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The Paleographical Dating of P-46

In 1988 Y.K. Kim published an article in <u>Biblica</u> arguing for the paleographical dating of P-46 (P.Beatty II + P.Mich. 222) to the later first century, preferably prior to the reign of Domitian (AD 81-96).¹ This would be rather dramatic if it were true. But so far no paleographical assessment of this dating has appeared in print.

It is true that in 1992 Bruce Metzger expressed some skepticism about Kim's dating.² But his reasons were not paleographical. Metzger objected that "P-46 is a perfectly ordinary copy—certainly not the archetype of the Pauline corpus! It must have taken some time for the nine Epistles that are preserved in P-46 to have been collected, then a copy made of the corpus (the archetype), and finally, a copy of this to reach the interior of Egypt." But since there is no hard data whatever on the early history of the Pauline corpus in Egypt, Kim's dating cannot be ruled out on these grounds. Nor, given the speed of ancient transportation, is there any reason why a copy of the Pauline corpus could not have reached the interior of Egypt at an early date.

Metzger also referred to a letter from T.C. Skeat in which Skeat argued: "We would have to accept that it is, by a very wide margin, the oldest surviving Christian manuscript <u>and</u> the oldest surviving example of a papyrus codes. Moreover, P-46 uses an extensive and well-developed system of <u>nomina sacra</u>, which it is difficult to believe can have existed, not merely in AD 80, but, presumably, in one of its ancestors. I therefore find it impossible to accept

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¹⁴Paleographical Dating of P-46 to the Later First Century", <u>Biblica</u> 69 (1988) 248-257.

² The Text of the New Testament, New York: Oxford University Press, 1992; 265-66.

Kim's thesis."³ But there is no improbability in the Christian use of the codex in the late first century; Martial attests it for pagan codices in exactly this period, and there is every reason to believe that at least some Christians were using it then as well.⁴ As for the system of <u>nomina sacra</u>, it is true that there is plausible evidence to suggest that the system began with only four words and then expanded—but when, where, and how fast the system expanded is simply unknown.⁵ Thus Kim's dating cannot be ruled out on this basis either.

Finally, Metzger appealed to the authority of E.G. Turner who assigned P-46 to the third century. Turner's authority is certainly always to be respected; but Turner died before Kim's article appeared, and hence there was no opportunity for him to assess Kim's arguments. This might not have made much difference, since Turner tended to be skeptical of early dates for Christian papyri. But it underlines the need for a paleographical study of Kim's case.

Analysis of a late first century date

1. The evidence from ligature forms. Kim notes that: "I examined the ligature forms of P-46, which until now have not received due notice. This sort of calligraphical hand with its striking effort to keep to the upper line is unknown to keep to the upper line is unknown to me after the first century at least in a consistent usage and is found mostly in the later Ptolemaic period." For those who are not paleographers, Kim's analysis needs some explanation. Ligatures refer to strokes used by a scribe to connect two separate letters. Good professional literary manuscripts avoided the use of ligatures; scribes writing everyday documents used ligatures heavily. Hence the use of ligatures does not so much indicate a time-period as it does a lapse of professionalism on the part of the scribe. The ligatures of P-46 do not point to the first century; they could point to any period where the scribe is being less than fully professional. If a period had to be chosen, one might suggest a certain

⁸ Kim 1988, 249.

³ Ibid.

⁴ C.H. Roberts and T.C. Skeat, <u>The Birth of the Codex</u>, Oxford: Oxford University Press, 1983; 24-29

⁵ C.H. Roberts, <u>Manuscript</u>, <u>Society</u>, and <u>Belief in Early Christian Egypt</u>, Oxford: Oxford University Press, 1979;26-48.

⁶ Metzger 1992, 266.

⁷ Eric G. Turner, <u>The Typology of the Codex</u>, University of Pennsylvania Press, 1977; 4.

similarity between P-46 and what paleographers refer to as the "chancery hands" of the early third century.

