a Scotch derivative. In the same letter as above, Dwiggins wrote in regards to this and small capitals:

> Oddly enough the Scotch italic looks the best … The Janson is the one I should have bet on, but no. I have a hunch that for small caps I'd like to try my hand on a start, at least, to see what small modifications might be introduced; I mean variations away from the usual any-old-face small caps. [59]

In the correspondence that followed, discussion of small capitals continued. Dwiggins knew that the variation he had in mind was not what Griffith liked. He mentioned the fact that Dwiggins liked "small caps the same height as the lowercase, i.e., 'z' [x-height]; while [his] preference [was] for a height about .006 above the top of the lowercase for better visibility."[60] Dwiggins continued to describe the design for the small capitals:

---

[55] CHGP. Response made to the letter from WAD to CHG, dated May 10, 1940.

[56] WADC. Letter from CHG to WAD, dated May 10, 1940.

[57] WADC. Letter from CHG to WAD, dated July 22, 1940.

[58] CHGP. Falcon Transcript. Letter from WAD to CHG, dated August 8, 1940.

[59] [ibid.]

[60] CHGP. Response made to the letter from WAD to CHG, dated August 15, 1940.

> Your handling of small caps for Caledonia and Electra is good, but lacks that small touch of 'something' which would have made 'em 'inevitable'. I dunno what, but it is in the nice determination of color and proportion in relation to the lowercase. The small caps should derive from the lowercase somehow, instead of from the caps.[61]

In December 1940, they refitted the entire lowercase alphabet from notes indicated on proof no. 7 by Dwiggins. Griffith said they had "finally established a pretty good working coordination of the characters, and little, if any, further juggling [needed] to be done."[62] On March 31, Dwiggins agreed and responded with alterations only in the design directly on the previous thins with a different color pencil. The drawing office could then visually change there drawings as per his specifications. However, Dwiggins had sent them for Griffith's "falcon eye," and could be "modified as [he saw] fit."[63]

Griffith approved the changes and said, "the final touches to the … characters will just about clear up the roman cap and lower-case alphabet."[64] More interestingly though, were the remarks made on the drawings for the figures:

> I hardly know what to say about the design you have submitted for the old style numerals. As far as I know the use of lining old style characters has never been attempted in any Linotype face, although I have seen a few examples in exotic display types, but cannot place them at the moment … The design looks very good, and I am inclined to cut them.[65]

Confused, Dwiggins explained that his intention was "regular old style alignment (non-ranging)," and he had drawn "the descenders to go down to [the] usual 12-point body size."[66] The misunderstanding came from the fact that Dwiggins had not drawn them to the usual alternate character length of a 13-point body. In June, in spite of Dwiggins' effort to draw them to fit, Linotype made some changes to the figures to get them to

---

[61] CHGP. Letter from WAD to CHG, dated August 15, 1940.

[62] WADC. Letter from CHG to WAD, dated January 30, 1941.

[63] CHGP. Falcon Transcript. Letter from WAD to CHG, dated March 31, 1941.

[64] WADC. Letter from CHG to WAD, dated April 9, 1941.

[65] [ibid.]

[66] CHGP. Letter from WAD to CHG, dated April 10, 1941.

work on the 12-point body. However, Dwiggins was told that he could send new drawings if he did not approve of the characters. Griffith also said "they were far enough ahead with the roman to warrant going ahead with the italic."[67]

Griffith was anxious to get the 12-point finalized, and sent proof no. 8 to Dwiggins that same month. Pleased with the alterations suggested by Dwiggins, he had thought the "improvement to [his] eye… quite distinctive."[68] By July, they had proofed, redesigned, and proofed again the figures and the few remaining characters with changes. Very little mention of fitting occurred during this period. The scarcity of materials due to the war, however, was mentioned in a handwritten letter Griffith sent to Dwiggins on July 14, 1941:

> Matrix brass is getting pretty scarce and [we] are tightening up on new work, but this will not affect experimental work or drawings or punches—just new work.[69]

Griffith had also sent several examples of various roman and italic types to Dwiggins. Perhaps comparison work was still being performed as before with the Scotch and Janson italics, as they had not yet finalized the italic design to date.

During first seven months of 1942, Dwiggins worked out the design of the italic for Falcon 249. In March, things became confused because of the quick succession of three proofs. On proof no. 11, the roman and italic were compared as duplexed characters: 'H,' 'n,' 'd,' 'a,' 'i,' and 'm.' [Figure 37] Griffith found "the line weights and general feeling of the italic [were] just about what [he had] in mind, and [liked] the detail very much," he thought the proof to be promising, and approved Dwiggins to "proceed with the balance of the italic drawings."[70] With his usual attention for detail, Dwiggins responded:

> I'd suggest pushing the down-strokes ('m' 'n') in a little—less counter—which would make the finials longer … . Your stem

---

[67] WADC. Letter from CHG to WAD, dated June 5, 1941.

[68] WADC. Letter from CHG to WAD, dated April 30, 1941.

[69] WADC. Letter from CHG to WAD, dated July 14, 1941.

[70] WADC. Letter from CHG to WAD, dated March 3, 1942.

> weight for cap 'H' (.0145) good, but don't you think there should be a swing in the cap stems to get the motion that the finials give to the stem of the 'i', for example? [A] suggestion of a double curve … as this proof is, the cap seems to slant, right more than the lowercase. Make the cap serifs either a little heavier at the bottom, or else a little lighter at top? I'd say a little lighter at top—what you say?[71]

New drawings were sent for the lowercase italic characters, 'm' and 'n,' and revisions done on the italic uppercase 'H' and lowercase 'd.'

With the above changes made in proof no. 12, dated March 24, Dwiggins only altered the lowercase italic '*n*' and '*m*' characters. Having recut only those two characters, Griffiths felt these to be "exactly right."[72] Proof no. 13 was submitted for approval to Dwiggins.

On April 12, 1942, Dwiggins questioned if "the flow would be better if the finial strokes hugged in a little longer." [Figure 38] But, he was aware that "the roman [was] a rather wide-swinging character and made the open-swinging italic finials look right."[73] He wanted to see another mixed proof with alternating lines of roman and italic, thinking this would show if the finials needed to be changed. After a conference held in Hingham, on April 16, Dwiggins and Griffith approved the italic characters: '*H*,' '*a*,' '*d*,' '*i*,' '*m*,' and '*n*.'

On April 28, 1942, the lowercase drawings completed, Dwiggins mentioned problems in duplexing that they must have discussed at the conference. The drawings he sent were to solve that problem. He followed up shortly thereafter with drawings for the uppercase italics. The uppercase '*H*' working drawing from Linotype had been approved, and Dwiggins wanted Linotype to "shift over [his] 249 caps to the '*H*' slant and serif detail."[74] In both letters from July 14 and August 6, everything supposedly on schedule, Griffith remarked about the 14-point Falcon being carried through on a 13-point dimension. They had, by this time, charted and tested the series from 6- to 14-point. On August 6, Griffith

---

[71] CHGP. Letter from WAD to CHG, dated March 11, 1942.

[72] WADC. Letter from CHG to WAD, dated April 2, 1942.

[73] CHGP. Letter from WAD to CHG, dated April 28, 1942.

[74] CHGP. Letter from WAD to CHG, dated May 23, 1942.

must have received the following letter from Dwiggins shortly after sending the previous remarks. On August 5, Dwiggins wrote:

> This darn stencil letter [Figure 39] which was the lead-in to Falcon, keeps troubling me: because I didn't get the essence of it into Falcon. In spite of having finished up Falcon (Proof #14, 7-27-42). I keep trying from time to time to capture the essential quality in large drawings—not so much to produce another face as <u>just to see if I could</u>. This (August, 1942) is the last attempt—it gets closer than Falcon, but still fails to capture some of the fine points.
>
> Part of the style of the stencil is in the fitting: a straight-stem interval no much smaller than the 'm' counter.
>
> The stencil 'dimin' is pretty close to a perfect example of the ideal 'black-white' ratio: width of black stems in relation to the white paper between—the ratio in all black-and-white designs that make the designs 'fuse' into a unity.[75]

In the first letter, Griffith had made no mention of changes or revisions that needed to occur. In the second letter Griffith wrote, after he had read the previous letter from Dwiggins, he appeared to have completely changed his mind:

> Your letter and comments on the stencil relationship to the effort so far … is exactly in line with what has been passing through my mind all along. I have a feeling that somewhere along the line we have missed something that I cannot get my teeth into. It is an instinctive feeling … some element is missing which is needed to complete the picture.[76]

Falcon 249 not yet abandoned, Dwiggins thoroughly analyzed all phases up to that point. The problem, he decided, was either in the fitting or in the design. On August 7, 1942 Dwiggins sent his analysis:

> I wonder if the trouble with the fitting of a face is a sign that the said face is <u>faulty in design</u>? (I think so–CHG) For example, Caledonia goes together without a hitch. There isn't anything I should want to change in the No. 1 fitting of Eldorado … . On the other hand I have not been able to accept Falcon as a good face. And yet … <u>in the individual letter-shapes</u>, [it looks] mighty good.
>
> Either the secret of success with these two faces is concealed somewhere in the jungle of the fitting problem, or else they are somehow <u>faulty in design</u>. (In my opinion, the

[75] CHGP. Letter from WAD to CHG, dated August 5, 1942.

[76] WADC. Letter from CHG to WAD, dated August 6, 1942.

> failure up to this point has been due to WAD's effort to make 'fitting' a concomitant to 'design'. – CHG)[77]

Had Griffith waited for Dwiggins to come to the same conclusion that he already had? Dwiggins continued in the letter to state, step by step, the different things he noted about each proof throughout the design, specifically in the fitting, of Falcon 249:

> In Conclusion: I am inclined to think … that the Falcon design is not faulty as a design, (subsequently decreed as faulty – CHG) and that a uniform result, on the basis of [proof] No. 10 or No. 13 or No. 9 would be a cure—with a little help, maybe, handed out to the round letters.[78]

Following that letter, Griffith summarized the project in the typescript:

> Following a study of all the exhibits mentioned in the foregoing, and of the substance of the letter in question, I had a conference with WAD in Hingham. The result of this conference was to the effect that it was mutually agreed that the basic design of Falcon, designated as Experimental No. 249, had become so involved in the effort to implement the theory of 'numerical fitting', that it was hopeless to pursue this line of approach further. It was accordingly abandoned, and all drawings, patterns, punches, and matrices … were discarded and … eliminated from further consideration.[79]

Experimental No. 266

In the letter dated August 6, 1942, Griffith had said of Experimental No. 249, "we will eventually put our fingers on the elusive quality that is needed." He was "determined to carry [it] through to a successful conclusion, even if [they had] to recut it a dozen times."[80]

Although the experiment was closed, the idea was not. On August 18, 1942, with this last statement quoted as a motto in the opening lines of the letter, and a set of new drawings, Dwiggins stated his intentions:

> With this flag flying above me I got busy at once on a reconsideration of the whole Falcon project, root and branch,

---

[77] CHGP. Letter from WAD to CHG, dated August 7, 1942.

[78] [ibid.]

[79] CHGP. Note written after letter from WAD to CHG, dated August 7, 1942. p. 32.

[80] WADC. Letter from CHG to WAD, dated August 6, 1942.

> to see where I got off the trail on my dream, and what exactly was the substance of the Falcon I dreamed of.

The drawings he sent had been done in response to everything he disliked about Experimental No. 249. He credited Maunde Thompson's book Introduction to Greek and Latin Paleography, for the help offered by its specimens and examples:

> Falcon No. 1 (249) now seems terribly clumsy and heavy and dead in its modeling and in its proportioning. The essence of type design, as I get it now, is to hit a middle ground between the mechanical exactitude and the flow and variety of a written hand—suggesting some of the said flow and variety, but controlling it so the letter can be repeated—middle ground somewhere between Orcutt's Humanistic [Figure 40] and the product of a conscientious mechanical draughtsman operating with compass and straight-edge [Figure 41, 42]. Falcon 'B' is all drawn free-hand.
>
> I passed up the straight-edge lines, angular junctions and templates of No. 1 (249). But the big difference between No. 1 and 'B' (266) is in the weights and proportions. I find that ink-spread on the usual book-paper increases the printed line about .001 over the metal type. No. 1, already too hea vy and clumsy I my drawings, when printed on book-paper becomes plain stumpy.

Dwiggins wrote this letter previous to the assignment of 266 as the number for this experiment, and referred to the new drawings as 'Falcon B'. Throughout the typescript, Griffith used parentheses to add his thoughts and anything that needed clarity. It is assumed that Griffith added the '(266)' in the above for clarification.

The main fault with the roman characters for Falcon 249, according to Dwiggins, only appeared after printed on bookpaper. He had made his judgments on weight from the proofs of 249 that had been done on smooth paper. Therefore, when printed on bookpaper, as he mentioned the letter lost the desired effect. He had corrected this in his 'B' drawings, and explained part of the method:

> I think you will see how the arches and curves are much more lively and active, and consequently more graceful, in 'B' than in No. 1, thinning in these places [Figure 43], against the thicker effect in No. 1, [Figure 44] does a lot to correct the stumpiness of No. 1 … .

The italic of 249 had also suffered from ink-spread. He had designed the 'B' italic to closely follow the fitting of the 'B' roman, and said that if changes were made to the roman, these same changes would have to be applied to the italic. He had, however, continued to follow the ratio of stem-relation of the 249 roman to the 249 italic.

> … The No. 1 italic I don't like at all. Besides being clumsy in weight it is unpleasant in action, e.g., the sprawl of the finials [of the No. 1 characters] [Figure 45] against the nervous click of 'B'. [Figure 46] The 'B' action to my 1942 eye looks pleasantly written and flowing (No. 1 is rotten, not written). All this about drawings, of course; can't tell what the gods will do in reduction.

Still pursuing an ideal fitting, he applied his "hypothesis about uniform intervals between straight stems, long, short, arched, bumpy or plain."

> I have tried hard … to work out the mystery of the irregular round—and see, e.g., how you go about setting the sidebearings on an 'O'. I don't learn much (No rule [for??]it – CHG), but I do arrive at a kind of 'course-adjustment', such as I would space them in drawing—this is what is set down on the tins papers (correct procedure – CHG).
>
> Why I keep fussing. Given a series of similar shapes repeating themselves in the same rotation—the round of 'b c d e o p q' alongside straight stems [in] such a series—a 'designer of space' can't give up the idea that a little more uniformity could be made to prevail in the series than we achieve sometimes. One of the beauties of some of the old faces is this appearance of uniformity … the lack of it makes many of the faces that folks consider tops: [Bruce Roger's] Centaur for example, unpleasant to my eye. Brer Goudy seldom gets it. Morris got it in Golden, and Emery Walker in the Doves. Even such oddities as Rickett's Vale, and the Eragny, are 'somehow good' for having it. D. B. Updike's special faces do not have it.
>
> After All Which: There is accomodation to be worked out, of course—it isn't just simply writing down .014 beside every stem and letting it go at that (of course not – CHG).

---

[81] [ibid.]

> Moreover, the slight irregularities of space that result from accommodation, are an asset—a relief from the mechanical rigidity… But I want a way to keep the irregularities slight.

Having left the "rigidity" of the stencil, template and ruler, Dwiggins continued to insist on some way to "regularize" the fitting of type. Perhaps what those designers possessed that "had it" in Dwiggins opinion, was a good eye for fitting. Griffith said that it was not a formula. Dwiggins had said: "the eye alone can determine—that it can't be reduced to a numerical formula … ." It was the rationale of a modernist conflicting with the craft of a traditionalist that continued to plague Dwiggins with other designs as well.

After a few weeks, Dwiggins wrote again to Griffith suggesting the characters that he would like to see cut, if they continue with the 'B' drawings for Falcon. "In working 'B' over," Dwiggins mentioned the idea of "carrying [the] roman and italic along together, modifying each to fit each, i.e., designing the face with the duplexing problem to the front and center."[83] In the typescript, Griffith referred to this as a "practical procedure."[84]

On October 9, 1942, Griffith wrote to Dwiggins, "ready to make a fresh start on the Falcon project."[85] Linotype had put all materials with reference to 249 into storage. The drawing office and Griffith both approved of Dwiggins' idea for "carrying the roman and italic along together." However, Dwiggins' continued desire to search for an "ideal" fitting was hampered. Griffith knew that this was still a delicate subject, but was not convinced on the idea of it:

> As [far as] as new formula for fitting, I think we had better adhere to standard practice in the test characters. It is my understanding, however, from your comments of August 6th,

---

[82] [ibid.]

[83] CHGP. Letter from WAD to CHG, dated August 19, 1942.

[84] CHGP. Griffith included the following in a letter from Dwiggins, dated October 21, 1942: "Note: This method of drawing the respective roman and italic characters in concert is a departure from traditional technique, and has obvious advantages of accommodating each to the limitations of arbitrary width, as in typewriter characters, in the original drawing: in contradistinction to the prevailing practice of first completing the roman in its entirety and then adapting the corresponding italic characters to the arbitrary roman widths previously established and fitted, which imposed severe restrictions in italic design. – CHG"

[85] WADC. Letter from CHG to WAD, dated October 9, 1942.

> that this design should be a trifle on the loose side. Just how loose it is to be will depend entirely upon the dictates of design. I do not anticipate any trouble in meeting your wishes in this detail. I agree with you that slight irregularities in fitting enhance the spirit and interest of the type.[86]

Dwiggins responded on October 10, "tremendously stimulated" that they had chosen to continue on with Falcon. Assured that "266 was hot stuff,"[87] he continued with the instructions sent him by Griffith.

Drawings were sent by Dwiggins, completed lowercase roman and italic, to Linotype based on their agreed upon method. A lengthy letter accompanied the drawings stressing the necessity to keep this in mind as they produced the drawings, and if they cut any test characters. Dwiggins seemed settled to the idea of Linotype's scheme on fitting, but continued to make suggestions as to "how much" in various instances. In December, Griffith turned the thins over to the drawing office.

On March 4, 1943, proof no. 1 for 266 was printed. Dwiggins reviewed them and sent them back to Griffith:

> Roman lowercase please me immensely … Your fitting just right … I like the caps … Italic lowercase promises to be a natural … This Proof No. 1 comes mighty close to my picture and the things that looked promising in that small stenciled specimen that started the trouble. [Figure 39] The fact that you have hit the fitting the first try is promising, too.
>
> Falcon [266] is lighter in color than Falcon 249, and lighter than our Garamond, which is probably disappointing to you (No – CHG), but that lighter effect is what I aimed at in restyling 249.
>
> The question for you to settle is whether or not 266 is too much like other faces to warrant its being born—can't tell this, I suppose, until you get a bunch of it together. The letter-forms, for me, are A-1, and it looks like it would sock into words with a bang. Caps about right weight, yes? no? (Yes – CHG).[88]

They compared the Falcon 266 with the following typefaces: Caslon #2, [Figure 47] Caslon Old Face [Figure 48], Original Old Style, and Old Style

---

[86] [ibid.]

[87] CHGP. Letter from WAD to CHG, dated October 10, 1942.

[88] CHGP. Letter from WAD to CHG, dated March 4, 1943.

#7. [Figure 49] Later they would add: Garamond #3 and Caslon #137. Griffith felt the comparison proved its originality, and said "the color and general performance of the italic [seemed] rather promising."[89]

Minor revisions sent, the weight of the capitals approved, and fitting agreed upon, Dwiggins was pleased. In his next letter he mentioned the length on the descenders and only sent one revised character, the lowercase 'o', roman and italic:

> Extensive and intensive examination of the Falcon 266 No. 1 proofs leads me to think that you have got just exactly the old style letter I dreamed of in starting the Falcon adventure. Moreover I think that you have hit the fitting intervals precisely right to get the music into the line. If, as you say, you lengthen the descenders little Willie will be entirely happy about 266 … .
>
> You, as marketer, will need to consider this point: that 266 is so darn free of affectations that it looks like it had always existed, and not been 'designed special'. Maybe the music of it will come through in page composition plainly enough to set it out as a new contribution to printing types—can't tell yet … Anyway, papa is satisfied in a way that hasn't occurred with any child except Caledonia and Eldorado.[90]

Griffith had mentioned the length of the descenders in a letter sent to Dwiggins on March 15. They both agreed and the 'j' and 'p' descenders were lengthened by .007 in the drawing office. On March 19, along with proof no. 2, Griffith sent a letter expressing his thoughts and news of a positive opinion from the outside on Falcon:

> I feel exactly the same as you about the possibilities of this face. Carl Rollins dropped in the office for a few minutes yesterday afternoon while I was examining the proofs, and I took a chance and let him see the test line of 266 in comparison with the other faces. He studied it for about five minutes, and said that it looked like a face that had always existed, but he could not fix it in his mind—practically lifting the similar expression right out of your letter. practically lifting the similar expression right out of your letter. You can imagine his surprise when I told him that he expressed your feeling in practically your own words.[91]

---

[89] WADC. Letter from CHG to WAD, dated March 9, 1943.

