

ACCOUNTING DISCREPANCIES IN THE MARI NĪ.GUB [NĪG.DU] TEXTS

JACK M. SASSON (The University of North Carolina)

I. INTRODUCTION

A. *Limitation of evidence*

Published mostly in ARM(T) VII, IX, XI, and XII is a large corpus of administrative texts which details the expenditure of foods and beverages destined initially for the king's table, and subsequently for the palace consumption. This body of texts includes a variety of documents which record the reception of, among other materials, barley, cereals, vegetables, fruits, oils, honey, sesame, fruits, condiments, meats, pots, pans, etc.... A healthy number of documents have also been published in these same volumes which record the delivery of grains into the palace from localities outside of Mari proper.

The evidence for this paper, affectionately dedicated to F. R. Kraus, is exclusively drawn from a category of texts which has come to be generally labelled *naptan šarrim* [NĪ.GUB/NĪG.DU LUGAL] documents*. Within that category, furthermore, we shall concern ourselves only with two types of documentation:

1a. Normally taking up both sides of a single tablet, a listing of ingredients or of finished products, is first given. This is then followed by a totalling of these amounts, by stating the purpose for the outlays [*naptan šarrim*, a formula sometimes expanded by the addition of *u šābi(m)* and/or *ina GN*—most often Mari], and by dating the whole to the day, month, and year of the king's reign.

1b. Similar in format are a number of texts, most often dated to the 1st and 16th of a given month, which differ only in specifying a funerary (cultic) destination for the materials. When dated to the 16th, the entry is usually limited to indicating the ingredients to be destined *ana kispim* LUGAL.MEŠ; those of the 1st are normally supplemented with an entry indicating that the ingredients were aimed *ana malikī*¹.

* [Cf., though not dealing with the subject of this paper: Ronald R. Glaeseman, *The Practice of the King's Meal at Mari: A System of Food Distribution in the 2nd Millennium B.C.* (Diss. UCLA, 1978).]

¹ Latest discussion on this type of documentations is in Ph. Talon, *Les offrandes funéraires à Mari. Annuaire de l'Institut de Philologie et d'Histoire Orientales et Slaves*, 22 (1978), 53-75. Unsatisfying is M. Bayliss's treatment, *The Cult of Dead Kin in Assyria and Babylonia, Iraq* 35 (1973) 123.

2. Published exclusively in ARM IX are accounts which *a.* recapitulate daily dispensations for the *naptan šarrim* into monthly accounts. Many columned, these texts usually end by grand-totalling the daily amounts, by specifying the purpose of the outlays (*naptan šarrim*), and occasionally by specifying the day and month in which the accounting took place. The year is not usually given, but because the daily accounts are matchable with individual texts from the above categories, we can, except for a few cases [e.g. 211, 213 ('Benjaminites'?), 218/221], assign them specific year-formulae². *b.* Of lesser concern to us are a whole series of texts which tally monthly expenditures [zi.ga = *šitum*] of foodstuff destined for the king's table (only occasionally specified—e.g. XII:199, 703). These documents can recall as many as 4 months which may even stretch over two separate years (e.g. XII:547). Although year-names may be appended to these texts, we are often led to rely on detective work in order to establish a temporal context³. [N.B. In the body of the paper, we shall henceforth designate as 'original' texts from categories **1a, b**; as 'list', those in category **2**.]

B. Observations on the evidence

1. *Reigns.* Although we have a nice corpus of *naptan šarrim* texts from the reign of Yasmah-Adad, this paper will limit itself to the documentation originating in the period of Zimri-Lim. It will be quickly apparent that the material available to us comes from a rather concentrated span of years. Birot's recent reconstruction of the last dozen year-formulae, which may have to be lengthened at the end by perhaps a year or two ('Kaḫat' and/or 'Muballitum'; 'II Babylon') is accepted here⁴.

2. *Menology.* Birot's reconstruction, as detailed in ARMT XII, pp. 20-22, and confirmed by Kupper, will be followed. Whether or not Uraḫum, the first month's in the calendar, is to be located in the Spring or the Fall is not of immediate concern to us⁵.

² Listing in ARMT IX pp. 291-292 (75). The documents assigned to this category are those which end with text No. 221, 19th from bottom. Year names are those given in Dossin, *Studia Mariana*, (1950) 54-59.

³ See Birot, ARMT IX p. 292 (§75), last 8 listings; IX:233; ARMT XII pp. 242-248 *sub* 'catalogue: comptes mensuels; compte récapitulatif'. However, XII:714 may not belong to this category.

For identification of year-formulae for texts which have no formulaary, see Birot, ARMT XII p. 15. One can add that IX:168 is probably datable to 'Dūr Yaḫdun-Lim' (No. 28), 215, to 'Census' (No. 26). IX:224 is likely to have come from the same year.

⁴ Données nouvelles sur la chronologie du règne de Zimri-Lim, *Syria* 55 (1978) 332-343.

⁵ J.-R. Kupper, *Le Calendrier de Mari. Symbolae ... de Liagre Böhl dedicatae*, 1973, pp. 266-270. Compare his views with those of Christopher L. Hamlin, *Cuneiform Archives as Data: Reliability of the Mari Archive for Agricultural Reconstruction*. (1976 - University Microfilm No. 76-22, 699), 278-311.

3. *Place of discovery.* The materials under discussion have been found in areas located throughout the palace. The largest corpus was recovered from Rm 5 [and published in ARM(T) IX, XII], a smallish room in the 'Quartier de l'intendance' (Parrot, MAM II/1 [1958], pp. 217-219), in the western segment of the palace. Those published in XI were found in Rm 111, slightly larger than 5 and adjacent to the larger Rm 106, which also contained bathing equipment and a brick inscription of Zimri-Lim. From Rm 110, also adjacent to 106, a rich harvest of documents included the *naptan šarrim* texts published in VII [MAM II/1, p. 102]. Rooms 69, a 'bath' in the 'Quartier des fours', and 79, in the southern part of the palace, have also given us texts of the same type [MAM II/1, pp. 228-230; 144-146; cf. Birot, ARMT IX, p. 274 (§46)].

