



“Glassware and Illumination Objects of XIII-XIV Centuries from
Excavations in Azak (The South of Russia)”

الأواني الزجاجية وأدوات الإضاءة من حفائر أزاك خلال القرنين ١٣-١٤م (جنوب روسيا)

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Abstract:

During the longstanding archaeological excavations on the territory of the Golden Horde city of Azak (present-day Azov city, Rostov region, South of Russia), there have been discovered and studied remains of medieval structures of residential and handicraft areas, bath-houses, mosques, fortification structures in the shape of an earth mound or a moat as well as several municipal Muslim burial grounds.

The finds of the Azov archaeologists dated by the XIII-XIV centuries include various wares made of ceramics, metal, bone, stone, glass, etc. The findings of ceramic crockery (jugs, bowls, water vessels, amphoras, etc.) are the most numerous. The ceramics complex of Azak were published in the museum catalogue. But until now researchers have paid a little attention to the glassware discovered in the memorial. Yet the range is quite wide. This study is devoted to the classification of glassware and illumination objects from the excavations in the medieval Azak. For the first time the authors make an attempt to give a brief characteristic to some repairable shapes of glass vessels.

Key-words: Azak, the Golden Horde, XIII-XIV centuries, glassware, illumination objects.

المخلص:

تعد دراسة التحف والأواني الزجاجية وأدوات الإضاءة فى منطقة جنوب روسيا خلال القرنين الثالث عشر والرابع عشر الميلاديين من الدراسات الهامة التى تلقى الضوء بشكل متخصص على اللقى الأثرية الزجاجية من خلال ما تم استخراجها من حفائر آزاك بمدينة أزوف بروسيا (راستوف أون دون، جنوب روسيا)، وهى المنطقة الأكثر ثراءً ، والتى تم العثور فيها على العديد من التحف الأثرية المختلفة من معادن وخزف وفخار وأدوات وأفران وبقايا منازل ومساجد قديمة، تم التعرف من خلالها على حضارة وعادات وتقاليد المسلمين اللذين قطنوا تلك الأماكن، حيث تمت دراسة المجموعة الزجاجية موضوع الدراسة من خلال تصنيفها حسب الشكل العام أو الغرض الوظيفى لها، وقياس أبعادها ومحاولة استعادة واستكمال شكلها الأصيل ودراسة ما عليها من زخارف ملونة، والتوصية بترميم واستكمال ما يصلح منها وعرضه داخل متحف أزوف.

1. Introduction:

Azak city was founded by Mongolians on the Lower Don territory in the XIII century and became one of ten biggest cities of the Golden Horde realm. Nowadays the remains of this city occupy the central part of the present-day Azov city (Rostov region, South of Russia). The area of the archaeological memorial covers nearly 450 hectares. This is the largest in size archaeological memorial on the territory of the Rostov region. It is known that by 1340 Azak reached its maximum in size when its population came to approximately 30 thousand people. People of various ethnic groups (Mongolians, Italians, Russians, Greeks, Jews, Armenians, and others) and of different religions (Muslims, Christians, Jews) lived in the city. It was a large trade center situated in the mouth of the river Don at the outlet to so called “southern seas” (the Azov sea, the Black sea and the Mediterranean sea) through which “The Great Silk Road” passed in the Middle Ages. Merchants brought their goods to this place to sell and barter both overland – by caravan routes, and by water – by ships till the downfall of the city in 1395.

Azak of the Golden Horde had its own complicated structure which differed greatly from the cultures of other Golden Horde cities, for example, such as the cities of the Lower Volga region. As a result of the longstanding archeological excavations on the territory of Azak, there have been discovered and studied remains of medieval structures of residential and handicraft areas, bath-houses, mosques, fortification structures in the shape of an earth mound or a moat as well as several municipal burial

grounds. Among the finds of the Azov archaeologists there are various medieval wares made of ceramics, metal, bone, stone, glass, etc. Undoubtedly, the finds of ceramic wares are the most numerous, primarily ceramics crockery (jugs, vases, bowls, water vessels, pots, lamps, amphoras, etc.). In recent years ceramics of the Golden Horde Azak has been thoroughly researched and classified by the local archaeologists, the research workers of the Azov Museum-Reserve. The same cannot be said of the glassware. Until now it has been paid a little attention, apparently due to the sparsity of such finds in the memorial as well as due to rather poor preservation of the items (severe fragmentation and irisation).

