Introduction
The development of the art of the book is related to the material possibilities, and this is one of the important factors determining the style and direction in the process of creating a manuscript. Using the style of the scripts, the color and direction of the paintings, the elements of the ornament, it always corresponded to the ideology of the ruling elite. Valuable art, such as art of the book, was developed in the main cultural centers with a high level of patronage. The economic and political changes resulting from the formation of a centralized state in Maverannaxr and Khorasan in the XIV century as Temurid Empire (1370–1507), created favorable conditions for the development of culture and science. As a result of interest in science, classical poetry, art and increased demand for books, the development of the preparation of books grew rapidly and gradually became one of the leading branches of art.

From the end of the 14th century, book masters who were invited by Amir Temur (d.1405) and worked in this city until the death of Mirza Ulugh Beg (d. 1449) made a great contribution to the establishment and development of art of the book in the capital of the state – Samarkand. At that time in Samarkand there were mahallas and streets where, for example, masters of the only specialty lived, one of which was called Kuyi Nakhashon (it means street of illuminators’) [11, p.6]. Numerous artists working in the library of Amir Temur were headed by master Khwaja Abdulhay who was from Baghdad. After Khwaja’s death, all masters imitated his works [6, p.345].

After the death of Amir Temur, during the time of the Timurids rule, attention to art of the book increased significantly. The division of the territory of the Timurid state into Movarounnahr and Khorasan undoubtedly influenced the cultural life of the region,
but the patronage of rulers and princes in various fields of science, culture and art contributed to the development of cultural and spiritual life. The fifteenth century was one of the most brilliant periods of the art of the book, during which descendants of Timur – his son Shahrukh (d. 1447) and grandsons Iskandar Sultan (d. 1414), Baysunghur (d. 1433), and Ibrahim Sultan (d. 1435) were noted patrons. Iskandar Sultan and Ibrahim Sultan were patrons of library-workshops (kitabkhana) at Shiraz, Shahrukh and his son Baysunghur (until his early death in 1433) at Herat. During the reign of Shahrukh the first step was taken to create a Herat style of art of the book in the center of the country and under the leadership of Baysunghur Herat develops as a center of art of the book, it was known as the political and cultural center of the Near and Middle East. Today’s Afghanistan, Iran and Central Asia were ruled by the Timurids as the only state, therefore the culture of the Turkic peoples was partially developed in Khorasan, especially in its capital Herat. It can be said that this period is one of the brightest periods in the history of Uzbek culture. Along with Herat, the best examples of the Timurid manuscripts were created in Bukhara, Tabriz, Mashhad, Shiraz and Baghdad.

About bookbinding in the library of Baysunghur Mirza

Timurid prince Mirza Baysunghur has established a palace scientific institution and library-workshop – kitabkhana in Herat, which marked the beginning of a new era in the development of the art of the books, especially bookbinding. F. Martin, a Swedish diplomat and one of the pioneer in the field of medieval Persian manuscript study, even named the kitabkhana “the Baysunghur Academy” [2, p.14]. There are information in several historical sources, about the bookbinding in the library of Baysunghur Mirzo, but the most valuable of them, of course, is the unique historical document Arzadasht. In 1948, Professor Zaki Validi Togan (d. 1970) found this document on the pages of the album Jungi Yaqubi, which is stored in the museum of Topkapi Palace in Istanbul, Turkey. The document was written in ink on a 46x13.5 cm sheet and printed in Turkey in 1976 with translations and commentaries [10]. After that, Arzadasht has been studied by a number of foreign scholars over the years [3; 4; 9; 17; 2].

The Arzadasht document is also valuable, it is noted that the library of Baysunghur Mirza is not only an institution representing the center of book production, but also a palace workshop representing a collection of highly qualified specialists in various fields of art. In it, the masters are not only engaged in artistic manuscripts, but also engaged in the creation of various artistic crafts. Arzadasht is an official report prepared for Baysunghur Mirza, and it was compiled between 1427 and 1431 by the head of the library, Kamal al-Din Ja’far Baysunghuri. The document contains information about 25 artists working in the library: calligraphers – Mawlana Shams, Mawlana Qutb, Mawlana Sa’d al-Din, Mawlana Muhammad-i Mutahhar and Kamal al-Din Ja’far Baysunghuri; artists – Amir Khalil, Khwaja Ghiyath al-Din Naqqash; illuminators and decorators of manuscripts – Mawlana Ali, Mawlana Shihab, Mahmud, Khwaja Ata, Hajji, Khatay, Abd al-Salam, Sayf al-Din, Khwaja Mir Hasan, Mir Shams al-Din bin Khwaja Mir Hasan, Mawlana Shams, ustad Dawlat-khwa, Khwaja Atay Jadvalkash; bookbinders – Mawlana Qawam al-Din, Hajji Mahmud, Khwaja Mahmud; artists working on pattern – Khwaja Abd al-Rahim and Mir Davlatyar. The following four important bookbinding reports were provided for Baysunghur Mirza:

Mawlana Qiwamuddin has finished the arabesque (islimi) margins for the binding of Shahnama and has taken up the brush for the pleasure scene of body of the binding. The groundwork (bum) is nearly two third done; the “back and head and neck” have been attached and the tariq has been drawn;

Hajji Mahmud has done the body of the front and outlining (tahirir) for the binding of the facsimile of the treatises and busy with the drawing outlines (guzar);

Khwaja Mahmud has finished the front and back of the binding for the Khwaja’s calligraphic treatises and is busy with the head and neck;

Khwaja Abdul-Rahim is busy making designs for the binders, illuminators, tentmakers and tilemakers [16, p. 324-325].

Baysunghur Mirza served as regent under his father, Shahrukh, and in 1420 was sent to take Tabriz. Another historical source of information about the library of the Baysunghur Mirza is the album prepared by Dost-Mohammad (d. 1560) in 1544 for Safavid Bakhram Mirza (d. 1549) (Istanbul, Topkapi Palace Library, MS Hazine 2154), which noted that on 21 November 1420 Baysunghur Mirza had brought from Tabriz to Herat Sidi Ahmad Naqqash, Khwaja Ali Musavvir and the bookbinder Qiwamuddin Mujallid Tabrizi. And he ordered that after the pleasing manner of Sultan Ahmad of Baghdad’s miscellany (jung), they should produce a book in exactly the same format and size and with the same scenes depicted. The binding was commissioned of the aforementioned Master Qiwamuddin, by whom inlay (munabbatkari) in bindings was invented [6, p. 346].

One of the features of the kitabkhana was the presence in the works of its masters of elements of the Far Eastern culture, which was probably the result of the exchange of embassies with China. It is known that artists of Herat sometimes carried out diplomatic missions; one of them, Ghiyath al-Din Naqqash, sent to China by Baysunghur, returned to Herat and
compiled the a report that Hafiz-i Abru (d. 1430) later included in his historical work [15, p. 375].

The following manuscripts, created under the patronage of Baysunghur Mirza, have survived to this day and are stored in various book collections of the world: Minhaj al-Din Abu Umar Usmon Siraj al-Din Muhammad Juzjani’s (born 1193) Tabaqat-i nasiri (The Generations of Nosir), it was copied by Ahmad bin Mas’ud al-Rumi in Herat in 814 (1411-12) (Berlin, Staatsbibliothek Preussischer Kulturbesitz, Petermann I. 386); Anthology of Poetry dated 823 (1420) in Shiraz, copied by Mahmud al-Husayn (Berlin, Museen fur Islamische Kunst, I. 4628); Nizami Ganjavi’s (1141-1209) Khusraw u Shirin, copied by Ja’far bin Ali al-Baysunghuri in 824/1421 (Saint Petersburg, Institute of Oriental Studies, B. 132); Nasayih-i Iskandar (The Counsels of Alexander) dated 829 (1425) and copied by Ja’far bin Ali al-Baysunghuri (Dublin, Chester Beatty Library, no. 4183); Sadr al-Din Muhammad bin Hasan Nizami’s (XIII c) Kitab taj al-ma’athir fi-t-tarikh (The crown of glorious deeds), dated 25 Shawwal 829 (31 August 1426), copied by Qubt al-Din bin Hasan Shah al-Kirmani (Library of the Oriental faculty of the Saint Petersburg University, no. 578); Anthology dated 830 (1426-27), copied by Shams al-Din al-Sultani (Florence, Sittegnano, Villa I Tatti (Haward University), Berenson collection); Gulistan of Sa’di (1203–1292) dated 830 (1426-27) copied by Ja’far al-Baysunghuri (Dublin, Chester Beatty Library, no. 119); Humay u Humayun of Khvaju Kirmani (1281–1352) dated 831 (1427-28) at Herat, copied by Muhammad bin Husam Shams al-Din al-Baysunghuri (Vienna, National bibliothek, Cod. N. F. 382); Kalila u Dimna of Abu al-Ma’ali Nasr Allah (XI c) dated Muharram 833 (October 1429), copied by Muhammad bin Husam Shams al-Din al-Baysunghuri in Herat (Istanbul, Topkapi Palace Library, R.1022); Shahnama of Firdawsi (935–1020) dated Jumada I 833 (January-February 1430) in Herat, copied by Ja’far al-Baysunghuri (Tehran, Gulistan Palace Library, no. 61); Tarjima-i tarikhi Tabari (Translation of the history) of Abu Ali Bal’am (d. 974), dated 20 Jumada II 833 (21 March 1430), copied by Qubt al-Din bin Hasan Shah al-Kirmanu in Herat (Saint Petersburg, National Library of Russia, PNS, 49); Anthology (containing the Shahnama of Firdawsi and Khamsa of Nizami), dated Sha’ban 833 (April-May 1430), copied by Muhammad al-Mutahhar; Tarikh-i jahangushay (History of the World Conqueror) of Ala’ al-Din Ata Malik Juvaynu, dated 833 (1430), copied by Sa’id al-Din Mashhadi (Saint Petersburg, National Library of Russia, PNS, 233); Kalila u Dimna of Abu al-Ma’ali Nasr Allah (XI c) dated 834 (1431), copied by Ja’far in Herat (Istanbul, Topkapi Palace Library, H.362); Tarikh-i Isfahab (History of Isfahan) of Abu Nuaym al-Isfahani (948-1038), dated at the end of Sha’ban 834 (May-June 1431), copied by Ja’far al-Baysunghury (London, Gobineau collection of British Library, Or. 2773); Kulliat of Khvaja Imam al-Din Faqih (d 1371), completed on 26 Dhul-Hijja 834 (4 September 1431), copied by Azhar (Oxford, Bodleian Library, Elliott no. 210); Chahar Maqala (The Four Discourses) of Nizami Aruz Samarqandi (d. 1160), completed in Rab’i I 835 (November 1431) in Herat, copied by “al-Sultani” (Istanbul, Museum of Turkish and Islamic Art, no. 1954); Tarikhi-I jahangushay (History of the World Conqueror) of Ala’ al-Din Ata Malik Juvaynu, completed in 835 (1431-32) (London, Keir Collection, VII. 62); a collection of Arabic proverbs and wise sayings (Dublin, Chester Beatty Library, no. 120); an album collection of calligraphy by the late thirteenth-century master Yaqut al-Musta’imini and six of his students (Istanbul, Topkapi Palace Library, H. 2310); Zubdat al-tawarikh (The Cream of Histories) of Hafiz-I Abru (d. 1430) (Saint Petersburg, National Library of Russia, Dorn, 268) [11, p. 14].