[90] CHGP. Letter from WAD to CHG, dated March 16, 1943.

[91] WADC. Letter from CHG to WAD, dated March 19, 1943.

Griffith also mentioned wanting to see Falcon "perform in the mass" before they made further changes or revisions.

Pleased with the outcome, Dwiggins worked on the remainder of the drawings for the uppercase roman characters. On March 29 he sent these to Linotype, suggesting they start by cutting the 'M' and 'S':

> The alphabet on paper is about all I have to say per old style caps in the 266 range. There are a few tricks in the lot. A tiny 'trade-mark' trick is the top of the 'A' [Figure 50, 51], proper to the 266 calligraphy. I like to get in a touch of that sort, just something to mark the font.[92]

He also asked about the figures, but Griffith thought they should wait as "the numerals [would] require very careful treatment and should conform very closely to conventional Old Style designs."[93] He felt they needed to start by doing another comparison test from other designs. Perhaps Dwiggins misunderstood Griffith's intent, because on April 10 he sent drawings. The design was "more or less based on Janson, but a little wider."[94]

Linotype's participation in the war had caused restrictions on materials and equipment. Perhaps this was another reason that Griffith had been hesitant about starting on the figures. He might have wanted to be more sure of the design. Whatever the case, Griffith reminded Dwiggins of this:

> I think perhaps I have failed to advise you that we cannot afford to cut both long and short descenders in old style figures, and for some time now such characters have been confined strictly to the lowercase 'g j p s q' [and] 'y' [characters], all others in the font being of normal length for casting on their own body.[95]

On April 21, Linotype printed proof no. 3, which included the uppercase characters for several roman and one italic. These approved,

---

[92] CHGP. Letter from WAD to CHG, dated March 29, 1943.

[93] WADC. Letter from CHG to WAD, dated April 7, 1943.

[94] CHGP. Letter from WAD to CHG, dated April 10, 1943.

[95] WADC. Letter from CHG to WAD, dated April 14, 1943.

Dwiggins said "they'd be something new in the line of caps—very swagger—the thin lines look about right."[96]

June 23, 1943, Griffith sent proof no. 4 of Falcon 266. He was pleased with the results, and suggested they move on to a formal specimen, and not wait for the completion of the uppercase italic characters. Dwiggins responded with several remarks and only minor changes. Did he have to swallow some pride?:

> The revised Falcon 266 pleases me [to] no end. At this sitting it looks like tops—later, when the elation over the result has quieted down [I] will comment at length. (follows) After two days I see nothing that I would change. Your fitting is an example of my 'exactly right ratio' dope, on the smooth paper at any rate. If it is just your usual scheme of fitting (Yes – CHG), the specimen proves that your scheme is right, for the letters of normal build.[97]

In reference to Griffith's previous mention of punctuation, he remarked that they "ought to be made special." Dwiggins only found fault with two characters from the proof:

> All in All: I think this revised Falcon is going to be hard to beat. It just about says all I have to say re an 'old style' of this weight, both in the roman and italic lowercase. The slight swing of the roman stems comes through, and gives the line vitality … . Very much worth while scrapping No. 1 (249) and starting all over again.[98]

Griffith agreed with everything that Dwiggins said about the type, and said that he was "particularly glad to know that [their] usual scheme of fitting has been more successful than it was in the original project." Did he say this with a little sarcasm? "Afterall," he continued, "it proves that design controls the fitting. If the design is out of kilter in essential detail it is a mighty difficult job to correct it by fitting."[99]

In the same letter Griffith discussed punctuation. For the opening quotation mark, he suggested using an inverted apostrophe instead of the "conventional inverted comma." The idea was again pushed for using

---

[96] CHGP. Letter from WAD to CHG, dated April 23, 1943.

[97] CHGP. Letter from WAD to CHG, dated June 25, 1943.

[98] [ibid.]

[99] WADC. Letter from CHG to WAD, dated June 29, 1943.

previously designed points and marks, as Griffith felt them "so comparatively unimportant from a style viewpoint, that he questioned the wisdom of making special designs for them."[100] Dwiggins agreed.

By July 1943, Revised Falcon 266 is complete with the exception of the uppercase italic and some of the punctuation points. They printed a formal setting of the face, of which Griffith said, "the performance of the type speaks for itself."[101] Arthur Rushmore from the Golden Hind Press in Madison, New Jersey, wrote to Griffith speaking very highly of Falcon:

> This new Falcon is the cats' whiskers. It's beautiful to my untrained eye. Clear, open, readable as can be, nothing to fill up. The caps with the little pen touches are very fresh and charming … . I think the italic is swell and very readable while still obviously italic … Thanks for letting me see it. My best to W.A.D. He's one of the few people in the world who have [sic] fun.[102]

By February 1944, all revisions for the basic alphabet had been turned over to Linotype, those that remained to be drawn were the roman ampersand, italic figures and small caps. The fitting chart for Falcon had been printed and approved, and discussion had been opened on various sizes to be made. However, fitting again became an issue. Griffith wrote:

> I am interested what you say about the puzzling texture of Falcon in mass composition, which you describe as a buzz in the black-and-white effect. Something about it has given me an uncomfortable feeling since the pamphlet was printed, but I could never exactly put my finger on it. Each time I [looked] at it the fitting was dissected, and, as you say, for uniformity it seems to be about right, although I know of two or three spots that needs touching up.
>
> This design, just like it's predecessor [249], requires the utmost exactitude in letter separation, and if we don't get it it simply will not click.[103]

However, Griffith explained this event more succinctly in a note from within the Falcon transcript:

---

[100] [ibid.]

[101] CHGP. Note added by CHG. p. 44.

[102] WADC. Letter from Arthur Rushmore to CHG, dated August 20, 1943.

[103] WADC. Letter from CHG to WAD, dated February 9, 1944. The correspondence that Griffith referred to could not be found from either the archive in Boston or that in Kentucky.

> In February 1944, after close study of the performance of Falcon 266 as cut, under various page tests, WAD and I had some doubt whether the fitting was not too tight for good results on rough book paper. We made up a new lowercase alphabet with the fitting between letters increased uniformly .001. 1944, after close study of the performance of Falcon 266 as cut, under various page tests, WAD and I had some doubt whether the fitting was not too tight for good results on rough book paper. We made up a new lowercase alphabet with the fitting between letters increased uniformly .001. The test proofs, dated 2-29-44, show parallel blocks in the original fitting and the wider fitting.[104]

Dwiggins had apparently preferred the wider fitting, but in the end approved the original. Proof no. 7 completed, Dwiggins wrote with praise and no further desire to test:

> A very successful job: so papa thinks. Your success with sizes of Caledonia under 12 point makes me look forward to see what you do with Falcon in 11, 10, 9, 8, 7 and 6 point sizes. By all means via graph, if Caledonia is a sample of its gradation. Fitting in your hands … I do not think we need to make any more tests ourselves—on Falcon, I mean.[105]

Very little correspondence remained on Falcon after this time. In October 1946, it still appeared that they were working toward a release of the face. Dwiggins had apparently approved Griffith to have the drawing offices work up the small caps, as Griffith had written to him describing how they would go about it. In April 1947, he had anticipated Dwiggins' approval on the fitting of the small caps, and wrote to say they would be cut. General enthusiasm still existed, Griffith wrote:

> I am very anxious to get this face … completed in [its] entirety so that we can proceed on the drawing boards, at least, with the layout of the complete series … . P.S. London is very

---

[104] CHGP. Note added by CHG. p. 43.

[105] CHGP. Letter from WAD to CHG, dated April 7, 1944. Griffith explained graph as: "A method devised by [him] for charting and recording the predetermined visual proportions and basic dimensional data relation to each point size of a series, in this case 6- to 11-point … predicated on the norms established for the pilot 12-point size. The proportions of height and width and the thickness of stems and hairlines in each size are thus determined in advance of and as a basis for subsequent development of the indicated point sizes required for the series. Dimensional data on the graph is a recording of the visual conception of relative proportion. Visual conception is given a graphic test by cutting experimental characters of each size [Figure 52]. If found correct, the standard list of trial characters… are cut in each size for further test. After final approval of these, the letters draughtsmen proceed with letter drawings for each of the point sizes in the series. N.B., for perfect visual gradation of sizes, each is drawn separately, and none is cut from the master patterns or drawings of any other in geometrical proportion by the pantograph process."

> anxious to get started on Falcon for introduction to the British market.[106]

On September 18, 1947, Griffith wrote to Dwiggins about an exhibition for American type designers. Within the catalogue produced for the exhibition, Dwiggins was included as one of the designers. Falcon was listed under the heading of "New faces to come." From a letter Griffith wrote to Dwiggins in regards to this exhibit, he stated:

> The decision, and a timely one, to release to public view all the new and experimentals of yours that we have available seems to impose an obligation that we shall have to take in hand right off.
>
> The type-conscious visitor to [the] Lakeside Galleries and elsewhere, as well as the younger crowd of typophiles, when viewing the new faces will quite naturally show some interest.[107]

In October, they closed up the series, minus the final changes on the figures, and were still working into November. In June of the following year Griffith wrote to Dwiggins to check in and let him know where they were at on several projects, including Falcon:

> Think I told you that the full series of Falcon… [is] now on the active production schedule—that is, officially in production, and not orphans as has been their status for some years. I am getting them firmly integrated so no one can throw 'em out.[108]

The final proof on 12-point Revised Falcon 266 was printed on June 15, 1951 [Sleeve 1], and the 6-point version, June 17, 1952. [Sleeve 2] According to Griffith the manner in which it had been proofed was "the final test given to a font of new type before the matrices are passed [on] for stock and released for trade.[109]

When Griffith compiled the correspondence from the Falcon project, he wrote many supplementary comments throughout. As mentioned previously, some very informative notes were written in regard to a short essay Dwiggins wrote on the "Causerie on Fitting." Some of this was

---

[106] WADC. Letter from CHG to WAD, dated April 8, 1947.

[107] WADC. Letter from CHG to WAD, dated September 18, 1947.

[108] WADC. Letter from CHG to WAD, dated June 14, 1949.

[109] CHGP. Note added by CHG. p. 45.

previously mentioned, but the remainder gave the best explanation for the ending of Falcon:

> Whether in the end he was convinced that the numerical formula in theory was impracticable, remains a matter of conjecture. But after the lines of attack in Experimentals Nos. 70 and 249 had been exhausted, and the success of the new approach in Experimental No. 266 was in sight, he did say, 'you have got just exactly the old style letter I dreamed of.'
>
> In fairness to WAD, I am convinced the successful outcome of the project in Experimental No. 266 was due essentially to the fact this new design was made up of letters of 'normal' build, and that the method of fitting was only a contributory factor—complementing basic design.[110]

[110] CHGP. Note added by CHG. p. 24-A.

Experimental No. 221 / *Experimental* No. 222

The experimental designs known as Charter and Arcadia illustrated an innovative approach to the development of two distinctly different typefaces. Arcadia was developed as a roman type to be duplexed with an italic or script type, Charter. It was assumed that when Dwiggins sent the original drawings to Linotype, Griffith did not realize that they were intended to be used together. This would explain why the designs, in the beginning phases, had separate experimental numbers. However, on January 8, 1937, when Dwiggins wrote to Griffith concerning a new type experiment that he had in mind there was no mention of the script design:

> I send a start on the *Eve, Cochin, Egmont* project. A brochure type somewhere between Eve and *Nicholas Cochin. Egmont* is too cramped and stiff.[1]

Cochin [Figure 53] was the face designed by Georges Peignot for the Peignot Foundry in 1912, later adopted by ATF in 1926 and by Monotype in 1929. *Eve* [Figure 54], originally called *Koch-Antiqua*, was the design of Rudolf Koch for the Klingspor Foundry in Offenbach, Germany.[2] Dwiggins went on to explain the intrinsic nature of these types:

> The underlying fact about these faces is that they are all steel-pen derivatives—the kind of roman letter formed by a pointed, flexible steel pen [Figure 55]. It may be that my experiments soften down the penpoint characteristics too much; but you can't copy a written letter into a type, as you know. Tell me what you think and where to go from here.[3]

These were the beginnings of what Griffith later called a "foil for *Egmont*."[4] [Figure 56] This was said of Arcadia because it was intended to

---

[1] CHGP. Letter from WAD to CHG dated January 8, 1937. It should be noted that Dwiggins and Griffith often referred to the Arcadia face as "Brochure" or the "Brochure Experiment" throughout the project.

[2] In America, the type design *Eve* was known as *Locarno*.

[3] [ibid.] The correspondence from January 8, caused some minor confusion as to whether it discussed Charter 222 or Arcadia 221. Walter Tracy referred to this correspondence in writing about Charter, in fact, this letter referred to what became Arcadia 221.

[4] WADC. Letter from CHG to WAD, dated March 11, 1937.

compete against another advertising face known as Egmont, the Dutch type design of S. H. De Roos for the Amsterdam Typefoundry. Indeed, the desire for an advertising face was stressed again during the development of this face, as Griffith felt that Egmont had "completely failed its purpose."[5]

While drawings had begun on Arcadia 221 first, Dwiggins had at least started on Charter 222 before March 8, 1937, because when Griffith wrote back to Dwiggins on March 8, he referred to proof no.1 which included both designs.[6] Some thought these types should be discussed separately and perhaps in their earliest conceptions they should, but as of the July 10, 1937, Dwiggins stated:

> I (as I keep saying) had planned No.222 [Charter] as an italic for the Brochure [Arcadia], so I have drawn the italic (222) test letters for the same width as the corresponding roman [Arcadia], for two-letter matrices.[7]

The earliest test proofs that included both typefaces, found in the W. A. Dwiggins Archive at the Boston Public Library, were dated March 5, 1937, and labeled "Experimental 222." The characters for both Charter and Arcadia were designed for a 12-point body, but evidently, "the ascenders and descenders [on the Arcadia letters] were so long that [they] had to punch [them] on the 14-point base line."[8] Enthusiastic about the face, Griffith wanted to continue with more characters, and desired to see them cut in 18- and 24-point sizes.

In a second letter from March 11, 1937, Griffith had second thoughts. Still content with the "spirit and general feeling" of the face, he had thought it "too compact and [was] a little on the heavy side."[9] He suggested a revision of the letters somewhere in between the original, more rounded, drawings and those in the new proofs that were slightly thinner in weight, Dwiggins agreed. They also continued to work with the

---

[5] WADC. Letter from CHG to WAD, dated June 18, 1937.

[6] Only for clarity are the names Arcadia and Charter being used. They were only known by various nicknames and their experimental numbers at this time.

[7] CHGP. Letter from WAD to CHG dated July 10, 1937.

[8] WADC. Letter from CHG to WAD, dated March 11, 1937.

[9] WADC. Letter from CHG to WAD, dated March 11, 1937.

widths of the characters. This was just one of many times that their working relationship became evident. As Griffith was a type designer, and so understood what it took to design type properly, this only served to help when technicalities in design arose. Subsequently Dwiggins often concurred with the suggestions made by Griffith, and vice versa. Changes must have been to their liking, as confidence in Arcadia seemed to mount, and Griffith saw fit to have it follow the production of Caledonia and 24-point Electra as of June 18, 1937. On this same date, Dwiggins had also sent the "second try at Brochure [221] per [Griffith's] recommendations"[10] to Linotype. On the July 14, Griffith sent proof no. 2 of Arcadia, with revisions on the lowercase 'l' and 'n' characters. At this point, Griffith proposed that if Dwiggins approved of the changes, they "go ahead with the balance of the characters"[11] on the Arcadia design.

They had proofed four lowercase characters and one uppercase character of Charter on March 5, 1937. However, it was not until proof no. 2 that Griffith appeared to finally understand the project. From a letter dated July 14, 1937:

> As soon as we get Experimental 221 under way we shall take up (Charter) Experimental 222, for which you have submitted two test characters of widths corresponding to those of 221.[12]

During the first phase of the correspondence, the fact that they used the numbers 221 and 222 interchangeably caused further confusion. Only by referring to Linotype's press proofs, and reading the correspondence can it be known for sure.

In a postscript written about Charter and Arcadia, Griffith had included a side note that explained why the progress was halted:

> The experimental projects, No.221 (Brochure), and No.222 (Charter), were laid aside at this juncture, July 1937, for the resumption of WAD's work on Caledonia which was approaching the final stages.[13] These experiments were

---

[10] CHGP. Letter from WAD to CHG dated July 10, 1937.

[11] CHGP. Letter from WAD to CHG dated July 14, 1937.

[12] [ibid.]

[13] Caledonia was one of the few typefaces designed by Dwiggins to be released from Linotype.

> revived in January 1938 and progressed in a desultory fashion, as vehicles of relaxation from several formal projects then on schedule.[14]

On January 30, 1938, the project was resumed. Dwiggins sent an outline of the "Brochure: near-'Egmont' project: Experimental 221-222."[15] He had assumed from previous correspondence with Griffith that other work supplanted this experiment. After being told otherwise he did a new study and included a short discourse to explain it:

> The new study is based on these trials; and on your letters March 8, 1937, and March 11, 1937, in which your comment on 221 was, 'make it not so compact, make it rounder, and lighter weight' (with which instructions I am in complete accord).
>
> Study No. 2 does not aim to look anything like 'Egmont'. It takes off from certain things in No.1 design, and develops as a new face with its own individual action. It is lighter weight than No.1, no so compact, and rounder.
>
> I have carried the roman and cursive along together. My aim is to have the derivative from 221, for the roman, and to duplex it with a derivative from 222 for its italic, or 'cursive'.
>
> With this aim in view, in opening out 221 to get a less condensed letter, I needed to open out 222 also, without losing the good effect we got … . This was the reason for designing roman and cursive together, instead of making a roman alphabet and then fitting an italic over the roman dimensions. I think it is better design, too, to carry them along together, because you can hand proportions back and forth from one to another, and so avoid widths in the roman that force you to make badly proportioned italic letters.
>
> <u>There are two stunts suggested as to capitals:</u> (1), A set of roman caps considerably shorter than lowercase ascenders, and with a lot of 'swing' in the modeling. (2), Another set of caps duplexing with (1) designed to fit the swing or action of the cursive lowercase; these would not be the conventional italic style, but would be flourished letters of a rather 'modern' twist—not too odd, but a little new. The 222 idea is unusual enough to warrant a bit of novelty in its caps. My thin-paper 'E' is not final, but it is a hint of what one might do. (The roman caps could be used with cursive, too.)

---

[14] CHGP. Postscript added to Griffith's typescript of the correspondence for the Charter and Arcadia project. Dated September 21, 1955.

[15] CHGP. Letter from WAD to CHG, dated January 30, 1938.

> My hope is that with all these touches we will get a face that looks quite unlike any existing face—with novelty and 'action' enough to catch the eye of the publicity crowd.
>
> NAME: I have called it 'Arcadia' just to have a handle. Some kind of rather romantic and 'female' name? 'Diana'?
>
> VARIATIONS: Could have a full-height cap, roman, instead of the suggested low caps. Could have a conventional italic capital for the cursive: 'A B C' [Swash style] instead of a 'near-modern.'[16] [Sleeves 3, 4, 5]

Griffith did not respond to this letter until later that year. Even if this were the case, their relationship seemed to allow for this, because they were both very busy, and these experiments in type design were only a small part of their activity.

The sense of confusion that can be described as lack of unified organization, behind the first version of Arcadia 221 and Charter 222 can be explained, and was finally rectified, in the latter part of a letter Griffith sent to Dwiggins on August 2, 1939:

> I have at last taken up the great mass of material which you sent me the early part of January, last, in connection with a revival of the No. 222 which you call Charter, and No. 221 Arcadia.
>
> I allowed this material to lay around so long that I lost track of the sequence of events and had quite a time attempting to get it straightened out this morning.[17]

Although it appeared from the materials that Dwiggins had not stopped thinking about Arcadia and Charter, Griffith had put it to the side. They had not cut any more test letters between March 5, 1937 and August 5, 1942 for Arcadia or Charter:

> As I now understand the situation it is the intention, based on your combination thin drawings which you sent me, dated 1-29-1938, to combine the Arcadia, No. 221, with No. 222, cursive. I am having [Nils] Larson study your sketches to see if the drawings last mentioned above differ in any way from the test characters which have been cut in both faces. I am inclined to discard everything that we received previously and start from your 1-29-1938 drawings, and go ahead from there.