Some explanation is also needed for Kim's reference to P-46's "striking effort to keep to the upper line." Paleographers conceive of writing as being inscribed between an imaginary upper and lower line. In Hebrew paleography, for example, the letters are hung from the upper line like laundry on a wash-line. This is also characteristic of Greek handwriting in the Ptolemaic period (circa 300 to 30 BC). But once Greek handwriting moves into the first century AD, it becomes strongly "bilinear"; that is, it tries to keep to both the upper and lower line. This commitment to "bilinearity" begins to break down some time in the middle of the second century, and the breakdown is well advanced in the third century. In this later period, it is not uncommon to find hands that keep the upper line, but not the lower line.

P-46 is not "bilinear", and this lack of bilinearity creates a problem for a first century dating. Since the manuscript is a copy of the letters of Paul, composed circa AD 50-65, the manuscript cannot be assigned to the Ptolemaic period (pre-30 BC). The manuscript is more likely to date some time after the middle of the second century.

2. The evidence from added hands. Kim calls attention to "an added hand, [which] seems to determine the papyrus's terminus ad quem. This style appears from the second century BC to the early second century AD". The added hand in question uses a "separated" kappa in which the vertical stroke is separated from the rest of the letter. Kim is correct that the separated kappa is a typical feature of first century hands. But this separated kappa appears in an added hand consisting of only two letters. Thus there is no way to be certain that this separated kappa is consistent feature of the hand in question. Indeed, this particular added hand appears to be misclassified; it is more likely to be the hand of the same scribe who wrote the page numbers at the top of the manuscript, and his hand likely belongs to the late second century or perhaps the third.

⁹ Kim 1988, 249.

Some additional examples of separated <u>kappas</u> can be found in the hand which did the corrections at fol 37v16 and fol 37v18. But here again, the evidence is so scanty that no firm conclusions can be drawn.

Finally, Kim's footnotes refer to three other correctors, identified by Kim as correctors 3, 5 and 7.¹⁰ Kim's corrector 3 is assigned by him to AD 59-161; but since the hand consists of only two letters, who can tell? Kim's corrector 5 consists of four letters, which he seems to assign to the second century; it is difficult to quarrel over evidence this limited. It is only with Kim's corrector 7 that we get as many as seven letters. Roberts assigned this hand to the late third century, but Kim assigns it to no later than the first half of third century; a third century date would seem to suit all.

3. The evidence from orthography. Kim points to the use of the eg form rather than the ek form before compounds with beta, delta, and lambda. He supplies lists of papyri designed to show that this spelling "gradually disappeared probably after the early second century AD."

It is a credit to Kim's industry and his integrity that he lists a glaring exception to this general pattern, the Christian papyrus, P-13 (P.Oxy 657 + PSI 1292). This papyrus is a copy of the letter to the Hebrews. It is written on the back of a Latin copy of Livy, which Latin paleographers have assigned to the third century. Since the Greek copy of Hebrews is on the back, it cannot be earlier than the third century Latin text. The Greek hand of Hebrews is also a solidly third century hand. This makes P-13 a strong example of the persistence of the eg in some third century hands.

All this is good additional evidence for the thesis of Gunther Zuntz that Egyptian scribes had a serious concern for the quality of the texts that they copied. But it is unconvincing evidence for a first century date for P-46.

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¹⁰ Kim 1988, 249-50fn8.

¹¹ Kim 1988, 254-56.

4. The evidence from the history of *Zierstil*. Kim asserts that "all literary papyri similar to P-46 in its exact style have been assigned an early date". He then gives two lists of papyri whose dates all cluster in the first century AD. 12 Kim is attempting to argue that P-46 is written in what Schubart termed Zierstil, or "decorated style"—which was Schubart's term for describing the short hooks and strokes which some scribes attached to their letters. Schubart believed that the Zierstil came to an end about AD 100.13 Now it is clear that if P-46 is an example of Zierstil, and if Zierstil came to an end in AD 100, then there is a strong case for a first century dating for P-46. Kim's argument is more complicated than this, however, since he believes that Zierstil continued through the reign of Hadrian, which ended in AD 138.¹⁴

Two cautions need to be made at the outset concerning Kim's analysis of Zierstil: first, study since Schubart has concluded that the use of decoration does not define a single uniform style; rather, it is a feature of several styles, which considerably complicates the usefulness of decoration as a criterion of dating. 15 Second, decorated styles continue well into the third century. Prominent examples include P.Oxy 3030 (AD 207), P.Oxy 654 (AD 200-250), and P. Lund.Univ-Bibl.IV.13 (AD 260-270).

