

CHAPTER 4 TESTING THE CRITERIA

The criteria appearing in these tombs have been charted using the proposed dating system.

The dating of some of these monuments is disputed, in some instances being dated as widely apart as Dynasty 4 and late Dynasty 6, which affects historical interpretation. Other tombs are merely dated very broadly, such as 'Neuserre or later, which limits the value of any historical interpretation that may be drawn from them.

The tombs in this section have been chosen to meet three aims:

- to test the validity of the criteria
- to test the general reliability of the system as a dating tool
- to judge whether the system is more capable than traditional methods of assigning a precise date to private tombs that at present can only be broadly dated.

(The following discussion of selected tombs refers to Dating Charts "A" to "EE")

GIZA TOMBS

Ḥm.t r^c PM 243 Refer to Chart A

The tomb of Ḥm.t-r^c was excavated by Selim Hassan in 1934 to 1935 and published in 1950. It is broadly dated in the Topographical Bibliography from mid Dynasty 4 to Dynasty 5 but the tendency has been to assign it to late Dynasty 4 or early Dynasty 5⁶⁰⁹. If this early dating is correct, the first historical mention of the god, Osiris, has to be given a late Dynasty 4 or early Dynasty 5 date, as Osiris is invoked in the tomb of Ḥm.t-r^c⁶¹⁰. In 1992 Bolshakov addressed this question asserting that it was 'axiomatic' that Osiris did not appear in private tombs until the second half of Dynasty 5, probably later than Neuserre⁶¹¹, citing Griffiths as his reference⁶¹².

⁶⁰⁹ Begelsbacher-Fischer (1981), 121 and Harpur (1980) 315, for example.

⁶¹⁰ Hassan 4 (1950), Figure 36, p. 48.

⁶¹¹ Bolshakov (1992), 203

⁶¹² Griffiths (1980) 113-14. Griffiths does not seem to have made much of a study of when Osiris is first mentioned. His statements are very general and the evidence he cites is selective and drawn mainly from Dynasty 6. One of the tombs cited by Griffiths (Shm-k3.j, PM 596) is likely to date to Neuserre. See Chart T, Shm-k3.j.

In arguing that the tomb of Hm.t-r^c should be dated to the second half of Dynasty 5 Bolshokov appealed to relative dating criteria based on the offering formula inscribed on the entrance lintel, on the occurrence of certain scenes on the thicknesses of the tomb entrance and epigraphic features. However, he did not explain how he arrived at these criteria except to cite, in certain instances, Hassan, Barta, Harpur, Fischer and himself⁶¹⁴. Bolshokov's arguments and authorities may be correct but as the dating of this tomb is contentious, the method by which these criteria are established needs to be shown.

A dating chart based on the system proposed here is only able to cite nine criteria. These criteria suggest the reign of Neferefre to that of Neuserre as the most likely date for the decoration of Hm.t-r^c's tomb, although a date as early as the end of Dynasty 4 is possible. A date as late as the reign of Djedkare is unlikely. The final date for Criteria 1 and 76 are only based on the tomb of Nj-^cnh-hnmw and Hnmw- htp, dated from late Neuserre to early Djedkare. It is probable that if this tomb was still being decorated in the reign of Djedkare, only final touches, after the death of Nj-^cnh-hnmw, were applied in this later reign⁶¹⁵.

Dynasty 6. One of the tombs cited by Griffiths (Shm-k³.j, PM 596) is likely to date to Neuserre. See Chart T, Shm-k³.j.

⁶¹⁴ Bolshokov (1992), 207 Notes (1) to (11), 208 Notes (1) to (6).

⁶¹⁵ See my discussion on this tomb in Appendix A.

Although Criterion 97, the low chair back over which a flat cushion is draped, becomes more usual in the second half of Dynasty 5, they are seen in the tombs of Sšm-nfr I [86] and Ḥwfw-ḥꜥ.f II [70]. However, the basic shape and the back of Ḥm.t-rꜥ's chair suggests a comparison with the 'lion' chair on which Mrs-ꜥnh III [38] sits in the offering table scene on the panel of her false door⁶¹⁶. The latest dates for Criteria 76, 77 and 78, the jewellery worn by Ḥm.t-rꜥ, are supported by Cherpion's dates for the same criteria⁶¹⁷.

It is, therefore, unlikely that this tomb was decorated later than the reign of Neuserre, while the work might have been as early as Shepseskaf or Userkaf. Although the supporting evidence is slim, it indicates that the earliest mention of Osiris in private tombs does, in fact, date to the first half of Dynasty 5.

⁶¹⁶ Dunham-Simpson (1974) Figure 7.

⁶¹⁷ Cherpion (1989) 191-94 (Critères 45, 46 and 47).

Jttj PM 193 and R^c-h^c.f-^cnh PM 207 Refer to Charts Band C.

Badawy, who excavated the tomb of Jttj, assigned it to late Dynasty 4 or early Dynasty 5 on his assessment of its archaeological and stylistic features and the association with Khafre through the names of two of Jttj's sons⁶¹⁸. Badawy also accepted that R^c-h^c.f-^cnh was Jttj's brother. Harpur has no objection to the relationship between the two men and judges R^c-h^c.f-^cnh to be the elder, as Jttj was sn dt of R^c-h^c.f-^cnh⁶¹⁹. However, if Badawy's earlier date for Jttj were accepted, it would place R^c-h^c.f-^cnh close in time to the reign of Khafre.

The two tombs are situated in the prestigious East Field but beyond the limits of the cemetery laid out for members of the royal family. This suggests a date for both tombs to a time when the strict protocol of assigning East Field tombs had broken down. Thus, the brothers were able to construct their tombs on the outskirts of the East Field. Harpur accepts that this would have entailed a date in the second half of Dynasty 5 for Jttj and the reign of Neuserre for R^c-h^c.f-^cnh. She therefore dates Jttj to V.7-8 and R^c-h^c.f-^cnh to V.6.

R^c-h^c.f-^cnh's criteria chart appears to place him in the first half of Dynasty 5 (V.1 - V.5), before the reign of Neuserre. However, three criteria (Nos 14, 38 and 94) prevent

⁶¹⁸ Badawy (1976) 10.

⁶¹⁹ Harpur (1984) 37.

him from being dated later than the reign of Neuserre. Criterion 38 (orientation: the straight edges of

the half loaves on the offering table facing away from the tomb owner) has one of the shortest time spans of all the criteria and is not supported by many instances in Groups A and B. It should not be accepted as a deciding factor. On the other hand, Criterion 14, style I of the animal skin worn by the sm priest, is much better supported. Criterion 94, the small rounded cushion seen only at the back of the chair, is probably date to Neuserre rather than to Djedkare. Nj-ḥ-ḥnmw and Ḥnmw-ḥtp [42] provide the final date for this criteria and most of the decoration of their tomb would have been carried out before Djedkare came to the throne. Apart from these criteria, the remaining criteria do not date R'-ḥ'.f-ḥ more precisely than to Dynasty 5, Userkaf to Neuserre.

Criteria 38 and 54 suggest that R'-ḥ'.f-ḥ decorated his tomb no earlier than the beginning of Dynasty 5, while Criteria 22 and 80 allow this to be placed right at the end of Dynasty 4. The very narrowest interpretation of the chart places the decoration of the tomb in the period Userkaf to Neferirkare but a more secure dating would be Userkaf to Neuserre. The chart makes a date as early as Khafre most unlikely.

Jttj's dating chart presents a number of problems. Only 12 criteria apply.

Criterion 9, the narrower version of the wsh collar, is strongly supported by much evidence and unlikely to have lasted beyond Dynasty 5. Criterion 12 (long wig exposing the ear, worn by the male) indicates the earliest date for the tomb to be late in the reign of Teti, while another criterion (No.95) the smaller pointed cushion at the back of the chair) supports a Dynasty 5 date. Logically, Criterion 12 cannot exist in the same tomb as Criterion 95 with its present date. The earliest date for Criterion 12 is strongly supported by Cherpion's Critère 31⁶²⁰. Consequently, it must be accepted that data needed to establish the final date for Criterion 95 is probably missing. The weight of criteria indicates late Dynasty 5 or the reign of Teti as the date for the decoration of the tomb. However, apart from Criterion 12 the tomb could be dated to any period in Dynasty 5 or even the end of Dynasty 4.