---

[16] CHGP. Letter from WAD to CHG, dated January 30, 1938.

[17] WADC. Letter from CHG to WAD, dated August 2, 1939.

> In order to clarify the whole situation I am now combining Arcadia and Charter as one project under Experimental No. 221, and will carry them along together.
>
> You sent me, however, dated 12-26-38, one thin sheet entitled 'Sketches for Charter, 12 point scale, 12 point alignment,' drawing with the same legend containing a heavily weighted roman cap E, a script cap C, and a roman lower case p. These characters are referred to in your letter of December 26, 1938, in which you say you have been spending the Christmas season doing stunts with our old Experimental No. 222. The lower case n and h on the sheet are very similar to the original Charter, but the f, j and p, are of an entirely different design, consequently I am all mixed up.[18]

Dwiggins had sent revisions of some letters, entirely new drawings for others, and new ideas for the design as well. This continued to happen from time to time. When different projects were set aside for long enough, Dwiggins would still be thinking about it and send on his thoughts and drawings to Griffith. He even mentioned this as being his *modus operandi* in the first letter he sent to Harry L. Gage, "but a typeface is a job that you have to dream over anyhow, and take up and lay down again."[19] Undeterred, Griffith continued to sort through the various notes and drawings:

> I want to go ahead with the original No. 221 and No. 222 for which I have revised drawings as above stated, which you sent me in January 1938, and covering letter dated the 30th.
>
> Your letter of January 30, 1938 is quite comprehensive and provides a complete specification for the next step, and the drawings are based on the trial characters of Nos. 221-222 as of 3-5-37, indicated as No. 1 Experiment, and my letters of March 8 and 11, 1937, suggesting that No. 221 should be made rounder and lighter in weight, to which you agreed. It was in this letter of 1-30-38 that you stated that you were carrying the roman and cursive along together, aiming to have the derivative from 221 for the roman, and to duplex it with a derivative from 222 for its italic, or "cursive." With this aim in view you stated you are opening out 221 to get a less condensed letter, and needed to open out 222 also, without losing the good effect we got in proof dated 3-5-37.[20]

---

[18] [ibid.]

[19] CHGP. Letter from WAD to CHG, dated February 27, 1929.

[20] WADC. Letter from CHG to WAD, dated August 2, 1939.

From alterations made from the proofs dated March 5, 1937, Dwiggins had intended the Charter 222 to serve as the italic or cursive of Arcadia 221. He made changes in both sets of characters for them to be duplexed one with the other. In the correspondence, Griffith recapitulated the intentions set forth by Dwiggins.

They continued to experiment and proceeded with the new drawings dated January 29, 1938. On January 14 and 29, after another pause in correspondence, Dwiggins drew some new characters. A note by Dwiggins on the thins of the lowercase 'u i a' and 'l' explained:

> This is a second shot at our old friend Exp. 222—a law hand for legal printing, deeds, contracts, policies etc., etc. Might be called CONTRACT—I called it CHARTER before.[21]

Unfortunately, the project was again put aside to concentrate on various others. According to Griffith, "in the circumstances it was decided to discontinue further development of 221 [Arcadia] pending the completion, and a study of the performance of the 'Fairfield' [Figure 57] design [by Rudolph Ruzicka]."[22] It was not until the end of the year, December 26, 1938, that Dwiggins again revisited the Charter project:

> Have been spending the Christmas season doing stunts with our old Experimental 222.
>
> The impulse arose, as usual, out of a personal need: a hamperment one time in designing some insurance policy forms for Liberty Mutual: lack of a tricky type. The thought spread to legal forms in general—how nice it would be to have 'em in something else beside 'law italic'. Dug out the 222 stuff … . Take a look.
>
> There is probably a type called 'Charter'. Good name, because it doesn't tie up too painfully close to legal matters and still has an air of authority. You could use Charter both for deeds and for advertising booklets.[23] [Figure 58]

The stunts described seemed similar to those of the previous letter from January 30, 1938. Dwiggins mentioned the two forms of capitals.

---

[21] WADC. This was hand-written by Dwiggins. It was dated January 14, 1942.

[22] CHGP. Postscript added to Griffith's typescript of the correspondence for the Charter and Arcadia project. Dated September 21, 1955.

[23] CHGP. Letter from WAD to CHG, dated December 26, 1938.

One form described as "square roman, blackish"[24] and the other as similar to some letters he did for *Pictorial Review* [Figure 59]. These drawings were drastically different from the direction that Charter, up until this point, had been headed.[25] Arcadia was not mentioned, at least by name. It was not understood whether the "square roman" he referred to was Arcadia, as the drawings are all script in style.

As of December 1941, the United States entered into the second World War and most, if not all, of the major manufacturing plants were enrolled to assist in the war effort. Linotype was no different, thus putting any typeface producing, including that of Dwiggins, on indefinite hold.[26] However, this did not keep Dwiggins from experimenting.

On January 14, 1942, Dwiggins sent a package containing material on 221 and 222, just to "get these ideas out of the shop and into [Linotype's] vaults." He knew they could not move forward under the circumstances, but "wanted to get them as far as thin paper drawings and into [their] hands."[27]

> The Experimental 222 (Charter) strikes me as good—not marketable possibly, but if it ever came into being it would certainly improve the looks of legal documents. Feeling pretty darn good.[28]

It cannot be confirmed if he sent these to Griffith, but on April 29, 1942, Griffith returned all of the materials to Dwiggins by request. There are a few more drawings dated May 5, and two days later Griffith appeared committed to the project again and "strongly in favor of completing the 14-point font."[29] He also sent Dwiggins an 18-point sample sheet of the numerals for Lino Script [Figure 60]. Apparently, they were confident

---

[24] [ibid.]

[25] The letter does not clarify if he meant these new drawings to replace the previous designs of Charter.

[26] CHGP. Letter from WAD to CHG. Dwiggins mentioned the war, in a letter dated September 30, 1940, referring to another experimental design. "After the war you will shadowgraph up some of the l.c. letters to 7 pt drawing size for me to study."

[27] CHGP. Letter from WAD to CHG, dated January 14, 1942.

[28] [ibid.]

[29] WADC. Letter from CHG to WAD, dated May 7, 1942.

enough in the alphabets to discuss figures, usually reserved until after the alphabet had been more or less finalized.

In a memo sent to W. A. Truesdell (Superintendant of the Matrix Department at Linotype) on May 7, 1942, and carbon-copied to Dwiggins, Griffith instructed Truesdell to replace the new drawings for all those dated March 5, 1937. However, in that same memo, all "work previously performed under Experimental No. 222 [was] to be cancelled, including drawings, patterns, punches and matrices."[30] This could be taken as the first sign of the demise of Arcadia.

Spurred on by Griffith's renewed enthusiasm for Charter, Dwiggins sent some revised drawings on the ornamental capitals to be duplexed with Charter. In this same package, Dwiggins explained the use of the name Contract in replace of Charter. This was done because Griffith had mentioned the name 'Contract' in his letter, and had not approved:

> Call it 'Charter' by all means, since you aim to cut it. A much better name than 'Contract', which had been considered. When 222 was put in storage earlier I thought 'Charter' was too good to be put away in the vault with the remains, and so thought of 'Contract' as OK for a dead one. 'Charter' fine selling name.[31]

On August 5, 1942, they cut the complete lowercase, an asterisk, a roman cap M, an ampersand, and two decorative letters 'T' and 'V' for Charter [Sleeve 6]. The only change made to the characters on the next proof, dated September 10, 1942, is to one lowercase 'w' character. They had also added the decorative capital 'T'. Along with the proofs from September [Sleeve 7], Griffith asked if Dwiggins had any preference on the text for a formal setting of the type; and questioned if he would like to see any of the proofs from the pattern plates. Illustrating Dwiggins' trust in Linotype's ability, next to this question, in Griffith's hand, was written "no-ok."[32] Griffith had also asked Dwiggins about display sizes, and if he thought they could be based on the 14-point drawings.

---

[30] WADC. Letter from CHG to W.A. Truesdell, dated May 7, 1942.

[31] CHGP. Letter from WAD to CHG, dated May 1942, no day given.

[32] WADC. Letter from CHG to WAD, dated September 11, 1942.

Was Dwiggins anxious to start telling people about the new design? He might have suggested the use of the test proof for promotional purposes. But, Griffith wrote to Dwiggins, and in no uncertain terms explained what they could and could not do:

> Under the terms of our agreement with Government agencies and type people with regard to the cutting and introduction of new faces, we will be unable to make any public announcement of this or any of the faces in process of development. No objection, however, to a very discreet private exhibition of them, and only as developments.[33]

They proceeded to set the text of 'The first Mass Thanksgiving Proclamation, Charlestown, Mass., June 20, 1676', using the 14-point Charter lowercase alphabet along with 14-point Electra capitals. The printing of this setting was dated October 13, 1942 [Sleeve 8].

By this time, the name Charter had been made official, and appeared along with the words 'experimental no. 222' at the top of any correspondence sent from Griffith.

In February 1943, this time with interest from the outside, Griffith wrote to Dwiggins.[34] He still considered Charter to be "a good specialty face,"[35] and again questioned him about using the 14-point drawings for the display sizes.

Through April of 1943, they experimented with weights and thicknesses on the lowercase 'h' character of both Arcadia and Charter. It appeared that when they cut the display sizes, 24-, 30-, and 36-point, they continued to use the same drawings. The effect was such as that of multiple photographic enlargements, further proof because there were no drawings specifying new sizes. Although there were some minor adjustments made in the 30- and 36-point sizes: the bottom of the stem was cut at a slight reverse angle and the flick was given a more tapered

---

[33] WADC. Letter from CHG to WAD, dated October 6, 1942.

[34] Griffith had shown the "Proclamation" specimen to R. N. McArthur for his opinion. McArthur had once been the typographic director and sales manager at the Barnhart Brother & Spindler, Chicago foundry until it was taken over by ATF. Because of this experience, Griffith respected his opinion, and now as McArthur was operating an advertising agency, he saw the possible uses of Charter from that side as well.

[35] WADC. Letter from CHG to WAD, dated February 23, 1943.

effect toward the join. The last proof on which Arcadia appeared was dated April 14, 1943.

Although they had continued to use the original drawings for the variant point sizes, Dwiggins did not think this correct. He could never have been mistaken for being simply a lettering artist. The detail and effort put into his drawings is proof of this, as are the notes that accompany many of these. On July 26, 1943, Dwiggins redesigned the lowercase 'h' character. He wrote an explanation that the changes made were such to "give a little more of the [calligraphy] that belongs to the letter, and [would show] more as the letter grew larger."[36]

> You are aiming at display sizes to make 222 useful. So I have tackled 36. My redrawing of your drawings of the [36-point 'h' character] does not suit me. It lacks the brittle crisp feeling of the 14. Too much sweetness in the curves—I have tried to get what it needs in the drawings [of the 'h', 'n' and 'a' characters included] herewith.
>
> The 14 will do, though I fell into the fault that has vexed me in other cases—getting things too heavy to stand the increase in color that comes from "ink-squeeze-out"—an increase in bulk all around of at least 1/1000. The 14 m drawing shows the way I should have made it in the first place. Somewhere along the course of events I have been taught that .003 is the smallest space in which the lead will run properly. This, + 1/1000 on each side, makes a printed line of .005 which is too heavy for the effect that 222 should have. In these 36-pt trys [sic] I have taken account of this thickening … The stems of 14 are OK, but on book paper the thins are so thick that they destroy the "copperplate" look that the face should have. This same trouble in the proof trials of 36 h. The 24 and 30 are not so bad.[37]

The last proof dated October 11, 1943, of the lowercase 'h' character in 24-point Charter, along with the redesigned 30- and 36-point of the same character.[38] Griffith wrote to Dwiggins, still interested in the idea of using the Charter lowercase characters:

---

[36] WADC. Handwritten note from WAD to CHG, dated July 26, 1943.

[37] WADC. Letter from WAD to CHG, not dated. However, from reading the letter in its entirety, it can be assumed that it was included with the aforementioned drawing of the lowercase 'h' character.

[38] The date of the proof was according to the BPL Rare Books and Manuscripts archives.

> Please put on your agenda for discussion next Tuesday, the disposition of this series. I think it would be a wise thing to complete the lower case of this series in 16, 18, 21, 24, 30 and 36 point sizes. The 16 point could be used with the roman caps of Garamond, Cloister, Caslon Old Face, and other of the old style faces that are made on script line. In laying out the other sizes I think they should be made on the same alignment as the corresponding sizes of these old style faces to permit free selection of roman caps. This is to merely record the subject while I have it in mind.[39]

They must have started the 16-point characters of Charter, or why would have Griffith suggested using what could fit? He proceeded to instruct him that they would layout the others size based on the fitting of the old style faces.

Charter was never completed, nor publicly released. The complete face was only cut in the 14-point size. Charter was used in 1946 by the Golden Eagle Press in the book *The Song Story of Aucassin & Nicolette*; this time Electra small capitals were used instead of the regular capitals as before.

Although Charter had been used in the aforementioned book, Griffith deemed it inappropriate. The typeface had not been intended for book typography. However, he acknowledged that it "did demonstrate its reading qualities in mass."[40] As of 1955, they planned no further work for Charter. Griffith summarized the two separate type designs:

> Experimental 221, designated as 'Brochure', (on some drawings, 'Arcadia', was suggested by the necessity for a moderately condensed Roman letter of good color and optimum legibility, combined with spatial economy, which would provide artistic and practical typographic media for fine brochures, booklets, and the varied requirements of the better grades of advertising publicity. Special effort was directed to the development of a letter devoid of 'arty' mannerisms which interfere with eye comfort in the process of continuous reading; to the harmonious blending of contrasting elements of design to produce a vigorous and colorful texture in the printed page on all paper surfaces, whether by letterpress or offset and gravure processes of printing.

---

[39] WADC. Letter from CHG to WAD, dated March 21, 1944.

[40] [ibid.]

Experimental 222, 'Charter', is the product of a whimsical urge to explore unbeaten trails in typographic development, but nonetheless predicated to a degree on functional considerations … . An alphabet of lowercase characters in 14-point size was completed, and test characters in display sizes as well, but business considerations in meantime intervened to discourage serious thought to commercial promotion of the design on a production basis.[41]

[41] CHGP. Postscript added to Griffith's typescript. Dated September 21, 1955.

Experimental No. 274

One of the last experimental types on which Dwiggins and Griffith worked, were designs inspired by typefaces found in D. B. Updike's book *Printing Types.*[1] The roman typeface was derived from a Dutch example, and the italic typeface later came from an Italian example. On August 4, 1942, included with a set of drawings [Figures 61, 62], Dwiggins wrote to Griffith:

> For a long time I have had a tender-spot for a quaint Dutch type cut by a certain [Jacques François] ROSART, shown in … . Updike's *Printing Types* [Figure 63] … . D.B.U. [Daniel Berkeley Updike] did not care much for the kind of type that pleased the Dutchmen in 1750—nevertheless the Rosart has a kind of cut-in-metal quality and oddity in the weighting of certain parts that makes it unlike anything in our present repertory, and that suggests something a little different. My study is tagged 'STUYVESANT" (Old Pete Stuyvesant, last Governor of New Amsterdam).[2]

Although Dwiggins had feelings against any historical revivalism, he could not help being interested in the older designs. This should not be counted as a fault, he always consciously altered the modeling, serifs, width, until it became his own. He would see potential and start whittling, such was the case with Stuyvesant.

Dwiggins was aware of what Griffith looked for, or rather was not looking for, in the type range. In the same letter, Dwiggins demonstrated this understanding and went on to defend this new idea:

> You say you don't want any more skinny types after Estienne. The trouble with Estienne is that it is too monotonously skinny—hasn't any life. I think Stuyvesant would have considerable life, due to the aforementioned odd accents of weight in the curves.[3]

---

[1] Updike, Daniel Berkeley, *Printing types: their history, forms, and use*, Vol. II (Cambridge: Harvard University Press, 1937) p. 42.

[2] CHGP. Letter from WAD to CHG, dated August 4, 1942.

[3] [ibid.]

Two days later, perhaps after closer study, he wrote to Griffith acknowledging that Enschede & Sons[4] had a type called "Rosart." (As a typographic designer and consultant, not only did he have to keep in mind the needs of Linotype, but he also had to be aware of what other types were available.) He had found this information from a "half-tone reproduction in *Studio Art of the Book*, in their special autumn number, 1938." However, he was of the opinion that it had not caught "the original spirit,"[5] as far as he could tell. He decided he needed his drawings so that he could "mull over them again, after some elapsed time."[6]

Two weeks later, Dwiggins wrote back to Griffith acknowledging that the "Dutchman [was] probably too close between Arcadia [265] and Eldorado."[7] On August 17, Griffith responded:

> I agree that the Dutchman is too closely related to the French and Spanish refugees to warrant serious action at this particular time. However, we will make test cuttings of a few characters.[8]

Stuyvesant was the "Dutchman," "the French" was Arcadia and the "Spanish refugee" was Eldorado.

December 10, 1942, Dwiggins proceeded with further drawings, most of these two to a sheet, perhaps to conserve paper or to explore fitting:

> On Saturday I mailed you a number of thins of a reworking of the Stuyvesant idea. Why this instead of carrying forward some of the others? Because I wanted to get under cover the idea while it was fresh … .
>
> This particular Dutch 1750 region is a hole not covered in Linotype faces or otherwheres. [sic] Monotype attempted it, in a way, in Fournier—but too dry, without much style or liveliness. Another English Monotype face, used in Oliver Simon's magazine *Signature* [Figure 64] around 1936, tries it again—but again without what I see as the real guts of this kind of letter.

---

[4] Type Foundry in Haarlem, Netherlands.

[5] CHGP. Letter from WAD to CHG, dated August 6, 1942.

[6] [ibid.]

[7] Comparing the stages that the three types were at on this date showed that they had completed the cutting of the capital and lowercase alphabets and had begun work on the italic lowercase for Arcadia. They had also completed the lowercase, figures and ten of the capitals for Eldorado.

[8] WADC. Letter from CHG to WAD, dated August 17, 1942.

> The quality I see is an essential 'metal stamp' or 'metal punch' quality—as though, being a lumberman, you had your firm name cut on the end of a metal punch to be stamped into 2x4's. This, combined with a certain well-fed robustousness [sic] that makes you think of Franz Hal's [sic] paintings (although the letters are thin in stem). The quality occurs in the modeling, as a thickening of the curved strokes, and in the fat terminal bulbs—these come out as little black accents … . This I have tried to get in [the] roman lowercase samples.[9]

Not merely content with copying previous typographic ideas, Dwiggins wanted to do something new with the italic and small capitals. However, with any innovations, especially technical like those found at Linotype, he had to make his idea conform to their limitations:

> The italic letters—made in conjunction with the roman—are not like Dutch italic of the time. They are experiments to find a new kind of italic. How they would track with the roman cannot be told in the drawing stage—though the letters are consistent among themselves and have some nice active curves; and look like they might be good with the roman.
>
> The small caps [are] an attempt to work out my feeling about small caps in relation to the lower case. It departs from your canon about small caps, but illustrates my own conception of how small caps should relate to its lowercase. My idea, also, is to provide a small cap that is letterspaced as it comes from the mint.[10]

It was necessary that Dwiggins kept in mind considerations for the fitting and duplexing of the characters from the beginning stages of any design. With Stuyvesant, Dwiggins based his fitting of the roman on the drawings of 12-point Electra. However, he was not sure how his desire for extra letterspacing in the small capitals would effect the character with which it would be duplexed. Dwiggins questioned Griffith:

> I haven't considered this [letterspacing] in my drawing, which is more an illustration of my idea of weight, alignment, and finish, than of width re letterspacing. (But how , in duplexing smallcap 'a' with '(' [open parentheses], 'q' with ')' [close parentheses], 's' with ':' [colon], 'o' with '*' [asterisk], 'l' with leader dot— according to your chart—do you keep the colon,

---

[9] CHGP. Letter from WAD to CHG, dated December 12, 1942.

[10] [ibid.]