Nonetheless, Kim offers four specific arguments for identifying P-46 as a first century AD example of Zierstil. First, Kim argues that finals (i.e., horizontal strokes) at the feet of letters point to the first century AD. 16 But finals can be seen well into the third century AD (cf., P.Lund.Univ-Bibl.IV.13, dated AD 260-270).

Second, Kim argues that the shapes of the beta and the upsilon in P-46 point to the first century AD. 17 He is correct that the shapes of the beta and the upsilon are compatible with a first century date. But these forms appear later as well. Most crucially, the shapes of these

¹³ W. Schubart, Griechische Palaographie, Munich, 1925.

¹⁴ Kim 1988, 253.

¹² Kim 1988, 250-52.

¹⁵ The most comprehensive study is G. Menci, "Scritture Greche Librarie Con Apici Ornamentali (III a.C.-II d.C.)", Scrittura e Civilta 3 (1979) 23-52. For the concurrence of E.G. Turner, see Greek Manuscripts of the Ancient World, 2nd ed., edited by P.J. Parsons, London: Institute for Classical Studies, 1987; 21.

¹⁶ Kim 1988, 252.

¹⁷ Kim 1988, 252.

letters are not the only issue; there is also the problem of the relationship of these letters to the lower line. Both letters regularly violate the lower line and are examples of the lack of bilinearity in the manuscript. This is unlikely in a first century manuscript and instead points to a later date. Thus instead of being good indicators of a first century AD date, the <u>beta</u> and the <u>upsilon</u> are serious problems.

Third, Kim notes that P-46 has not been influenced by two specific styles of decoration, the most important being the "blob-ornamental" style of P.Oxy 2987 (AD 78/79). P.Oxy 2987 is one of the two manuscripts that Kim lists as most strongly encouraging him to re-evaluate the dating of P-46. Kim is quite correct that P-46 has not been influenced by the style of P.Oxy 2987. But this does not necessarily mean that P-46 was written prior to Domitian. It may simply mean that P-46 was written substantially later.

Fourth, Kim argues that when P-46 is compared with P.Oxy 841 (AD 100-150), P-46 appears to be "very early". But P-46 is almost certainly later than P.Oxy 841. P.Oxy 841 uses the separated kappa that is frequently found in first century papyri. P.Oxy 841 also uses an epsilon with a detached cross-bar; this is a common feature in first century and early second century hands, but it is absent from P-46. In P.Oxy 841 both the iota and the upsilon are bilinear, whereas in P-46 these letters regularly violate the lower line. Finally, one notes the phi which P-46's scribe writes with a broad, angular diamond shape. I have not been able to find any example of this in any first century manuscript. This form of the phi is highly unusual prior to the late second century, and is most common in the middle of the third century.

Kim offers one additional argument: he gives a list of dated papyri which he believes shows that P-46 uses form of letters that can be distinguished from letter forms dominant since the reign of Domitian.²¹ There is scarcely any concise way to respond to this argument; there is no space here to analyze each papyrus in detail. All one can do is to say that review of these

¹⁸ Kim 1988, 252-53.

¹⁹ Kim 11988, 248: "I was encouraged to do this, above all, by the publication of two papyri,

P.Oxy. XLI 2987 (AD 78/9) and P. Mich. Inv. 6789." The latter papyrus was assigned to the late first/early second century AD.

²⁰ Kim 1988, 253.

²¹ Kim 1988, 253-54.

lists does not seem to substantiate Kim's argument, and that a first century date is not established on these grounds.