One sequence in the month of Kinūnum, 'Dūr Yaḥdun-Lim', shows the following distribution of texts:

26th	—	XI:249; Room 111
27th	—	VII:175; Room 110
28th	—	XI:250; Room 111 [King getting ready to travel toward Hanat]
29th-30th	—	XII:605-606; Room 5 [King in Dēr].

Birot, ARMT XII, p. 16, has suggested that the texts found in Room 111 originated from 5. Even if it does not make allowance for those found in 110, this explanation, highly attractive as it is, does not take account many complexities. For example, we can note that the oil receipts for Bēlet-biri, 'Dūr Yaḥdun-Lim', show the functionary Aḥlamu to be in charge for those found in Rm 5 [XII:492; 496-7; 500; 506-10; IX:144], in Rm 111 [XI:206; 211-2], but not 110 [VII:148].

4. *Observations on 'originals'.*

a. *Periodicity of meals.* Outlays for the king's were made twice daily. This is confirmed by the occurrence of 'originals' dated to the same day, which contain markedly different amounts for differing ingredients; they thus cannot be considered duplicates of the same transaction [e.g. IX:156/ VII:152; IX:126/ XII:459; IX:95/ XI:168; IX:183/ XII:597]. While the terms *naptan kašātim*, (early) morning meal, and *n. mūšim*, (late) evening meal, have surfaced in Mari (XII:685-6), they have not, so far, been specifically attached to the royal meals. An opinion, which cannot be substantiated, is that whenever we find two 'originals' dated to the same day but which exhibit markedly different tallies and totals in foodstuff, the larger one may be regarded as destined for the evening meal⁶.

⁶ The amounts in each of two daily outlays need not differ sharply in quantity or contents. Compare XII:113 with 114, XII:130 with IX:32. When 2 'originals' are available for the same day we note that dispensations for oils, honey, and sesame can be recorded as available to one meal only (e.g. XII:114

b. Duplicates. We have found very few genuine duplicates in the *n. šarrim* documentation. The very few which have been recovered refer to very unusual events. XII:267 and 268 record outlays for the sacrifice of Ištar; XII:270 gives disbursements in a terminology which differs very slightly (and unconsequentially?) from that of 271. During the festival for Nergal's Chariot an enormous amount of foodstuff is recorded in XII:272-3; a slightly lesser amount, possibly meant for the morning meal, is recorded in XII:275⁷. It cannot be established whether or not to consider as imperfectly copied duplicates the examples in which two 'originals' display minor deviations [e.g. XII:520/ XI:217]⁸. The matter is complicated by the fact that the Mari scribe seems to be attached neither to form nor to spelling; this is made certain when we compare non-*n. šarrim* texts which have been preserved in duplicates⁹.

5. *Observations on Lists.* So far recovered only from Rm 5, lists usually cover a month's span of time, from its beginning to its end. In some cases, however, a list may cover unusual stretches. IX:121 goes from Abum 15⁷ through Ḫibirtum 10. IX:220-221 takes up two months. Days can be omitted from particular sequences¹⁰.

vs. XII:113), to both (e.g. XII:130 vs. IX:32), to neither (e.g. VII:152 vs. IX:156). These items do not seem to have been affected, moreover, by the seasonality of food production (contra, to some degree, Hamlin, *Cuneiform Archives as Data*, 310-311). On the possibility that the larger of 2 outlays may be assigned to the evening meal, note IX:71:iii:15-24 where the two widely diverging accounts for the same day are ordered such that the larger one is given secondly. Rather weak an argument, admittedly.

⁷ XII:256 and 257 cannot be considered as duplicates since they detail different moments of the same transaction. See also IX:224 vs. XII:1-17.

⁸ We have the barest of hints that the 'original' which have survived may, themselves, be copies of now lost prototypes. XII:215 omits an outlay for the ingredient *pappāsum*. Not only does the total in l. 7 of the text presume its outlay of 2 *qa*, but documents from the same month of the same year (XI:81-82; XII:212-216) consistently include the ingredient. While carelessness at any moment of the recording process could, of course, bedevil a scribe, in this case the discrepancy might best be regarded as one of copying.

⁹ Compare XVIII 58 with 59 and 60, all dated to the same day. Note Rouault's comments, ARMT XVIII pp. 136-137. Differences are most easily noted in the decision of the scribe to resort to sumerograms whenever he is moved to do so, to lay out materials on lines which differ from one text to its copy, and to abbreviate a series of ingredients into a single entry. This tendency is most easily observable when 'originals' are compared with daily entries into lists; on this, see below.

¹⁰ In this as well as in the accounts that will be detailed in the next two dozen footnotes, I have aimed not so much to give a complete detailing of all errors and/or discrepancies that can be noted in the Mari tablets, but to include enough examples in order to promote the thesis that accounting procedures at Mari readily permitted the introduction of inaccuracies.

Under this particular footnote, I place here examples in which the differences between the entries of ingredient and that of their total cannot be easily attributable to the scribe's decision to leave out a specific ingredient from his tabulations. I have left out from consideration fragmentary texts, even when restored very persuasively by their editors.

ARM IX: 76 (0.1.30); 82 (*0.1.35); 119 (*0.1.14); 161 (*0.1.51); 173 (5.1/2-37 1/2); 209 (1.2.46)

ARM XI: 33 (*0.0.79); 46 (*0.2 1/2.42); 62 (*0.0.78); 65 (0.0.15); 82 (*0.0.9-šipk.); 100 (*0.1 1/2.15 + 0.0.8); 153 (0.3 1/2.15); 163 (*0.1 1/2.58); 176 (*0.1 1/2.34); 185 (*0.1 1/2.9); 190 (0.2 1/2.27); 198

Although we possess one list from the year 'Benjaminites' (No. 6) and two from 'Muballiṭum' (No. 31), the remainder of the lists come from the 4-year sequence: 'Šamaš' (No. 16), 'Census' (No. 26), 'Dūr Yaḥdun-Lim' (No. 28), and 'Ḥatta' (No. 21). It is perhaps not accidental that no list has been recovered from either repeat year (*šanitum šattum*; MU.2.KAM) or repeated activity (year ... *šanīš*). If the former condition is confirmed by later discoveries, this might indicate that the lists were compiled well into the end of a year, after a new, individual year name has been assigned by the chancery. Finally, it is observable that the months Kiskissum and Ebūrum, last in the Mari calendar, have provided us with a very healthy percentage of our corpus. How suggestive is this last remark remains to be seen.

