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## Production and Trade in the Old Assyrian Period

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- H. Waetzoldt, *Untersuchungen zur neusumerischen Textilindustrie*, Roma, 1972.
- H. Waetzoldt, H. Hartmut, recensione a McG. Gibson, R.D. Biggs, *The Organization of Power: Aspects of Bureaucracy in the Ancient Near East*, *JAOS*, 88, 1991, pp. 637-641.
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## Production and Trade in the Old Assyrian Period

This paper investigates the economic role of Aššur during the Old Assyrian period, especially during the 19<sup>th</sup> century, focusing on its textile production, and the organization of its long-distance trade to Anatolia<sup>1</sup>. The Old Assyrian period, which covers more or less the first three centuries of the 2<sup>nd</sup> millennium BC,<sup>2</sup> is closely linked to the development of the city of Aššur, on the Tigris River (northern Iraq), as a trading city. Aššur was one of the main centers of an international exchange network linking southern Mesopotamia and Elam with Upper Mesopotamia and Anatolia. Because of its strategic position, Aššur's role in international trade may have started earlier. Its first occupation dates to the beginning of the 3<sup>rd</sup> millennium. According to written sources, Aššur was successively conquered by the Akkadian and Ur III dynasties. With the fall of Ur III, it became an independent city state dominated by an oligarchy of merchants. During the Old Assyrian period, Aššur covered some forty hectares and its population presumably numbered several thousands of inhabitants (Veenhof 2010).

The archaeological discoveries for this period remain rare and scattered. Besides a few school texts, Aššur did not produce any tablets for the Old Assyrian period, and the commercial quarter has not been identified. The main constructions dated to this period, especially the old palace and the temple dedicated to the god Aššur, contained some thirty official inscriptions. These show that the development of the Assyrian trade in central Anatolia could have been

the result of Assyrian royal policy. Ilušumma, who ruled Aššur during the very beginning of the 2<sup>nd</sup> millennium, took political measures in order to improve the relations between Aššur and southern Mesopotamia and to attract traders from the South by giving them some privileges (Grayson 1987, 18, pp. 49-54; Larsen 1976, p. 63). This may have stimulated the import of copper and Babylonian textiles from the South. Another measure ordained by Erišum (1972-1933), his son and successor, was intended to set up a free traffic of many goods traded by Aššur inhabitants; among these goods, references to gold, tin and wool indicate links with overland trade (Grayson 1987, 22, pp. 20-25; Larsen 1976, pp. 64-75).

Under the reigns of Ikūnum (1932-1918) and his son Sargon I (1917-1878), the Assyrian merchants developed the long-distance trade to central Anatolia. They settled in Anatolia, in thirty to forty trade colonies (*kārum*, and smaller settlements called *wabartum*). The central trade bureau (*bēt kārim*) of this network was located at Kültepe, ancient Kaneš, northwest of Kayseri. There, in the lower town, 22.500 clay tablets were excavated in the merchants' quarter, most of them dating to the first half of the 19<sup>th</sup> century (Michel 2003, 2006a, 2011). These private archives, predominantly belonging to Assyrians, represent our main sources for the reconstruction of the socio-economic history of the Old Assyrian period. During the reigns of Puzur-Aššur II (1877-1870), son of Sargon, and his own son Narām-Suen (1869-1835?), the Assyrian trading colonies in Anatolia had to contribute up to ten minas of silver (5 kg) to the repairs of Aššur city walls (Michel 2001a, no. 15).

During the second half of the 19<sup>th</sup> century, the trade with Anatolia slowed down a little, then increased, perhaps after the conquest of Aššur by Šamšī-Adad, king of Ekallātum, in 1808 BC. This great king, who dominated the whole northern Mesopotamia from Šubat-Enlil, in the Habur triangle, shared his kingdom with his two sons: Išme-Dagan, at Ekallātum on the Tigris River, and Yasmah-Addu at Mari, on the Middle Euphrates. Aššur did not hold the status of a capital but still played a preeminent economic role until the end of the Old Assyrian period, around 1700 BC.

### 1. *What did Aššur produce?*

During the Old Assyrian period, Aššur was not yet a territorial state, and had no raw materials. Its strategic position at a major crossroads for various trade routes explains the economic power of the city, which played an important role as intermediary. Aššur exploited a section of the tin and precious stones road between East and West; it also exported textiles from south Mesopotamia to Anatolia. The private archives of the Assyrian merchants discovered in the Kaneš lower city, mainly motivated by the long-distance trade, do not document other aspects of the ancient Assyrian economy. They depict Assyrians devoting most of their time to commerce, and give few hints to their everyday occupations in Aššur. However, letters show the Aššur women, in the absence of their husbands, buying grain in markets and shops for their own consumption. Real estate purchase contracts, which concern mainly Kaneš and vicinity, deal almost exclusively with houses. When land is concerned, sellers and buyers are all Anatolians. Since merchants were not interested in land, we have almost no data about agriculture and breeding, except a few instances limited to the Anatolian milieu. As for Aššur, the breeding of donkeys for caravans is sporadically mentioned. The only Aššur production documented in detail by the Old Assyrian sources concerns textiles, both for consumption and for export to Anatolia.

#### 1.1. *Grain for Assyrians*

Letters sent by the Aššur women to their husbands in Anatolia refer occasionally to the purchase of grain, after the harvest, for the consumption of their households. Lack of means to buy barley, the basic food item, was one of their principal worries: «After you had gone, there was a severe famine in the City (of Aššur and) you did not leave me barley, not even a single liter! I keep buying barley for our sustenance [...] Now, I am living in an empty house. The (harvest) season is now! Be sure to send me the silver you have in exchange for my textiles, so that I can buy barley, about 10 *šimdu* measures (ca. 300 l.)» (Michel 2001a, no. 344:14-18, 31-38). Stocks could be substantial in some private houses: when Pūšu-kēn's wife, Lamassī died, there

were 1300 barley measures stored in her house (TC 1, 30:7). Grain, ground into flour, was used to make various kinds of bread. It was also the main ingredient of beer.

Texts are silent concerning cultivated lands around the city, the peasants working on these lands or the provisioning of Aššur. However, letters mention the existence of markets, stalls and street shops for basic commodities; a larger marketplace could have also existed nearby the city gate. The City Hall sold barley to individuals, among other foodstuffs, and there was an 'eponym of barley' (Dercksen 2004, p. 23).