> or whatever, from standing away from its words? Making a big hole in the line?[11]

Griffith later clarified Dwiggin's concerns:

> It is understood that in order to accommodate three alphabets, lowercase, caps, and smallcaps, in the available 90 keys on the Linotype keyboard, in the form of two-letter matrices, the smallcaps must be duplexed on the same matrix with certain characters which are not ordinarily called for in the italic form, such as the parentheses, colon, fl, °, etc. In making the matrices, the smallcap characters are punched in a position on the brass which provides the correct amount of space, or fitting, on each side; to eliminate the hole, WAD refers to, the colon, for example, which is duplexed with the smallcap 's', is punched to the left of the body with the right space for fitting closely to the preceding letter, and the excess space left on the righthand side—instead of in the center of the brass as WAD seemed to think.[12]

Griffith could not understand why Dwiggins was concerned with the technical issues, as Linotype could alter and correct any such thing in the following stages at the works. Dwiggins' letter and Griffith's afterthought stood as evidence of the enthusiasm they both possessed for the entire type development process. These drawings, described by Dwiggins as "heavier stem, straight-cut serifs, not so much 'soft' bracketing,"[13] were then handed off to Nils Larson for the cutting of test characters. According to check sheets that were written and typed-up by Griffith, or perhaps his secretary Helen Jagau, they cut test characters of cap 'E,' lowercase 'a,' 'd,' and 'n' in roman and italic.

The press proof dated March 3, 1943, [Sleeve 9] was sent along with a letter from Griffith. He thought they had something and wanted to proceed with the cutting of a few more characters. Griffith spoke well of the italic, and Dwiggins had agreed barring some suggestions he sent on March 9, 1943. Griffith approved the idea for the small capitals and

---

[11] [ibid.]

[12] CHGP. Letter from WAD to CHG, note added to typescript of a letter dated December 12, 1942.

[13] CHGP. Letter from WAD to CHG, dated December 15, 1942. Dwiggins was comparing the new drawings with the first that were much closer in design, he felt, to Arcadia.

suggested Dwiggins look at something they had done with the Caslon Old Face series.

On March 11, 1943, Griffith sent Dwiggins photostats of the Rosart type sample from the Updike book. In the same letter, Griffith mentioned the drawing office creating projection sketches of the specimen as well. After Dwiggins reviewed and altered his drawings from December 1942, and compared them against the Rosart sample, he returned them to Linotype:

> Here is a first shot at the Rosart enlargements. Nice detective job to find the letters buried under the ink. Variations in the shapes of individual letters show that there was a lot of ink used [Figure 65].
>
> The Rosart page in D.B.U. *Printing Types* was reproduced by line-process too; but after all, what caught my eye was the letter as seen in D.B.U., and on of the qualities is a kind of monoline quality, combined with accents of modeling in the curved parts. In deducing my dimensions from the enlargements I have tried to keep this monoline quality … in the thickness of the serifs (which were undoubtedly much thinner in the type itself).[14]

With the enlargements as reference, it seemed that they had moved closer to what they wanted to avoid, an historical revival of Rosart. Dwiggins noted that he had altered a few characters, to fit within the needs of the Linotype machine, but in general "the proportions of the letters [could] be taken as practically Rosart, and the modeling is his."[15] Griffith quickly responded to Dwiggins on April 13, concerned for the progression:

> I have made a conscientious study of your thins in comparison with the sketches blown up from the original, and for the life of me cannot feel that we have caught the subtle variation in tempo of Rosart's letters. I don't mean merely the geometry – but rather a reflection of the casual spirit of freedom that emerges from the mass pattern.
>
> I may be entirely wrong—as my initial impressions are never anything more tangible than "hunches"—but I cannot

[14] CHGP. Letter from WAD to CHG, dated April 6, 1943.

[15] [ibid.]

> visualize in the drawings that elusive element of loose-jointed gracefulness and mellowness, so satisfying to the eye, that fuses Rosart's crude letters into words. What I am going to say may be presumptuous and untimely, but I feel only what I can see.
>
> It is my impression that we are about to fumigate old Rosart and remove too much of the musty smell – which is chiefly characterized by the lack of rigidity of angles of verticals to base line. Some of them lean right, some left, and others perfectly true. The lower-case "l", for example, is almost a right-angle, and serves to both offset and at the same time call attention to the swing of the others. This is apparent in both caps and lower-case. I feel we have washed out a lot of this in the drawings.[16]

It seemed the level of detail and irregularity in the Rosart design, which Griffith wanted to maintain without "advocating a copy job," became a matter for professional inclination. In the case of Falcon 249, for instance, Dwiggins added his own details to the old style design to make it unique. He had attempted the same with Rosart. However, in this letter, Griffith was now afraid of "fumigating" what made Rosart, Rosart. Dwiggins reviewed his thins and revised them based on Griffith's remarks. The letter sent in regard to the drawings, dated April 17, suggested that Dwiggins had altered his point of view to be more in line with that of Griffith:

> Glad to have your opinion—the virtue of our team is that there are <u>two</u> opinions instead of one—my drawings are always provisional and aim to help you find out what you think … . There are about as many shapes for each letter in the specimen as there are letters. The items I ferret out as the ones you had blown up give me an idea of what you are seeing as to weights of details, serifs, etc … . Don't worry about suggesting changes. Whatever alterations this 4-17-'43 lot suggests will be tried on the next rally. You will notice that I have kept as close as I could to the Rosart irregularities. Whatever ones of these you'd like to push back to something more regular, let me know.[17]

In a later letter, Griffith mentioned the "variations in parallelism of stems," and that this was a "feature of the Rosart letter which contributed

---

[16] WADC. Letter from CHG to WAD, dated April 13, 1943.

[17] CHGP. Letter from WAD to CHG, dated April 17, 1943.

so much to its liveliness and movement."[18] This seemed contrary to the idea of not copying Rosart's designs. How much detail could be used before inspiration became imitation?

On May 10, 1943, Dwiggins wrote to Griffith about changes discussed from the conference earlier that month. He sent a set of thins referred to as "second round." According to Dwiggins, they had decided to "sharpen it up a bit and thin down elements like serifs."[19] A comparison of the lowercase characters showed a general rounding of all corners, and the contrast between the thicks and thins was lessened as well. The lack of crispness or sharpness seemed much exaggerated, which might occur if someone had photographically enlarged the characters. They lacked the vitality and energy that Dwiggins' types usually emitted. However, in a letter sent with proof no. 2 [Sleeve 10], dated June 10, 1943, Griffith thought the characters were headed in the right direction. He said they produced "the effect that [he] had in the back of [his] head all the time," and that he was "very much pleased with it."[20]

One peculiarity within the set of drawings dated April 17, which subsequently ended up cut and proofed, was found on the lowercase 'a' character [Figure 66]. It appeared to have a broken counter in the drawing. On the tracing paper, it looked as though the stroke closing the counter of the two-story 'a' had been erased and Dwiggins had rounded off the stem midway. Griffith remarked that "if the stroke is carried out to a tapered point, gradually fading out as it approaches the stem, instead of an abrupt break, it will give the effect we both want and at the same time not be too conspicuous."[21] He returned the drawings with proof no. 2, as most of the characters had been drawn two to a sheet, thus giving Dwiggins an

[18] WADC. Letter from CHG to WAD, dated June 21, 1943.
[19] CHGP. Letter from WAD to CHG, dated May 10, 1943.
[20] WADC. Letter from CHG to WAD, dated June 10, 1943.
[21] [ibid.]

opportunity to revise the lowercase 'a' and send a new set of lowercase drawings.[22]

Commenting on proof no. 2, Dwiggins wrote "Review" and "Rosart Enlargements" on some of the drawings dated June 17, 1943. In the drawings which they used to cut the test characters for proof no. 2, Dwiggins explained that he had drawn "the 'm' in one weighting and the 'h' in another lighter weighting of finish details—stems of 'm' and 'h' the same."[23] This he did in order to compare the visual weight of those details when printed. Not wanting the visual weight "in serifs and junctions—which heaviness would be increased on book paper," and again stressing his desire that the characters "not to go too thick and clubby in the thin parts on book paper,"[24] Dwiggins revised the drawings. This did not affect the Linotype Drawing Offices, as they had only created working drawings for the test characters used.[25]

The characters, with comparison of the lowercase 'a' [Figure 67] from April 17, to that of June 17, had returned to a more detailed style. They appeared, once again, modeled and with more obvious curve and detail. After this set of drawings, they settled the basic style, because this was the last dated change made to the lowercase roman characters.

At the end of the letter from the June 17, Dwiggins declared that Stuyvesant 274 was "highly legible. In the mass a new thing for book work—a face that does not parallel any book face [they] (or the others) [had]."[26] He agreed with the "irregularity" that it had, and approved of the "little spots of accent" and the "modeling." Dwiggins questioned the weight and wondered if they should try proof no. 2 on book paper. And "as mentioned otherwheres, the italic (June 17) [did] not try to reproduce the

---

[22] Griffith had told Dwiggins that the Drawing Offices had requested these to be redrawn, one to a sheet, as it caused some confusion in transferring them to working drawings. They cut and proofed the irregular character on proof no. 6 [Sleeve 11].

[23] WADC. Letter from CHG to WAD, dated June 17, 1943.

[24] [ibid.]

[25] The drawings, after arriving at Linotype, were first sent to the drawing office where they would assign sidebearing data, after which Nils Larson transferred to working drawings. From these working drawings, they would cut the brass pattern for the cutting of the matrices.

[26] [ibid.]

italic, Dutch, of Rosart's moment."[27] The new italic drawings were more from the "Plantin style" [Figure 68]:

> Mine strikes out on a new line, but looks like it would go with the 274 well enough. It is a kind of copperplate letter such as might have been cut as a type in 1750—but modern, too.[28]

On June 21, Griffith wrote to Dwiggins and confirmed moving forward with the preparation needed to cut the pilot letters. Griffith mentioned that the roman lowercase in general would print "somewhat darker on the book paper than would have been the case with the original Rosart." However, this was "desirable,"[29] and was rationalized in terms of the printing surfaces available, and how they differed from those in the time of Rosart. He reasoned that Rosart would have designed a thinner letter, which would have compensated for over inking and printing on dampened papers.

In July, Dwiggins sent a letter with the completed drawings of the small and italic capitals. In the letter, he outlined the progress of the drawings and listed the ones that he had sent, he also mentioned drawings already in possession at Linotype. In closing, he offered the motivation behind the new italic drawings:

> I think I have found a lead for an italic that goes with the Rosart Stuyvesant in Updike, Volume I, Figure 133, Zatta 1794 Venice, follows page 186, 3 pages over … . The Zatta has the Rosart quaintness and irregularity.[30] [Figure 69]

The first day of September, Griffith received completed drawings for the lowercase italic characters, as well as the full-set of roman and italic capitals. Dwiggins explained that he had used the Rosart enlargements again as reference for the proportions on the roman capitals. He had experimented again with the stem weight, but kept to the original action

---

[27] [ibid.]

[28] [ibid.]

[29] WADC. Letter from CHG to WAD, dated June 21, 1943.

[30] CHGP. Letter from WAD to CHG, dated July 23, 1943.

of the curves from the italics in proof no. 3 [Sleeve 12], and now needed Griffith's opinion.

Shortly after this he started experimenting with the Figures. One of the original characteristics that Dwiggins had liked about Rosart was the bulbous terminal endings and 'odd accents', and he carried this detail over to the Figures. However, Griffith had not approved, as Dwiggins commented in a letter sent with new drawings of the Figures:

> I have de-Rosarted the numerals somewhat, but have kept some of the Rosart in '2 3 5'. They do not look too odd, perhaps, to be un-Rosarted. The circular finial are a kind of Stuyvesant trademark. Yes dots?[31] [Figure 70]

Griffith wrote, November 9, 1943, "the complete roman and italic lower-case alphabets [were] in the works. Punches have been cut and matrices [would] be finished within the next week or ten days." After proof no. 5 had been completed on November 15 [Sleeve 14], Griffith wrote to Dwiggins on November 19 with the opinion that the italic was a little thin when printed on the glossy paper. However, he thought "the rough and antique finishes [from] the textures [was] just about right."[32] With proof no. 5, they also printed a first text setting of two paragraphs of Latin, and it was on this that the critique would have been based.

Throughout 1944, although correspondence was limited on Stuyvesant, they continued to work on the type. After he viewed Proof no. 6 [Sleeve 15],[33] Dwiggins wrote to Griffith:

> Stuyvesant Proof No. 6 makes me feel young again … . Set a little, any copy, to see how it reads on book paper … isn't the italic a live baby?[34]

They had only printed one numbered proof that year, although they did print a second test with text. It was from a poem titled 'The Ruines of

---

[31] CHGP. Letter from WAD to CHG, dated September 2, 1943. These changes resulted in proof no. 4 [Sleeve 13].

[32] WADC. Letter from CHG to WAD, dated November 19, 1943.

[33] To illustrate the thorough method which Dwiggins went about reviewing the proofs an example has been included [Sleeve 16]. These were often sent along with the new drawings, or with a letter in regards to a test proof.

[34] CHGP. Letter from WAD to CHG, dated May 3, 1944.

Time', set in two-columns on a half-page [Figure 71, 72]. By this time, Griffith was very pleased with the outcome of the lowercase roman, but still concerned for the weight of the uppercase characters. Instead of suggesting redrawing however, Griffith suggested that he "lap the punches of three or four characters, thereby increasing the thickness of stem and hairline between a quarter and a half thousandth—no more—in an experiment."[35] But this was not done, as Dwiggins thought the "skinniness [was] somehow part of the style of the face."[36]

In 1945, Dwiggins completed the drawings for the old-style Figures, ligatures, punctuation, and diphthongs. The works at Linotype, concerning involvement with Dwiggins, only redesigned four lowercase italic characters [Figure 73, Sleeve 17]. On one of the drawings from February 26, he wrote "Dutch Baroque" on the tracing. Did this imply that he was reconsidering the name?

Concern for fitting and spacing in the small capitals arose again in February. Griffith asked Dwiggins "how [they might] very well lay out the small capitals until all the numerals [were] cut?"[37] However, Dwiggins felt they were too important, especially in regard to book design work, to be completed last. With this and other reasons, he wrote to Griffith:

> It is silly for me to mug in on small cap adjustments after you have been through the country a hundred times and worked out all the problems—nevertheless, I can't keep from being silly: the problem is too interesting as a geometry-puzzle… .
>
> I've studied your various work-outs in Linotype faces in general, and I get a feeling that small caps are a kind of poor relation in a font, expected to be content with whatever is left over and not holler for more. The duplexing restrictions are rigid, but if it is reasonable to work out roman and italic at the same time, why not reasonable to work out numerals (and other 'duplexed withs') and their companion small caps at the same time? An established uniform width for numerals allows this to be done, yes? Without bothering about numeral details in the process.

[35] WADC. Letter from CHG to WAD, dated May 12, 1944.

[36] Written in a review, from the CHGP. Letter from WAD to CHG, dated February 17, 1945.

[37] WADC. Letter from CHG to WAD, dated February 22, 1945.

> The February 26 lot of thins, herewith, can be sent back with your emendations for me to work farther with. I have, in them, followed your suggestion of striking for a reasonable letter-shape, first. My sidebearing lines are just my own game of seeing what the restrictions do to the shapes, and are for you to change.[38]

After 1945, no new or revised drawings were found. In 1946, there is no proof that either Dwiggins or Linotype performed any work at all on Stuyvesant. After the war, it did take Linotype some time to get back to pre-war standards, thus slowing all progress on work. In 1947, proof no. 8 was printed, testing the Figures '2' and '4,' as well as the roman small capitals 'B' and 'D' [Sleeve 18]. Griffith's enthusiasm for Stuyvesant was made apparent in a letter, which also included proof no. 8, sent on April 8 to Dwiggins. It seemed that Griffith told Nils Larson to "proceed with the completion of the set," before approval was received from Dwiggins on the proof.

The years 1948 and 1949 continued much the same as the last, with only minor things discussed, changed, or revised. They printed the last two proofs in 1948, some with redesigns for the remainder of the Figures, ligatures, punctuation, and diphthongs [Sleeves 19, 20]. Although, Griffith wrote to Dwiggins that they would be "unable to get on with the development until later in the year," he mentioned, "the series would be continued in 10-, 11-, 14- and possibly 16-point sizes."[39]

Sometime in late 1942 or early 1943, Dwiggins wrote a description for Griffith about the experimental fonts on which he had currently worked. In discussing Stuyvesant, he wrote that it "hadn't been born yet, but it's aim in life is to fill a hole in type equipment not so far occupied."[40] He also said it would not be "modern, maybe quaint. Quaintness [had] its uses. A Dutch quaintness of 1750. Atmosphere evoker … Why not?"[41]

---

[38] CHGP. Letter from WAD to CHG, dated February 26, 1945.

[39] WADC. Letter from CHG to WAD, dated January 19, 1948.

[40] WADC. Undated typescript by W. A. Dwiggins. From various clues within the letter, Griffith would have had at least the earliest drawings for Stuyvesant.

[41] [ibid.]

Whether he achieved this or not, the review made by Walter Tracy considered it a "pleasant enough face, but it [had] none of the 'well-fed robustness' that Dwiggins said he saw in the Rosart type." He went on to write that the italic "is less attractive—noticeably 'modern' in style and therefore at odds with the roman."[42]

In 1949, before any kind of public release of Stuyvesant, Chandler B. Grannis, the assistant editor at *Publisher's Weekly*, wrote to Dwiggins. He had heard about another experimental type tested at Knopf, and wanted Dwiggins to add a few paragraphs to the colophon he had written for *The Shirley Letters*. [Figures 74, 75] Dwiggins had already written an article on another of his experimental typefaces, and Grannis wanted to publish the Stuyvesant article at the same time. Dwiggins wrote:

> Another experimental type, Stuyvesant, shows in another way what a type may do to a text… .
>
> The Rosart roman lower case, very much in the style of Dutch faces of the time, had various irregularities in its character— due, probably, to the punch-cutter's not-quite perfect skill rather than to his intentions—that suggested the idea that it might be interesting to provide a present-day face in the Dutch feeling with something of the hand-cut quality that makes Rosart's type 'amusing'—to get away, one might say, from the too great precision of the machine.
>
> The Stuyvesant is heavier in its stems and junctions than the Rosart and consequently prints out as a darker page. The capitals are cut thinner than Rosart capitals, which latter 'stick out of the page' as a little too heavy for their lower case. The Stuyvesant italic is a new design, drawn in a pseudo-Dutch style to harmonize with the Rosart-inspired roman.
>
> The overtone of the face in general, as so far used, is pleasantly irregular and unmechanical.[43]

They continued to use it at Knopf to test it for usefulness. In 1950, Jackson Burke, member of the Linotype offices, wrote to Sidney R. Jacobs at Knopf in regards to Stuyvesant. He wondered if the type could be used at a different press, as he was concerned with the quality of the printing

---

[42] Tracy, Walter, *Letters of credit: a view of type design* (London: Gordon Fraser, 1986) p. 188.

[43] Dwiggins, W. A., 'Two new type faces, two new books', *Publishers Weekly* Volume 156, Number 11 (September 10, 1949) pp. 1338-39.

and wanted to give Stuyvesant a fair testing. It was completed only in the 12-point pilot size, first being used in a book published by Alfred A. Knopf and designed by Dwiggins, called *The Shirley Letters*. After he reviewed the book, Griffith said of Stuyvesant or "Old Peter," that "it was a natural."[44]

As of 1956, when Griffith compiled his papers and correspondence concerning all work done with Dwiggins, he wrote of Stuyvesant:

> This winds up the project on Stuyvesant Experimental No. 274. Proof No. 10, dated December 7, 1948, shows all the characters in the font, duly corrected and refined, and a resume under the heading, 'Status of Characters' shows all the changes that were made in individual characters from January 1943 to December 1948 during the process of developing the face … . The face has not been exploited for commercial use up to this time, 1956, and no additional sizes have been cut. It is, however, on the company's production schedule and is considered active for completion in a full range of sizes at an appropriate time.[45]

Stuyvesant was never released due to the advances made in photo-typesetting capabilities and lack of support for the design. Although both the roman and italic designs closely resemble those same that inspired him, it stood as an example of what Dwiggins could do when he consciously let inspiration from another design guide him.

---

[44] CHGP. Letter from WAD to CHG, dated December 2, 1948.

[45] CHGP. Typescript for Stuyvesant, dated September 1956. p. 15.