While two outlays, one for evening, the other for morning, were prepared for any given day, the lists only rarely [e.g. IX:71:iii:15-24] will register more than one of them. In the case of day 17 of IX:71, the smaller amount, possibly representing the morning meal, is seen to duplicate the 'original' of IX:68. Unfortunately that the second meal has not been found yet. The reverse condition, that of having two separate daily 'originals', of which only one is entered into the list, is often met [e.g. XII:597/ IX:183/ IX:185:iii:19'-26'; XII:629/ XII:630/ IX:193:ii:1-12]. A healthy chunk of our evidence, however, consists of one 'original'—representing one of the two daily outlays—which is incompatible with the daily entry within a list that is dated to the same period. In this case, since the discrepancy cannot be assigned to duplicating errors, we presume that the missing 'original' was the source for our list. However, whenever we possess two 'originals', apparently representing outlays for an evening and a morning meal, there seems to be no apparent reason why the scribe preferred to enter one of them into the list over the other. It may be—but I strongly doubt it—that we shall yet discover lists which contain all those 'other' originals which were not entered into those documents that have been already found.

(*0.1¹/₂.29); 217 (0.4.22+0.0.12); 224 (*0.0.91); 228 (*0.2¹/₂.24); 234 (0.3.48); 243 (0.4.9); 256 (*0.2.58); 258 (*0.3.24); 261 (*0.5.42).

ARM XII: 50 (0.4.28); 90 (*0.0.104); 92 (*0.0.94); 98 (*0.0.88); 100 (*0.0.44); 107 (*0.2.50); 121 (0.3.34); 176 (*0.0.41); 180 (*0.3¹/₂.31); 222 (*0.1¹/₂.3); 226 (0.1¹/₂.35); 243:7 (0.1¹/₂.1); 246 (*0.2¹/₂.21); 269 (*0.7.31); 277 (0.1.42); 280 (0.2.30); 297 (0.1¹/₂.54); 316 (0.1.33/43); 329 (*0.1¹/₂.17); 330 (0.1¹/₂.54); 331 (0.1¹/₂.22); 346 (0.0.83); 351 (*0.0.88); 377:9 (*0.0.4); 398 (*0.8¹/₂.50); 415 (*0.0.32); 436 (0.2¹/₂.9); 444 (0.2.15); 476 (0.5.9); 507 (0.5.25); 516 (0.2.8); 525 (0.1.52); 528 (*0.2.59); 558 (0.2.40); 568 (0.1.32); 571 (*0.1.39); 572 (0.0.93); 593 (0.1¹/₂.3); 666 (*0.3¹/₂.54); 670 (*0.1¹/₂.49); 672 (*0.0.43); 678 (*0.3.28).

II. PRESENTATION OF EVIDENCE

A. *Previous discussions and presentation problem*

The matter of discrepancy in accounting procedure pertaining to the *n. šarrim* documentation has been alluded to by Bottéro, Burke and Birot. Consistently in ARMT XII, less so in IX, Birot followed the practice of both footnoting a tabulating inconsistency between the original and a list's entry and of providing a particular arithmetic error with a *sic*. On pp. 275-276 of ARMT IX, Birot provided explanations, partially convincing, for the two phenomena described above: the matter of entering only one 'original' into listings, and that of days missing within the sequences of some lists. Burke, ARMT XI, 138-139, corrects (inaccurately in the cases of XI:190, 152!) some examples of gross negligence on the part of the Mari scribe, remarking: "Ce qui apparaît actuellement comme pure fantaisie est un effet de notre documentation encore trop clairesmée; un plus grand nombre d'exemples permettra de faire la part des habitudes de scribes et des changements administratifs."

We now have a large enough documentation that we may begin the process of analysing scribal techniques by cataloguing the variety of errors that have crept into administering the royal meals. I shall begin by presenting successively those errors that have entered into the 'originals', into daily entries within lists, and into the transfer of originals within monthly tabulations. I shall then give examples where one can plausibly reconstruct the manner in which the inconsistency develops. Finally, I shall provide a *bilan* of queries which might be posed not only to the Mari *n. šarrim* materials, but to any administrative documentation which comes from cuneiform sources.

Abbreviations:

<i>alap.</i>	=	<i>alappānum</i>	<i>mers.</i>	=	(NINDA) <i>mersum</i>
<i>app.</i>	=	<i>appānum</i>	N.	=	NINDA
<i>ars.</i>	=	<i>arsānum</i>	N.K.	=	NINDA.KUM
<i>emš.</i>	=	(NINDA) <i>emšum</i>	<i>papp.</i>	=	<i>pappāsum</i>
<i>dišp.</i>	=	<i>dišpum</i>	<i>pul.</i>	=	<i>pulilum</i>
<i>hal.</i>	=	<i>hallūrum</i>	<i>sasq.</i>	=	<i>sasqum</i>
<i>haš.</i>	=	(NINDA) <i>hašlum</i>	<i>šamaš.</i>	=	<i>šamaššammū</i>
<i>him.</i>	=	<i>himēṭum</i>	<i>šamn.</i>	=	<i>šamnum</i>
<i>isq.</i>	=	<i>isqūqum</i>	<i>šipk.</i>	=	<i>šipkum</i>

Fuller discussions of these terms are available in the appropriate sections of ARMT VII, IX, XI, and XII, in the entries of CAD and AHW, and in the notes to Chapter 3 (pp. 123-140) of Hamlin's dissertation, cited in n. 5, above.

A star (*) before a corrected total means that the correction yields an amount higher than that indicated by the scribe. An underlined number refers to the inaccuracy in the text.

B. 'Originals'

The following are types of errors and discrepancies which are found in totalling the originals. Note that we allude to certain foodstuffs (oil, honey, ghee, sesame) only under unusual circumstances. Broken texts have not been used here.