Nevertheless, the remains of glassware appear among the archaeological material from the excavations of the Golden Horde Azak. The assortment of these wares is very multifarious and to some extent it differs from that of the other Golden Horde cities. The following items belong to it: glass ornaments (beads, finger-rings, bracelets, pendants, inserts), window glass, glassware (decanters, glasses, goblets, phials, bowls) and illumination objects (lamps). This research work is one of the first generalizing works devoted to the glass from the excavations of the Golden Horde Azak, in the first place to the glassware and illumination objects. In the past only single finds made of glass have been mentioned by different authors¹.

¹-**Belinsky I.V., Maslovsky A.N. 1998.** Typological characteristic of the products from the excavations of an area of the Golden Horde Azak (Azov, 7 Moskovskaya Street), HARALD, issue 15. Azov, p.243, pic.24; **Goudimenko I.V., Dmitriyenko M.V. 2004.** Summary on the archaeological researches in 12 Liebknechta Street in Azov in 2003, HARALD, issue 20. Azov, p.130, pic.2; **Dmitriyenko M.V. 2006.** Summary on the archaeological researches in 70 Tolstogo Street in Azov in 2005, HARALD, issue 22. Azov, p. 132, pic.6; **Dmitriyenko M.V. 2010.** Summary on the rescue archaeological excavations on the territory of Azov in 2007, HARALD. Issue 24. Azov, p.308, pic.2; p.311; **Kravchenko S.A., Shirochenko E.B, Goncharova S.M. 2012.** Excavations in Azov in 2010, HARALD. Issue 26. Azov, p.182, pic.3; p. 184, pic.5; p.186, pic.6; p.190, pic. 9; p.192, pic.10; p.193, pic.11; p.195, pic.12; p.208, pic.21; p.210, pic.22; **Maslovsky A.N. 2000.** Works of the I Azov brigade in 1998, HARALD, Issue 16. Azov, p.117, pic.1; **Maslovsky A.N. 2002.** Excavations in Azov, HARALD, Issue18. Azov, p. 219, 221, pic.4, 5; **Maslovsky A.N. 2006.** Archaeological works in Azov and the Azov district in 2004, HARALD, Issue 21. Azov, p.103; p.105, pic.10; p.108, pic.13; p.109; p.112, pic.14; **Maslovsky A.N. 2006.** Archaeological researches in Azov and the Azov district in 2005, HARALD, Issue 22. Azov, p. 105, pic.3; p.112; p.113, pic.9; **Maslovsky A.N. 2006.** About time of the emergence of Azak, HARALD, Issue 22. Azov, p. 290; p. 286, pic.15; **Maslovsky A.N. 2008.** Researches in Azov, the Azov district and Rostov in 2006, HARALD, Issue 23. Azov, p.157, pic.8; p.159, pic.9; **Maslovsky A.N. 2010.** Archaeological researches in Azov and the Azov district in 2007-2008. HARALD, Issue 24. Azov, p.188, pic.4; p.194-195; p.193, pic.7; p.205, pic.14; **Perevozchikov V.I. 1997.** Excavations in the yard of the Azov Museum-Reserve in 1994, HARALD, Issue 14, Azov, p.69, pic.13; **Perevozchikov V.I. 1998.** Rescue archaeological works on the territory of the Azov Museum in 1995-1996, HARALD, Issue 15, Azov, p.150, pic. 7; **Shirochenko E.B. 2010.** Archaeological researches in Azov in 2008, HARALD, Issue 24, Azov, p.253; p. 254, pic.1; **Shirochenko E.B., Maslovsky A.N. 2011.** Archeological researches in Azov and explorations in the Azov district in 2009, HARALD, Issue 25, Azov, p.186, pic.16.

The main information about these objects can be found in the reports on the archaeological excavations in Azov in different years¹.

Aim of this work is to make a classification of the glassware and the illumination objects from the excavations in the medieval city of Azak in accordance with their technological features and functionality. Besides the classification, the authors make an attempt to give a brief characteristic to a number of repairable shapes of glass vessels.

2. Glassware and illumination objects from the excavations in Azak:

All finds of glass vessels from the archaeological research on the territory of the medieval city of Azak can be conditionally divided into five main groups that apparently belonged to different centers of manufacture.

2.1. Group 1. This group includes wares made of transparent glass manufactured without artificial admixtures for colouring or decolouring. These wares have a distinctive greenish shade. The following wares belong to this group: glasses with cellular, zigzag or floral ornament, and decanters. There has been discovered a single sample of a thick-walled jug (?) with overlaid threads (**pic.1,6**).