⁶²⁰ Cherpion (1989) 180.

Snb PM 101 Refer to Chart D.

Junker's dating of the tomb of the dwarf, Snb, to late Dynasty 6⁶²¹ has been accepted by some scholars⁶²² but has been disputed by others⁶²³. Junker judged the tomb of Snb and its neighbours to be 'archaizing', that is, to have deliberately copied the styles of earlier tomb decoration. This explanation is able to account for an unusual combination of features:

- the location of this cluster of tombs to the far west of the Western Field of the Giza necropolis
- their structure, which is unusual in comparison with the mastabas of the nucleus cemeteries of the Western Field.
- their early (Dynasty 4) iconographic features.

The chart for Snb tends to support an earlier dating rather than the later Dynasty 6 date. Four criteria limit Snb's date to the period Shepseskaf to Neferirkare. Criterion 6, (the R'-ḥtp kilt), Criterion 43a (the linen list) and Criterion 77 (the long animal skin robe) are all characteristic of Dynasties 3 and 4 and early Dynasty 5. Criterion 102 is the *male* figure pulling papyrus. There is no existing scene of this theme in Groups A and B prior to

⁶²¹ Junker 5 (1941) 3-6.

⁶²² Inter alia, Vandier (1958) 137,. Porter-Moss (1974) 101 and more recently, Harpur (1984) 269.

⁶²³ Cherpion (1989) 89.

Nb.j-m-3htj [47]⁶²⁴ who dates to the end of Dynasty 4. Criterion 107 (papyrus thicket in front of the tomb owner) does not usually occur in a papyrus pulling scene. Elsewhere it is reserved for the theme of the tomb owner fishing and fowling. The only other exception known to the author is that of Mrs-ʿnh III [38]⁶²⁵. Harpur suggests that Snb was given the female posture of papyrus pulling because he was a dwarf⁶²⁶. Perhaps he was given the same scenic background for a similar reason.

Proponents of the late Dynasty 6 date for Snb's tomb may argue that an archaizing tomb inevitably shows early stylistic features and that dating based on these criteria should therefore be discounted. This would be logical except that the question of a tomb with archaizing decoration in the context of the Egyptian Old Kingdom raises difficulties. 'Archaizing' material in other periods of Egyptian history, such as the Saitic period, exhibit the inaccuracies and mistakes to be expected at a time when there were no systematic historical studies. If, indeed, the tombs of Snb and neighbours were truly 'archaizing', it would have to be acknowledged that the craftsmen who decorated these tombs had a remarkable capacity to get every stylistic detail historically accurate. Not a single criterion challenges the earlier dating. This includes 'reversions' to a symbolism that belong to a period earlier than Dynasty 6, such as the depiction of half loaves of bread instead of reeds

⁶²⁴ LD II, 12b.

and papyrus pulling. By Dynasty 6, tombs portrayed reeds rather than half loaves on the offering table, while the male tomb owner is depicted fishing and fowling rather than papyrus pulling. To have portrayed Snb in late Dynasty 6 seated before a table of half loaves and pulling papyrus⁶²⁷ would have involved shifting back in time the symbolism associated with afterlife beliefs.

Of all scholars, Cherpion proposes the earliest date for Snb. She argues that the tomb and its neighbours are not 'archaizing' but were indeed constructed in Dynasty 4. She dates Snb to the reign of Djedefre, whose name appears in his tomb in four separate circumstances⁶²⁸. Cherpion supports her judgement by reference to the group of tombs which have a significant number of features in common and contain only the names of kings of Dynasty 4, none later than Khafre.

Assigning Snb (and neighbours) to a date between Shepseskaf and Neferirkare, as the present dating chart does, overcomes some of the difficulties posed by Cherpion's early to mid Dynasty 4 dating for this cluster of tombs. A date as late as Neferirkare, who came to the throne approximately eighty years after the death of Khufu, allows for the

⁶²⁵ Dunham-Simpson (1974) figure 4, plate 5 (lower).

⁶²⁶ Harpur (1980) 57.

⁶²⁷ Harpur attempts to justify the papyrus pulling scene in Snb on the grounds that he was a dwarf and therefore would have been depicted in a context reserved for females and dwarfs. This surmise does not account for the depiction of loaves rather than reeds on the offering table. Harpur (1980).

⁶²⁸ Snb was *hm-ntr* of Djedefre and named three of his children after that king. (Cherpion (1989) 89).

objection⁶²⁹ that the tombs in this cluster were not part of the original plan of the necropolis⁶³⁰. This date would also allow time for the development of ateliers catering to lesser officials⁶³¹ and yet it makes acceptable the fact that all these tombs had decoration engraved in Tura limestone⁶³².

⁶²⁹ Malek (1991) 97.

⁶³⁰ By the reign of Neferirkare clusters of tombs such as Cemetery G6000 were being constructed beyond the original necropolis plan.

⁶³¹ The cluster of tombs with similar features identified by Cherpion includes Nj-ḥtp-ḥnmw (PM 50), Nfrj (PM 50), Snnw (PM 52), K3.j-tp (PM 52) and Nfirt-nswt (PM 64) all dated in Porter-Moss (1974) to mid Dynasty 5 or later, Jrj (PM 100), ʿnh (PM 100), Snb (PM 101), Jtw (PM 103) Mnj I and II (PM 107-8) all dated in Porter-Moss (1974) to Dynasty 6.

⁶³² Cherpion (1989) 86-7.

K3.j-m-^cnh PM 131 Refer to Chart E.

The tomb of K3.j-m-^cnh (G4561) is located in Cemetery G4000 and blocks the street between G4560 and G4660. It is dated in the Topographical Bibliography to 'Dynasty 6'⁶³³. Harpur accepts this date⁶³⁴. By implication Bolshokov assigns the tomb to late Dynasty 6. Arguing that there was a 'logic of development' for the decoration of the burial chamber, he identifies stages in this development. He places the burial chamber of K3.j-m-^cnh in his last stage (the burial chamber decorated like a tomb chapel) which he attributes to the end of Dynasty 6⁶³⁵.

The criteria chart for K3.j-m-^cnh consistently suggests a date in Dynasty 5, from late Neuserre to Unas. Criterion 94 (the small rounded cushion seen only at the back of the stool) narrows the dating further, from late Neuserre to Djedkare. Seven criteria (Nos 2, 9, 88, 94, 102 and 104) make a date as late as Teti very unlikely.

This dating challenges the 'logic of development', which Bolshokov sees in burial chamber decoration. A late Dynasty 6 date for the tomb also raises the question of the appearance of K3.j-m-^cnh in a papyrus pulling scene in his burial chamber. While three

⁶³³ Porter-Moss (1974) 131.

⁶³⁴ Harpur (1984) 270.

⁶³⁵ Bolshokov (1994) 17.

different presentations of chair and cushions (Criteria 88, 94 and 96) in one tomb, although unusual, may occur, the male 'papyrus pulling' scene in late Dynasty 6 seems anachronistic in view of the development of after-life beliefs and associations. In Groups A and B, the last instance of this feature is in J3sn towards the end of Dynasty 5. Of course, the situation of this scene in the burial chamber may account for a late date. In general, however, to maintain the tomb of K3.j-m-ḥnh belongs to late Dynasty 6, as Bolshakov implies, it would be necessary to argue that the decoration was stylistically 'archaizing'.

According to the dating chart, the tomb of K3.j-m-ḥnh is securely dated from the reign of Djedkare to that of Unas.

K3-hj.f PM 76 Refer to Chart F.