On the difficulty of dating P-46

A first century date for this papyrus seems highly unlikely. But trying to date P-46 with any precision is very difficult. Numerous conflicting dates can be found in the scholarly literature: Kim (AD 50-100); Gagos (AD 125-200); Wilcken, Zuntz and Aland (AD 175-225); Kenyon (AD 200-250); Turner (AD 225-275); Sanders (AD 250-300). The basic evidence for assigning a date can be summarized as follows:

- 1. The stichometrical notes. These are the notes which were added at the end of each epistle counting the number of stichoi (lines) which the scribe copied. The number of lines copied were the basis for determining the scribe's pay. The stichometrical notes are in a cursive hand. Normally, cursive hands are very helpful for dating a manuscript, since cursive hands are usually thought to be more precisely datable than literary hands. But in this case the cursive notes are restricted to a handful of letters at the end of each epistle. I would suggest a date of circa AD 200 based on comparison with BGU I 92 (AD 187) and BGU III 913 (AD 206); but not a lot of weight can be placed on this evidence given the limited data.
- 2. The paginator's hand. Zuntz noted that a single hand wrote the page numbers and many of the corrections.²³ The page numbers show the use of thick descending strokes and narrow crossing strokes, a feature which Cavallo relates to a shift in the angle of the pen that took place around the middle of the second century.²⁴ In general, the paginator seems to exhibit a

²² Traianos Gagos--personal conversation with the author; U. Wilcken--<u>Archiv fur Papyrusforschung</u> 11 (1935) 113; G. Zuntz--<u>The Text of the Epistles</u>, Oxford: University Press, 1953; K. Aland and B. Aland, <u>The Text of the New Testament</u>, Grand Rapids: Eerdmans, 1989; F.G. Kenyon—<u>The Chester Beatty Biblical Papyri</u>, Fasc. III, London: 1936; E. Turner—Turner 1977; H. Sanders—<u>A Third Century Papyrus Codex of the Epistles of Paul</u>, Ann Arbor: University of Michigan Press, 1935.

²³ Zuntz 1953, 252-54...

²⁴ G. Cavallo, <u>Ricerche sulla maiuscola biblica</u>, Florence: 1967. Kim's description of the hand of the paginator as "biblical majuscule" (Kim 1988, 250fn8) is contrary to Cavallo's assessment of this style. Cavallo's description of the origins of biblical uncial being rooted in a shift in the angle of the pen in the mid second century may help, however, with identifying the time period of the paginator.

late second century hand, but the forms of the beta and the lambda both caution that a third century date would also be quite plausible.

3. Correctors' hands. Kim assigns the correction of P-46 to at least sixteen separate hands.²⁵ This seems too high, and some of the specific hands appear to be misclassified. Most of these hands are too brief anyway to be of any help in dating, but three seem to be of some assistance. Kim's corrector 7 seems to be correctly classified; the hand is likely third century. Kim's corrector 14 also appears to be correctly classified, and also appears to be third century. An incorrectly classified hand is found at fol 38v12/13; it is one of the longest corrections in the manuscript, and appears to come from circa AD 175-225.

and the dimensions of the papyri. He hoped, among other things, that these groups would prove to have some value for dating manuscripts. P-46 falls into Turner's group 8, and only three members of this group are assigned to the period circa AD 200 or earlier. In the case of P-75, another codex of disputed date, Turner argued that this supported his dating of P-75 to the third century, since P-75 also belongs to group 8.26 If Turner is correct that it is unusual to find papyrus codices belonging to group 8 prior to AD 200, then a similar argument would

4. The typology of the early codex. Turner classified codices into groups based on the size

AD 200 in his entire sample, and 11 possible groups. Hence the fact that there are only three manuscripts in group 8 prior to the third century does not prove very much; we would only

apply to P-46. But Turner has misanalyzed his data. Turner only has 30 manuscripts prior to

expect about three manuscripts.

5. The text-critical issue. The question arises as to whether the specific nature of the text of P-46 offers any help in dating. P-46 places the doxology of Romans 16:25-27 at the end of chapter 15 of Romans. It is the only manuscript known to do so. If Kurt Aland is correct that the textual problem of the end of Romans was caused by Marcion's lopping off two chapters

²⁵ Kim 1988, 255-56.