2.1.1. Glasses are divided into 4 types according to the body shape:

2.1.1.1. truncated-conical (**pic.1,1**);

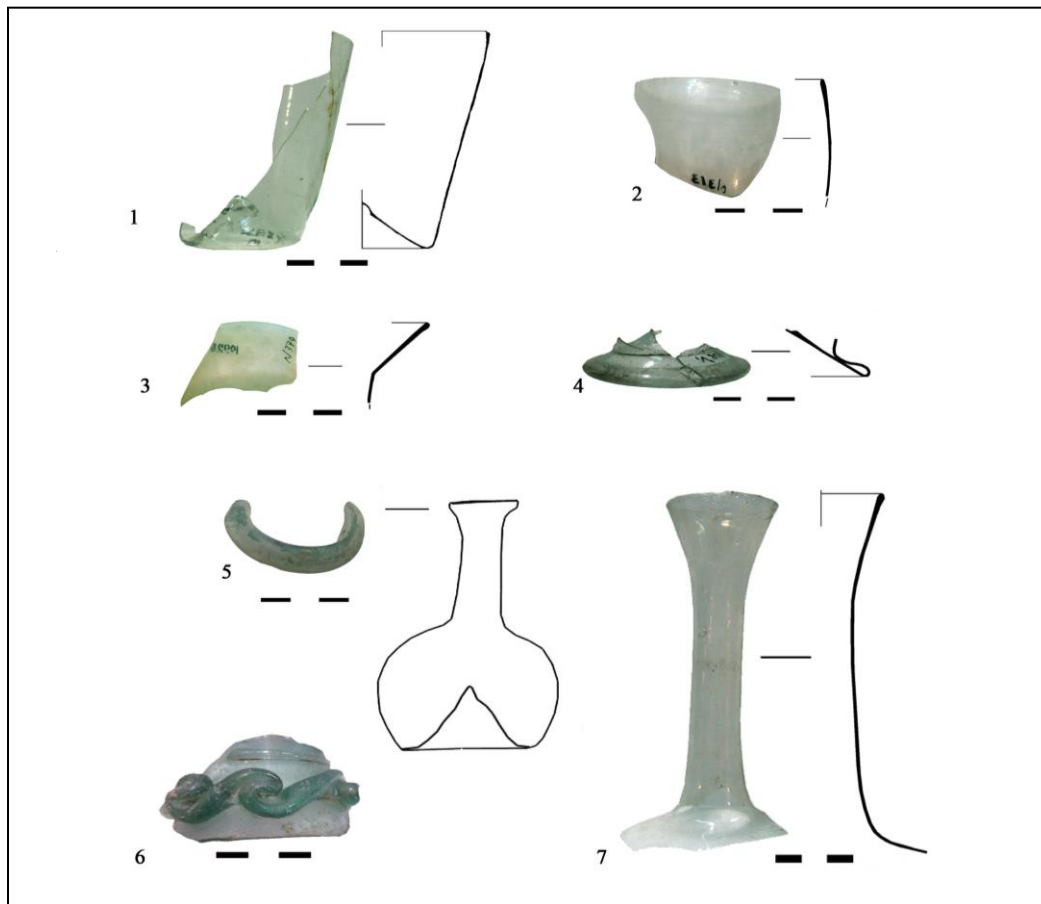
2.1.1.2. barrel-shaped (**pic.1,2**);

2.1.1.3. cylindrical with a bell-shaped rim (**pic.1,3**);

2.1.1.4. on a circular tray (**pic.1,4**).

The diameters of glass bottoms vary from 3,5 cm to 6,5 cm. The diameters of rims vary within the range of 5,5-10,0 cm. The height of glasses is 5,5-8,0 cm.

¹- **Belinsky I.V. 1993.** Report on the rescue excavations in the area of building site of the Church of the Azov Icon of the Mother of God in Rosa Luxemburg Street in Azov, 1992 // AMR Archive;
Goudimenko I.V. 1988. Report on the rescue excavations in Azov in Chekhova Street in March-April, 1988 // AMR Archive, KVF 11170/1,2



Pic.1. Glassware fragments of the **Group 1**: 1-4 – glasses; 6 – a jug; 5-7 – decanters

2.1.1. Decanters are of the same type: with a narrow cylindrical neck, a bell-shaped rim and spherical body (**pic.1, 5,7**).

2.2. Group 2. Vessels made of transparent specifically discolored glass, which could sometimes be of a yellowish shade. There are wares without ornaments, decorated with overlaid colorless straight rollers or horizontal ones with nips, sculptured figures in a shape of thorns or roundish plaques, and decorated with dark blue sculptured overlaid threads. Thickness of walls varies from 0,2 cm to 0,5 cm. The range is represented with glasses, decanters, goblets, bowls, vases, phials.