Type of discrepancy	Text number	Correction or explanation
i. Addition ¹⁰	IX:155	*0.3.54
ii. Copying ¹¹	XII:630	<i>šamn.</i> should be 0.1.2 or <i>alap.</i> should be 0.1.4
iii. Rounding off ¹²	IX:64	0.0.118
iv. Ingredients ¹³		
a. unusually added ¹⁴	XII:320	<i>šamaš.</i> added into total
b. unusually ignored ¹⁵	VII:153	<i>isq.</i> and <i>ḥal.</i> left out of total
c. totalled twice ¹⁶	IX:82	<i>šipk.</i> accounted twice
v. Carelessness ¹⁷	XII:66	l. 9-10: 0.0.2 LĀL / 0.0.8 ŠE.Ī.GIŠ
vi. Miscellaneous errors (too odd for simple explanations!) ¹⁸	XII:54	0.1. ¹ / ₂ .7 + 0.0.8

¹¹ E.g. XI:243:12 (0.0.15); XII:357:5 (0.0.6); 625:6 (0.0.13); 630:8 (read: *alap.* 5); 666 (left out 100 *qa*).

¹² IX:147 (0.2¹/₂.49); XII:249 (0.1.28¹/₂+0.0.2); 443 (0.0.27¹/₂).

¹³ There are numerous examples in which ingredients listed in the 'originals' are recapitulated under different accounts in the totaling. I shall return to this topic in notes 22 and 31.

¹⁴ XI:255 (*šamaš.*); XII:417 (dates); 589:9 (*šamaš*).

¹⁵ Corrections will depend on whether or not one presumes that the scribe intentionally decided not to include *šipk.* in his totalling; e.g. IX:76 (0.1.30/32); 119 (0.1.12/14); XII:316 (0.0.43/33).

But here can be included another category of discrepancy, one in which the scribe simply failed to integrate an ingredient into his total which is normally accounted for: e.g. VII:153 (*isq.* + *ḥal.*); IX:85 (*pul.*); 103 (*alap.*); 52 (*ars.*); 145 (*alap.*); 165 (*šipk.* + *app.*). Note a whole series of ingredients unaccounted in IX:99's total.

ARM XI: 220 (*app.*); 244 (*ḥal.*); 249 (*isq.* + *sasq.*); 169 (*papp.* + *ḥal.*).

ARM XII: e.g. 194 (*app.*); 283 (KAŠ *i-da-tu*); 324 (*pul.*); 465 (*alap.*); 480 (*šipk.* + *ḥal.*); 495 (*sasq.* + *app.*); 591 (*alap.*); 624 (N. *mers.*).

¹⁶ This text also contains a totalling error. See also IX:131 (1.2¹/₂.15 or 1.3¹/₂.5); XII:134:8 (*šamaš.*); 670:4 (added twice).

¹⁷ a. XII:128:6 (*šamn.*!); 135:7 (0.0.17); 215:7 (skipped 2 *qa papp.* between lines 4 and 5; cf. 214, 216); 227:7 (left out from total); 329:5 (should be 0.¹/₂.17); 438 (left out amount after 1¹/₂ KÜR; read: 0.1¹/₂.34); 568 (should be another ingredient in l. 9).

b. Examples of dates incomplete or missing: XII:66; 67 (days missing) XII:338; 378 (day/month). Note that in the year 'Benjaminites', the scribe frequently fails to total (XII:20-107).

¹⁸ XII:99 (0.1¹/₂.13+0.0.8); 330 (0.¹/₂.54); 363 (1.1¹/₂.50+0.2.72); 466 (0.0.117).

C. Lists

There are two types of discrepancies at stake here. The first can be evaluated only rarely, since it requires a well preserved text from which to assess the evidence. The second conforms very closely to the categorization offered under ‘originals’ (above). In compiling the data, I have arbitrarily, but rather necessarily, chosen to break my investigation with IX:216. Since all lists occur in ARM IX, it will not be necessary to repeatedly refer to that volume. Additionally, rather than clumsily referring to columns and lines in which a daily entry is located within a text, I mention, between brackets, the particular day in which the discrepancy or error is to be located. In the few cases where I need to cite a list which refers to more than one month, I place the name of the month before the day number, within the bracket. Thus 168:[2] refers to ARM IX:168:i:9-16.

1. *Grand Total [naphar napharim]*. We are given very few opportunities to check the scribe’s grand totals. This is because, in order to do so, we need an intact text, where the totals of each daily entry is preserved as well as the final totalling of all the entries. We can refer to 3 less than completely satisfying opportunities.

a) This condition obtains best in the case of IX:121, a list which, beginning with column iv, covers the first 10 days of Hibirtum, ‘Census’. We first note that, as given, the totals for day 6 and for the *kispum* ceremony are not correct (read: $*0.1\frac{1}{2}.45$ and $*0.0.51$ respectively), and that the scribe was rather inconsistent in his inclusion of certain ingredients in his daily totals (*papp.* counted in 8th, but not in 7th; not counted in 9th, but counted in the ‘original’ for the 9th [XII:445]). With these in mind we offer the following:

Col. and line	Text’s totals	Reconstructed totals
vi:1	1.4.47 NINDA <i>burrum</i>	1.4.32 (counting daily totals as given) 1.4.36 (counting corrected daily totals) 1.4.42 (counting by ingredients)
vi:3	0.0.4 <i>alap</i> . ¹⁹	0.0.4
vi:5	0.0.14 <i>papp.</i>	0.0.13 $\frac{1}{2}$
vi:7	0. $\frac{1}{2}$.0 <i>šamn.</i>	0.0.58 $\frac{1}{2}$
vi:8	0.0.8 <i>dišp.</i>	0.0.8 $\frac{1}{2}$
vi:9	0.0.40 <i>šamaš.</i>	0.0.40 <i>šamaš.</i>

b) Another example, unfortunately marred by a few breaks in the text, is afforded by IX:216 [1-30 Ebūrum, ‘Hatta’].

¹⁹ On the ŠE *alap.* of l. vi:4 and its computation, see Birot, ARMT IX p. 294 (§77d).