Conclusion

The typefaces of William Addison Dwiggins were born out of a career as a calligrapher, lettering artist, and typographer for books, publications and advertising. Through years of practice, he formed opinions about how best to design and use these shapes. From his relationship with Mergenthaler Linotype, he was given the opportunity to take those theories and his skills, and experiment. Although only five typefaces were ever publicly released from these experiments, it should be noted that quantity was not discussed between Dwiggins and Griffith, but quality was always a factor.

Falcon, Arcadia, Charter, and Stuyvesant, all inspired by different things, yet together they demonstrated the key methods and ideas used in all of Dwiggins' designs. He turned his back on advertising and yet designed Charter and Arcadia specifically for forms and brochures. He did not approve of historical revivalism but designed Stuyvesant borrowing directly from the past. And lastly, he imbued Falcon, derived from old-style designs, with his own modern methodology.

Dwiggins designed type at a time when the world was going through drastic changes. The second World War, through which time most of his experimentation was done, created limitations and restrictions. However, the War cannot be taken as the reason they were never released. Four of the five faces that were eventually released by Linotype had also been in some stage of development during the War. Photocomposition, Griffith's retirement, and Dwiggins' failing health all hindered the completion of the experimental type designs.

This essay was not written to answer why the experimental types were never released. In the last part of his three-part article on "Bill Dwiggins' experimental sans serif," Alexander Lawson said:

> Typographically, the coincidence of timing has proved again and again to be of vital importance in the development of fresh approaches to design. It may be wondered when the

> recognition of timelessness itself will again become a factor in the recognition of true talent.[1]

This statement answers well enough the question of why Dwiggins' experimental typefaces were not released; the answer is in the past and cannot be changed. After all, this essay presents information to those that might ask: what can we learn from the process of each?

[1] Lawson, Alexander, 'Typographically Speaking,' *Printing Impressions* (November 1975) p. 216.

Appendix A – Contract

The following Agreement between Mergenthaler Linotype Company and W. A. Dwiggins was transcribed from Box #56 in the Dwiggins Collection at the Boston Public Library. While it is a contract from later in the relationship between Dwiggins and Linotype, it can still stand as an example of the manner in which they dealt with the business aspect of their relationship.

> In consideration of the mutual convenants herein contained, W. A. Dwiggins, of 30 Leavitt Street, Hingham, Massachusetts, as an independent contractor, and Mergenthaler Linotype Company, a New York Corporation with factory and principal offices at 29 Ryerson Street, Brooklyn 5, New York (hereinafter referred to as Mergenthaler) agree as follows:
>
> 1. W. A. Dwiggins agrees to rend such services to Mergenthaler, as a typographic consultant, as Mergenthaler may require. Such services shall be performed at such places as Mergenthaler may direct or permit, and at such times as it may reasonably require.
>
> Further, he will perform his obligations hereunder with due diligence, limiting his services in the field of typography to Mergenthaler exclusively, except to the extent that Mergenthaler may, in writing, consent to his performance of work in the field of typography for others; provided, however, that Mergenthaler shall not unreasonably withhold such consent.
>
> 2. W. A. Dwiggins agrees to disclose in writing to officials of Mergenthaler any designs, developments, creations, simplifications, improvements or inventions which he may conceive, make or develop in the field of typography during the course of, and as a result of, his performance of services for Mergenthaler. All designs, developments, creations, simplifications, improvements or inventions in the field of typography conceived or made by W. A. Dwiggins, alone or jointly with another or others, during the life of this agreement and for six months thereafter are hereby assigned outright to Mergenthaler without further consideration, and W. A. Dwiggins agrees, at Mergenthaler's expense, to make applications for letters patent and to execute any and all papers that Mergenthaler may deem necessary to transfer and vest in Mergenthaler, in any and all countries, all right, title and interest in and to such developments, designs, creations, simplifications, improvements and inventions; provided, however, that this clause shall not apply to developments, designs, creations, simplifications, improvements and inventions made for other clients during the term of this agreement which are consistent with paragraph 1 above.

3. W. A. Dwiggins agrees not to disclose, during or after the time he is retained by Mergenthaler, any confidential information obtained by virtue of his contacts with Mergenthaler during the time he is retained by it, and also agrees to take from Mergenthaler's premises only such drawings, blueprints, reproductions, data or physical equipment as authorized by an executive officer of Mergenthaler.

4. Mergenthaler shall pay to W. A. Dwiggins, monthly, $300, in addition to such unusual travelling and other expenses in connection with the services to be performed hereunder as Mergenthaler may expressly authorize, in writing, in advance.

5. This Agreement shall continue for one year from the date hereof, and thereafter for six-month periods, unless 60 days prior to the end of the first year, or any six-month period thereafter, either party notifies the other in writing of his intent to terminate the Agreement; in which case this Agreement shall terminate at the end of that period.

Appendix B – 'M' Formula

The 'M' Formula, or the "Marionette" Formula, is perhaps the most important of all ideas that Dwiggins came up with as he was attempting to create his marionette puppets for his playhouse. He subsequently applied this same theory to his type designs. It is included below in its entirety as it was written, the illustrations are on the page directly following. This stands as proof of his ideas and methods. The following was transcribed from the Chauncey Hawley Griffith Papers, Special Collections Department, University of Kentucky Libraries; and is a part of the Times Roman Experimental #223 folder.

> Memorandum 1. My spies report that he-blooded advertising printers over the country want a type that will carry a good charge of ink on coated stock, and that on coated stock will look crisp and finished instead of blobby and squz-out. They want it, too, for newspaper ads., to get relatively strong color and at the same time a look of finish and snap.
>
> Memorandum 2. I lift these quotes from the article by Raymond Hopper you sent me: "What will be tomorrow's types?"
>
> "I am convinced that the next step will be… some modification of the beauty that once was Greece and Rome" (I hope so.)
>
> "The classical forms we shall soon begin to return to – even now are returning to – will not be simply the familiar old Caslon."
>
> "… Whatever… that may follow will have… less to owe to the traditional imitation of hand-lettering… It is cast in metal, cut by precision machines, printed, not painted… The hard, clean lines of gravure processes; the printing of dull inks on even glossy papers; familiarity with and innate love for engraving; the crisp note struck by so-called modernistic furniture, all tend to foster the urge for something brilliant, scintillating. There will be a refinement, a finesse, that was lacking utterly in Caslon and Cloister, however lovely their forms may have been."
>
> Memorandum 3. In cutting marionette heads in wood I came up against the problem of projecting the face of a girl – so that the doll would really look like a girl of 18 – subtly modelled features, delicate, springlike, young – to the people in the back row. (Aged folk like us are easy to carve, and project) I started by making delicately modelled heads. [Exhibit A] These were charming at arm's length,

but the girl quality did not carry to the back benches. Then I made a discovery. Instead of soft curves for the cheeks, etc., I cut flat planes with sharp edges. [Exhibit B] These sharp-cut planes, when viewed on the stage, by some magic transformed themselves into delicately rounded curves and subtle modellings; and the faces looked like young girls from clear across the room, as well as from the front benches.

Memorandum 4. In the kind of geometrical spinach I have been growing for printers' ornament, I note that straight-line forms and shapes of geometric curves properly put together achieve more effect of grace of line and curve and motion that do combinations of free flowing curves and shapes. The "grace" quality is somehow augmented – stepped up to a higher level by the sharp angular quality of the elements. Also, a new kind of tingle and life is added to the brew.

[Exhibit C] is not the best specimen to illustrate the point, but compare, re "vitality" (and projection of the "grace" quality – come right out with it), with Frederick's [Goudy] carefully constructed curves. [Exhibit D]

I have been cogitating the matters touched upon in Memorandum 3 and 4, with a view to discovering from them a method for modelling type-letters in some other than the traditional way – to produce in the printed words the quite astonishing results I get with marionette heads and with geometrical spinach.

I have tried various schemes, and come out with one set of letters* that, under the reducing glass, shows a good portion of the kind of thing I have been aiming at. You can't see "it" except in the reduction. The reducing lens I use puts the drawings down to close to 12 point where the copy is on the floor and you are standing up.

These letters are "classical" anatomy processed àla marionette. You will see the method in the drawings. It is more evident in the lowercase than in the capitals, but that is OK because most of the character of any font is in the l.c. [lowercase].

One can't be dead sure, of course, [but] I have the hunch that these letters do not parallel any existing face. They may be worth trying out via the photo-reduction stunt.

I think there is something good close along this line.

W.A.D.

*Original Drawings Follow.

Illustrations used in Appendix B

Exhibit A

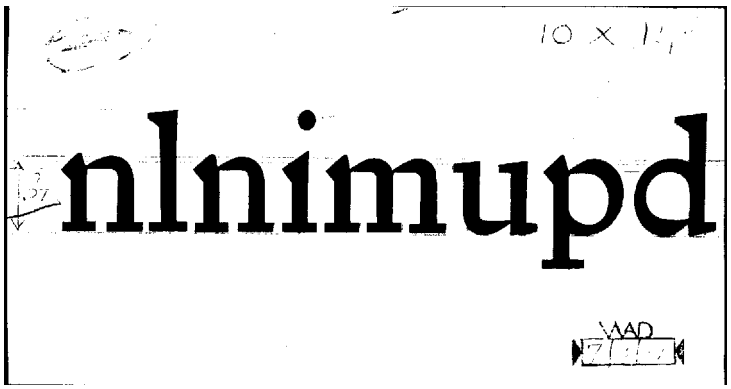
Exhibit B

Exhibit C

Exhibit D

All images appear at 100% of the size as they were in the manuscript.

Illustrations used in Appendix B



The "various schemes" to which Dwiggins referred in his 'm' formula.

All images appear at 50% of the size as they were in the manuscript.

Appendix C – Action

The following was transcribed from the Chauncey Hawley Griffith Papers, Special Collections Department, University of Kentucky Libraries; and is a part of the Times Roman Experimental #223 folder. While this occurred in conjunction with another design, the word was constantly used throughout the correspondence and was used as part of the vocabulary of Griffith and Dwiggins.

> ACTION — re. Exper. 223 [Times Roman]
>
> Need a term to describe a certain attribute of letter-shapes. In calligraphy it would mean the result of the combined motions of hand & flexible [steel] pen. I have used the word "action" to tag this quality. If you think of typeletters as descendents of pen-letters (Stan. Morison thinks we oughtnt [sic] to, apparently) this attribute would occur in type-letters also.
>
> I don't believe (and you do not either, of course) that you can make a type-letter by copying a pen-letter the way W. D. Orcutt did. But I can't get away froom the feeling that type-letters ought to have a suggestion of this "action" quality in their curves.
>
> In 223 we have succeeded, even in 7 point, in suggesting this "action" quality by means of the thefty [sic] design of angular and straight-sided shapes – which is what makes me so tickled with the outcome in Proof 3 – and which is the thing that will make 223 look more alive than regular news-type, if my hunch is right. To build up out of angles and straight lines the whip-lash "action" that makes a freely drawn pen-stroke crackle with vitality (fig 207) [and which is so darn hard to draw deliberately and slowly] is a triumph of impressionistic art – and for the M Formula! No?
>
> You spoke once about my trade-mark trick of having the arches take away from the stems in a point. Why trick, and trade-mark? Isn't it just the way nice letters behave? (fig 208)

*Original Drawings Follow.

Illustrations used in Appendix C

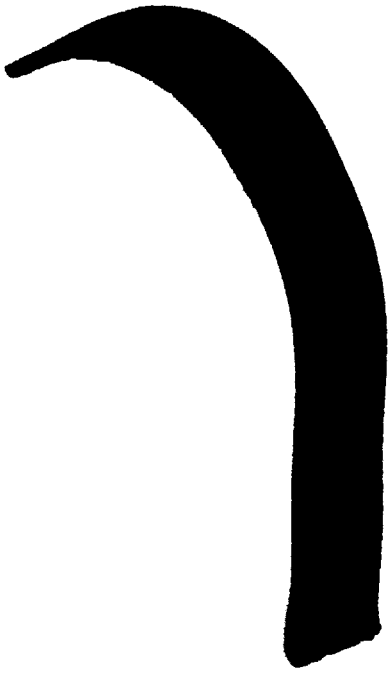


Figure 207

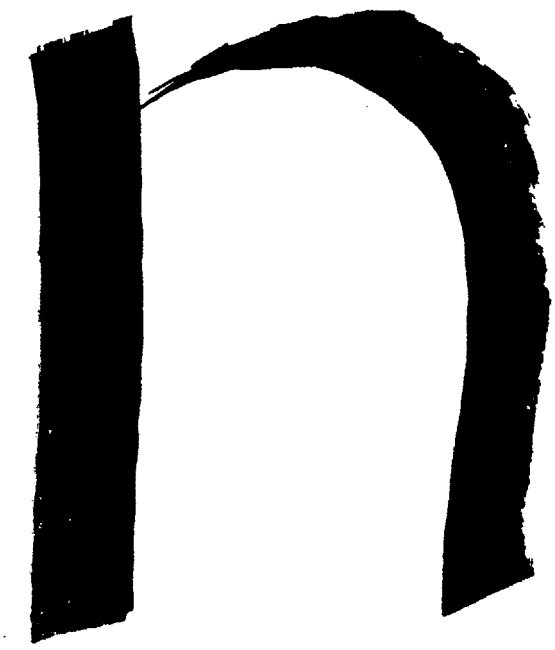


Figure 208

All images appear at 100% of the size as they were in the manuscript.

Appendix D – 'Causerie on Fitting'

Although this correspondence was taken from the information for the development of Falcon, Dwiggins concerned himself with fitting on all of his designs. Dwiggins' methodology on the fitting of Falcon Experimental No. 249 brought up many ideas and this was a result of those. It has been included in it entirety. The following was transcribed as it appeared in the Chauncey Hawley Griffith Papers, Special Collections Department, University of Kentucky Libraries; the only changes made were those suggested by the notes from C.H. Griffith, those appear in parentheses where necessary. Letter from W.A. Dwiggins to C.H. Griffith, dated May 10, 1940.

> I take it, from our letter and talks at various times, that the question of Fitting is in some way an uncomfortable subject in your department. Possibly there is a conflict of opinions in the various departments about fitting—or something—I do not know just what—that makes the consideration of the problem a thing to be side-stepped as long as possible. At any rate it seems to be a hazy region in the technic—a place where everybody is uncertain just how to get about it… Nevertheless, and in spite of all this, each time I spend half-hour's study of our little Falcon, in the various proofs, I am the more convinced that the way to turn that face into a hum-dinger is to find the inevitable fitting that derives from the weights and proportions of the characters.
>
> I know that you agree with me because it is your own baby: That the eye alone can determine—that it can't be reduced to a numerical formula. I am all for that. But I can't give up the search for some system of attack that will help the eye—a method of comparison and deductions via the eye that will say what to do first and what to do next.
>
> I have spent a lot of time gazing at the various proofs since no.5 came in, and I want to send my deductions, for what they are worth. All I can claim, in this case, is that the designs are the products of my eye-deductions in the first place, and that my deductions about how the strokes should relate to one another may have a bearing on the problem of fitting.
>
> I have studied the proofs for a starting-point that would say what was the right interval between straight-stem strokes to make them march—given the weights and proportions of the letters.

I arrive at the interval "u-m" as pretty close to what I need. On the proofs, under a glass, this interval comes pretty close to the [first] counter [in the lowercase] 'm' [character], which, on the drawing is .0335. Taking it on the narrower side, i.e., dropping the .0005, I get .035 (roughly .030 on No. 5 proof) as a lead for the starting-point straight-stem gap. If you take a look at that little 24-point stencil letter that started all the trouble I think it will be found to have something like this kind of interval—that 24-point stencil was the one you shadowgraphed up to guide me.

Now, says I in my amateur ignorance, what would I do next after I got this .033, and had no typefounding experience or traditional formulas to guide me? …Something like:

Take the mystic Tamil word, "jhulmin". Set all these letters on the brass (matrix) dimension so that when they were together in any arragement they would measure .033 between the straight of their stems, not counting serif-overhangs or receding arches:

This is the way you would right or draw them for uniform intervals in any arrangement."

[using the 'm' character to create uniform spacing]
j–h–u–l–m-i–n l–u–m–i–n–h–j
(The above is intended to convey the idea of uniform intervals in all letter combinations–CHG)

This would give me leads on other letters: lefts of "b f k p" and maybe "t", e.g., "m–b", "m–f", "m–t", "m–k", "m–p"; rights of "d q a". e.g., "d–m", "q–m", "a–m".

Next would be the relation of rounds to straights: "p–m", "m–d", etc. I can't find with a glass on the proofs any such relation I can be sure of. The interval ['b-m'] looks like it might be close, but I can't measure it for comparison purposes because I am not dead sure of the Proof No. 5 sidebearing, "–m", the one character in my drawings (thins) that does not have sidebearing written on. Saying that "-m" is the same as Proof No. 5
"–n", then Proof No. 5 "b–m" is .02125, which seems to little, because "b–" works out as .0035, which is less than your Proof No. 5 allowance, i.e., .005 (sidebearing on loops), so the "b–m" Proof No. 5 must be too little or my .033 straightline.

What we need here is some kind of experimental method to help the eye—say we could get up the "jhulmin" characters on my .033 scheme, and then had a way to vary the sidebearings on a few of the round characters, through three or four changes, and let the eye see proofs of them in combination with "jhulmin"—I think you could pick the right one to make the proper music with "i-.033-m", etc.

Then there are the 'wolf' intervals: "--a" "c--" "e--" "f--" "g--" "k--" "r--" "t--"
"--s--", etc., in relation to straight stems—unknown unless you have some rough rule-of-thumb formula to start them with, but highly important in the "music" of line-rhythm.

I know this is all old stuff to you, but there may be some little thing in it to start a new line of attack. You need not take the trouble to point out my fallacies—some of them I already know, such as e.g., that "m--x--o" does not look the same as "o--x--m" when "x=x", in spite of the displacement of "m" on its brass right. (allowance for curvature of r.h. stroke). But there is some lead in equal-spaced "jhulmin" I am sure, because that is the calligraphic way. The "wolf" intervals strike me as the hardest to get at.

Exegesis: Given, finished width of matrix, .095, based on the .033 interval, if centered on the brass the sidebearing would be ".0615-n-.0615"; and the same for "jhulmi", and .01775 on "-b" "-k" "-p" "d-" "q-", etc., allowing for the displacement of .00125 "n-" by your formula, the fitting would be .01775-n-.01525. All dimensions are stem-to-stem, disregarding serifs and other projections.

Bibliography

Abbe, Dorothy, *William Addison Dwiggins: a talk delivered to the Bookbuilders of Boston, April 1973* (Boston: Boston Public Library, 1974)

——, *Stencilled ornament and illustration: a demonstration of William Addison Dwiggins' method of book decoration and other uses of the stencil* (Boston: Trustees of the Boston Public Library, 1980)

Agner, Dwight, *The books of WAD: a bibliography of the books designed by W. A. Dwiggins* (San Francisco: Alan Wolfsy Fine Arts, 1977)

Beaujon, Paul (Beatrice Warde), 'On decorative printing in America,' *The Fleuron* Number 6 (1928) pp. 69-93.

Bennett, Paul A., 'On recognizing the type faces,' *The Dolphin*, Number 2 (1935) pp. 11-53.

——, 'W. A. Dwiggins: 1880-1956,' *Typographer* Volume 19, Number 1, Spring Edition (1958) pp. 9-11.

——, 'The Typophiles' adventures in bookmaking,' *The Penrose Annual* Volume 54 (1960) pp. 21-27.

——, ed. *Postscripts on Dwiggins* 2 Volumes (New York: The Typophiles, 1960)

Burke, Jackson, 'Black and white-smith: W. A. Dwiggins,' *The Penrose Annual* Volume 45 (1951) pp. 17-19.

Carter, Sebastian, *20th century type designers* New Edition (London: Lund Humphries Publishers Ltd., 1995)

Daines, Mike, 'Typographic treasures: the work of W. A. Dwiggins,' *Baseline* Number 8 (1986) pp. 21-26.

Dwiggins, William Addison, 'D. B. Updike and the Merrymount Press,' *The Fleuron* Number 3 (1924) pp. 1-8.