The mastaba of K3-hj.f was originally dated to mid Dynasty 6 by Junker on account of the poor quality of its material and reliefs⁶³⁶. This dating has been accepted in the Topographical Bibliography⁶³⁷ and by Harpur⁶³⁸, but challenged by Cherpion who dates the tomb to the reign of Neuserre⁶³⁹. Although K3-hj.f was a priest of Khufu and his mastaba is situated in Cemetery G2100, neither cartouche nor location is much help in assigning a date. The priesthood of Khufu lasted well into Dynasty 6 and the mastaba is intrusive in the street between the larger mastabas, G2135 and G 2140.

While the dating chart clearly suggests a date between Djedkare and Unas, with a possibility of a date late in the reign of Neuserre, the concurrence of certain individual criteria presents an unusual situation. The depiction of three different styles of flared kilt (Styles 2, 3 and 4) in one tomb is rare, although it does occasionally occur⁶⁴⁰. It is most unusual to see the narrow collar (Criterion 9) teamed with Style 4 of the flared kilt (Criterion 4)⁶⁴¹. A further unusual feature is the different style of the legs of the two chairs on the panel of the northern false door. K3-hj.f 's chair has four lion's legs while his wife's

⁶³⁶ Junker VI (1943) 94-95.

⁶³⁷ Porter-Moss (1974) 76.

⁶³⁸ Harpur (1984) 271.

⁶³⁹ Cherpion (1989) 137-8.

⁶⁴⁰ This feature occurs in a number of tombs of the second half of Dynasty 5 (late Neuserre to Djedkare), when perhaps there was a comparatively rapid change of styles.

chair has two bull's legs. This distinction between chairs for deceased and wife is maintained throughout the decoration. In the offering table scene on the south wall where K3-hj.f shares the seat with Hnmt, the chair legs are in the style of bull's hooves.

Unless the tomb is judged to be 'archaizing' it cannot be dated to mid Dynasty 6.

Four criteria (Nos 9, 67, 69 and 98) are not seen at all in Dynasty 6. The chart suggests late Neuserre to Unas as the most likely date for the decoration of the tomb. This time span could be narrowed to late Djedkare to early Neuserre. Perhaps the unusual combination of stylistic features should be attributed to confusion due to poor quality craftsmanship.

⁶⁴¹ Junker 6 (1943) figure 40.

Nfr I⁶⁴² PM 137 Refer to Chart G.

Nfr I has been dated from the second half of Dynasty 5 to Pepy II⁶⁴³. His mastaba, G4761, is intrusive into the street between G4760 and G 4860 and the cartouches in his chapel are those of Khufu. Neither location nor cartouche helps to date the chapel.

The dating chart for Nfr makes a date in Dynasty 6 unlikely. Six criteria limit a date range to about the end of Dynasty 5. One criterion, No 94 limits the range even further. Two criteria (10 and 53b) make a date before Neuserre unlikely. No. 10, the broad version of the wsh collar, is strongly supported as there are so many depictions of the collar available to verify its dating. Consequently, the chart provides a date range from late Neuserre to Djedkare, although a broader time frame of Neuserre to Unas is not out of the question.

⁶⁴² Junker 6 (1943) 26-74.

⁶⁴³ For the various date assigned see Harpur (1984) 37.

Roth's 'Tombs of Palace Attendants' (G 2086, G 2088, G 2091, G 2092, G 2092a, G 2097, G 2097-1, G 2098 and G 2240) Refer to Charts H-Q.

The tombs of *hntj-š* officials in Cemetery G 2088 have been given both a relative and a dynastic dating by Roth. Their relative dating is based on the orientation of the tomb chapels and changes to their orientation⁶⁴⁴. Their dynastic dating, however, has had to be based on the typology of chapel decoration, as there is no inscriptional or archaeological evidence to anchor any of the tombs precisely and securely in time. For typological inferences, Roth depends heavily on dating suggestions of Harpur⁶⁴⁵ and to a lesser degree on Cherpion⁶⁴⁶. Roth comments that Harpur's "more synthetic tomb dating" is more "realistic than Cherpion's mechanical dating to the latest royal name"⁶⁴⁷. She notes that results from Cherpion's dating method are likely to be skewed to give too early a date, although admits that the dates from Cherpion's method were largely consistent with the relative dates arrived at through analysing the orientation of tombs. While Roth is thus quite critical of Cherpion's method, she does not question the basis of Harpur's dating of

⁶⁴⁴ Roth (1995) 23-33.

⁶⁴⁵ Harpur (1984) *passim*.

⁶⁴⁶ Cherpion (1989) *passim*.

⁶⁴⁷ Roth (1995) 35.

decorative features, although Harpur frequently fails to explain how she arrived at the dating of relevant tombs.

There are problems associated with dating this cluster of tombs by means of the iconography of wall decoration:

- The cluster was constructed within two generations, making their iconography very similar.
- Most of these chapels have been subject to at least one change of orientation, while the earlier tombs experienced two such changes. These changes may have affected the iconography. Some tombs seem to reflect the decorative features of the first, second and third phases of construction and orientation. Unless earlier and later features can be clearly distinguished, applying a dating system based on the typology of these features tends to produce dating possibilities that reflect two generations.
- Some of the chapels, including later additions, have little or no extant decoration.

A comparison of the dates worked out by Roth with those arrived at using the dating system presented here is can be seen in Chart Q. There is a significant agreement of dating for tombs G 2086, G 2088, G 2091, G 2097-1, G 2098 and G 2240. While G 2097-1, decorated in two phases, presents the problem referred to above of dating a tomb by the present method, Roth's phases coincide with the time span provided by Chart L.

The chart for G 2092/3 (Chart K) agrees less closely with Roth's dating.

According to Chart K, the most likely date for the decoration of this monument is late in the reign of Neuserre, while Roth dates it firmly to the reign of Djedkare.

Other dating discrepancies:

- G 2086 (Chart H): Only Criterion 14 (the earlier style of the animal skin) restricts the result from Chart H to the reign of Neuserre.
- G 2088 (Chart I): Criterion 29 (the tomb owner at the offering table holding a folded cloth to his breast) is the only feature offering V.6L-8E as the earliest date for the decoration of this tomb. This feature occurs in the tomb of Nj-^ḥnh-^hnmw and ^hnmw-^htp [42], whose decoration is more likely to have been carried out in the reign of Neuserre.
- G 2091 (Chart J): Criterion 94 (the small rounded cushion seen only at the back of the chair) also limits this tomb to the reign of Neuserre, while a date early in the reign of Djedkare is possible.
- G 2092/3 (Chart K): Criterion 76 (the choker necklace worn alone) restricts the latest date for the decoration to V.6L-8E. As the defining occurrence for the latest date of the feature is in the tomb of Nj-^ḥnh-^hnmw and ^hnmw-^htp [42], the date is more likely to be late in the reign of Neuserre.

- G 2097 (Chart L): Criteria 14 (the earlier style of the animal skin) and 39 (the straight edges of the half loaves on the offering table facing towards the tomb owner) restrict the latest date to V.6. However, Criterion 109 (the tomb owner standing on a skiff wearing a šndwt kilt) restricts the earliest date to Djedkare. In theory this should date the tomb from the end of V.6 to the beginning of V.8. Roth, however, dates this tomb from late in the reign of Djedkare to Unas.
- G 2097-1 (Chart M): Chart M is not particularly useful, probably because it reflects the decorative features of two phases.
- G 2098 (Chart O): Criterion 80 (the banquet scene) limits the latest date for the decoration to late Djedkare with a possible extension to the reign of Unas.

SAQQARA TOMBS

Tjj⁶⁴⁸ PM 468-78 Refer to Chart R.