In Kaneš, the Assyrian merchants could buy agricultural products and animals at the local market on the citadel, all the production being organized by Anatolians and the local palace (Dercksen 2008; Michel 2014a). Some Assyrians, married to Anatolian women, benefited from the agricultural work of their wives in fields or from the oxen and pigs they bred (Michel 2008a).

### 1.2. *Donkeys for caravans*

The regular trade between Aššur and Kaneš involved huge caravans of donkeys carrying tin and textiles one way, gold and silver the other way. According to the Mari royal archives, such caravans could number some 300 donkeys (ARMT 26/2, no. 432). The Old Assyrian caravan accounts, drawn up in Aššur, mention the purchase of merchandise for export and of robust black donkeys used as beasts of burden, which could carry some 75 kg (Larsen 1967, pp. 37-43; Veenhof 1972, p. 45).

Aššur was surrounded by meadows used as pasture for donkeys. These were bred and sold in a place called *gigamlum*, near Aššur (TC 2, 7:12). Such places presumably existed also in Kaneš and in all the commercial settlements. There is no data about those in charge of the breeding of the donkeys, either private or institutional. A black donkey cost 16-17 shekels of silver at Aššur (Garelli 1963, pp. 299-300), and its equipment some 2-3 shekels. The equipment consisted, according to J.G. Dercksen, of «one or more rugs or saddlecloths that were put under the packsaddle, a packsaddle or packing-rack, leather bags, ropes and pegs, as well as straps or ropes to fasten the packsaddle» (Dercksen 2004, pp. 277-278). There might have been, in Aššur, a

specialized production of leather bags, ropes, rugs and packsaddles for donkeys. During travel, there were some expenses for paddock and fodder, and for the salary of the donkey driver.

In Anatolia, some of the donkeys were sold with the merchandise, because caravans coming back to Aššur carrying gold and silver were smaller. A donkey (and its equipment, but without the leather bags) was sold for 20 to 30 shekels. Profit from the sale of the donkeys was not always as high as expected because some donkeys died on the way, in the mountains, or were stolen (Michel 2008b, pp. 383-384).

### 1.3. *Textiles for trade*

#### 1.3.1. *Private production*

Among the textiles exported by the Assyrians to Anatolia were imported pieces from Babylonia and textiles locally produced at Aššur. Women's letters sent to their male relatives at Kaneš document their private textile production, which had two goals: clothing household members and sustaining the long-distance trade (Michel 2006b).

Spinning and weaving were the main activities of all the women of the house, including girls, elderly women and female slaves, perhaps, in wealthy houses, a dozen or more. Texts give data about the dimensions of the produced textiles, their variety, quality, number and prices, but they do not tell much about the organization of production. Assyrian fashions and techniques were much appreciated in Anatolia, where these textiles were considered prestigious goods and mainly sold to the elite (Michel 2014b). Assyrian merchants present on the Anatolian markets gave, from time to time, technical advice to their wives to improve their production. Textiles had to be thin and dense, and, those for export, when finished, measured 4.5 × 4 meters. Hence, they were not woven in one piece. Merchant accounts dealing with the transport of textiles to Anatolia indicate that each piece weighed about 5 pounds (2.5 kg), but letters show that this could be plus or minus one pound of wool.

Women bought raw wool at the city gate of Aššur; some Aššur inhabitants or institutions may have owned herds of sheep. According to the Mari royal archives, nomads came each year from the Suhûm area, southeast of Mari, to pluck

their sheep near the city (Charpin, Durand 1997, pp. 377 and 387-391; Michel 2014c). The most common type of Assyrian fabric exported to Anatolia, the *kutānum*-textile, could be woven with wool from the Hamrin Mountains, southeast of Aššur (Dercksen 2004, p. 16; Michel, Veenhof 2010, p. 221). When there was a shortage, wool could even, exceptionally, be sent in small quantities from Anatolia: «When you send the purse, enclose some wool (because wool is expensive in the City» (Michel 2001a, 305:16-21). Indeed, there were important wool markets southeast of Kaneš, and many texts attest to the involvement of Assyrians in the Anatolian wool trade (Michel, Veenhof 2010, p. 216; Lassen 2010, 2014).

Texts do not give much data about technical aspects of the private textile production at Aššur. For these, we rely on Ur III administrative archives (Waetzoldt 1972, 2010), and archaeological tools and experiments, especially those made at the Centre for Textile Research at Copenhagen (Andersson Strand 2012).<sup>3</sup> Women had to clean and prepare the wool for spinning: to obtain the 5 pounds of cleaned wool necessary to weave an Assyrian textile, it would have taken some 20 days. The spinning, made with spindle and spindle whorl, was a long process. A textile of 4 × 4.5 meters (18 m<sup>2</sup>) required some 36 km of thread (plus some 1.8 km for the setting of the looms), which were obtained by a single woman spinning for 96 days, thus more than three months. According to experiments, one person can weave about 50 cm per day, depending naturally on the width of the loom. If we suppose that the fabric was woven in two strips of 2 meters each, which were then sewn together, two women were necessary to set up the two looms during some 4 days, and two women would complete the textile in 10 days. Postulating that textile production was performed throughout the year – this is most probable when international trade is concerned – a woman would have been able to weave at most 2 ½ such textiles a year. A wealthy household would then have been able to produce a maximum of 25 textiles a year.<sup>4</sup> Out of these, some 5 pieces would be necessary to dress the household members in Aššur and Kaneš, and there were at most 20 textiles sent to be sold in Anatolia.

The textiles produced by the women of Aššur and sold on the Anatolian market by their male relatives assured them an income. The standard *kutānum*-textile was sold for

15 shekels apiece at Kaneš. Once all the taxes deducted, women could hope to get back 10 to 12 shekels apiece. From this price, one has to deduct the price of the raw material. According to a royal inscription of Šamši-Adad dated to the 18<sup>th</sup> century (Grayson 1987, A.0.39.1:59-72), for one shekel of silver, one could buy in Aššur 15 pounds of (raw) wool.<sup>5</sup> Taking into account that during the cleaning process there could be a loss of 30% of the original wool, with 1 shekel of silver it might have been possible to acquire about 10 pounds of cleaned wool, which could be used to weave 2 textiles. With the income of 1 textile, corresponding to 10-12 shekels of silver, a woman could buy wool to produce 20 to 24 more textiles. But usually, at most one third of the sale price of a textile was invested in the purchase of wool to produce 6 to 7 pieces. These estimates lead to the hypothesis that a household producing yearly some 20 textiles sent for trade in Anatolia would receive between 3 1/3 and 4 pounds of silver per year as gross income. Such an amount corresponded to the price of a small house in Aššur (Veenhof 2011, p. 226). With this silver, women could buy wool to make more textiles, as well as slaves, food, and goods for daily life. A few texts from Late Bronze Age Aššur show that such a profitable business went on during the Middle Assyrian period as well (Postgate 2014).