——, *Layout in Advertising* First Edition (New York: Harper and Brothers Publishers, 1928)

——, *A bakers' dozen of emblems and Electra* (Brooklyn: Mergenthaler Linotype Company, 1935)

——, *WAD to RR: a letter about designing type* (Cambridge, MA: Harvard College Library, Department of Printing and Graphic Arts, 1940)

——, *MSS by WAD: being a collection of the writings of Dwiggins on various subjects: some critical, some philosophical, some whimsical* (New York: The Typophiles, 1947)

——, *Layout in advertising* Revised Edition (New York: Harper and Brothers Publishers, 1948)

——, 'Two new type faces, two new books,' *Publishers Weekly* Volume 156, Number 11 (September 10, 1949) pp. 1335-39.

——, 'About Caledonia—A note by the designer: W. A. Dwiggins,' *Print in Britain* Volume 1, Number 4, August (1953)

——, 'Trade book design,' *Typographer* Volume 19, Number 1, Spring Edition (1958) pp. 20-25.

——, 'Introduction to a new typeface: Eldorado,' [Advertisement] *U&lc* Volume 2, Number 2, August (1984)

Haley, Allan, 'Typographic milestones,' *U&lc* Volume 11, Number 1, May (1984) pp. 16-19.

Heller, Stephen, 'William Addison Dwiggins: a current assessment,' *Fine Print* Volume 13, Number 2, April (1987) pp. 82-86.

——, 'The man who invented graphic design,' *Eye* Volume 6, Winter (1996) pp. 26-35.

—— and Karen Pomeroy, eds., *Design Literacy* (New York: Allworth Communications, 1997)

Hofer, Philip, 'The work of W. A. Dwiggins,' *The Dolphin*, Number 2 (1935) pp. 220-30.

Hollister, Paul, 'Note, To be filled in a corner-stone,' *W.A.D.: The work of W. A. Dwiggins shown by the American Institute of Graphic Arts at the Gallery of the Architectural League* (New York: American Institute of Graphic Arts, 1937) pp. 5-15.

Kent, Norman, 'American printing richer for his contribution,' *Typographer* Volume 19, Number 1, Spring Edition (1958) pp. 28-29.

Kirshenbaum, Sandra, 'Dorothy Abbe and William A. Dwiggins,' *Fine Print* Volume 1, Number 2, April (1975) pp. 18-19.

Kristensen, John, 'The experimental types of W. A. Dwiggins,' *American proprietary typefaces*, David Pankow ed. (New York: American Printing History Association, 1998) pp. 149-65.

Lawson, Alexander S., *Anatomy of a typeface* (Boston: David R. Godine, 1990)

——, 'Typographically Speaking,' *Printing Impressions* (November 1975) pp. 215-16.

Lehmann-Haupt, Hellmut, *The book in America: a history of the making and selling of books in the United States* Second Edition (New York: R. R. Bowker Company, 1952)

McGrew, Mac, *American metal typefaces of the twentieth century* (Delaware: Oak Knoll, 1993)

McLean, Ruari, *Modern book design: from William Morris to the present day* (London: Faber & Faber, 1958)

——, *Typographers on type* (London: Lund Humphries Publishers Limited, 1995)

McKitterick, David, ed., *Stanley Morison & D. B. Updike: selected correspondence* (London: Scholar Press, 1972)

Nesbitt, Alexander, 'A contemporary's view,' *Fine Print* Volume 13, Number 2, April (1987) pp. 87-89.

Ruzicka, Rudolph, 'W. A. Dwiggins, Artist of the Book,' *More books: the bulletin of the Boston Public Library* June (1948) pp. 203-11.

Shaw, Paul, 'Tradition and innovation: the design work of William Addison Dwiggins,' *Design Issues* Volume 1, Number 2, Fall (1984) pp. 26-41.

Sherman, Frederic Fairchild, 'Modern hand-lettered books,' *The Printing Art*, February (1908) pp. 373-79.

Standard, Paul, 'W. A. Dwiggins—Artist-Dialetician in American book design,' *The Penrose Annual* Volume 39 (1937) pp. 38-44.

——, 'The Typophiles of New York,' *The Penrose Annual* Volume 41 (1939) pp. 32-36.

——, 'Calligraphy in Recent U.S. Book Production,' *The Penrose Annual* Volume 42 (1940) pp. 45-49.

Tebbel, John, *A history of book publishing in the United States, Volume II: The expansion of an industry 1865-1919* (New York: R. R. Bowker Company, 1975)

——, *A history of book publishing in the United States, Volume III: The golden age between two wars 1920-1940* (New York: R. R. Bowker Company, 1975)

——, *A history of book publishing in the United States, Volume IV: The great change 1940-1980* (New York: R. R. Bowker Company, 1975)

Thomajan, P.K., 'William Addison Dwiggins,' *The American Printer* (September 1950) p. 15.

Thomson, Ellen Mazur, *The origins of graphic design in America*, 1870-1920 (New Haven: Yale University, 1997)

Thompson, Maunde, *An introduction to Latin and Greek Paleography* (Oxford: Clarendon Press, 1912)

Thompson, Susan Otis, *American book design and William Morris* Expanded Edition (U.S.A.: Oak Knoll Press and The British Library, 1996)

Tracy, Walter, *Letters of credit: a view of type design* (London: Gordon Fraser, 1986) pp. 174-94.

Updike, Daniel Berkeley, *Printing types: their history, forms, and use*, Vols I and II (Cambridge: Harvard University Press, 1937)

Unger, Gerard, 'Experimental No. 223,' *Quaerendo* Volume XI, Number 4, Autumn Edition (1981) pp. 302-24.

[Author unknown], 'Caledonia,' *L&M News* December 1949–January 1950 (1950) pp. 40-41.

American type designers and their work: prepared on the occasion of an exhibition at the Lakeside Press Galleries, R. R. Donnelley and Sons Company Exhibition Catalogue (Chicago: R. R. Donnelley, 1947)

Letters and Nils Larson: reflections on his contributions to typographic development, 1992-1959 (Brooklyn: Merganthaler Linotype Company, 1959)

Figures and Sleeves

Because the work that Dwiggins performed was visual, it was felt that the inclusion of as many images as possible was necessary. The following images have been pulled both from the archives used in research and various books and publications. Where it has been possible the size at which they appear has been included.

The illustrations within the sleeves were not scanned as the others, as the quality of some of the photocopies made it impossible to improve upon the image. It was also done to keep the final size of several of them that were too large to scan properly. The photocopies, or sleeves, are all taken from the CHGP Archives in Kentucky.

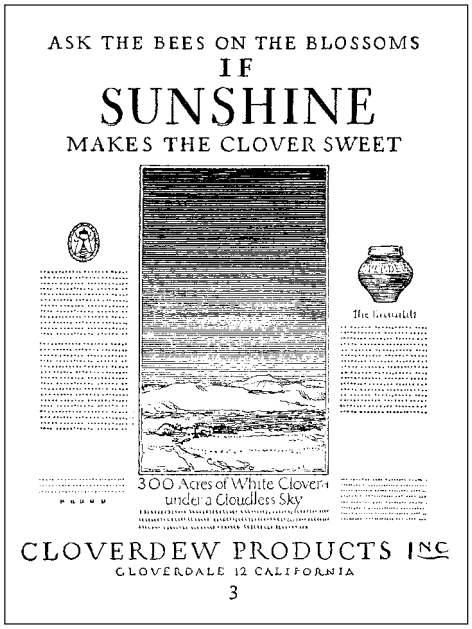


Figure 1

Figure 2

Sample Advertisements from Dwiggins' Book *Layout in Advertising*.
W. A. Dwiggins *Layout in Advertising* (New York: Harpers & Brothers, 1928)

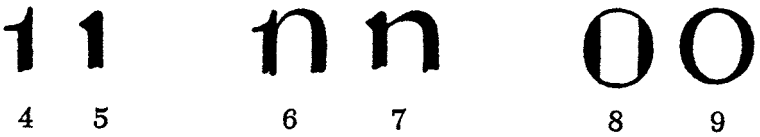


Figure 3

From Dwiggins' Article on Roman letter forms, these were used to illustrate ideal letter forms. The lowercase 'o' character, number 8, showed hints of the future experimental design Tippecanoe.
W. A. Dwiggins *MSS by WAD: a letter about designing type*
(Cambridge, MA: Harvard College Library, 1940) p. 43.

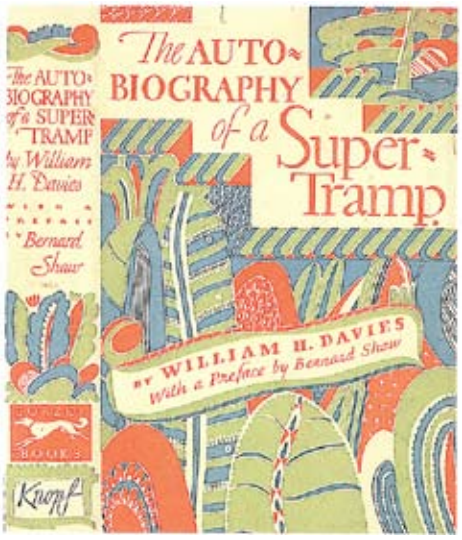


Figure 4

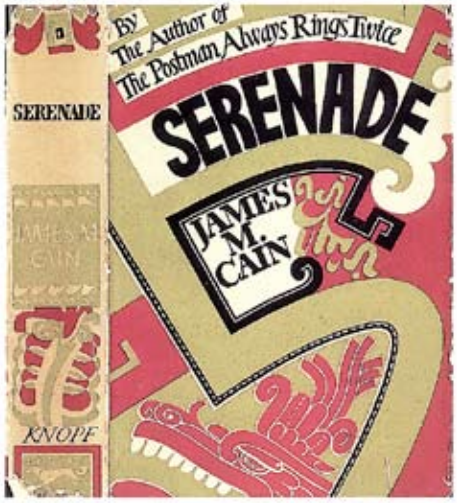


Figure 5

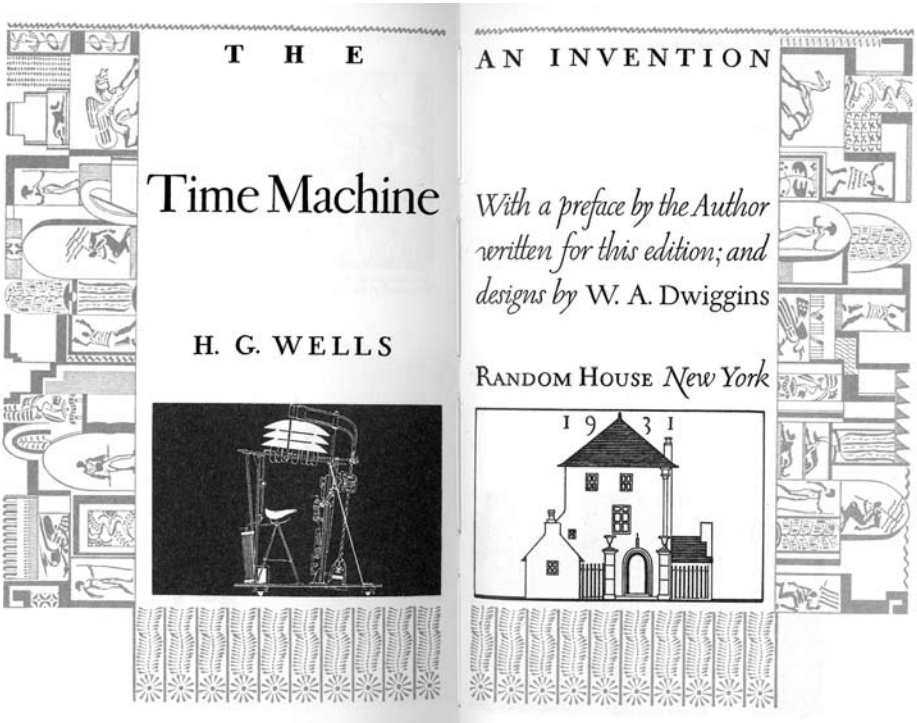


Figure 6

A small selection from the hundreds of title pages and book jackets designed by Dwiggins for Knopf and Random House, both in New York.

Stephen Heller 'The man who invented graphic design,' *Eye* Volume 6, Winter (1996)

Figure 7

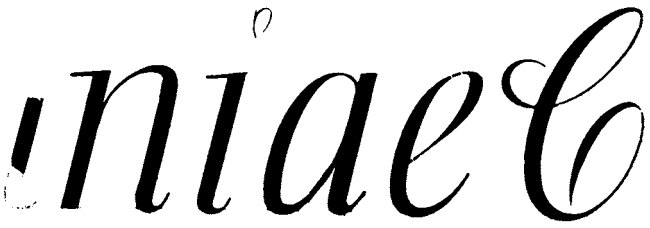


Figure 8

Lettering that Dwiggins did for the *Pictorial Review*.
He would refer to these in a future project.

WADC at Boston. These were included in a letter dated December 26, 1938. Shown at 100% of actual size.

Figure 9

Figure 10

These were selected from a group titled "News headletter."

WADC at Boston. Taken from the box labeled "Experimental." Shown at 100%.

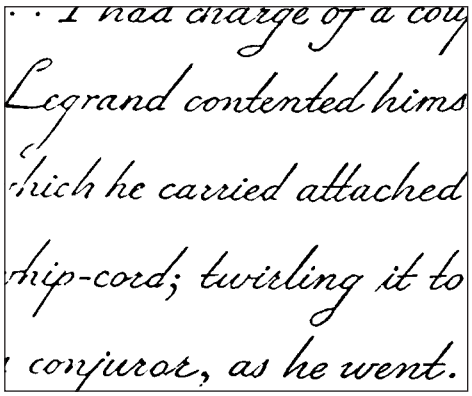


Figure 11

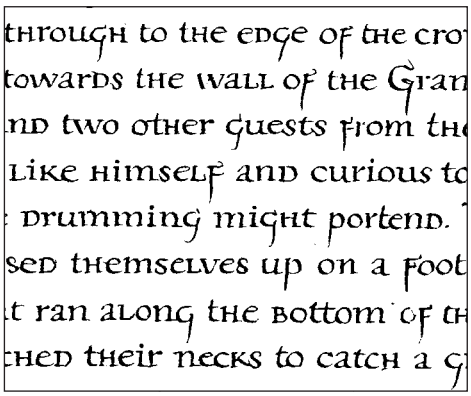


Figure 12

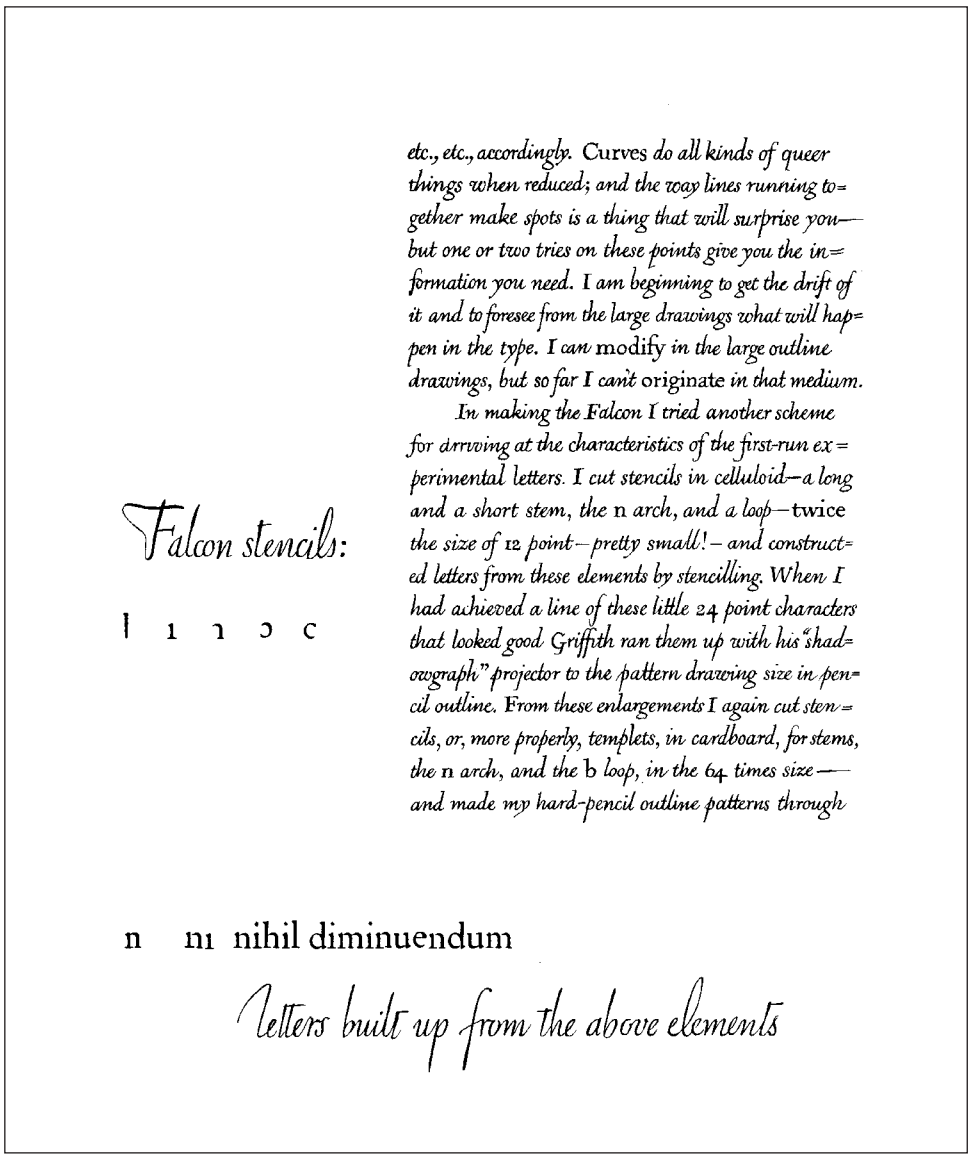


Figure 13

Dwiggins' hand-lettering abilities were used in creating manuscripts for the modern-day.
Clockwise from top left: *Edgar Allen Poe's Tales* (Chicago: The Lakeside Press, 1930), *History of Susannna* from the King James Version of the Bible (New York: The Scribe Archway Press, 1947), Dwiggins' book *WAD to RR: a letter about type design.* (Cambridge, MA: Harvard College Library, 1940)

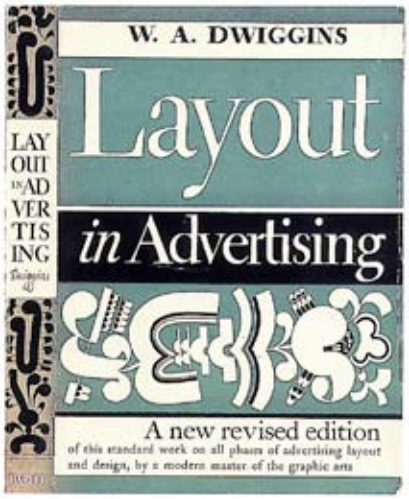


Figure 14

The book that set Dwiggins on a new course. This is the jacket cover from the second edition from 1948.

W. A. Dwiggins *Layout in Advertising* Revised Edition (New York: Harpers & Brothers, 1928)

AaBbCcDdEeFfGgHhIiJjKkLlMmNn
OoPpQqRrSsTtUuVvWwXxYyZz
1234567890 !@#£%^&*()_+

Figure 15

AaBbCcDdEeFfGgHhIiJjKkLlMmNn
OoPpQqRrSsTtUuVvWwXxYyZz
1234567890 !@#£%^&*()_+

Figure 16

AaBbCcDdEeFfGgHhIiJjKkLlMmNn
OoPpQqRrSsTtUuVvWwXxYyZz
1234567890 !@#£%^&*()_+

Figure 17

Sanserif designs that prompted Mergenthaler Linotype to create one of their own. From top to bottom: Futura, Kabel, and Gill Sans.

Digital Versions shown, all from the Adobe collection of typefaces.

ABCDEFGHIJKLMNOPQRSTUV
WXYZ&ÆŒæœ
1234567890
abcdefghijklmnopqrstuvwxyz
[($£,.:;'-'?!*†‡§¶)]

Figure 18

Metro was the first typeface produced by Linotype from a design by Dwiggins.

Setting taken from the book *Postscripts on Dwiggins*, Volume 2.

Figure 19

The first three test characters from Experimental No. 70, Falcon.
CHGP at Kentucky. Falcon Transcript, p. 2. Shown at 200% of actual size.