The tomb of **Tjj** was chosen because its precise dating presents problems, although the broad date of Neuserre to the end of Dynasty 5 is generally accepted. Its location to the north west of the Step Pyramid does not help in its dating. **Tjj** was 'jmj-r' of sun temples of four consecutive kings, Sahure, Neferirkare, Neferefre and Neuserre. Neuserre is the latest king mentioned in the tomb. **Tjj** was an important official, as the splendour of his tomb and his official titles⁶⁴⁹ suggest, but he was not a vizier.

Strudwick noted the mixture of new and old elements in the false doors of **Tjj**⁶⁵⁰.

This is true of the decoration generally. **Tjj** and his male attendants are depicted wearing all four styles of flared kilt with 'apron'. **Tjj** wears both the narrow and broad collar.

Although his tomb was decorated at a time when the theme of the tomb owner fishing and fowling was being introduced, he had himself depicted in the older scene of papyrus pulling. At the same time, the recently introduced depiction of the wife kneeling at her husband's feet is consistently shown.

⁶⁴⁸ Épron-Daumas (1939), Wild 2 (1953), Wild 3 (1966).

⁶⁴⁹ According to Strudwick the two most important administrative titles of **Tjj** were jmj-r sš ʿ nswt and jmj-r k3t nbt nt nswt. Strudwick (1985) 158.

Such an array of old and new features might be expected to contradict each other in terms of the time factor unless the tomb can be dated to the period when these features overlapped. The chart of dating criteria for Tjj shows the latter to be the case. Criterion 4 (flared 'apron' kilt style 4) is basically a Dynasty 6 feature but probably began in the reign of Djedkare. Criterion 18, the animal skin with broadened paws, is a development of the second style of panther skin (Criterion 15), first seen late in the reign of Neuserre. Criteria 10, 15, 18 and 96 narrow the earliest dating to late Neuserre. However, Criterion 4 limits it to late Djedkare.

Criteria 77, 78 and 79 limit the latest date to Djedkare, indicating a period of approximately 20 years in which the decoration of the chapel could have been carried out. Although there are 32 criteria in the chart, there is no problem of chronological synchronization. The tomb is securely dated from late Neuserre to Djedkare, but probably dates from the middle to later years of Djedkare.

⁶⁵⁰ Strudwick (1985) 158-9.

Htp-hr-3htj PM 593 Refer to Chart S.

Htp-hr-3htj 's tomb chapel, now in Leiden Museum, was originally situated west of the Step Pyramid. The deceased was hm-ntr of the sun temple of Neuserre and his tomb chapel is dated in the Topographical Bibliography to the reign of 'Neuserre or later'⁶⁵¹. Mohr, who published the tomb chapel, described it as a 'typical example of the Fifth Dynasty tombs at Saqqara' and dated it to the second half of that dynasty⁶⁵². Harpur has since dated the tomb chapel from Neuserre to early Djedkare, but does not explain her precise dating except to place the chapel in a class of chapels that she dates from late Neuserre to mid Djedkare (V.6L-8M). Harpur's chapel categories are here based on the development of the marsh activities themes. Htp-hr-3htj 's chapel, according to Harpur, belongs to a group of chapels which have the fishing and fowling scenes as the focal point of marsh activities⁶⁵³.

In the planning of the decoration of the Leiden chapel Mohr finds a sufficiently 'close connection' with the artists of the tomb of Tjj to decide that the two tombs were decorated by craftsmen from the same atelier. As the Leiden reliefs do not match the quality of those of Tjj, Mohr does not believe the same craftsmen decorated both tombs.

⁶⁵¹ Porter-Moss (1981) 593.

⁶⁵² Mohr (1943) 21.

⁶⁵³ Harpur (1980) 191-93.

The criteria chart of Htp-ḥr-ḥtj bears out Harpur's dating of the tomb from late Neuserre to early Djedkare, although only one criterion (94) indicates a date of no later than early Djedkare. Htp-ḥr-ḥtj may have been contemporary with Nj-ḥ-ḥnmw and Hnmw-ḥtp or just a little later. Like them, he does not wear a proper šndwt but a very short kilt that seems to be half way in style between the flared kilt and the šndwt⁶⁵⁴.

⁶⁵⁴ Moussa-Altenmüller (1977) figures 5, 6, plate 74 and Mohr (1943) 64, figure 34, plate 2.

Shm-k³(.j) PM 596 Refer to Chart T.

The tomb chapel of Shm-k³(.j), where the latest cartouche mentioned is that of Neuserre, was partially excavated and published by Murray, who assigned the tomb to Dynasty 5. It is situated in the cemetery west of the Step Pyramid and a little to the north west of D62 (Pth-ḥtp I [25]), which is securely dated to the reign of Djedkare. Apart from the façade architrave, which is inscribed with an offering text, Murray found the west wall of the chapel to be the only decorated surface. The Topographical Bibliography assigns a date of 'Neuserre or later'⁶⁵⁵ to the tomb and Harpur dates it to V.6-8E? without explaining her dating⁶⁵⁶.

There is no real dispute over the dating of Shm-k³(.j)'s tomb. However, it provides an early invocation of Osiris. If the tomb does date to the reign of Neuserre, it offers further evidence that Osiris was invoked in private tombs at an earlier date than is presently accepted by many scholars⁶⁵⁷.

The dating chart for Shm-k³(.j), however, merely limits the date of the tomb to the second half of Dynasty 5. Criteria 15, 27 and 53b suggest a date between Neuserre and

⁶⁵⁵ Porter-Moss (1981) 596.

⁶⁵⁶ Harpur (1984) 276.

⁶⁵⁷ Griffiths (1980) 113-14.

Djedkare with a possible extension to the reign of Unas. The cartouche of Neuserre puts a clear limit of the earliest possible date and Criterion 15 suggests a time late in that reign.

As this tomb is most likely to date to the reign of Djedkare, it does not settle the question of whether Osiris was being invoked as early as Neuserre.

Nfr-jrt-n.f PM 583 Refer to Chart U.

As Harpur notes, the tomb of Nfr-jrt-n.f is important because it contains a particularly early fishing and fowling scene⁶⁵⁸. If the tomb were decorated in the reign of Neferirkare or soon after⁶⁵⁹, it would contain the first instance of these scenes and would make invalid the earliest dates for criteria drawn from the fishing and fowling scenes (Criteria 105-112). To date this tomb, therefore, Criteria 105 to 112 will be considered separately to avoid circular argument. These criteria are shaded on Chart U.

Harpur dates the tomb to the second half of Dynasty 5, in particular to the reigns of Djedkare to Unas. She bases her judgement on criteria drawn from decorative features, only one of which coincides with the criteria proposed in this study. This is the registers of foods and containers (Criterion 44)⁶⁶⁰. This feature should be dated from early Dynasty

⁶⁵⁸ Harpur (1984) 39.

⁶⁵⁹ Smith (1946) 187-88.

⁶⁶⁰ Van der Walle (1978) pls. 2, 3.

4⁶⁶¹, while Criterion 45 (jumbled piles of foods near the offering table) dates from early Dynasty 5.

Five criteria (Nos 9, 31, 69, 75, and 77) make a date after Dynasty 5 very unlikely. Three criteria (Nos 75, 96 and 97) make a date before the reign of Neuserre unlikely. The latest date for Criterion 31 (the earliest height for the half loaves on the offering table) is well supported as this is a feature with many instances establishing its duration. Moreover, it is replaced by another feature (half loaves of a greater height). By late Dynasty 5, when the latest instance of Criterion 31 is seen, the second height of half loaves was well established. Criterion 75 (female wearing a long wig with a fillet and streamers) does not have many supporting instances but they are all clustered in the period Djedkare to Unas. Criterion 96 is not well supported but is partly confirmed by Cherpion. All the cartouches occurring with this feature, except for the tomb of Nfr-jrt-n.f itself (Neferirkare) and that of J3sn [3] (Khufu), are of Neuserre with one, Nj-ḥn-sw (PM 496)⁶⁶², of Teti and a single instance in K3r [91] providing a final date for the criterion as defined⁶⁶³. The cartouche of Khufu in J3sn's tomb does not affect the dating of the tomb to V.8L-9 (see prosopography).