### 1.3.2. *Did an institutional textile production exist at Aššur?*

It seems clear that the textile production of Aššur households exceeded their needs; the surplus was sent to Anatolia, thus contributing to the international trade. But the demand of the Assyrian merchants was very high and difficult to combine with weaving of textiles for home use, as we understand from many women's letters. Lamassī wrote to her husband that she could not fulfill his demands: «You keep sending me consignments (of silver); but, here, I cannot send you (in return) each time textiles that (are) weighty» (Michel 2001a, no. 343). With some twenty textiles exported each year by wealthy Aššur households, we may imagine that at least one thousand textiles privately produced were sent yearly to Anatolia. These were not enough to supplement the few thousands of textiles exported each year by Assyrian merchants to Anatolia.

This is why it has been suggested that a centralized and institutional textile production existed at Aššur during the Old Assyrian period (Dercksen 2004, p. 16), as was, for example, the case at Mari, during the Old Babylonian period (Durand 2009), or at Aššur during the Middle Assyrian period (Postgate 2014). However, lacking official archives from the Old Assyrian Aššur, we have no data about such a centralized textile production. Texts do not mention the purchase of large amounts of wool by local institutions. There is no attested weaving shed at the palace or at temples in Aššur (Michel 2014c). The few textiles that were sold by Aššur eponyms or by the City Hall could have been previously bought by the Town Hall from Babylonian merchants (Dercksen 2004, pp. 14-15). By contrast, tablets document the import of numerous Babylonian textiles (called Akkadian textiles), which supplemented the local production for the trade to Anatolia. These could be in short supply on the Aššur market because of political troubles: «As for the Akkadian textiles you wrote about, since you left, Akkadians have not entered the city, their country is in revolt» (Michel 2001a, no. 110:5-8). The reputation of Babylonian textiles was built on the quality of weaving, enhanced by the excellence of their wool, as Mari letters witness (Durand 2009; Michel 2014c).

### 1.3.3. *Specialization in textile production*

Even if we suppose that Aššur textile production was predominantly private, there were, however, some specialized craftsmen to whom the women took their textiles for cleaning. This last step in the *chaîne opératoire* involved at least the textiles sent as garments for the Assyrian merchants living in Anatolia, as we learn from a letter wrote by Lamassī to her husband: «As for the textile (made of wool) from Šurbu about which you wrote me as follows: 'Send me a garment for me to wear', the garment has indeed been made, but (it is) now with the washer man (*ašlākum*), so I have not yet sent (it) up to you. I will send up to you by a later (caravan) the textile (made of wool) from Šurbu for you to wear» (unpubl. tablet Rendell quoted by Michel & Veenhof 2010, p. 249). Nothing is said about the textiles made to feed the international trade; these just

as well been cleaned in Anatolia, where several washer men are known (Michel forthcoming).

## 2. *The Old Assyrian long-distance trade to Anatolia*

The Old Assyrian long-distance trade to Anatolia was based on caravans making two round trips per year between Aššur and Kaneš. It was based on partnerships, trade companies and family networks. Controlled and promoted by the authorities via commercial treaties, it benefited Aššur merchants and notables, as well as the King and the temples.

### 2.1. *A caravan trade*

Assyrians exported to Anatolia tin from Uzbekistan or Tajikistan (Weisberber, Cierny 2002), lapis lazuli from Afghanistan (Michel 2001b), carnelian from the Indus valley and textiles from Babylonia; as seen above, only some of the exported textiles were produced in Aššur. Merchandise was transported on donkeys for a travel lasting some six weeks through steppes and mountains. A merchant normally loaded an average of two to five donkeys (Larsen 1967, pp. 146-147). Small convoys gathered into a large caravan under the responsibility of a merchant, helped by freightors and donkey drivers.

The purchase of tin and textiles in Aššur depended on their availability on the market. Tin was usually bought from 12 to 16 shekels of tin per shekel of silver; in Anatolia, it was sold for twice this price (Garelli 1963, pp. 265-317; Veenhof 1988). The *kutānum*-textile was bought in Aššur for between 3.5 to 6.5 shekels of silver apiece and was sold for three times this price in Anatolia. In period of war or bad weather, the Aššur market was not resupplied with tin and Babylonian textiles, so prices increased (see above and Michel 2001a, no. 108, 110).

For accounting purposes, the total value of the merchandise was converted into tin with an equivalence of 2 minas of tin per textile and 1 mina of tin per donkey; the total value of the biggest caravans exceeded 410 talents of tin (12 1/3 tons, VS 26, 155). Such a conversion was useful, to compute, for example, the liability of each participant for

TABLE 1. Table of the various taxes imposed on Assyrian caravans

Which tax?	Where?	To which institution?	How much?
<i>wašītum</i> export tax	Aššur	Town Hall	1/120 of the value in tin of the caravan
<i>dātum</i> caravan tax	<i>En route</i>	local authorities	10% of the value in tin of the caravan
<i>qaqqadātum</i> personal tax	<i>En route</i>	local authorities	10-15 shekels of tin per person
<i>nīshatum</i> import tax	Kaneš	local palace	3% of the tin and 5% of the textiles
<i>īsrātum</i> tithe	Kaneš	local palace	purchase of 10% of textiles at reduced price
<i>šaddu'atum</i> transport tax	Kaneš	<i>kārum</i> authorities	1/60 of the value of gold+silver going to Aššur
<i>nīshatum</i> import tax	Aššur	Town Hall	4% of the imported precious metal (gold+silver)

the many taxes paid to the authorities at Aššur, *en route*, and at Kaneš.