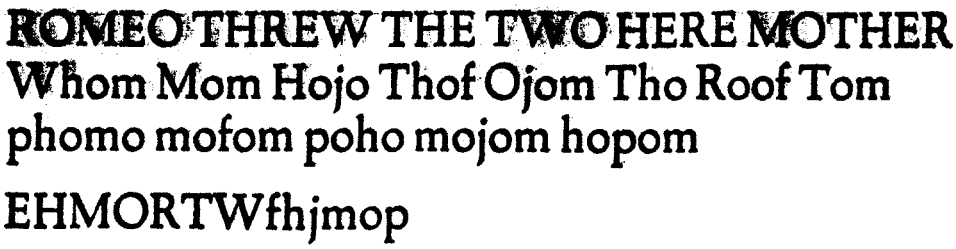


Figure 20

Proof No. 2
CHGP at Kentucky. Falcon Transcript, p. 2. Shown at 175% of actual size.

Figure 21

"Sharp-finished old-style."
WADC at Boston. Tracing taken from original ink drawings. Shown at 100% of actual size.

Figure 22

Figure 23

Dwiggins' sharp, crisp, and non-conformist art.
Taken from Dorothy Abbe's book *Stencilled ornament and illustration.* (Boston: Trustees of the Boston Public Library, 1980) p. 27.

Figure 24

Used to illustrate one of his techniques in type design.
Taken from Dwiggins' book *WAD to RR: a letter about type design*.
(Cambridge, MA: Harvard College Library, 1940) Unpaginated.
Shown at 200% of actual size.

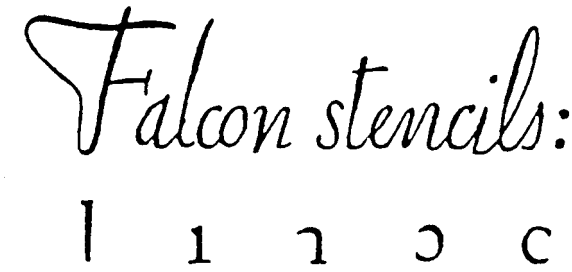


Figure 25

The five initial shapes that led to Falcon.
Taken from Dwiggins' book *WAD to RR: a letter about type design*.
(Cambridge, MA: Harvard College Library, 1940) Unpaginated.
Shown at 200% of actual size.

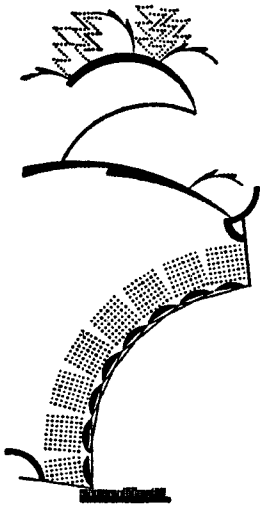


Figure 26

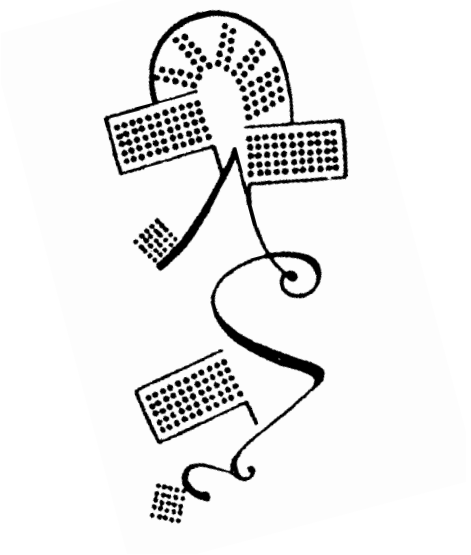


Figure 27

The stencil technique used as a pattern.

Taken from Dorothy Abbe's book *Stencilled ornament and illustration.*
(Boston: Trustees of the Boston Public Library, 1980) pp. 27 and 35 (rotated).

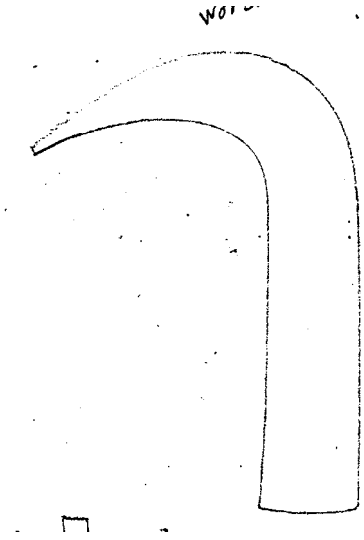


Figure 28

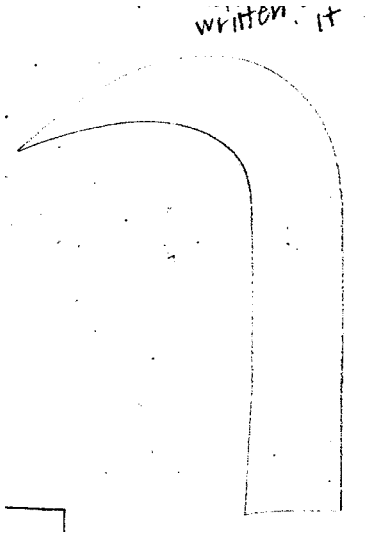


Figure 29

Similar to the stencil, he also used large templates to establish shapes and uniformity. The one of the left was the revised shape, and was labeled "use," while the one on the right was labeled "don't use."

WADC at Boston. Undated. Shown at 55% of actual size.

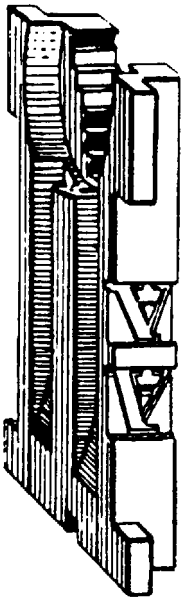


Figure 30

The Linotype Matrix, illustrating the idea of duplexing.
Taken from Mac McGrew's book *American metal typefaces of the twentieth century.* (Delaware: Oak Knoll, 1993). Shown at 200% of actual size.

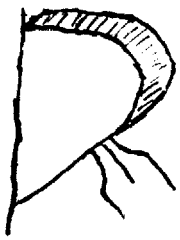


Figure 31

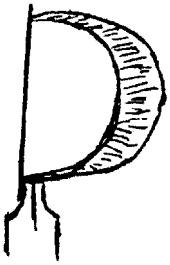


Figure 32

Dwiggins demonstrating his idea for modelling of the capitals.
CHGP at Kentucky. Falcon Transcript, p. 13. Shown at 200% of actual size.

Figure 33

Figure 34

Figure 35

Working towards an appropriate italic to be duplexed with the roman.
CHGP at Kentucky. Falcon Transcript, p. 15. Shown at 200% of actual size.

Figure 36

A sample taken from Proof no. 6.
CHGP at Kentucky. Falcon Transcript, p. 25. Shown at 200% of actual size.

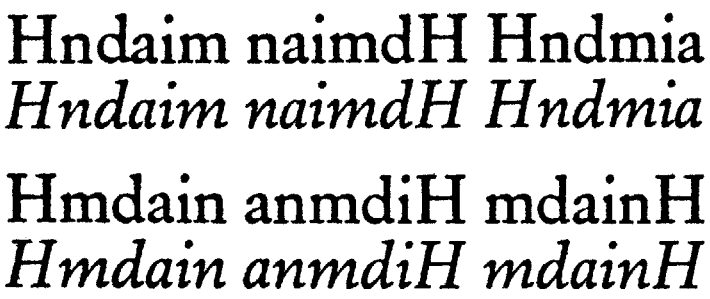


Figure 37

A sample taken from Proof no. 11.
CHGP at Kentucky. Falcon Transcript, p. 28. Shown at 200% of actual size. Cut in half to fit.

Figure 38

Re-thinking the finial strokes pertaining to the italic.
CHGP at Kentucky. Falcon Transcript, p. 29. Shown at 200% of actual size. Cut in half to fit.

nihil diminuendum
dpb ohh

Figure 39

"That darn stencil letter . . . ."
CHGP at Kentucky. Falcon Transcript, p. 22. Shown at 200% of actual size. Cut in half to fit.

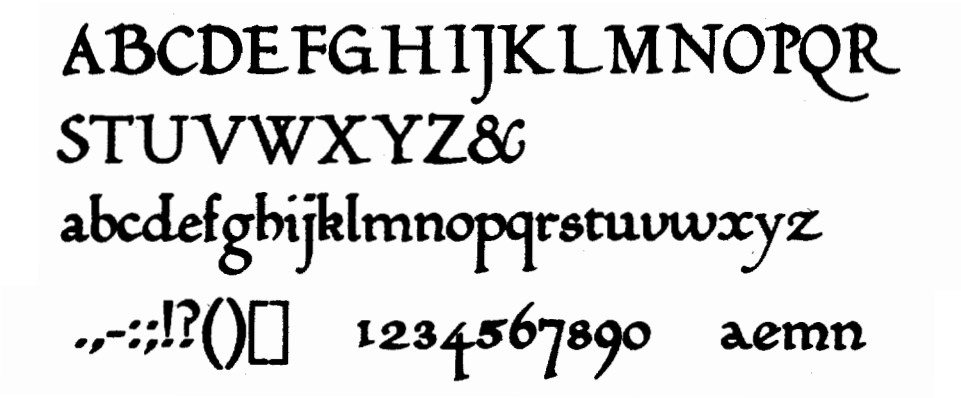


Figure 40

"Orcutt's Humanistic . . . ."

Taken from Mac McGrew's book *American metal typefaces of the twentieth century.* (Delaware: Oak Knoll, 1993). Shown at 200% of actual size. Arranged to fit.

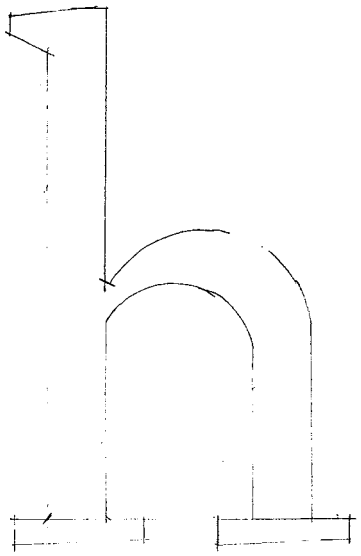


Figure 41

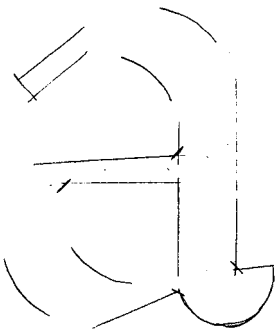


Figure 42

"Since the fellers are all yelling for mechanical, non-human letters one might meet them full-face with a type that had nothing human (i.e. calligraphic) about it at all, at all. . . This is pure straight-edge and compass, with no trace of hand-drawn curves."

WADC at Boston. These are only partial tracings of line drawings. Although they are dated July 7, 1948, it was felt that they demonstrated the qualities to which Dwiggins referred. Shown at 55% of actual size.

Figure 43

Figure 44

Re-thinking the arches and curves.
CHGP at Kentucky. Falcon Transcript, p. 34. Shown at 200% of actual size.

Figure 45

Figure 46

Comparing the finials from Experimental 70 and Falcon B.
CHGP at Kentucky. Falcon Transcript, p. 35. Shown at 200% of actual size.

ABCDEFGHIJKLMNOPQRSTUVWXYZ&ÆŒ
ABCDEFGHIJKLMNOPQRSTUVWXYZ&ÆŒ
abcdefghijklmnopqrstuvwxyzæœfiffflffiffl 1234567890
abcdefghijklmnopqrstuvwxyzæœfiffflffiffl 1234567890

Figure 47

ABCDEFGHIJKLMNOPQRSTUVWXYZ& ($£,.:;'-'?!*†)
ABCDEFGHIJKLMNOPQRSTUVWXYZ& ($£,.:;'-'?! †)
1234567890 abcdefghijklmnopqrstuvwxyzfiflffffiffl 1234567890
1234567890 abcdefghijklmnopqrstuvwxyzfiflffffiffl 1234567890

Figure 48

ABCDEFGHIJKLMNOPQRSTUVWXYZ&ÆŒ
ABCDEFGHIJKLMNOPQRSTUVWXYZ&ÆŒ
abcdefghijklmnopqrstuvwxyzæœfiffflffiffl 1234567890
abcdefghijklmnopqrstuvwxyzæœfiffflffiffl 1234567890

Figure 49

Some of the types used for comparison with Falcon 266.
Taken from Mac McGrew's book *American metal typefaces of the twentieth century.* (Delaware: Oak Knoll, 1993). Shown at 100% of actual size. From top to bottom: Caslon No. 2 & Italic, Linotype 12-pt.; Caslon Oldface & Italic, Linotype 14-pt.; Oldstyle No. 7 & Italic, Linotype 14-pt.

Figure 50

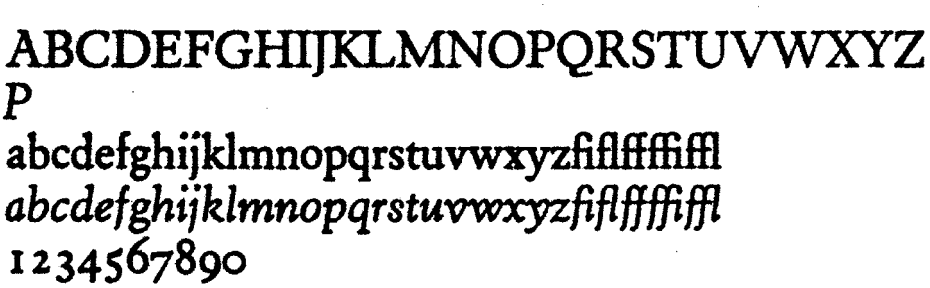


Figure 51

Proof no. 5 and an enlarged capital 'A,' showing one of Dwiggins' "trade-mark" tricks.

CHGP at Kentucky. Falcon Transcript, p. 22.
The capital is shown at 400% of actual size. The proof is shown at 200% of actual size.

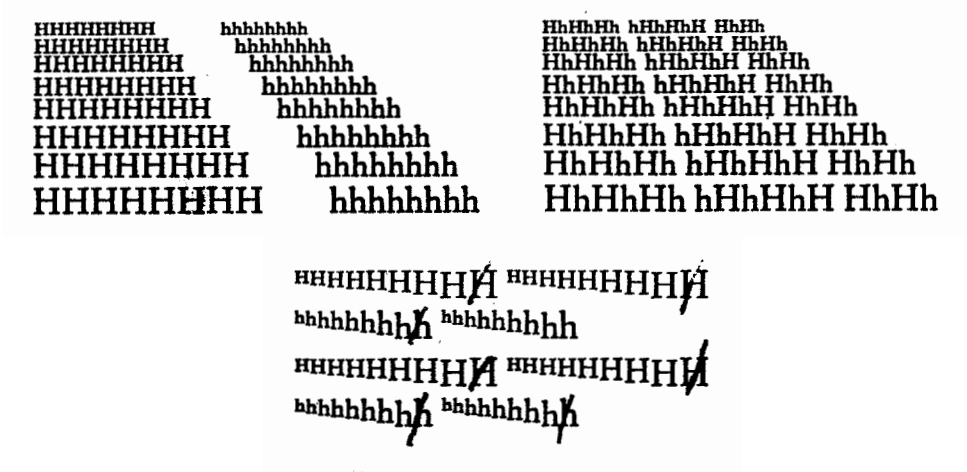


Figure 52

An example of the "graph method" used at Linotype.

CHGP at Kentucky. Falcon Transcript, p. 44.
The capital is shown at 400% of actual size. Shown at 100% of actual size. Arranged to fit.

Figure 53

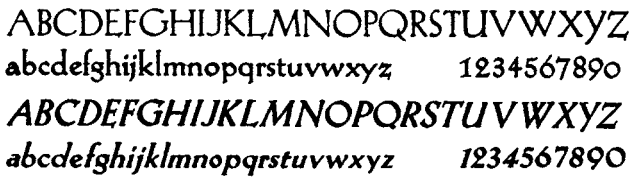


Figure 54

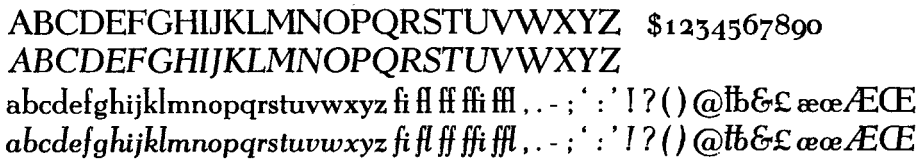


Figure 56

Cochin, Eve, and Egmont: the types that were considered competition.

Taken from Mac McGrew's book *American metal typefaces of the twentieth century.* (Delaware: Oak Knoll, 1993). Shown at 100% of actual size. From top to bottom: Cochin, Monotype 24-pt.; Eve, Klingspor Foundry 12-pt.; Egmont Medium & Italic, Intertype 12-pt.

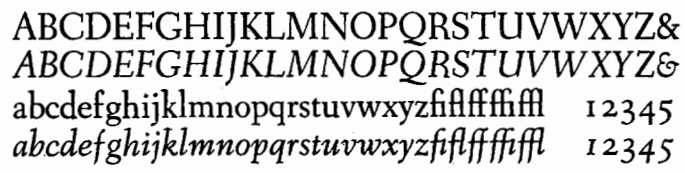
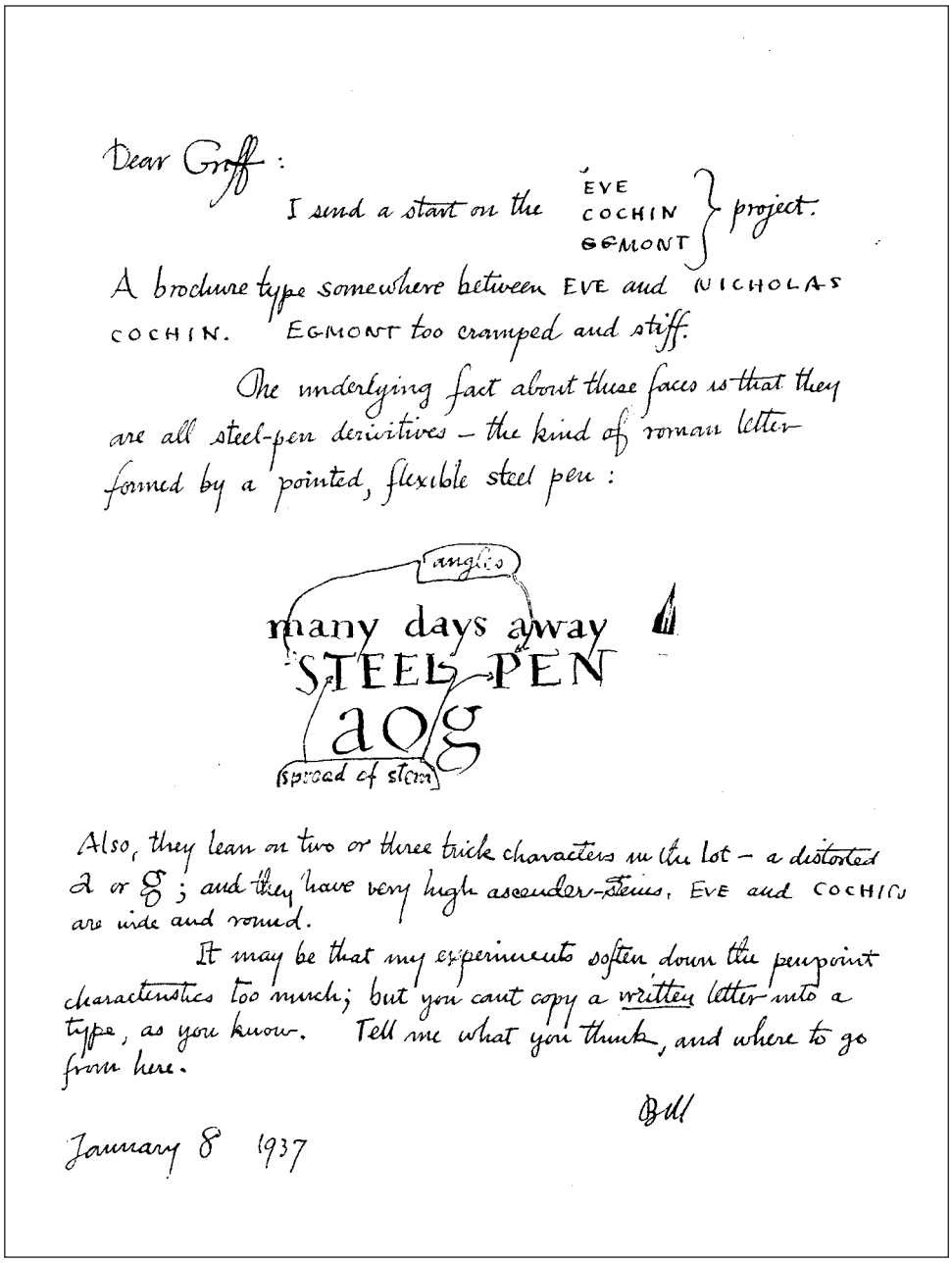


Figure 57

Rudolph Ruzicka's "Fairfield"

Taken from Mac McGrew's book *American metal typefaces of the twentieth century.* (Delaware: Oak Knoll, 1993). Shown at 100% of actual size. Fairfield & Italic, Linotype 14-pt.