Col. and line	Text's totals	Reconstructed totals
vi:1	6.4.67 NINDA	6.4.50 (counting daily totals as given) 6.5 ¹ / ₂ .25/45 (corrected daily accounts)
vi:2	0.3.44 <i>alap.</i>	0.3.44
vi:3	0.1.44 <i>šamn.</i>	0.1.60
vi:4	0.0.22 <i>dišp.</i>	0.0.32
vi:5	0.0.100 <i>šamaš.</i>	0.1.10

c) It is unfortunate that IX:215, which recalls the outlays for Ebūrum of an unknown year, contains a break at days 15-16; for the daily entries themselves are remarkable in being error free in their computation of daily totals. The absence of any entry for days 19, 23, and 24 do not prejudice the cause of this particular exercise since the scribe's grand total obviously depended on what he has included in the list. One could immediately note that the calculations, taking into account the break in 15-16, were those of a uniquely conscientious scribe.

Col. and line	Text's totals	Reconstructed totals
v:40	3.5.0 <i>burrum</i>	2.9.11 [i.e. allowing 0.5 ¹ / ₂ .49 for totals of days 15-16]
v:41	0.0.38 <i>alap.</i>	0.0.33
v:43	0.0.70 ¹ / ₂ <i>šamn.</i>	0.0.63 ¹ / ₂
v:43	0.0.12 ¹ / ₂ <i>dišp.</i>	0.0.12 ⁶ / ₁₀ [rounding off!]
v:44	0.1.24 <i>hal.</i>	0.1.0 [unusual tabulation of this particular ingredient!]
v:45	0.0.54 <i>šamaš.</i>	0.0.54

2. *Totals in Daily Entries.* The range in this type of discrepancy and error closely matches that found in the 'originals'.

Type of discrepancy	Text and day	Correction or explanation
i. Addition ²⁰	71 [1]	0.0.92 [cf. IX:61—same error]
ii. Copying ²¹	98 [28]	0.0.71 [cf. XII:394:7]
iii. Rounding off	121 [3]	0.0.27 ¹ / ₂ [cf. error in XII:443]

²⁰ 71: [6] (0.1.54); [10] (0.0.59); [13] (0.2¹/₂.56); [14] (*0.1.21); [16] (*0.3.37). 98: [5] (*0.1.18); [11] (0.1¹/₂.40); [17] (0.7¹/₂.11); [23] (0.0.39); [26] (*0.0.59); [28] (0.0.81). 109: [8] (0.2¹/₂.13). 114: [7] (0.0.106); [22] (*0.3.19). 121: [Ab. 28] (0.1.23); [Hib. 6] (*0.1¹/₂.45); [1-*kisp.*] (*0.0.51). 168: [4] (0.1¹/₂.1); [5] (*0.2.29); [9] (*0.2.8); [12] (0.2¹/₂.2); [26] (*0.2¹/₂.16/32); [27] (*0.3.67). 193: [1] (0.0.45); [3] (*0.1.51). 198: [14] (0.1¹/₂.1); [15] (0.3.0); [25] (0.1.50); [26] (*0.0.68). 212: [6] (*0.3¹/₂.26); [10] (0.4¹/₂.24); [7] (0.1.30); [Kisk. 22] (0.0.48); [23] (0.1.56). 213: [19:13'] (*0.0.12); [24:ii:11'] (0.0.10). 214: [10] (0.0.40/38); [12] (*0.0.106); [14] (*0.1.23); [26] (0.0.67); [*kisp.*] (0.0.103). 216: [1] (*0.2.12); [10] (0.2.8); [17] (*0.3¹/₂.5); [18] (*0.3.38); [23] (*0.3.48); [24] (*0.3.20).

²¹ IX:98 [28] (cf. XII:394); 114 [23] (cf. XI:182:2); 121 [28] (cf. IX:119:1).

iv. Ingredients ²²		
a. unusually added ²³	71 [13]	<i>šamn.</i> and <i>dišp.</i> added
b. unusually ignored ²⁴	71 [6]	<i>šipk.</i> left out of total
v. Carelessness	211 [27]; 212 [7]	*0.0.39 ¹ / ₂ ; day missing from tally
vi. Miscellaneous	114 [1]	neglects to give total [cf. XII:418] (common in <i>kispum</i> accounting)
	219 [26!]	wrong day, correct sequence.
	212 [Kiskissum 7]	neglects to assign a date to an entry

D. Comparisons between 'original' and its entry into a list

Mari affords the researcher an opportunity to document the discrepancies that occur when a scribe enters an 'original' into a monthly account. In some cases, it is even possible to hypothetically reconstruct the manner in which the error and/or the discrepancy entered into the list. We shall try to document, lightly in the latter case, some of the examples which present us with this opportunity. In entertaining the first of these occasions, I am not unmindful that the absence of two 'originals', one for the morning, the other for the evening meal, often makes it difficult to distinguish between materials which have been incorrectly or irregularly transferred from an 'original' into a list and those which may have depended upon a now lost 'original'.

1. Examples

a) Type of discrepancies or errors	'Original'	List	Remark
i. Same total/different contents ²⁵	XII:591	185 [3]	
ii. Different totals, each correct ²⁶	XII:315	71 [2]	+ 0.0.2

²² Previous commentators have already expressed their opinion on the difficulty of establishing the nature and purpose of some of the ingredients listed in the *n. šarrim* texts (cf. latest discussions in Hamlin, *Cuneiform Archives as Data*, pp. 128 ff.). The term *šipkum* has always been the most difficult to assess (Hamlin, pp. 129-130). In comparing the listings of items with the abbreviated forms given in the totalling, it is observable that the term *šipkum* is used, by the scribe of 'originals' as well as lists, to represent an ingredient of a different name (*papp.* (e.g. XI:70; 76), *isq.* (XI:125, 288, 305, 341 ...), *app.* (XI:152); *pul.* (IX:193 [17])), or combinations of two, three, even four differing ingredients. In some cases, it can be noted that the scribe of a specific list seems to favor one combination for a stretch of daily entries over another. A definite pattern in usage cannot be extracted as yet, *ars. ḫal. sasq.* and occasionally *N. emš.* also enter into these combinations.

²³ IX:71 [13] (adds *šamn.* + *dišp.*); 216 [11] (adds *šamaš*).