When in Kaneš, after clearing customs at the local palace, merchandise was sold for cash or on credit to agents travelling to other Anatolian markets. To increase profit, it could be converted into copper and wool before being sold for silver; part of the silver was then changed into gold. In Anatolia, tin was necessary for the bronze industry sustained by local copper mines (Dercksen 1996; 2005). Tin mines were also exploited in Anatolia (Yener 2000), but their production might have not been sufficient for the Anatolian needs in arms, tools and vessels.<sup>6</sup> On the way back, smaller caravans carried to Aššur consignments of gold and silver. Their value was estimated in silver; some were worth more than 400 kg of silver (Prag I, 742). The gold was hoarded or used to buy tin and lapis lazuli from Elamites, while silver was the main mean of payment: it was reinvested in further caravans and in various financial operations, while the remainder was spent to buy houses, slaves, food, etc. The substantial quantities of precious metals brought to Aššur attracted foreign merchants selling tin, precious stones and textiles.

## 2.2. Trade partnerships

The organization of Assyrian long-distance trade was based on partnerships in which there were mainly two categories of merchants: investors and agents charged with

making a profit with the invested capitals. Such enterprises could be risky for the shareholders, who sought agents with good reputations. Agents tried to build up this reputation, as Aššur-idī explained to his son Aššur-nādā: «People less important than you administer joint-stock investments, and people less important than I have invested 10 minas of gold. Come and take over a joint-stock capital and only then leave again» (Larsen 2002, no. 19). There were various types of contractual relationships for the purpose of commercial cooperation, either short-term or long-term (Michel 2001a, pp. 303-357). The joint-stock company (*naruqqum*) mentioned in this letter belonged to the second category; it governed relations between funders in Aššur and merchants in Anatolia, and was the primary mode of financing long distance trade (Dercksen 1999). This joint stock company, named for the bag (*naruqqum*) containing the capital, is the oldest form of putting substantial collective funds at the disposal of private merchants (Larsen 1977; Veenhof 1997; Veenhof 1999). The following contract gives the list of shareholders (including the agent), the value of the invested capital in gold (30 minas, thus 15 kg), the name of the agent (Amur-Ištar) and the length of the contract (12 years):

6 minas of gold: investments

1 ½ minas: Irišum

2 minas: Iddin-Aššur

2 ½ minas: Alāhum

2 minas: Šū-Labān

2 minas: Ikuppī-Ištar

2 minas: Ilī-dān

1 ½ minas: Aššur-malik

1 ½ minas: Aššur-idī

1 ½ minas: Akusānum

1 ½ minas: the *tamkārum*-creditor

1 mina: Abu-šalim

1 mina: Hinnāya

4 minas: Amur-Ištar

In all 30 minas of gold represent the *naruqqum*-bag of Amur-Ištar.

From the year-eponym of Susāya (1908), he will carry on commercial activities for 12 years.

Of the profits he will enjoy a third, he will guarantee another third.



The one who takes back silver before the end of the contract will take only 4 minas of silver per invested mina of gold. He will not receive any profit (Hecker 1999).

Each creditor had a copy of the section of the original document which concerned his own investment. In order to diminish risk, creditors distributed their investments among several such joint stock companies (TC 3, 244). During the whole contract, the agent had to guarantee to his funders a third of the realized profits on his commercial activities. When the creditors were satisfied, they could renew the agreement several times; shares in such companies could be inherited by funders' descendants.

Among the short-term commercial partnerships, loans with default interest were the most numerous; they often resulted from the credit sale of merchandise (*bābtum*). Such a loan extended usually a few months and never exceeded a year. Merchandise was entrusted to an agent against the credit tablet, the amount of the debt being converted into silver depending on the value of merchandise and the length of the credit (Michel 2013). The creditor got back the value of his merchandise in silver, while the agent kept the profit on the sale; he had to pay a default interest in case he did not manage to repay his debt on time. Loan contracts could also include the silver given to an employee as business capital (*be'ūlatum*), out of which he could profit. Investors were at the mercy of a dishonest trader who could disappear in Anatolia with the entrusted merchandise (Michel 1991, pp. 158-161). Again, the reputation of the agent was a key element in such a contractual agreement.

To reduce such risks, family links could offer bases of professional relationships; the Assyrian international trade relied on the extended family structure (Michel 2013). Merchant families were organized into so sort of enterprises in which each member in Aššur or Anatolia played a precise role. The father ran the enterprise from Aššur acting as a shareholder. His eldest son headed the Anatolian branch of the family network in Kaneš, receiving the merchandise and organizing its sale. The other sons represented the enterprise in other trading posts in Anatolia and the youngest ones acted as transporters. The women contributed to the trade by their textile production (Michel 2001a, pp. 359-418). However, in the family enterprise, every individual worked

for his own profit, there is no reference to family funds (Larsen 2007).<sup>7</sup>

### 2.3. A private trade promoted by institutions

The Old Assyrian trade in Anatolia was both controlled and promoted by the Aššur authorities, as has already been observed in some royal inscriptions (see above). Several decisions of the Aššur assembly, relayed by letters sent to Kaneš, show the involvement of this institution in the trade. It decreed some commercial rules, among which one prohibited Assyrians from selling gold to the different groups they traded with at Aššur (except to the Elamites) or on the road to Anatolia, including the Akkadians (Babylonians in the South), the Amorites (Upper Djezireh), and the Subarians (Hurrians in Upper Mesopotamia; Veenhof 2008b; Michel 2001a, no. 2). Other letters show its policy to protect and favor the Assyrian import of woolen textiles into Anatolia (Veenhof 2003a). Two merchants wrote to a colleague as follows: «Here (in Aššur) it has come to a lawsuit concerning *sapdinnum*- and *pirikannum*-textiles, woolen products, and many people have been fined. You too have been obliged to pay 10 minas of silver; you must pay one mina each year [...] Please do not get involved in (the trade in) *sapdinnum*- and *pirikannum*-textiles and do not buy them! [...] The ruling of the City is strict!» (Michel 2001, no. 199). The *sapdinnum* and *pirikannum* textiles were common textiles produced in Anatolia and much cheaper than those produced in Aššur. The trade of these textiles by the Assyrians in Anatolia was carried to the detriment of the normal Assyrian imported textiles. This protectionist rule might have been decreed for a limited period of time when the Assyrian textile trade was not going very well (Michel 2014b).