Dear Goff:

I send a start on the EVE / COCHIN / EGMONT } project.

A brochure type somewhere between EVE and NICHOLAS COCHIN. EGMONT too cramped and stiff.

The underlying fact about these faces is that they are all steel-pen derivitives – the kind of roman letter formed by a pointed, flexible steel pen:

Also, they lean on two or three trick characters in the lot – a distorted a or g; and they have very high ascender-stems. EVE and COCHIN are wide and round.

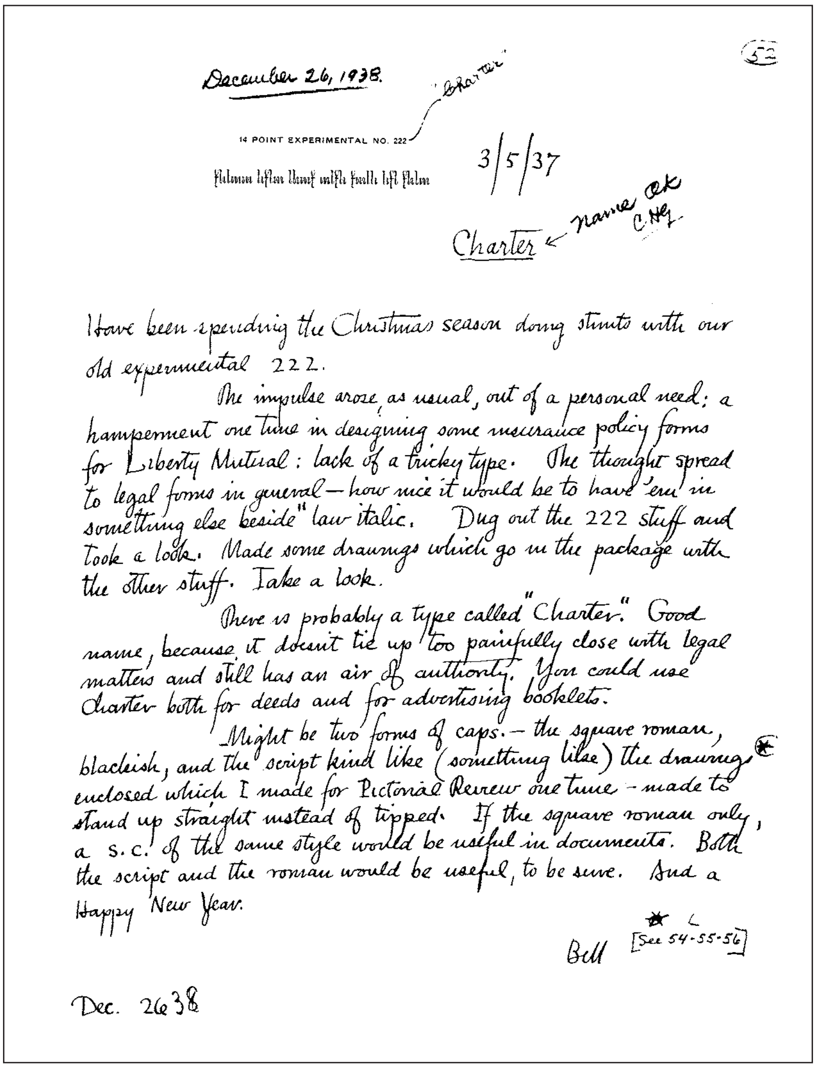
It may be that my experiments soften down the penpoint characteristics too much; but you can't copy a written letter into a type, as you know. Tell me what you think, and where to go from here.

Bill

January 8 1937

Figure 55

The letter that began the typeface that became Arcadia.
CHGP at Kentucky. Taken from a photocopy. Shown at 65% of actual size.



December 26, 1938. Charter

14 POINT EXPERIMENTAL NO. 222

3/5/37

Charter ← name OK C.H.G.

Have been spending the Christmas season doing stunts with our old experimental 222.

The impulse arose, as usual, out of a personal need: a hampement one time in designing some insurance policy forms for Liberty Mutual: lack of a tricky type. The thought spread to legal forms in general—how nice it would be to have 'em in something else beside" law italic. Dug out the 222 stuff and took a look. Made some drawings which go in the package with the other stuff. Take a look.

There is probably a type called "Charter." Good name, because it doesn't tie up too painfully close with legal matters and still has an air of authority. You could use Charter both for deeds and for advertising booklets.

Might be two forms of caps.—the square roman, blackish, and the script kind like (something like) the drawings* enclosed which I made for Pictorial Review one time—made to stand up straight instead of tipped. If the square roman only, a s.c. of the same style would be useful in documents. Both the script and the roman would be useful, to be sure. And a Happy New Year.

Bill

*[See 54-55-56]

Dec. 26 38

Figure 58

Letter from December 26, 1938.

CHGP at Kentucky. Taken from a photocopy. Shown at 50% of actual size.

Figure 59

Lettering that Dwiggins did for the *Pictorial Review*.
These were included in the letter from December 26, 1938.

WADC at Boston. Shown at 100% of actual size.

1234567890

Figure 60

Cochin, Eve, and Egmont: the types that were considered competition.
Taken from Mac McGrew's book *American metal typefaces of the twentieth century.* (Delaware: Oak Knoll, 1993). Shown at 400% of actual size. Lino Script 14-pt.

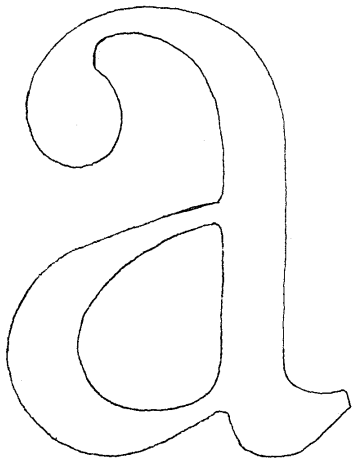


Figure 61

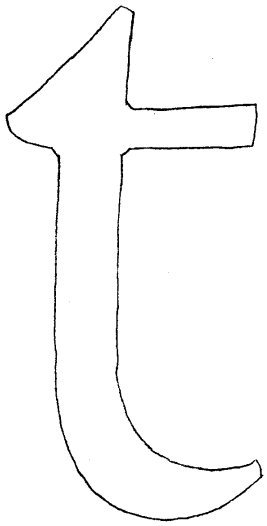


Figure 62

Sample taken from the original drawings for Stuyvesant.
WADC at Boston. Tracings taken from original drawings. Dated August 4, 1942.

Ce Caractère Coulé a été inventé & Gravé la premiere fois l'An 1753. ſur le double Mediaan ou Cicero, pour ſervir à la Muſique, que J. F Rosart a inventé & donné au Public le 3 de Janvier 1750 dont le Sr. Sancto Lapis & Antonio Mahout & toute la Ville d'Harlem peut certifier.

Figure 63

The type that inspired Dwiggins to design Stuyvesant.
Taken from D. B. Updike's book *Printing types: their history, forms, and use,* Volume 2. (Cambridge: Harvard University Press, 1937). Shown at 150% of actual size.

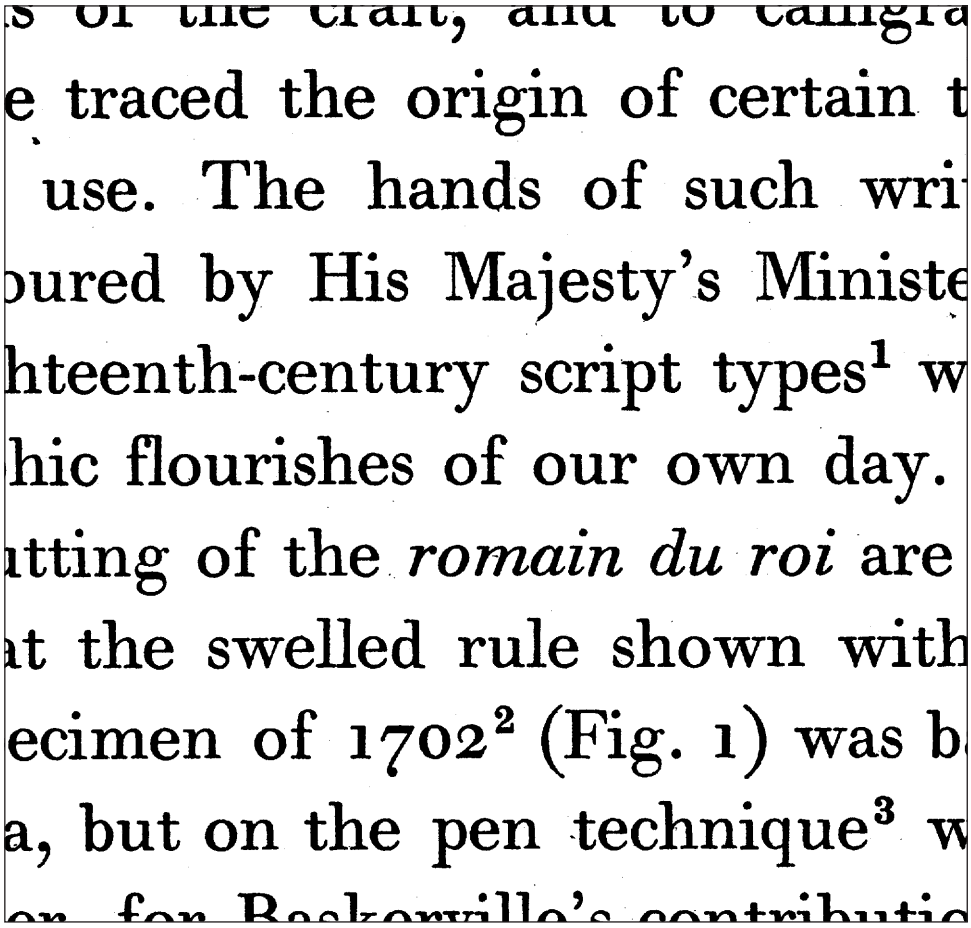


Figure 64

Oliver Simon's *Signature Magazine* typeface.

Shown at 150% of actual size.

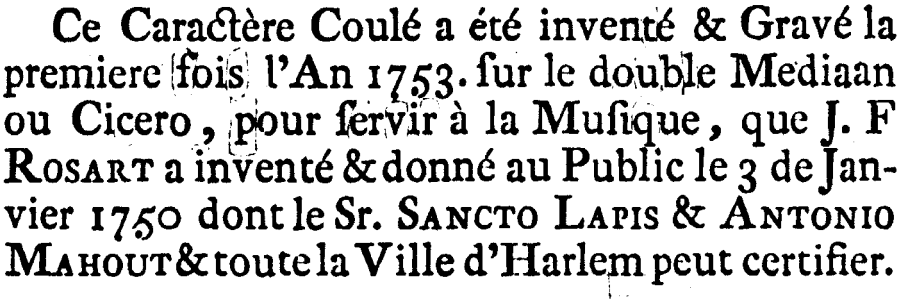


Figure 65

In looking closely at this, you can see the marks that Griffiths made as he identified the letters that Linotype had borrowed.

Shown at 150% of actual size.

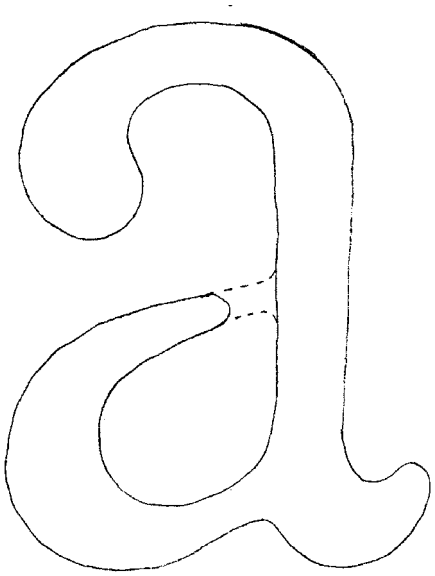


Figure 66

Examining closely the sample from the Updike book, perhaps Dwiggins was trying to mimic the same character shown.

WADC at Boston. Tracings taken from original drawings. Dated April 17, 1943. Shown at 60% of actual size.

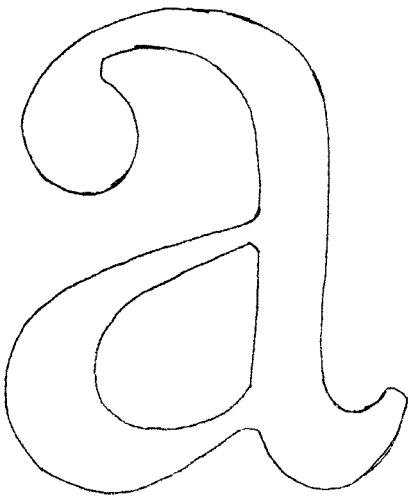


Figure 67

Returning to more detail in the modelling.

WADC at Boston. Tracings taken from original drawings. Dated June 17, 1943. Shown at 60% of actual size.

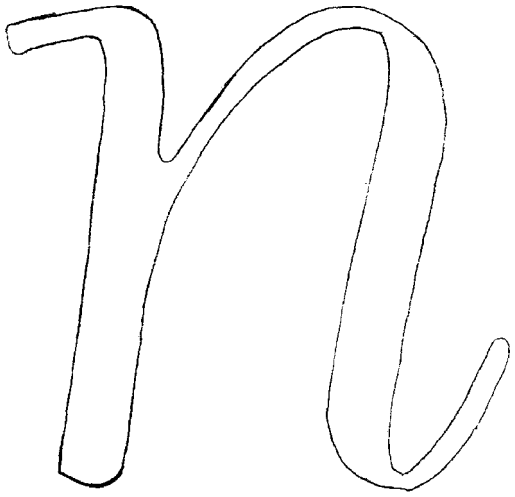


Figure 68

The italic inspired by Plantin.
WADC at Boston. Tracings taken from original drawings. Dated June 17, 1943. Shown at 60% of actual size.

zio, nuovo Testamento Greco, ed altri libri dei loro torchj, dove trovansi dei caratteri rossi sono capi d' opera nella loro arte. Più volte hanno stampato il catalogo delle loro edizioni che fra le altre comprendono tutti gli autori classici, i di cui piccoli caratteri sono belli tanto, quanto nocevoli alla vista.

I Stefani si riguardano come i regi della stampa, tanto per l' erudizione, che per le edizioni Greche ed Ebraiche. Otto sono gli Stefani che si distinsero nella loro carriera, ma Roberto ed Enrico suo secondo genito si re-

Figure 69

The inspiration behind the final italic for Stuyvesant.
Taken from D. B. Updike's book *Printing types: their history, forms, and use*, Volume 2. (Cambridge: Harvard University Press, 1937). Shown at 100% of actual size.

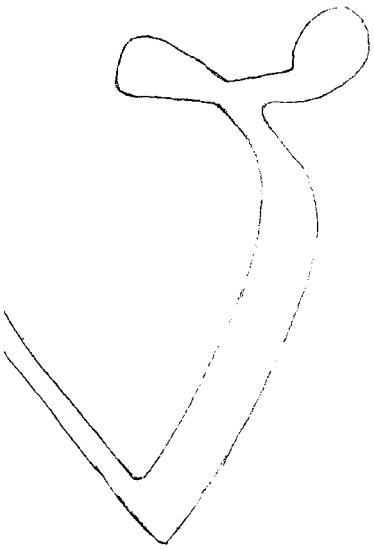


Figure 70

A "Rosart" detail. The right side of the lowercase 'v' character.
WADC at Boston. Tracings taken from original drawings. Dated September 7, 1943.
Shown at 60% of actual size.

THE RUINES OF TIME

It chaunced me on day beside the shore
Of silver streaming Thamesis to bee,
Nigh where the goodly Verlame stood of yore,
Of which there now remaines no memorie,
Nor anie little moniment to see,
By which the travailer that fares that way
This once was she may warned be to say.

Figure 71

'Ah! what delight,' quoth she, 'in earthlie thing,
Or comfort can I, wretched creature, have?
Whose happines the heavens envying,
From highest staire to lowest step me drave,
And have in mine owne bowels made my grave,
That of all nations now I am forlorne,
The worlds sad spectacle, and Fortunes scorne.'

Figure 72

Proof No. 6 for 12-pt. Stuyvesant
CHGP at Kentucky. Tracings taken from a photocopy. Dated May 1, 1944.
Shown at 125% of actual size.

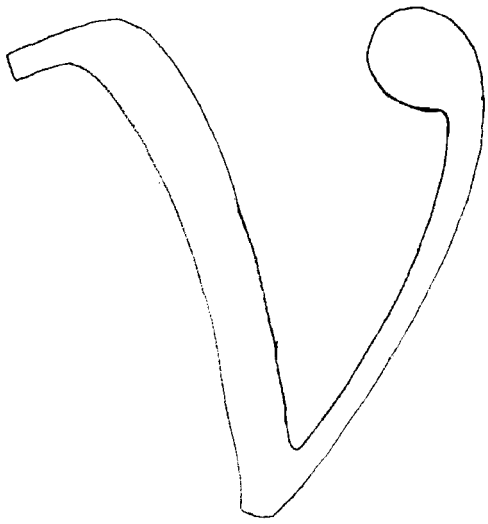


Figure 73

The lowercase 'v' after de-rosarting.
WADC at Boston. Tracings taken from original drawings. Dated February 17, 1945. Shown at 60% of actual size.

Patience, sister of mine. Your curi-
osity is truly laudable, and I trust that
before you read the postscript of this
Patience, sister of mine. Your curi-
osity is truly laudable, and I trust that
before you read the postscript of this
PATIENCE, SISTER OF MINE. YOUR
CURIOSITY IS TRULY LAUDABLE, AND
I TRUST THAT BEFORE YOU READ

Figure 74

Sample of Stuyvesant shown in *Publisher's Weekly*
CHGP at Kentucky. Taken from a photocopy. Shown at 150% of actual size.
Publisher's Weekly Volume 156, Number 11 (September 10, 1949) p.1336.

Letter First

A TRIP INTO THE MINES

Rich Bar,
East Branch of the North Fork of Feather River,
September 13, 1851

I CAN easily imagine, dear M——, the look of large wonder, which gleams from your astonished eyes, when they fall upon the date of this letter. I can figure to myself your whole surprised attitude, as you exclaim, "What in the name of all that is restless, has sent 'Dame Shirley' to Rich Bar?" How did such a shivering, frail, home-loving little thistle ever float safely to that far away spot, and take root so kindly, as it evidently has, in that barbarous soil? Where, in this living, breathing world of ours, lieth that same Rich Bar, which, sooth to say, hath a most taking name? And for pity's sake, how does the poor little fool expect to amuse herself there?"

Patience, sister of mine. Your curiosity is truly laudable; and I trust that before you read the postscript of this epistle, it will be fully and completely relieved. And first, I will merely observe *en passant* — reserving a full description of its discovery for a future letter — that said Bar forms a part of a mining settlement situated on the East Branch of the North Fork of Feather River, "away off up in the mountains," as our "little Faresoul" would say, at almost the highest point where, as yet, gold has been discovered, and indeed, within fifty miles of the summit of the Sierra Nevada itself. So much at present, for our *locale*, while I proceed to tell you of the propitious — or unpropitious as the result will prove — winds, which blew us hitherward.

15

Figure 75

Press proof for the book *The Shirley Letters* using 12-pt. Stuyvesant roman and italic.
CHGP at Kentucky. Taken from a photocopy. Dated February December 28, 1948. Shown at 100% of actual size.
Proof for Alfred A. Knopf, performed by The Plimpton Press.