⁶⁶¹ There are registers of foods beside the offering table of Wḥm-k3.j[(PM 114, Kayser (1964) 32-3] and above the table of W3š-ptḥ:jsj [PM 456] Mogensen (1918) plates 10, 11].

⁶⁶² Quibell (1907) pl. 61, 1.

⁶⁶³ See K3r [91] in Table 4.

Criteria 31, 69, 75, 77 and 96 suggest the most likely date for the decoration of the tomb of Nfr-jrt-n.f as late Neuserre to Djedkare. A hint that the tomb may be contemporary or just a little later than that of Nj-^cnh-hnmw and Hnmw-htp is the style of kilt depicted on Nfr-jrt-n.f as a spear fisherman. Nfr-jrt-n.f 's kilt appears to be a combination of the shortened flared kilt worn by Nj-^cnh-hnmw and Hnmw-htp [42] in their marsh scenes and the true šndjt, pictured in later fishing and fowling scenes⁶⁶⁴. This 'combination' style is also seen on K3.j-m-^cnh (PM 131)⁶⁶⁵.

⁶⁶⁴ Compare van der Walle (1978) pl. 1 and Moussa-Altenmüller (1977) pls. 4, 5, 74, 75.

⁶⁶⁵ Junker 4 (1940) fig. 8.

Jrw-k3-ptḥ PM 639 Refer to Chart V.

The tomb of Jrw-k3-ptḥ has been recently republished by McFarlane, who dates it between Menkauhor and Djedkare⁶⁶⁶. Previously it had been dated from perhaps early in Dynasty 5 to the First Intermediate Period⁶⁶⁷. In dating this tomb McFarlane considered its location⁶⁶⁸, architecture⁶⁶⁹ and features such as its engaged statues and false door with cavetto cornice and torus moulding. These and other aspects such as the official status and titles of the deceased, scenes and motifs in the wall decoration led McFarlane to judge that the tomb could not have been constructed before the reign of Neuserre or later than early Unas.

However, in arriving at a date for the tomb McFarlane had difficulty with certain features of the fowling scene. One of these features, Criterion 12 (the long male wig which exposes the ear) also presents problems for the Chart V, as the feature can be dated no

⁶⁶⁶ McFarlane (2000) 19.

⁶⁶⁷ McFarlane cites with references the previous dating of the tomb. McFarlane (2000) 16.

⁶⁶⁸ McFarlane asserts that the tomb's position close to the buttress wall supporting the Unas causeway is a very strong reason to date its construction earlier than the reign of Unas. McFarlane (2000) 16-17.

⁶⁶⁹ The tomb has a N-S corridor chapel, as do most of the rock-cut tombs in this location which are dated by their excavators between the reigns of Neuserre and early Unas. McFarlane (2000) 17.

earlier than the reign of Pepy I⁶⁷⁰ in this system and therefore cannot be reconciled with Criteria 9, 27, 40 and 88.

This fowling scene is only roughly sketched and the craftsmanship is especially clumsy. The anomalous exposure of Jrw-k³-pth's ear may be discounted as the result of poor and confused workmanship, for long wigs covering the ear and short wigs exposing the ear are both seen in tombs of similar date (Neuserre to Djedkare). Discounting Criterion 12 allows other unusual aspects of the fowling scene to be seen in a chronological perspective. These features include the relatively large depiction of the female, probably the wife, standing in front of Jrw⁶⁷¹ and the type of kilt worn by the deceased. This kilt is shorter than the flared 'apron' kilt, but is not the šndwt kilt which the deceased wears in later fishing and fowling scenes⁶⁷². Both of these features suggest that the scene belongs to the period of early portrayals of the deceased fishing and fowling, which is probably to be dated between Neuserre to Djedkare.

⁶⁷⁰ A date no earlier than Dynasty 6 for Criterion 12 is supported by Cherpion (1989, p. 180). In Cherpion's table all except two of Cherpion's instances of this feature are associated with the cartouche of Pepy I or later. The two exceptions are found in tombs with the cartouche of Teti.

⁶⁷¹ The larger depiction of the wife in the fishing and fowling scenes appears to have preceded the portrayal of the very small figure. Compare the size of the 'wife' of R'-špss [64] (LD II 60) with that of the wife of Mrrw-k³.j [36] (Duell, 1938, pls. 9, 17).

⁶⁷² This 'in between' kilt is evident in the fishing and fowling scenes in Nj-ṇḥ-ḥnmw+Ḥnmw-ḥtp [42] and Ḥtp-ḥr-ḫtj. PM 593 (Mohr (1943) 64, fig. 34, pl. 2).

With the omission of Criterion 12, the chart clearly dates the tomb decoration between late Neuserre and early Djedkare, a period of perhaps 20 years, which agrees closely with McFarlane. Furthermore, only Criterion 40 (reeds arranged in pairs on the offering table) limits the tomb to early Djedkare. Without this criterion, the chapel's decoration could be dated to any time in the long reign of Djedkare.

PROVINCIAL TOMBS

Jntj and **Jttj/šdw** DESHASHA PM IV 121-3 Refer to Charts W and X.

Petrie, who first excavated these two tombs, dated Jnti to mid Dynasty 5 and Jttj-šdw to VI.1⁶⁷³. More recently, following Smith⁶⁷⁴, both tombs have been assigned to the second half of Dynasty 6. Both tomb owners were provincial governors (sšm-t³ and ḥk³ ḥwt or ḥk³ ḥwt ʿ3t). Whether they both administered both nomes 20 and 21 and their relationship to each other are unclear.

In 1992 Kanawati re-excavated these tombs⁶⁷⁵, redating the tomb of Jntj to V.8 and that of Jttj/šdw to VI.1. To support his dating of Jntj, Kanawati cites architectural features, iconographic data based on Cherpion's system of dating and the presence of rare scenes such as the siege of a town and the painting of a ḥn-box⁶⁷⁶. He compares these rare scenes with their appearance in other tombs with contentious dates.

In the chart of dating criteria for Jntj three criteria (14, 50, 52 and 91) suggest a date in the first half of Dynasty 5, even late Dynasty 4, rather than the reign of Djedkare for the decoration of the tomb. In assigning a date to Jntj, Kanawati placed considerable

⁶⁷³ Petrie (1898) 4.

⁶⁷⁴ Smith (1946) 219-20.

⁶⁷⁵ Kanawati-Mcfarlane (1993).

weight on the parallel scene of warfare in the Saqqara tomb of K³(.j)-m-ḥst. A number of scholars have argued the dating of the tomb of K³(.j)-m-ḥst and its neighbour, that of K³(.j)-m-snw⁶⁷⁷. None, however, settles the issue. K³(.j)-m-ḥst, in particular, may be dated from early Dynasty 5 to Dynasty 6. It is, then, possible that the two tombs with the unusual scene of warfare date to the first half of Dynasty 5. Chart W suggests a date in late Dynasty 4 or early Dynasty 5, from Shepseskaf to Shepsekare, for Jntj.

The chart of Jttj-šdw offers less difficulty. According to these criteria the tomb could have been decorated in either the reign of Pepy I or Mernere with possible extensions to late Teti and early Pepy II. The reign of Pepy I as the earliest date for Criterion 12, the long wig for the male exposing the ear, is likely to be accurate. Cherpion only cites two earlier cartouches for this feature, both of Teti⁶⁷⁸, probably too early a date for both these tomb owners⁶⁷⁹.

⁶⁷⁶ Kanawati-McFarlane (1993) 17-19, 42-44.

⁶⁷⁷ Firth-Gunn 1 (1926) 31; Baer (1943) 143-4; Strudwick (1985) 150-51; Cherpion (1989) 112-15; Kanawati et al (1984) 7-8.

⁶⁷⁸ Cherpion (1989) Critère 31, p. 180.

⁶⁷⁹ J. J. S. Kanawati et al (1984) p. 48.