The Old Assyrian trade in Anatolia started and expanded in a peaceful context and was facilitated by commercial treaties concluded between Aššur and the local authorities; these treaties are unilateral, addressed to the Anatolian partner and do not really mention the duties of the Assyrians (Veenhof 2008a, pp. 183-218).<sup>8</sup> However, they all begin with the rights of the local party. On the caravans arrival, the local ruler is usually allowed to levy a percentage of tin and textiles as an import tax, to purchase a fixed quantity of textiles at a reduced price, and to make limited additional

purchases. On the caravans returning the Aššur, he may levy a tax on the silver. In return, he had to protect individuals and goods on his territory; in case of losses, he had to replace the merchandise, and in case of murder he had to deliver the murderer. Treaties could contain protectionist clauses meant to prevent competition by Babylonian traders. Assyrians were free to sell precious materials to the palace (lapis lazuli or native iron) and to travel even if the country was at war with its neighbors. Assyrians enjoyed extraterritorial rights in the *kārum*s, and were protected with their families against seizure of property (Veenhof 2008a, pp. 183-218; 2013). Even if these treaties were one-sided – Assyrians imposed their conditions and oath was only of the local rulers – Anatolian rulers were eager to conclude such treaties in order to get some profit out of the trade.

#### 2.4. Who benefited from long-distance trade?

With the help of caravan accounts, the amount of taxes imposed on caravan both ways and the gross interest obtained on the sale of merchandise in Anatolia, it is possible to evaluate the net profit realized by the Assyrian merchants at about 50%. A large part of Aššur and Kaneš population seems to have been involved in the trade, but the situation was not the same in the two cities.

Aššur inhabitants mentioned in the Mari royal archives are normally merchants. The Old Assyrian tablets, written by and for merchants, naturally offer the image of a city predominantly inhabited by merchants and entrepreneurs; there are rare mentions of other jobs necessarily exercised by Assyrians, such as various handicrafts (Michel forthcoming). However, benefits realized each year by the merchants seem to have devolved on to the greater part of the Aššur population (Michel 2008c). To the various commercial professions, we may add those who had a direct or indirect connection with the long distance trade, such as textile and leather craftsmen, donkey breeders, and messengers (Veenhof 2008c).

The Aššur king, like the other notables of the city, was privately involved in its international trade. Half of his letters addressed to his sons or to merchants, excavated in their archives at Kaneš, deal with consignments of merchandise to be sold in Anatolia (Michel in press). The

City Hall, whose authority took precedence over the king's, played a preeminent role in the trade: it sold goods to merchants, acted as a bank and public warehouse, collected taxes, controlled caravans and the traffic of some goods. The many taxes helped to enrich the city state. The Aššur eponyms, members of the elite, had various occupations not all connected to the long-distance trade: boatman, arms producer, butter maker; however, some were merchants (*tamkārūm*; Veenhof 2003b).

Temples also participated to the trade in Anatolia. From the gold and silver votive offerings (*īkeribū*) given by merchants, they invested in the trade by making funds or merchandise available to traders as long-term loans (Dercksen 1997). Priests were involved in international exchange, and merchandise was sometimes stored in their houses.

In Anatolia, across the Euphrates, communities welcomed the Assyrian merchants because they too found there a source of revenue. Trade led to the increase of local wealth via taxes imposed on foreigners activities and boosted the local economy with the crossing of large caravans in which men and animals needed food and places to rest (Barjamović 2011, pp. 1-37). Thus, local authorities tried to attract the Assyrians by giving them a privileged access to goods. As for the Assyrians in Kaneš, members of family firms based at Aššur, and eldest sons of families, their social status was determined by the prosperity of family affairs. They were usually less wealthy than their fathers in Aššur; some left substantial debts to their sons (Michel 2008d).

\*

The trade developed by the Assyrian merchants in the first centuries of the 2<sup>nd</sup> millennium BC between Aššur and Central Anatolia relied only partly on a local textile production; its main aim was to generate profit by serving as an intermediary for the trade of precious metals and stones, as well as of textiles. It was based on a vast network of contractual relationships and mutual representation, partly imposed by the distance separating Aššur from Anatolia. Shareholders invested in the purchase of merchandise, transported by a specialized personnel. Once in Anatolia, goods were entrusted to agents charged with their sale for profit. The silver resulting from the transactions was transported to Aššur and reinvested into new caravans.

The complex organization of this international trade influenced early historians and economists. K. Polanyi, in the fifties, used old historical synthesis of this documentation (by J. Lewy and B. Landsberger) to create his marketless administrated trade model. Judging that the *kārum* of Kaneš, mainly inhabited by Anatolians and gathering institutions governing trade relations, was not acting as a competitive marketplace, he concluded that it was an administrated port of trade, and that the main activities of its merchants belonged to the public service sector (Polanyi 1957). However, the population of the Kaneš lower city was mixed (Michel 2014d), and was engaged in a private trade based on family connections. The intervention of the Assyrian city state and the *kārum* authorities, via commercial treaties concluded with local kings, was intended to protect the interests of its merchants. The Aššur kings maintained a commercial policy in order to stimulate exchange and to avoid competition. This long-distance trade originated in a relatively peaceful context in Anatolia and thrived thanks to a balance between Assyrian economic power and Anatolian military and administrative power. In Aššur, most of the population benefited from the trade; notables held in turn the charge of eponym; free men, according to their status, belonged to the «big» or «small» men of the Aššur and Kaneš assemblies, which took most of the political and economic decisions linked to the trade. Some Assyrian merchants built large fortunes, as witness their graves excavated at Aššur.

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<sup>1</sup> I address my warmest thanks to Benjamin Foster who very kindly corrected the English of this contribution.

<sup>2</sup> The expression 'Old Assyrian' is conventional. It refers first to the dialect spoken at Aššur and by Assyrians in Anatolia, to their writing, thus to the tablets found in Aššur, Kaneš and several other sites. By convention, it also refers to

the kings ruling Aššur during the period documented by these tablets, and by extension, we use the expression «Old Assyrian period». This period is more or less contemporaneous to the Old Babylonian period. All dates mentioned in this contribution are BC and are to be understood as 'ca.'; they are given according to the so-called Middle Chronology, which places the end of the 1<sup>st</sup> Dynasty of Babylon in 1595. For Old Assyrian chronology, see now Barjamovic, Hertel, Larsen (2012).