²⁶ Tuner 1977, 95.

circa AD 140, then P-46 must date from after this period.²⁷ But it is also possible that Marcion was blamed for creating a textual problem that pre-dated him.²⁸

It is also worth noting that Gamble has identified P-46 and Origen as the only two witnesses to a 15-chapter from of Romans. If we remember that Origen died in the middle of the third century, and that third century translations such as the Old Latin and the Sahidic attest only the 16-chapter form, then it could be suggested that P-46 attests a form of Romans that vanishes from the records after the mid-third century.

6. The main hand. The factors listed in the first part of this essay seem to rule out a date before the middle of the second century for the main hand. The more difficult issue is how much later it is likely to be. Turner assigned it to the mid-third century, and the shape of the <a href="https://phi.org/phi.

It is difficult to find a very close comparison for P-46, but three papyri that may be useful are P.Turner 1, P.Oxy 3030, and P.Oxy 654. P-46 is apparently later than P. Turner 1, which has been plausibly assigned to the early second century. P-46 appears roughly contemporaneous with P.Oxy 3030 (AD 206), but perhaps somewhat earlier. Finally, P-46 is probably not later than P.Oxy 654, the Gospel of Thomas. Thomas is written on the back of a land-survey list in a cursive hand that Grenfell and Hunt assigned to the late second or early third century, and there is no particular reason to question their assignment. This means that Thomas is unlikely to be later than the middle of the third century. The hand that wrote Thomas seems significantly later than P-46: the beta, the kappa, the lambda, and the mu, all

²⁷ K. Aland and B. Aland 1989.

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²⁸ H. Gamble, The Textual History of the Letter to the Romans, Grand Rapids: Eerdmans, 1977..

seem strongly third century. If P-46 is earlier than the Gospel of Thomas, then a date of AD

175-225 looks about right.

Conclusions

I would emphasize and underline the tentative nature of the above arguments.

Paleographical dating tries to assign literary papyri to 50 year time-spans. This is not always

possible—at least not with any high degree of confidence. The wide spectrum of opinions

already in the literature testifies to the difficulty paleographers have had in determining the

date of this papyrus. I think we can rule out with a high degree of confidence any date prior to

the middle of the second century. And P-46 is probably not later than the middle of the third

century. Narrowing things down any further is very difficult. In light of P.Oxy 3030 and

P.Oxy 654, I would prefer a date of AD 175-225.

Below is a email extract from Dr. Bruce Griffin, discussing his opinions on Papyrus 46.

Received on March 3, 2005, to Mr. Dykes.

Subject: RE: more about p46

Date: Thursday, March 03, 2005 2:02 PM

Dear Gary:

Okay. Here goes. If there's a problem with your firewall, let me know and

I'll re-send it.

This a slightly revised version of my 1996 paper to the SBL.

1. Prior to giving the paper, I was in touch w/Traianos Gagos at UMichigan.

At the time, he told me that he dated P-46 early to mid second century.

I've never been able to quite figure out his reasons for this; when I publish the paper, I would like to get permission to cite his opinion in print--but so far, I don't have that.

- 2. Palaeographical dating of literary manuscripts is a much messier problem than most NT text-critics realize. The years since the paper have strengthened my belief that a) a late first-century date for P-46 is highly improbable; b) assigning a date for any literary manuscript needs much more rigorous methodologies than are currently being applied.
- 3. Until more rigorous methodologies are developed, it is difficult to construct a 95% confidence interval for NT manuscripts without allowing a century for an assigned date. If we use the 50-year period that is currently standard for the Oxyrhynchus series, then I would prefer AD 175-225 as the most probable date for P-46. But if we want a 95% confidence interval for P-46, then at present AD 150-250 is probably the narrowest range that we can use.
- 4. In terms of the manuscript history of the Pauline corpus, a wise text critic should be prepared to deal honestly with the possibility that P-46 is as old as AD 150 OR as late as AD 250. At present, it is not possible to rule out either extreme with a high degree of confidence.
- 5. I do think that a date for the reign of Domitian (pace Kim) can be ruled out with a high degree of confidence. At least this is my own judgment--and much informal canvassing of palaeographers has not located any papyrologist who agrees with Kim on this issue.

Thanks for your persistence!