2.2.1. Glasses are divided into 5 types according to the shape of a body:

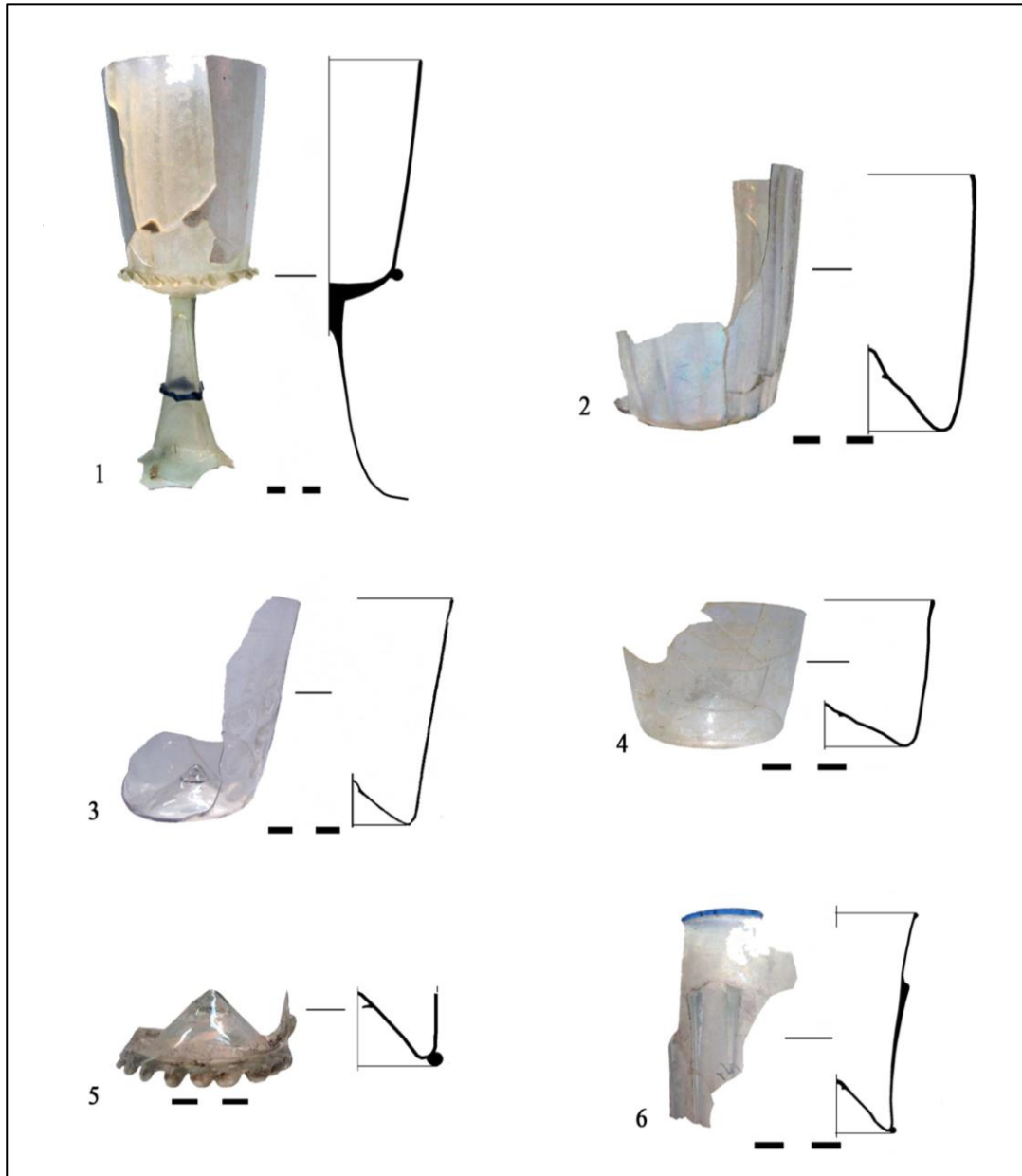
2.2.1.1. truncated-conical (height of vessels is about 7,5 cm) (**pic.2,3**);

2.2.1.2. heaviest, broad, of a truncated-conical shape (height - 5,5 cm, diameter of a bottom - 6,5 cm) (**pic.2,4**);

2.2.2.3. cylindrical, with a slightly narrowed bottom (**pic.2,2**);

2.2.2.4. cylindrical (**pic.2,5**);

2.2.2.5. wide-necked, with a bell-shaped rim (**pic.2,6**).



Pic.2. Glassware fragments of the **Group 2:** 1 – a goblet; 2-6 – glasses.