- <sup>3</sup> The combination of experiments and data given by an Ur III text has been much debated, see for example Firth, Nosch (2012) and Andersson Strand, Cybulska (2013). For the use of traditional crafts, experiments, ancient tools and texts to reconstruct ancient textile production, see the proceedings presented on the web of the Amman conference on *Traditional Textile Craft – an Intangible Cultural Heritage*, March 2014 (<http://www.traditionaltextilecraft.dk/>).
- <sup>4</sup> Such a reconstruction is based on many assumptions, such as the number of active women per household, the time period during which women were producing textiles, the size of the textiles, the type of loom used by Aššur ladies, the density of a textile, etc. Despite these uncertainties, the estimated number of textiles produced per household fit with the textile shipments made by Lamassī to her husband Pūšu-ken during a limited time period, presumably a year (Michel 2001a, nos. 302-304, 307).
- <sup>5</sup> This price is similar to the one for common wool at Mari (Michel 2014c, pp. 244-246).
- <sup>6</sup> Recent explorations of the area of Kültepe carried by F. Kulakoğlu and A. Yener have highlighted the existence of tin mines on the foothills of the Erciğes Dağ.
- <sup>7</sup> The notion of individual property is omnipresent; there are many references to loans contracted between members of the same family: father and son, brothers, even husband and wife.
- <sup>8</sup> For level II, we have only a draft of a treaty (Michel 2001a, no. 87) while for level Ib, there is one badly preserved treaty found in Tell Leilan (Eidem 2011, no. LI5) and two others, discovered in 2000 in the Kaneš lower city (Günbatt 2004), concluded with the rulers of Kaneš and Hahhum. A detailed study of these treaties is now available in Veenhof 2013.

### References

- E. Andersson Strand, «The Textile chaîne opératoire: Using a Multidisciplinary Approach to Textile Archaeology with a Focus on the Ancient Near East», in C. Breniquet, M. Tengberg, E. Andersson (eds.), with the collaboration of M.-L. Nosch, *Prehistory of Textiles in the Ancient Near East, Paléorient*, 38, 2012, pp. 21-40.
- E. Andersson Strand, M. Cybulska, «Visualising Ancient Textiles – how to make a Textile Visible on the Basis of an Interpretation of an Ur III Text», in M.-L. Nosch, H. Koefoed, E. Andersson Strand (eds.), *Textile Production and Consumption in the Ancient Near East*, Ancient Textiles Series, 12, Oxford-Oakville, 2013, pp. 113-127.
- G. Barjamovic, *A Historical Geography of Ancient Anatolia in the Old Assyrian Colony Period*, Carsten Niebuhr Institute Publications, 38, Copenhagen, 2011.

- G. Barjamovic, Th. Hertel, M.T. Larsen, *Ups and downs at Kanesh. Chronology, History and Society in the Old Assyrian Period*, Old Assyrian Archives Studies, 5, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 120, Leiden, 2012.
- D. Charpin, J.-M. Durand, *Aššur avant l'Assyrie*, Mari. Annales de Recherches Interdisciplinaires, 8, Paris, 1997, pp. 367-392.
- J.G. Dercksen, *The Old Assyrian Copper Trade in Anatolia*, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 75, Istanbul, 1996.
- J.G. Dercksen, «The Silver of the Gods. On Old Assyrian *ikribū*», *Archivum Anatolicum*, 3, 1997, pp. 75-100.
- J.G. Dercksen, «On the Financing of Old Assyrian Merchants», in J.G. Dercksen (ed.), *Trade and Finance in Ancient Mesopotamia, Middle Eastern Studies Program Studies*, 1, Leiden, 1999, pp. 85-99.
- J.G. Dercksen, *The Old Assyrian Institutions*, Middle Eastern Studies Programme on the Economy of Ancient Mesopotamia, 4, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 98, Leiden, 2004.
- J.G. Dercksen, «Metals according to documents from Kültepe-Kanish dating to the Old Assyrian Colony Period», in Ü. Yalçun (ed.), *Anatolian Metal III*, Der Anschnitt, Beiheft, 18, Bochum, 2005, pp. 17-34.
- J.G. Dercksen, «Subsistence, Surplus and the Market for Grain and Meat at Ancient Kanesh», *Altorientalisch Forschungen*, 35, 2008, pp. 86-102.
- J.-M. Durand, *La nomenclature des habits et des textiles dans les textes de Mari*, Matériaux pour le Dictionnaire de Babylonien de Paris, 1; Archives Royales de Mari Traductions, 30, Paris, 2009.
- J. Eidem, *The Royal Archives from Tell Leilan. Old Babylonian Letters and Treaties from the Lower Town Palace East*, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 117, Leiden, 2011.
- R. Firth, M.-L. Nosch, «Spinning and Weaving Wool in Ur III Administrative Texts», *Journal of Cuneiform Studies*, 64, 2012 pp. 67-84.
- P. Garelli, *Les Assyriens en Cappadoce*, Bibliothèque archéologique et historique de l'Institut français d'archéologie d'Istanbul, 19, Paris, 1963.
- A.K. Grayson, *Assyrian Rulers of the Third and Second Millennia BC (to 1115 BC)*, The Royal Inscriptions of Mesopotamia Assyrian Periods, 1, Toronto, 1987.
- C. Günbattu, «Two Treaty Texts found at Kültepe», in J.G. Dercksen (ed.), *Assyria and Beyond. Studies Presented to Mogens Trolle*, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 100, Leiden, 2004, pp. 249-268.
- K. Hecker, «In nova...», *Archiv Orientalní*, 67, 1999, pp. 557-565.