²⁴ IX:109 [7] (omits *alap.*, accounted in [8]); 121 [7] (omits *papp.*, added the next day); 121 [9] (omits *papp. ḫal. pul.*—cf. XII:445); 168 [25] (omits *šipk.* + *ḫal.*); 185 [22] (omits *ḫal.* + *papp.*); 212 [6] (omits *šipk.*); 214 [15, 17, 18, 24] (omits *alap.*—fairly common); [29] (omits *alap.* + *isq.* + *sasq.* + *papp.*); 214 [30] (a series of ingredients omitted); 216 [13, 24] (omits *šipk.*). In 168 [26] errors are retained even by excluding a number of ingredients.

²⁵ XII:591—185 [3]; XII:295—216 [3]; XII:298—216 [7]; XII:319—71 [10] (incorrect addition!).

²⁶ XII:315—71 [2] (+2); XI:190—121 [ḫib. 8] (-7); VII:151—160 [22] (+2); XII:419—114 [6]

iii. Different total, original correct only ²⁷	IX:63	71 [5]	wrongly expanded <i>šipk.</i>
iv. Different totals, list corrected (and expanded) ²⁸	IX:64	71 [11]	+0.0.10 <i>ḥaš.</i>
v. Different totals, both incorrect ²⁹	XII:444	121 [6]	
vi. Ingredient added ³⁰	XII:419	114 [6]	adds <i>ḥal.</i>
vii. Ingredient's name changed ³¹	XII:392	98 [20]	<i>papp.</i> → <i>šipk.</i>
viii. Ingredients amalgamated ³²	IX:96	98 [12]	<i>sasq.</i> + <i>papp.</i> → <i>šipk.</i>
ix. Ingredient broken into many ³³	XI:180	114 [9]	<i>papp.</i> → <i>papp.</i> + <i>sasq.</i>
x. Unusual reshuffling ³⁴	XII:317	71 [7]	NINDA.KUM → <i>šipk.</i>
xi. Unusual reshuffling with error	XII:316	71 [6]	
xii. Careless listing of ingredients	XII:635:5	193 [13]	Ī.GIŠ vs. Ī.NUN
xiii. Dates ³⁵	XII:393	98 [27]	'original' has 24th (see below)

b) Within this category, in which 'originals' and list's entries are compared, we may evaluate and compare single texts which give a monthly total of food outlay, published in ARM IX, XII, and to a lesser extent, in ARMT XI, with the grand totals given in specific lists. Unfortunately, few of these monthly summaries are either dated to the year in which the tallying is made or complete enough in preservation to allow useful discussion. XII:449, which spans 3 months in the year 'Census', would be ideal for our purposes, except that grand totals in the equivalent lists (e.g. IX:114) are missing. However, we could point to the following as examples:

(+3); XII:526 168 [14] (+4); XII:630—193 [7] (copying); XI:114—212 [24] (+3); XII:295—216 [3] (+12); XII:301—216 [9] (+10); XI:123—216 [14] (+45).

²⁷ IX:63—71 [5] (+2); XI:167—98 [5] (−3); XII:394—98 [28] (+10); XII:633—193 [13] (−1).

²⁸ IX:64—71 [11]; VII:155—160 [22]; IX:155—160 [17]; XII:525—168 [13] (flagrant!); XII:593—185 [11]; XII:630—193 [7]; XII:277—212 [16]; XII:297—216 [5]; XII:299—216 [8]; XII:302—216 [17].

²⁹ IX:161—168 [4]; XII:618—217 [10].

³⁰ List expanded. XII:419—114 [6]; XI:180—114 [9]. List shortened without affecting total. XII:591—185 [3] (*alap.*); XI:244—185 [5] (*ḥal.*).

³¹ E.g. XII:392 (*papp.*)—98 [20] (*šipk.*); IX:163 (*isq.*)—168 [8] (*sasq.*). Not uncommon procedure.

³² See also note 22, above. XII:394 (*papp.* + *ars.* + *app.* + *sasq.*)—98 [27] (*šipk.*); XI:167 (*isq.* + *sasq.*)—98 [5] (*šipk.*); IX:155 (*šipk.* + *ḥal.*)—160 [17] (*šipk.*); VII:151 (*isq.* + *sasq.* + *papp.* + *ḥal.*)—160 [22] (*šipk.*); XII:521 (*isq.* + *ḥal.*)—160 [29] (*šipk.*). Other examples can readily be collected.

³³ XI:180 (*papp.*)—114 [9] (*papp.* + *sasq.*); XII:594 (*isq.*)—185 [13] (*isq.* + *sasq.*).

³⁴ XII:317—71 [7] (includes N.K. into *šipk.*); XII:318—71 [8] (includes *emš.* into *šipk.*); IX:95—98 [7] (reordering); XII:444—121 [Hib. 6] (shuffling N.K. and *emš.*); VII:151—160 [22] (includes *emš.* into *šipk.*); IX:161—168 [4] (different terms for ingredients); XII:526—168 [14] (*isq.* incorporated into *emš.*).

³⁵ IX:162 (6th!)—168 [9] (note XII:522—9th!).

1) XII:199 partially preserved monthly tabulation for the month Malkānum of 'Šamaš'. This differs only very slightly [XII:199:1, 5 vs. IX:219:iv:44, 50] from the accounting given in list IX:219.

2) IX:224 is a pockmarked, undated, monthly tally stretching from Bēlet-biri to Ebrum. XII:547 gives us a reduplication of these listings [but cf. IX:224:2 vs. XII:547:2] for the same months, but expands into Uraḥum, hence into the following year. The whole text is dated to 'Dūr Yaḥdun-Lim', but because we cannot recover the perspective from which the scribe is operating, it is not possible to be certain whether the months before Uraḥum—and hence the listings within IX:224—are to be assigned to the year preceding 'Dūr Yaḥdun-Lim', 'Census'.

Whichever choice we make concerning the year-name for Bēlet-biri-Ebūrum, we nevertheless face problems when trying to match the totals of these monthly accounts with those of surviving grand totals found in lists. Thus the grand total of IX:98, which tallies outlays for Kiskissum, 'Census', does not match their supposed equivalent in XI:224/XII:547; nor does that of Ebūrum of 'Dūr Yaḥdun-Lim' (IX:168) match those of IX:224/XII:547.