There are glasses with smooth, faceted and sculptured walls, decorated with overlaid rollers with nips or with overlaid dark-blue threads.

Decanters are of 2 types only:

- 2.2.2.1. with a narrow neck, a slightly widening rim, a spherical corrugated body (**pic.3,4**);
- 2.2.2.2. with a short truncated-conical neck, a groove under the rim, with a bell-shaped rim and a corrugated body (**pic.3,3**).

2.2.3. A single **goblet** has been discovered. It has faceted truncated-conical body on a high, hollow stem widening downward, and a flattened tray. The goblet's height is 19,2 cm, the diameter of a rim - 7,5cm (**pic.2,1**).

2.2.4. **Phials** are thick-walled, made of yellow and green glass, with an egg-shaped body and a chamfered bottom (**pic.3,1**). They have a short narrow neck and a horizontal rim, slightly chamfered inwards (**pic.3,2**).

2.2.5. **Vases** are thick-walled, made of yellowish glass. They are represented with 2 types:

2.2.5.1. big ones (the diameter of a rim - 30,2 cm), with a spherical corrugated body, a low neck and a small horizontal rim, and a flattened bottom (**pic.3,5**);

2.2.5.2. miniature ones (the diameter of a rim - 12,0 cm), with a body segmental in section and a roller-shaped rim oval in section (**pic.3,6**).

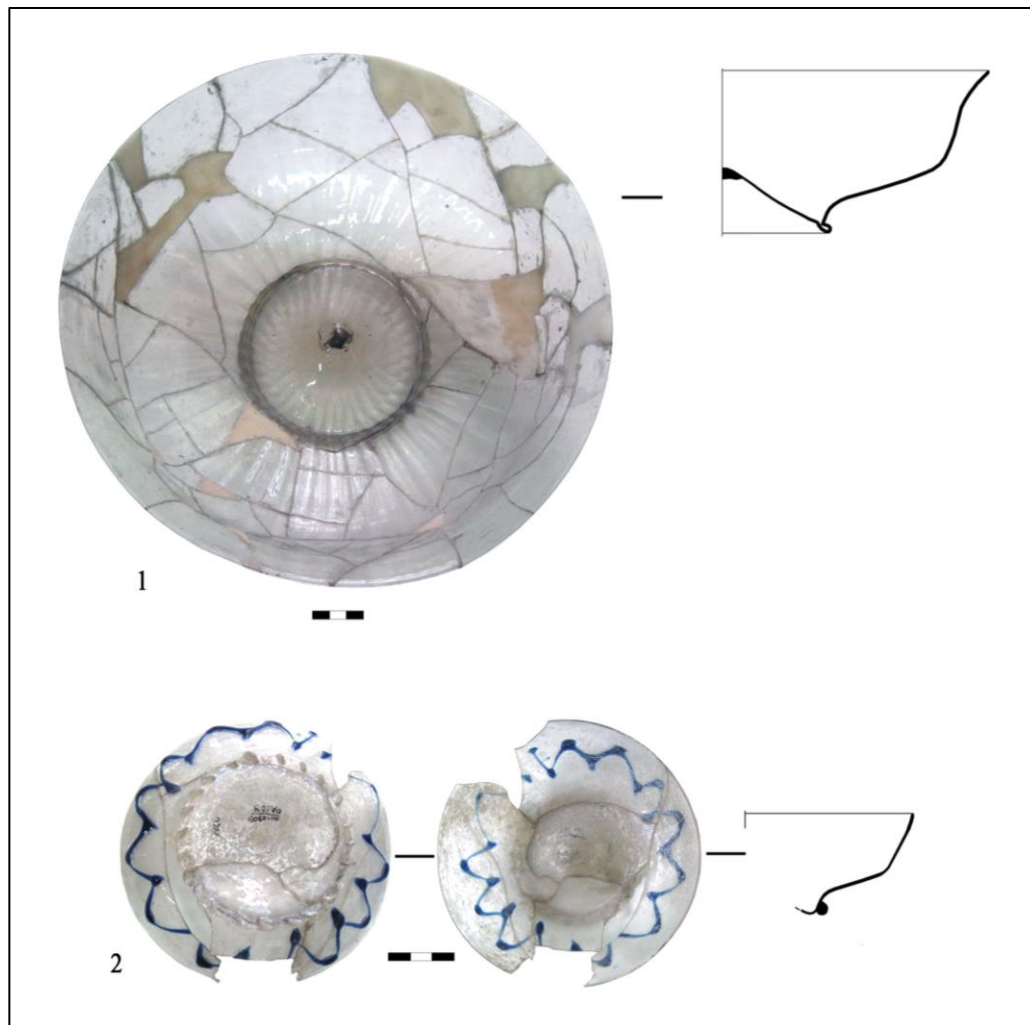


Pic.3. Glassware fragments of the **Group 2**: 1-2 – phials; 3-4 – decanters; 5-6 – vases.