- M.T. Larsen, *Old Assyrian Caravan Procedures*, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 22, Istanbul, 1967.
- M.T. Larsen, *The Old Assyrian City-State and its Colonies*, Mesopotamia, 4, Copenhagen, 1976.
- M.T. Larsen, «Partnerships in the Old Assyrian Trade», *Iraq*, 39, 1977, pp. 119-149.
- M.T. Larsen, *The Aššur-nādā Archive*, Old Assyrian Archives, 1, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 96, Leiden, 2002.
- M.T. Larsen, «Individual and Family in Old Assyrian Society», *Journal of Cuneiform Studies*, 59, 2007, pp. 93-106.
- A. Lassen, «The Trade in Wool in Old Assyrian Anatolia», *Jaarbericht van het Vooraziatisch-Egyptisch Genootschap Ex Oriente Lux*, 42, 2010, pp. 159-179.
- A. Lassen, «Wool in Anatolia in the Old Assyrian Period», in C. Breniquet, C. Michel (eds), *Wool Economy in the Ancient Near East and the Aegean: From the Beginnings of Sheep Husbandry to Institutional Textile Industry*, Ancient Textiles Series, 17, Oxford-Oakville, 2014, pp. 255-263.
- C. Michel, *Innāya dans les tablettes paléo-assyriennes*, Paris, 1991.
- C. Michel, *Correspondance des marchands de Kanish au début du II<sup>e</sup> millénaire av. J.-C.*, Littératures du Proche-Orient ancien, 19, Paris, 2001a.
- C. Michel, «Le lapis-lazuli des Assyriens au début du II<sup>e</sup> millénaire av. J.-C.», in W.H. van Soldt, J.G. Dercksen, N.J. Kouwenberg, Th. J. Krispijn (eds.), *K.R. Veenhof Anniversary Volume*, Leiden, 2001b, pp. 341-359 (<http://halshs.archives-ouvertes.fr/halshs-00350330>).
- C. Michel, *Old Assyrian Bibliography of Cuneiform Texts, Bullae, Seals and the Results of the Excavations at Assur, Kültepe/Kanis, Acemböyük, Alishar and Bogazköy*, Old Assyrian Archives Studies, 1, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 97, Leiden, 2003.
- C. Michel, «Le commerce privé des Assyriens en Anatolie modèle du commerce archaïque selon K. Polanyi», in P. Clancier, F. Joannès, P. Rouillard, A. Tenu (eds.), *Autour de Polanyi, vocabulaires, théories et modalités des échanges*, Colloques de la Maison René-Ginouvès, 1, Paris, 2005, pp. 121-133 (<http://halshs.archives-ouvertes.fr/halshs-00351790>).
- C. Michel, «Old Assyrian Bibliography 1 (February 2003-July 2006)», *Archiv für Orientforschung*, 51, 2006a, pp. 436-449.
- C. Michel, «Femmes et production textile à Aššur au début du II<sup>e</sup> millénaire avant J.-C.», *Techniques et Culture*, 46, 2006b, pp. 281-297 (<http://halshs.archives-ouvertes.fr/halshs-00821277>).
- C. Michel, «Les Assyriens et leurs femmes anatoliennes», in J.G. Dercksen (ed.), *Anatolia and the Jazira during the Old Assyrian Period*, Old Assyrian Archives Studies, 3, Publications de l'Ins-

- titut historique-archéologique néerlandais de Stamboul, 111, Leyde, 2008a, pp. 209-229 (<http://halshs.archives-ouvertes.fr/halshs-00667570>).
- C. Michel, «Les pérégrinations des marchands assyriens en haute Mésopotamie et en Asie Mineure», *Res Antiquae*, 5, 2008b, pp. 371-388.
- C. Michel, «'Tu aimes trop l'argent et méprises ta vie'. Le commerce lucratif des Assyriens en Anatolie centrale», in *La ricchezza nel Vicino Oriente Antico. Atti del Convegno internazionale Milano 20 gennaio 2007*, Centro Studi del Vicino Oriente, Milan, 2008c, pp. 37-62 (<http://halshs.archives-ouvertes.fr/halshs-00642825/fr/>).
- C. Michel, «The Alāhum and Aššur-taklāku archives found in 1993 at Kültepe Kaniš», *Altorientalische Forschungen*, 35, 2008d, pp. 53-67 [abstract p. 359].
- C. Michel, «Old Assyrian Bibliography 2 (August 2006-April 2009)», *Archiv für Orientforschung*, 52, 2011, pp. 416-437.
- C. Michel, «Economic and Social Aspects of the Old Assyrian Loan Contract», in F. D'Agostino (ed.), *L'economia dell'antica Mesopotamia (III-I millennio a.C.). Per un dialogo interdisciplinare*, La Sapienza Orientale, 9, 2013, pp. 41-56.
- C. Michel, «Central Anatolia in the Nineteenth and Eighteenth Centuries BC», in E. Cancik-Kirschbaum, N. Brisch, J. Eidem (eds.), *Constituent, Confederate, and Conquered Space. The Emergence of the Mittani State*, TOPOI, Berlin Studies of the Ancient World, 17, 2014a, pp. 111-136 (<http://www.degruyter.com/viewbooktoc/product/129816>).
- C. Michel, «The Assyrian Textile Trade in Anatolia (19<sup>th</sup> century BCE): From Traded Goods to Prestigious Gifts», in K. Droß-Krüpe (ed.), *Textile Trade and Distribution in Antiquity*, Marburg, 2014b, pp. 111-122.
- C. Michel, «Wool Trade in Upper Mesopotamia and Syria According to Old Babylonian and Old Assyrian Texts», in C. Breniquet, C. Michel (eds.) *Wool Economy in the Ancient Near East and the Aegean: From the Beginnings of Sheep Husbandry to Institutional Textile Industry*, Ancient Textiles Series, 17, Oxford, 2014c, pp. 232-254.
- C. Michel, «Considerations on the Assyrian settlement at Kaneš», in L. Atici, F. Kulakoğlu, G. Barjamovic, A. Fairbairn (eds.), *Current Research at Kültepe/Kaneš. An Interdisciplinary and Integrative Approach to Trade Networks, Internationalism, and Identity*, JCS Supplement, 4, 2014d, pp. 69-84.
- C. Michel, «Les lettres des rois d'Aššur découvertes à Kaniš (XIX<sup>e</sup> siècle av. J.-C.)», in L. Reinhardt, S. Tost (eds.), *Official Epistolography and the Language(s) of Power*, Vienna, In press.
- C. Michel, *Were there only merchants at Aššur and Kaneš? Overview of professions attested in the Old Assyrian Sources*, in a forthcoming Festschrift, Forthcoming.