K³(.j)-ḥnt (A2) and K³(.j)-ḥnt (A3) EL-HAMMAMIYA PM V 7-9 Refer to Charts Y and Z.

While provincial tombs in the same cemetery may be dated in relation to each other according to such criteria as position, architectural features and family names, they can be more difficult to date precisely than Memphite tombs. Thus, if there are no biographical details nor cartouches to provide at least a date *ante quem non* nor archaeological data, only a system of relative dating largely established upon Memphite criteria can date these tombs. This raises the question of whether stylistic changes in tomb decoration occurred at the capital and in the provinces at the same time.

It would not be surprising if there were a time lag between Memphis and the provinces but this could only be established if Memphite tombs could be compared with provincial tombs that were securely dated by features independent of a relative dating system. There are very few such tombs before the second half of Dynasty 6, when decorated Memphite tombs become scarce.

These considerations may affect the dating of the tombs of K³(.j)-ḥnt (A2) and K³(.j)-ḥnt (A3) of El-Hammamiya, which have been very widely dated. Petrie assigned

them to the reign of Khufu⁶⁸⁰, while Baer suggested the reign of Neuserre for A2 and Menkauhor to Djedkare for A3 arguing that the owner of A2 was the father of A3⁶⁸¹. In 1989 Kanawati re-excavated the decorated tombs of El-Hammamiya⁶⁸² dating A3 to the beginning of Dynasty 5 and A2, as the younger K³(.j)-ḥnt and son of the owner of A3, to a slightly later date, although still in early Dynasty 5. Kanawati based his judgement on the location, size and design of the tombs as well as on decorative features⁶⁸³.

The charts based on dating criteria suggest a reversed order for the two K³(.j)-ḥnt s. A2 appears to belong to the end of Dynasty 4 or the very beginning of Dynasty 5. Three criteria (6, 13 and 25) belong to the earliest period (late Dynasty 3 and Dynasty 4). A further three criteria (38, 52 and 92) limit the latest date for the tomb decoration to the reign of Neferirkare.

A3, on the other hand, has fewer criteria belonging the earliest period, with two criteria (10 and 15) limiting the earliest possible date for the decoration of the tomb to Neuserre. Two other criteria (38 and 92) limit the latest date to the reign of Shepseskare.

⁶⁸⁰ Mackay et al (1929), 36-7.

⁶⁸¹ Baer (1960), 294.

⁶⁸² El-Khouli-Kanawati, (1990) 11-19 A2: 26-53 pls. 2 (c) to (d), 6-17, 32-51; A3: 54-66 pls. 18-23, 52-75.

⁶⁸³ El-Khouli-Kanawati, (1990) 13-14.

The charts date the decoration of A2 to a period from Weserkaf to Sahure, and that of A3 between the reigns of Shepseskaf and Neuserre.

K3(.j)-ḥp:ttj-jkr (H26) and Hnj:špsj-pw-mnw (H24) EL HAWAWISH Refer to Charts AA and BB.

K3(.j)-ḥp:ttj-jkr (H26) was ḥrj-tp ʿ3 n Hnt-Mnw. He has been dated generally later than Dynasty 6, the latest suggested date being Dynasty 11⁶⁸⁴. Kanawati, who excavated and published this tomb in 1980, dated it using architectural features, the trend in tomb areas, the height of the tomb above sea level and official titles⁶⁸⁵. He placed considerable weight on the comparison of entrance elements with those of Jttj-šdw of Deshasha. Both tombs have an open forecourt, portico with two independent and two engaged pillars, with their chapel at a higher level, all rare features for the provinces. In 1980 Kanawati accepted the dating (by others) of Jttj-šdw to the latter part of the reign of Pepy II⁶⁸⁶, giving it as one of the reasons for assigning K3(.j)-ḥp:ttj-jkr to mid Pepy II or a little later.

Hnj:špsj-pw-mnw (H24) has also been generally dated to later than Dynasty 6. In dating this tomb, Kanawati took into account the coincidence of individual names, ranking of titles, epigraphic features, the appearance of certain scenes, height above sea level and architectural features, again noting the comparison between the tomb's entrance and that of

⁶⁸⁴ Fischer (1968) notes 313, 576; Brovarski (1985)

⁶⁸⁵ Kanawati, (1980-1992) 1 (1980) 13-14.

⁶⁸⁶ Kanawati, (1980-1992) 1(1980) 35-6, note 35.

the entrance to Jttj-šdw⁶⁸⁷. Kanawati finally dated Hnj:špsj-pw-mnw to late Pepy II, tentatively judging him to be the son of K(.j)-hp:ttj-jkr but admitting that the relationship could be reversed⁶⁸⁸.

More recently⁶⁸⁹, Kanawati has altered his dating of Hnj:špsj-pw-mnw to the period of Mernere to early Pepy II but has retained the mid Pepy II date of K³(.j)-hp:ttj-jkr, thus apparently reversing their chronological order and relationship.

The charts of K³(.j)-hp:ttj-jkr and Hnj:špsj-pw-mnw look very similar but have a number of significant differences. Based on three criteria (16, 99 and 110) the chart dates K³(.j)-hp:ttj-jkr to between Teti and Mernere. Only Criterion 99 suggests limiting the latest dating to Mernere, although allowing for an extension to early in the reign of Pepy II. Otherwise, Criteria 4, 73, 84 and 100 indicate a latest date early in Pepy II's reign.

For Hnj:špsj-pw-mnw Criteria 12 and 110 provide an earliest date of late Teti to Pepy I, while Criteria 17, 30 and 99 provide the reign of Mernere as the latest possible date, with a possible extension into the first third of the reign of Pepy II. Generally, the chart of Hnj:špsj-pw-mnw offers more late features, 20 extending at least to late in the reign of Pepy II, whereas K³(.j)-hp:ttj-jkr has only 15 such features. The criteria charts tend to

⁶⁸⁷ Kanawati, (1980-1992) 2 (1981) 11-14.

⁶⁸⁸ Kanawati, (1980-1992) 2 (1981) 14-15.

⁶⁸⁹ Kanawati (1992) 296.

confirm Kanawati's dating to Dynasty 6, although placing K³(.j)-hp:ttj-jkr at an earlier period than that assigned to it by Kanawati.

Kanawati believed that the comparison between the two El Hawawish tombs and that of Jttj-šdw of Deshasha was significant. The dating based on the charts brings the two El Hawawish tombs closer to the dating based on Jttj-šdw's chart, which assigns the tomb to Teti to Pepy I, with the first third of the reign of Pepy II as the latest acceptable date. Having excavated and studied the Deshasha tombs himself, Kanawati now dates Jttj-šdw to the reign of Teti⁶⁹⁰. However, he has not changed his dating for K³(.j)-hp:ttj-jkr⁶⁹¹.

The dating by chart of these two El Hawawish tombs must be considered tentative and, at best, supportive of their dating by other methods. Their charts exemplify the problems associated with the method for the second half of Dynasty 6: too few tombs to provide secure dates for criteria and too many criteria obviously extending beyond the reign of Pepy II, which therefore cannot be given a final date.

⁶⁹⁰ Kanawati-McFarlane(1993) 42-44. See also Kanawati (1992) 301.

⁶⁹¹ Kanawati-McFarlane(1993) 296.

The Tombs of Naga ed-Der

Three decorated tombs of Nome 8 have been widely dated from the end of the Old Kingdom (Dynasties 8 to 9) to mid to late Dynasty 6. Peck, who originally assigned these tombs to the end of the Old Kingdom, did so cautiously⁶⁹². In her dissertation she notes that each tomb offers an array of features from both the Old Kingdom and later. Her final judgement, however, tends to be based on the presence of 'new' features and palaeographic criteria rather than on the iconography. Kanawati, who more recently redated these tombs to Dynasty 6, based his conclusions on a comparison of architectural features with the tombs of El Hawawish⁶⁹³, titles and offices held by the three men⁶⁹⁴, as well as on iconographic and palaeographic criteria. As Kanawati points out⁶⁹⁵, the dates assigned to these Naga ed-Der tombs are a matter of importance in working out the characteristics and historical dynamic of the period, Dynasty 6 to Dynasty 9.