2. *Reconstructions of selected examples of discrepancies.* It would be fair to state that many of the discrepancies and errors presented under II D 1 a [Types of discrepancies or errors] can be provided with reasoned, tailor-made, explanations which would account for their origin. I try my hand at only a few, but caution that these reconstructions ought not inspire blind confidence.

a) *Different totals in the 'original' and list, each correct.* IX:168 [Rm 111!] and IX:95 [Rm 5] record outlays for 7 Kiskissum, 'Census'. Of these, the scribe chose IX:95 to incorporate within IX:98 [also found in Rm 5].

'Original', IX:95		List, IX:98 [7]	
1.	0.1.15 N.K.	1.	0.1.15 N.K.
	0.0.7 N. <i>emš.</i>		0.0.7 N. <i>emš.</i>
	0.0.1 N. <i>mer.</i>		0.0.4 N. <i>mer.</i>
	0.0.4 <i>isq.</i>		0.0.6 <i>šipk.</i>
5.	0.0.2 <i>sasq.</i>	5.	0.0.2 <i>pul.</i>
	0.0.2 <i>ḥal.</i>		
	0.0.1 <i>app.</i>		
	0.0. ¹ / ₆ <i>šamaš.</i>		0.0. ¹ / ₆ <i>šamaš.</i>
	total: 0.1.32 N.		total: 0.1.34 N.

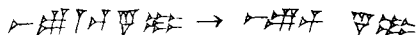
- i. scribe copies first two lines exactly,
- ii. compacts lines 3, 6, and 7 of 'original', to save space probably, into l. 3 of list,
- iii. compacts lines 4, 5 into line 4 of list,

- iv. *repeats* 'original's' line 6 [*hal.*], already accounted in step ii, as *pul.*,
v. adds and corrects list's own total.

b) Different totals in the 'original' and the list, both incorrect

1) 'Original' IX:119 [28 Abum. 'Census']	List, IX:121 [28]
1. 0.1.1 N.K.	1. 0.1.10
0.0.6 N. <i>ems.</i>	0.0.6 N. <i>ems.</i>
0.0.5 <i>isq.</i>	0.0.5 <i>isq.</i>
0.0.2 <i>sasq.</i>	0.0.2 <i>sasq.</i>
total: 0.1.13 [<i>sic</i>] N.	total: 0.1.24 [<i>sic</i>] N.

- i. Scribe's eye skips over 3rd sign of 'original's' line 1, and thus gets 0.1.10,



- ii. lines 2 and 3 are copied as are,
iii. 'original's' total is corrected mentally to *0.1.14,
iv. and the 0.0.10 addition in line 1 of list is automatically incorporated into the 'corrected' total of the 'original': *0.1.14 + 0.0.10 = *0.1.24.

2) 'Original', XII:320	List, IX:71 [13 <i>sic</i>]
1. 0.1 ¹ / ₂ .20 N.K.	1. 0.1 ¹ / ₂ .20 N.K.
0.1.0 N. <i>mer.</i>	0.1.0 N. <i>mer.</i>
0.0.23 N. <i>ems.</i>	0.0.25 N. <i>ems.</i>
0.0.11 <i>šipk.</i>	0.0.11 <i>šipk.</i>
5. 0.0.12 <i>šamn.</i>	5. 0.0.12< <i>šamn.</i> > 0.0.1 <i>him.</i> 0.0.2 <i>dišp.</i>
0.0.2 <i>dišp.</i>	
0.0.10 <i>šamaš.</i>	0.0.10 <i>šamaš.</i>
0.0.1 <i>him.</i>	
total: 0.3.4 [<i>sic</i>] N.	total: 0.3.10 [<i>sic</i>] N.

The matter is complicated by the fact that the list's 71 [13] is obviously based on an original which is dated to the 14th! It seems to me plausible to hypothesize that the scribe, in possession of two 'originals' for the 14th [XII:320 -evening²; XII:321 -morning³], and apparently none for the 13th, merely allocated these texts to different daily entries within a list. Note that IX:71 [14] obviously depends on XII:321, but it can be seen that our scribe misread or miscopied the total for his list. With this point in mind, we can offer the following reconstruction:

- i. copies lines 1 and 2 as are,
ii. unaccountably (error in reading?) reads 0.0.2) in line 3,
iii. copies line 4 as is,
iv. saves space by placing lines 5, 6, and 8 of 'original' in one line of the list,
v. copies line 7 as is.

—Because of his compacting and his reshuffling, the scribe was forced to reconsider the total. He did note that the scribe of the ‘original’ obtained his own total by, unusually, including the 0.0.10 *šamaš*.—

vi. Proceeding from his own presentation, the list’s scribe included everything in the first 5 lines, except for the *himētum*.

c) Herein are mentioned a few cases where a reconstruction is plausible. **1.** XII:591, an ‘original’ for 3 IGI.KUR, ‘Dūr Yaḥdun-Lim’, contains a number of erasures. In preparing the list, IX:185 [3], its scribe copied the *erased* text of line 3, ignored the entry of line 5 [*alap*.], but copied the corrected total of 1. 9. **2.** IX:155, 7 Kiskissum, ‘Dūr Yaḥdun-Lim’ is entered into IX:160 [7]. In order to save space, the scribe had compacted the ‘original’s’ lines 5 and 6 [0.0.12 *šipk.* + 0.0.2 *hal.*] into the list’s iii:19’ [0.0.14 *šipk.*]. In entering the next line, the ‘original’s’ 0.0.12 *šamn.*, the scribe carelessly reproduced the new amount he had just computed for the preceding line. Note that, however, the scribe corrects the error manifest in the ‘original’s’ total. **3.** XII:393 is dated to the 24th Kiskissum, ‘Census’ and is reproduced in IX:98 as the 27th. In his note for the ‘original’, Birot, ARMT XII, p. 141 n. 3, considers this to be an “*erreur du scribe pour 27*”. But this assessment can be correct only if one assumes that the scribe of the list has means at his disposal to recognize that an ‘original’ was dated incorrectly when it was first created. This would clearly be an unreasonable assumption, unless one is to believe either that the scribe wrote the original on the basis of the list or that he formed both at about the same time. Much more plausible is the possibility that the scribe, unable to put his finger on an ‘original’ for the 27th day, simply used a text that tallied the evening meal of the 24th, while placing in its correct sequence the text which recalled the morning meal of the 24th (cf. 98 [24]). **4.** Outlays for various festivals and cultic activities are often recorded in ‘originals’ and in monthly lists. The *kispum* funerary meal took place at least twice monthly. Monthly lists which often double the amounts allotted in ‘originals’ for the *kispum* may in fact merely be saving spaces by incorporating into one entry a number of occurrences which stretched during the month. However, the case of those activities destined *ana zura’im*, *ana malikī*, *ana tuḥimātīm*, are quite unusual; for they were scheduled, as far as can be gathered, no more than once monthly. Thus when a list differs from the ‘original’ which contains outlays for these ceremonies, it invites inclusion among other discrepancies. Compare IX:123 with IX:121:v:42-44; XII:214:vi:25.