- C. Michel, K.R. Veenhof, «The Textiles Traded by the Assyrians in Anatolia (19<sup>th</sup>-18<sup>th</sup> Centuries BC)», in C. Michel, M.-L. Nosch (eds.), *Textile Terminologies in the Ancient Near East and Mediterranean from the Third to the First millennia BC*, Ancient Textiles Series, 8, Oxford, 2010, pp. 209-269.
- K. Polanyi, «Marketless Trading in Hammurabi's Time», in C.M. Arensberg, K. Polanyi (eds.), *Trade and Market in the Early Empire. Economies in History and Theory*, Glencoe, 1957, pp. 12-26.
- N. Postgate, «Wool, Hair and Textiles in Assyria», in C. Breniquet, C. Michel (eds.), *Wool Economy in the Ancient Near East and the Aegean: From the Beginnings of Sheep Husbandry to Institutional Textile Industry*, Ancient Textiles Series, 17, Oxford, 2014, pp. 401-428.
- K.R. Veenhof, «Prices and Trade. The Old Assyrian Evidence», *Altorientalische Forschungen*, 15, 1988, pp. 243-263.
- K.R. Veenhof, *Aspects of Old Assyrian Trade and its Terminology*, Studia et Documenta, 10, Leiden, 1972.
- K.R. Veenhof, «'In Accordance with the Words of the Stele'. Evidence for Old Assyrian Legislation», *Chicago-Kent Law Review*, 70, 1995, pp. 1717-1744.
- K.R. Veenhof, «'Modern' Features in Old Assyrian Trade», *Journal of the Economic and Social History of the Orient*, 40, 1997, pp. 336-366.
- K.R. Veenhof, «Silver and Credit in Old Assyrian Trade», in J.G. Dercksen (ed.), *Trade and finance in Ancient Mesopotamia*, Middle Eastern Studies Pro-gramm Studies, 1, Leyde, 1999, pp. 55-83.
- K.R. Veenhof, «Trade and Politics in Ancient Assur. Balancing of Public, Colonial and Entrepreneurial Interests», in C. Zaccagnini (ed.), *Mercanti e politica nel mondo antico*, Saggi di storia antica, 21, Roma, 2003a, pp. 69-118.
- K.R. Veenhof, *The Old Assyrian List of Year Eponyms from Karum Kanish and its Chronological Implications*, Ankara, 2003b.
- K.R. Veenhof, «The Old Assyrian Period», in M. Wäfler (ed.), *Mesopotamia. The Old Assyrian Period*, Orbis Biblicus et Orientalis, 160/5, Fribourg-Göttingen, 2008a, pp. 13-264.
- K.R. Veenhof, «Aspects of Old Assyrian Commercial Law Treaties and Legislation», in M. Liverani, C. Mora (eds.), *I diritti del mondo cuneiforme (Mesopotamia e regioni adiacenti, ca. 2500-500 a.C.)*, Collegio di Diritto Romano, 2006, Cedant, Pavia, 2008b, pp. 247-269.
- K.R. Veenhof, «Communication in the Old Assyrian Trading Society by Caravans, Travelers and Messengers», in C. Michel (ed.), *Old Assyrian Studies in Memory of Paul Garelli*, Old Assyrian Archives Studies, 4, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 112, Leiden, 2008c, pp. 199-246.

- K.R. Veenhof, «Ancient Aššur. The City, its Traders, and its Commercial Network», *Journal of the Economic and Social History of the Orient*, 53, 2010, pp. 39-82.
- K.R. Veenhof, «Houses in the ancient city of Assur», in B.S. Düring, A. Wossink, P.M.M.G. Akkermans, *Correlates of Complexity. Essays in Archaeology and Assyriology Dedicated to Diederik J.W. Meijer in Honour of his 65th Birthday*, Publications de l'Institut historique-archéologique néerlandais de Stamboul, 116, 2011, pp. 211-231.
- K.R. Veenhof, «New Mesopotamian Treaties from the Early Second Millennium BC from kārum Kanesh and Tell Leilan (Šehna)», *Zeitschrift für Altorientalische und biblische Rechtsgeschichte*, 19, 2013, pp. 23-57.
- H. Waetzoldt, *Untersuchungen zur neusumerischen Textilindustrie*, Roma, 1972.
- H. Waetzoldt, «The Colours and Variety of Fabrics from Mesopotamia during the Ur III Period (2050BC)», in C. Michel, M.-L. Nosch (eds), *Textile Terminologies in the Ancient Near East and Mediterranean from the Third to the First Millennia BC*, Ancient Textiles Series, 8, Oxford-Oakville, 2010, pp. 201-209.
- G. Weisgerber, J. Cierny, «Tin for Ancient Anatolia?», in Ü. Yalçın (ed.), *Anatolian Metal II, Montanhistorische Zeitschrift Der Anschnitt*, Beiheft, 15, Bochum, 2002, pp. 179-186.
- A.K. Yener, *The Domestication of Metals. The Rise of Complex Metal Industries in Anatolia*, Leiden-Boston-Köln, 2000.

## Production and Commerce in the Old Babylonian Period

Both the terms Babylonia and Old Babylonian period indicate complex realities. Babylonia was the region whose inhabitants depended on the waters of the Tigris and Euphrates Rivers for their survival, stretching from the vicinity of modern Baghdad to the Persian Gulf.<sup>1</sup> It contained agricultural areas, large marshes at the head of the sea and along the rivers, and zones of steppe-land where only migrant pastoralists could survive. There were many diverse ecological niches with varied economic potentials. The area included different types of settlements, but cities dominated the countryside – about forty of them. Those were the centers of politics, culture, and most importantly in the context of this paper, the economy. The period I will consider here was four hundred years long, from ca. 2000 to ca. 1600 BC (using the so-called Middle Chronology dominant in the study of ancient Mesopotamian history).<sup>2</sup> It was characterized by conflict between these cities, whose kings fought for hegemony after the collapse of a state that had united the entire region in the twenty-first century under the Ur III dynasty. Several cities in a row took the lead in seeking political supremacy and around 1755 Hammurabi of Babylon did succeed in creating a unified Babylonia, but some thirty-five years later the south and center had already seceded. These political events and especially the military actions they brought about had an effect on the economy. Military tactics included the diversion of irrigation water from canals in order to starve an opponent into submission (Charpin 2002, pp. 557-558), which had lasting effects on the countryside. But this was still a prosperous period in Babylonia's history: levels of urbanization were high (Adams 1981, p. 138), many cities