2.2.6. Bowls are thick-walled. They are represented with 2 types:

2.2.6.1. miniature ones (the diameter of a rim - 12,5 cm) with a heaviest body segmental in section, on an isolated low cylindrical tray (**pic.4,2**);

2.2.6.2. large ones (the diameter of a rim - 30,8 cm) with a rim bent outwards, a corrugated body on a small circular tray teardrop-shaped in section (the diameter of a tray - 12,5 cm) (**pic.4,1**).



Pic.4. Glassware of the **Group 2: 1-2** – bowls

2.3. Group 3. Vessels made of specifically decoloured glass of a yellowish Shade ,with a polychromatic enamel painting and gilding. Sometimes there can be seen an overlaid sculptured ornament of colourless glass. The thickness of walls varies from 0,2 cm to 0,5 cm. This group is represented with glasses, decanters and lamps for mosques.

2.3.1. Glasses are of the same type: with a cylindrical body and bell-shaped rim bent outwards (**pic.5,1**).

2.3.2. Decanters have a turnip-shaped body, a narrow neck and a horizontal rim in the shape of a broad ledge (**pic.5,2**).

2.3.3. Lamps are thick-walled, with a biconical body, a wide truncated-conical neck and bolt-on handles (**pic.5,3**).



Pic.5. Glasswares and fragments of the **Group 3:** 1 – a glass; 2 – a decanter; 3 – a lamp

2.4. Group 4. Vessels made of transparent coloured glass of vinous, cherry, brown, dark-blue, green and orange colours. Wares of this group are dissimilar. Along with ceremonial dishes lavishly decorated with polychromatic painting and gilding or overlaid white threads, there can also be seen glass vessels with no painting, often with a channeled body. This group is represented with phials, jugs, lamps, bowls, miniature vessels.

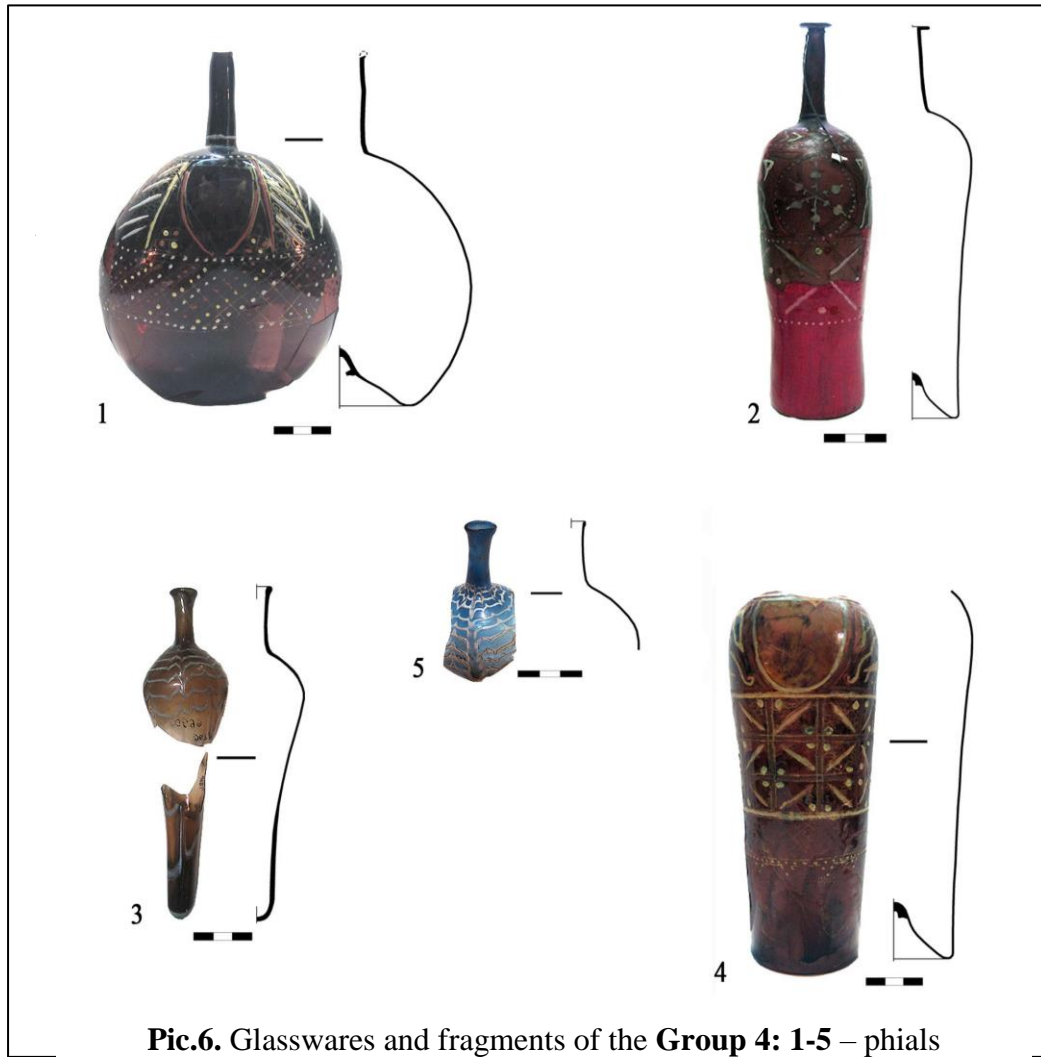
2.4.1. Phials are divided into 3 types:

2.4.1.1. with a narrow neck and a swollen body oval in section (**pic.6,1**);

2.4.1.2. with a narrow neck and an elongated cylindrical or truncated-conical body (**pic.6,2,4,5**);

2.4.1.3. with a narrow neck and an elongated chamfered bottom (**pic.6,3**).

The phials are made of thin cherry, vinous or blue glass and decorated with polychromatic enamel painting and gilding or overlaid white threads.



Pic.6. Glasswares and fragments of the **Group 4: 1-5** – phials

2.4.2. Jugs are of the same type: thin-walled, with a narrow neck and a bell-shaped rim, with a flat handle, a biconical channeled body on a circular tray. They are made of blue, brown, orange or green glass (**pic.7,2**).

2.4.3. Lamps are thin-walled, with a spherical body, a wide truncated-conical neck, on a circular tray, with three bolt-on reticulate handles for suspension. They are made of blue glass and decorated with polychromatic enamel painting and gilding (**pic.7,1**).

2.4.4. Bowls are miniature, on a roller-shaped circular tray roundish in section (**pic.7,4**).

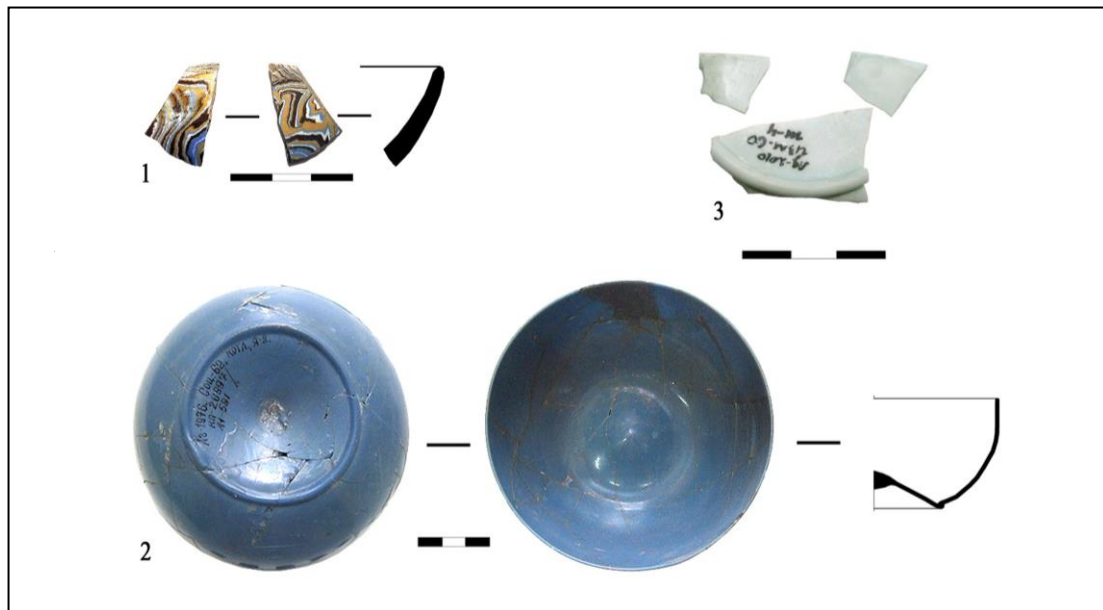
2.4.5. Miniature vessels are represented with one type – with an acorn-shaped channeled body (**pic.7,3**).