When the present system is applied to the three tombs it should be borne in mind that the criteria are all drawn from the decoration of the tombs. Peck notes for each tomb

⁶⁹² Peck (1958) 29, 83-7, 123-27.

⁶⁹³ He compares the tomb of Tmrrjj (N248) with that of Nhwt-dšr (G95) of El Hawawish (p.57). See also Kanawati (1992) 107, 109..

⁶⁹⁴ Kanawati (1992) 58-61, 108-9.

⁶⁹⁵ Kanawati (1992) 56.

that decorative features tend to reflect Dynasty 6 styles, even if colour schemes are very different and workmanship is poor.

Tw³w (N359) Refer to Chart CC.

Peck dated Tw³w 's tomb to early Dynasty 8, making its decoration the oldest of the three tombs she studied. She commented on the mass of contradictory tendencies within the tomb, noting that a date late in Dynasty 6 or in Dynasty 9 were both possible⁶⁹⁶. Kanawati judges Tw³w to be either a contemporary of Jbj [6] of Deir el-Gebrawi, who is dated in the Prosopography from Mernere to early Pepy II (VI.3-4E)⁶⁹⁷ or, preferably, to be dated to Pepy I.

The chart for Tw³w suggests mid Dynasty 5 as the most likely date. This, however, rests on only two criteria (27 and 78). The depiction of the tomb owner wearing a flared kilt at the offering table is not seen after Dynasty 5 in Groups A and B, which are totally dominated by Memphite tombs in Dynasty 5. The appearance here of this feature could be the result of a time lag between styles at the capital and in the provinces. This could be true of the other anomalous criterion, No 78, the multiple bangles worn by the

⁶⁹⁶ Peck (1958) 29.

⁶⁹⁷ This would depend on Peck's reading of a fragmentary title, which does not accord with evidence from El Hawawish. Kanawati (1992) 108. Jbj was appointed by Mernere. Davies 1 (1902), pls. 18, 23.

seated wife. It could also account for Criterion 89, chair legs in the shape of bull's legs and hoofs, which is a criterion supported by many instances, and for Memphite tombs is not seen after the reign of Pepy I. In other respects the reigns of Teti or Pepy I are equally indicated by the chart.

If this chart were taken into account in the dating of this tomb, it would be necessary to decide whether to consider an even earlier date than that suggested by Kanawati or to opt for a significant time-lag between the styles prevalent in the capital and those prevailing at Naga ed-Der.

Tmrrjj (N248) Refer to Chart DD.

Peck dated the tomb of Tmrrjj slightly later than that of Tw³w, while Kanawati judged it to be earlier than Tw³w, dating Tmrrjj to late Teti or early Pepy I⁶⁹⁸.

From the criteria chart the most likely date is mid Dynasty 5, which presumably has to be discounted on epigraphic grounds. However, the mid Dynasty 5 date is only supported by one criterion (37), which is the half loaves of bread on the offering table arranged around a central axis with their straight edges facing outward. Even if this criterion is discounted, the chart does not distinguish between the second half of Dynasty 5

⁶⁹⁸ Peck (1958) 86; Kanawati (1992) 59.

and the first half of Dynasty 6. Yet it does suggest that the latest date for the tomb is the reign of Pepy I, which is much closer to Kanawati's judgement than that of Peck.

Mrw:jjj (N3737) Refer to Chart EE.

This tomb is judged to be the latest of the three by both Peck and Kanawati. Peck, however, cautiously dates it to Dynasty 9 while Kanawati assigns it to the period Mernere to early Pepy II⁶⁹⁹. Peck asserts that the tomb plan, painting style, iconography and palaeography point to a date after Dynasty 6. At the same time she notes that the general appearance of the walls is similar to the tombs of D'w[106] and JsJ of Deir el-Gebrawi and that the palaeographic evidence is inconclusive, so that the tomb could be Dynasty 6 or Dynasty 11. It is possible that in her final assessment Peck was swayed by the poor quality of the artistry, which is very evident in this tomb.

Kanawati bases his dating partly on the shaft and burial chamber but otherwise does not discuss the architectural features. He mainly relies on iconographic evidence and

⁶⁹⁹ Kanawati (1992) 55-61.

judges Mrw:Jjj to be contemporary with Jbj of Deir el-Gebrawi and K³.j-ḥp/ttj of El Hawawish⁷⁰⁰.

Mrw:Jjj 's chart generally agrees with Kanawati's dating and certainly suggests that he was later than the other two Naga ed-Der officials studied. Criterion 108 (the large figure of the tomb owner on a skiff wearing a flared kilt) presents a problem. In a much damaged fowling scene Mrw:Jjj has his near arm raised backward with his hand above his head in a 'fowling' action. He is shown wearing a flared kilt of knee length⁷⁰¹. I know of no other Old Kingdom depiction of this nature and can only suggest that it is the work of a provincial craftsman unfamiliar with all the conventions of this theme. Apart from this, the chart confirms the date, VI.1 to VI.4E.

⁷⁰⁰ Kanawati (1992) 55-61.

⁷⁰¹ Peck (1958) pl 15.

CHAPTER 5 CONCLUSIONS

The criteria

The number of occurrences of each of the criteria varies from well over 200 (Criterion 10) to as few as two (Criteria 40 and 70). The criteria with very few instances have been retained because they are distinctive and likely to be limited to approximately the dates given.

The validity of the time span of criteria with many occurrences (50 or more) is well established. However, criteria with only about 10 to 50 occurrences can be equally valid. Some criteria occur many times in a tomb, while others, by their nature, appear only once or twice. For example, apart from the tomb of Nj-^cnh-ḥnmw and Ḥnmw-ḥtp [42], chapels only have one scene of the tomb owner fowling and one of him fishing. These scenes are valid criteria yet they only have, respectively, 11 and 14 occurrences (Criteria 105 and 106) in Table 4.

Criteria with less than five occurrences are even more open to challenge. These include: Criterion 39 (4 occurrences), Criterion 40 (2 occurrences), Criterion 46 (3 occurrences), Criterion 70 (2 occurrences), Criterion 75 (4 occurrences), Criterion 101 (3 occurrences) and Criterion 111 (4 occurrences). While it is unlikely that the earliest and

latest dates for these criteria are final, each is contained within a narrow time span. As distinctive features, which are mostly limited to a particular time, they may provide supporting rather than definitive weight to a proposed date for a monument.

Criteria with either their earliest dates in Dynasty 3 to the first half of Dynasty 4 or their final date in the reign of Pepy II are retained because their other final date falls between the reigns of Khufu and Pepy II and thus offers a useful dating criterion. There are very few tombs from the beginning and end of the Old Kingdom which can be included in Groups A and B. Criteria which can be seen in these tombs cannot be accepted as the earliest or latest occurrence. All that can be said is that these criteria are only traceable as far as Snfrw (or Dynasty III) and Pepy II.

Validity and reliability

A system that depends on statistics for its results needs to be shown to be valid and reliable.

I have attempted to do this by applying the system to a number of tombs which are either disputed in date, very broadly dated or recently dated using up to date findings and methods.

- The criteria offered in this study need to be used judiciously with the above reservations in mind. The most valid use of the criteria is to use them as a 'dating profile' such as is offered in Charts "A" to "EE".
- The tombs to which the system has been applied (see Charts "A" to "EE") have provided a dating chart without significant discrepancies or inconsistencies.
- The few discrepant or inconsistent results that have emerged appear to be the result of insufficient data from Groups A and B. When this happens⁷⁰², the criterion accounting for the inconsistency must be disregarded as unreliable until more data is available.
- With sufficient criteria, the system can make the dating of a tomb quite precise. With 33 criteria from the tomb of Tjj its dating can be narrowed to one generation.
- The method has been able to place tombs of similar date in chronological order. The charts of K³.j-*hnt* A2 and K³.j-*hnt* A3 of El-Hammamiya very clearly distinguish between the two men, although as father and son they would have been comparatively

close in time. The charts of K³(.j)-h^p/tj-jkr and H^h/spsj-pw-mnw of El Hawawish, which are so similar, distinguish less clearly between the two in time.