III. CONCLUSIONS AND QUERIES

The exercise to which the above paper belongs is not one which yields definite and definitive conclusions. Indeed, the presentation of the evidence, on its own

merit, should shape the nature of the problem and gauge the perimeters of its resolution. Thus even when we make allowance for the complications that beset any accounting technique—inaccurate ‘originals’, incomplete data, desire to save space, unclear copies, peculiar sequences—we nevertheless note that, in the matter of the *n. šarrim* documentations, the Mari scribe did not feel inordinately constrained to be accurate in registering outlays of food, and in computing their totals. This situation was encountered whether our scribe was filling ‘originals’ or transferring into lists. We find numerous examples in which he calculated inaccurately, copied carelessly, shuffled indiscriminately, and resorted to short-cuts measures to save linear space or to fill temporal gaps. Those peculiarities, it should be emphasized, were not limited to overly complex situations or prototypes (cf. XI:65, a childishly simple account); nor do they seem inspired by a desire to harmonize contents. No doubt the extent to which discrepancies are entered depended on the quality of work which individual scribes produced. Thus, while we could point to a few lists which were tolerably accurate (IX:109, 114, 193), others can be shown to be riddled with inaccuracies (IX:71, 98, 168, 216). A careful analysis of the handwriting might permit us to distinguish between these two categories of production.

But our main task now is not to translate the columns of findings in the previous pages into narrative prose, but rather to suggest that this evidence, focused as it is on a specific archival transaction, raises important, if not always answerable, questions regarding the function and purpose of record keeping at Mari. Some of these queries refer to the purely mechanical aspect of this enterprise. Can we always presume that the Mari scribe had at his disposal an ‘original’ when he worked on a list? Can we, moreover, always assume that the transfer of information went only in the direction of ‘original’ to list? No doubt the greatest portion of our texts went along this normal path. But what are we to make of the many examples in which the daily entries in a list contain fuller information than those provided in an ‘original’?

In a previous essay (*Iraq*, 34 (1972) pp. 55-67), I have tried to show that the Mari bureaucrat did not find it easy to recover specific texts, not only because he may have been unalphabetic, but because of the lack of personnel who could read and write, and because the archives were scattered in haphazard collections all over the palace. As indicated above, the *n. šarrim* texts were placed in at least 5 different rooms. Might it not be possible, therefore, that, as he transferred ‘originals’ into lists, the scribe occasionally found it difficult to locate the needed documents, and easier to juggle those accessible. While we could easily imagine our scribe, under these circumstances, to have resorted either to imagination or to a well-remembered pattern when he expanded the contents within a monthly account, it might yet not be improbable that, faced with the absence of a

particularly dated document, the scribe may have still proceeded with filling, in the proper slot, a fictitious entry, and have “covered his tracks,” by producing an ‘original’ to suit the occasion.

This radical, if not cynical, proposal would gain in likelihood were we to know a bit more about the working habits of the scribe. A crucial question concerns the time lapsed between the production of an ‘original’ and its transfer into a list. We have hints that this time lag may have been appreciable. To begin with, all these types of accounting texts—‘originals’, monthly lists, monthly totals, memoranda, even the few cases of ‘brouillons’—must have played a role in facilitating the task when, after much time, information was to be recorded, transferred and stored. Then too we might find it indicative that no lists has (so far?) been found which stem from repeat year-formulae (MU.2.KAM), even though we occasionally come across ‘originals’ so dated. This might allow us to suppose that the chancery awaited the new formulation for a given year—which at times occurred after the lapse of half a dozen months—before returning to the task of compiling monthly accounts.

But a more portentous series of inquiries can yet be posed at this point. Why, after all, is the Mari scribe devoting so much energy to the task of categorizing, recording, and transposing all this information? If, even at this stage of research, it could be that the enterprise had a definite purpose and goal in mind, we might yet understand the many discrepancies, inaccuracies, and oddities which are found in our texts. Thus, if it could be shown that the aim was to balance, daily, monthly, yearly, the incoming supplies of foodstuff—whether taxed or grown in the king’s private land—with the outgoing rations, then we might even sympathize with the plight of scribes eager to keep the books neat and orderly. But this perspective would face the difficulty of explaining a recording and accounting technique which registers into lists only half of the available ‘originals’, which displays an ingratiating lack of consistency in reshuffling the contents of these ‘originals’, which displays no inhibitions to calculate, either above or below, sums and totals given in those ‘originals’. We might even puzzle over an administration which finds it useful, perhaps even necessary, to track, correctly or otherwise, transactions—say of oil—for over 30 months.

I have, now and then, shared my perplexity with friends and colleagues whose areas of concern differed appreciably from mine. It was disconcerting, initially at least, how often a knowing smile would precede a sarcastic answer: “Who’s looking over their shoulders,” they would ask, “if not an other scribe?” I must admit that, as far as Mari is concerned, I can’t provide them with adequate responses. And, not being able to do so, I often bite my lips, and hope that future evidence will come to vindicate the reputation, ever so slightly sullied, of Old Babylonian scribes.