Pic.7. Glasswares and fragments of the **Group 4**: **1**– a lamp; **2** – a jug; **3** – a miniature vessel; **4** – a bowl

2.5. Group 5. Wares made of opaque stained glass. The range is represented with bowls and vessels of a closed shape.

2.5.1. Bowls are miniature (the diameter of a rim - 12,0 cm), with a hemispherical body, a straight rim and a roller-shaped circular tray roundish in section (**pic.8,2,3**). They are made of violet, white and light-blue, dark-red and light-green glass, sometimes decorated with overlaid white threads. A fragment of a bowl's rim made of polychromatic (brown-yellow-blue-white) "marmoreal" glass stands apart (**pic.8,1**).



Pic.8. Glassware and fragments of the **Group 5: 1-2** – bowls

It must be noted that practically all glass vessels discovered during the archaeological research on the territory of the medieval Azak have an incurved conical bottom with a mark of a pontius. It indicates that they were manufactured by free blowing or blowing into a form.

3. Manufacturing centers of glass vessels from Azak:

Over the years of excavations (starting from 1960-s up to the present day) in the Golden Horde city of Azak neither a single one glass workshop, nor any concomitant signs of its presence have been found, whereas quite a large number of ceramic and bonecarve workshops, as well as workshops with metallurgical furnaces where various metallic wares were manufactured, have been researched. The Azov archaeologists succeeded in discovering on the territory of the medieval city only a few ingots of turquoise, green or violet opaque glass, that were apparently used as raw materials for the manufacture of glass jewellery, not vessels¹. That explains why these glass vessels should be considered only as merchandise that was one of the imported articles in the XIII-XIV centuries.

It is rather difficult to localize glasswares according to their manufacturing centers without chemical analyses to confirm the data. However, taking into account the researches that have been already done, on the analogy of the similar finds in the

¹ **Maslovsky A.N. 2010.** Archaeological researches in Azov and the Azov district in 2007-2008. HARALD, Issue 24. Azov, p.188, pic.4; p.194-195; p.193, pic.7; p.205, pic.14; p.217, pic.23; p.221, pic.26; p.222, pic.27; p.225, pic.29; p.226, pic.30; p.230, pic.33; p.239, pic.40; p.241, pic.42.

Volga region¹, Bolgar², Bilyar³ and Russian cities⁴, it can be said that main entering routes of glass to Azak are traced from the direction of the Middle East and Central Asia. It is possible that part of wares were brought here from the Golden Horde cities that had their own glass manufactures. It is likely that some glass vessels refer to the Venetian craftsmanship. This suggestion is corroborated with the place of discovery of these vessels – the territory of the former Italian trading station Tana situated beside the Golden Horde Azak (the archaeological dig in Rosa Luxemburg Street in Azov, 1992)⁵.

4. Conclusion:

To sum up our research work, we can state that judging by the archaeologists' finds, there was no glass manufacture in the Golden Horde Azak in the XIII-XIV centuries. Since, there is no glassware manufacture centers were discovered in the area until now. It testifies that all these wares were imported. For the time being, it is highly problematic to define manufacturing centers of glasswares brought to Azak through the trade routes without chemical analyses to confirm the data. However, according to the analogies, it can be suggested that glassware and glass lamps for mosques were brought to the Lower Don from the Middle East, Central Asia and the Volga region. We cannot rule out the possibility that some part of glasswares refer to the Venetian craftsmanship.

¹ - **Belinsky I.V., Maslovsky A.N. 1998.** Typological characteristic of the products from the excavations of an area of the Golden Horde Azak (Azov, 7 Moskovskaya Street), HARALD, issue 15. Azov, p.243, pic.2; **Polouboyarinova M.D. 1988.** Glasswares of the Bolgar hill-fort// Bolgar city: studies of handicrafts. M.

² - **Perevozchikov V.I. 1998.** Rescue archaeological works on the territory of the Azov Museum in 1995-1996. HARALD, Issue 15, Azov, p.150, pic.7.

³ - **Bousyatskaya N.N. 1976.** Glasswares of the Volga region cities (XIII-XIV centuries)// Medieval memorials of the Volga region. M; **Polouboyarinova M.D. 1963.** Glassware of the ancient Turaw// SA №4.

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⁵ - **Belinsky I.V. 1993.** Report on the rescue excavations in the area of building site of the Church of the Azov Icon of the Mother of God in Rosa Luxemburg Street in Azov, 1992 // AMR Archive.

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