- However, the two El Hawawish charts highlight one of the weaknesses of the system, that is its inability to provide precise dates for monuments which probably belong to the second half of Dynasty 6. The small number of tombs in Groups A and B dated to the reign of Pepy II are provincial, and there are no dated tombs beyond this reign to provide a *terminus post quem non* for criteria which are still seen at the very end of Pepy II's reign. Where the 'final' date for a criterion is given as 'late Pepy II' it simply means that there is no evidence to establish when the criterion actually disappears from the record. The absence of dated tombs after the end of Dynasty 6 makes the extension of the present system beyond Dynasty 6 not feasible⁷⁰³.
- Further difficulties arise from the fact that 'earliest' dates for some criteria depend on just a few tombs, in particular on Mrs-^h III [38] and Hwfw-h^c.f I [69]. This, again, cannot be avoided because the data drawn from early to mid Dynasty 4 is limited.

⁷⁰² See the criteria charts of Mrw/J^h (Criteria 35, 108, 110), Jtj (Criteria 12, 69b, 94) Nfr-lrt-n.f (Criteria 31, 77, 109) and K³.j-hnt (A3) (Criteria 15, 38 92).

⁷⁰³ Brovarski has attempted to establish a relative dating system based on the typology of stelae, but the validity of his method is doubtful. Brovarski, (1989) passim.

- Another methodological objection to the system is the need to apply broad dating to so much of the data (tombs) on which the criteria are based. There is no answer to this problem if the data, and thus the criteria, are to remain valid. All the tombs in Group B have a dating based on location, personal relationships or archaeological evidence and therefore usually cannot be precisely dated to a single reign. This has meant that any criteria based on Group B often have an extended possible time span. These time span extensions (indicated by a broken line on the dating charts and the criteria synopsis) in some cases tend to make the system a 'blunt tool' that is unable to supply a precise date for a monument in need of dating.
- The criteria are not all equally useful. Those with the greatest number of supporting occurrences are obviously the most reliable. Others have considerable time gaps between supporting instances. This limitation and the previous one should be allowed for.

- The established criteria provide a more reliable dating when they are applied systematically, as in charts "A" to "EE". As features vary in their reliability as dating criteria, it would be unwise to depend on one or two criteria to date a monument.
- The need to depend very largely on published reports highlights the system's dependence on the accuracy of copyists and editors. Further checking with photographs is not always satisfactory owing to the quality of the reproduced prints.

These difficulties will rarely affect the dating of tombs providing enough criteria can be drawn from the decoration. However, the system is not reliable for monuments that probably date to the earliest and latest limits of the Old Kingdom or beyond.

Notwithstanding the above difficulties, in general the criteria are valid and based on reliable data. They may not solve every problem connected with the dating of Old Kingdom tombs, but there are many tombs that the system can reliably date to within one reign or two short reigns.

Need for more criteria

A comparison of the charts of Tjj (Chart R) and Jttj (Chart B) suggests that, in general, the more criteria applied, the more precisely a tomb may be dated. Tjj has 33 criteria and can be dated to within a generation. Jttj has only 12 criteria, three of which are suspect, and cannot be dated more precisely than to Dynasty 5 after the reign of Neferirkare. K³(.j)-hnt (A2) and K³(.j)-hnt (A3), with 28 and 24 criteria respectively, can be put in chronological order although very close to each other in time.

The need for more criteria is especially noticeable in early Dynasty 4 and late Dynasty 6. Certainly there are many more criteria to be established from the presently used data. It may be possible, without falling into the trap of circular argument, to add tombs dated by this system to provide further support for criteria already established. Tjj, K³(.j)-hnt (A2) (Chart Y) and K³(.j)-hnt (A3) (Chart Z), for example, can now be added to Group B.

While further criteria can be established from the iconography, a larger quantity of criteria could be established from the epigraphy and palaeography of the tombs in Groups A and B, using the same method. This may also improve the dating capability of the system for early Dynasty 4 and late Dynasty 6 monuments, but is beyond the scope of the present study.

A time lag between cemeteries?

A time lag in the adoption of male kilt styles in Dynasty 4 and early Dynasty 5 between the West Field and the other early Giza cemeteries has emerged. However, it is difficult to establish whether there was a time lag between decorative styles in the capital and the provinces without having more dated Memphite and provincial tombs which belong to the same period. Even this would not entirely settle the question because the situation might vary between important and less significant provincial cemeteries, or from time to time. For example, a time lag might be expected to occur in the earlier period of the Old Kingdom, when senior provincial administrators were more often buried in the capital and there would have been few reasons to take gifted Memphite craftsmen to the provinces. Whether such a situation would continue into Dynasty 6, when much more attention was being paid to the provinces and nome leaders were buried where they worked, is a further question. A hint is offered by the tomb of Krrj [92] of El Hawawish, dated by inscription to Pepy I⁷⁰⁴. The tomb owner sits before an offering table which holds half loaves of bread, whereas the latest Memphite offering table with half loaves rather than reeds occurs in Sšššt:Jdwt [89], dated to the reign of Teti⁷⁰⁵. Perhaps the question depended on whether

⁷⁰⁴ Kanawati (1986) fig. 22.

⁷⁰⁵ Macramallah (1935) pl. 15.

the individual official could afford to employ a superior craftsman with Memphite training and experience⁷⁰⁶.

While tombs in the same provincial cemetery may be dated in relation to each other according to such criteria as position, architectural features and family names, they can be more difficult than Memphite tombs to date precisely. Provincial cemeteries do not offer helpful features such as proximity to a royal monument, and being much smaller, they rarely offer a long series of tombs spanning more than a dynasty. Thus, if there are no biographical details or cartouches either to provide at least a date *ante quem* nor clear architectural comparisons to be made, only a system of relative dating largely drawn from Memphite criteria can be used to date these tombs. Unfortunately, when there are more provincial tombs with 'helpful' data (in the reign of Pepy II), no dated, decorated Memphite tombs are available.

Periods of change

The criteria suggest that there were occasions when a large number of stylistic features were modified, added or abandoned. A new king and newly appointed administrators may help to account for changes in stylistic features but it is possible that a moment in time when a large number of changes occur simultaneously may hint at significant events,

⁷⁰⁶ Onlt two titles survive for Krrj, hrj-tp nswt pr-^{sz} and shd hm-ntr. Kanawati (1986) fig. 20c.

developments or changes in the economy or in administrative policy. Some of these clusters of change in stylistic features seem to coincide with flurries of interest in the provinces:

| <i>Date</i> | <i>Number of criteria affected</i> | <i>Provincial policy</i> |
|---|--|---|
| End of Dynasty 4 to early Dynasty 5 | 22 | Officials, other than minor priests, first buried in the provinces*. |
| Reign of Neuserre | 28 | |
| End of Dynasty 5 to the beginning of Dynasty 6 | 29 | Jsj to Edfu as ʔtj sʔb ʔtj and hrj-tp ʔ n spʔt and Nhwt-dʃr to El Hawawish**. |
| Pepy I to Mernere. | 14 | administrative changes; a vizierate established at Akhmim; return(?) of nomarchic families to the provinces#. |

* Kanawati (1992) 23.; ** Kanawati (1992) 47; # Kanawati (1992) 51, 53-4.

These clusters of changes in criteria appear to coincide with the spurts of interest in the provinces. Such issues lead to the historical dynamic of the Old Kingdom. A credible interpretation of the dynamic requires a secure chronological framework for the evidence on which it is based. It is hoped that the proposed method of dating will contribute to such a framework.