Only some of these manuscripts have original binding. Thomas Lentz considers the manuscripts of Kalila-u Dimna (833/1429), Tarikhi-I Isfahan (834/1431), Tabarkhi-I Tabari (833/1429), Chahar maqala (835/1431-32) preserved with the original binding. Kalila u Dimna which was copied in 833 (1429) is preserved in Istanbul (Topkapi Palace Library, R.1022). The binding is in a very ruined state. The central medallion with the pendants and the quarter medallions hold figures of animals engaged in strife. On the border are palmate and rumi fillings enclosed in cartouches, and the flap of the binding shows a game animal with two lions, one of which has seized the quarry, and floral decoration with peonies. Kalila u Dimna which dated 834 (1431) has a horizontal landscape in relief filled with various kinds of birds and animals, either in conflict or standing alone. The landscape is also enriched harmoniously with floral designs. The flap of binding has two confronted dragons. On the lower cover are rumi and palmette fillings inside the geometric interlacing, inscribed with Baysunghur’s name in kufic. The closely woven braided geometric design on the inner side of the flap evidently shows Mamluk influence [4, p. 60].

The outside of the covers of binding of Tarih-i Isfahan, which copied by Ja’far al-Baysunghury, are decorated with gold roll-tooled frames and have central gold and oval medallions and pendants which are stamped with a floral design. The flap has similar gold frames with a central round medallion. The doublure is decorated with an oval sunk medallion and pendants outlined with gold tooling. The medallions and pendants are inlaid with a design of red-bronze leather filigree arabesque tendrils on a blue background [8, p. 340]. Many of the luxury bindings of the Timurids produced in Herat show a preference for the use of woodland scenes, animal and figures to decorate their covers and doublures in the style of the
cover of the Divan of Sultan Husayn Bayqara produced in 805/1402.

Shiva Mihan added to Thomas Lentz’s list two manuscripts – Nasayih-i Iskandar 829 (1425) and manuscript which containing the Kunuz al-wad’i min runuz al-zari’a ila makarin al-shari’; a translation of al-Faraj ba’d al-shidda wa al-ziga. This second manuscript was copied by Sa’d al-Mashhadi and is dated 833 (1430). It is preserved in Istanbul, Suleymaniye, Yeni Cami, no. 937. The binding of the Yeni Cami codex is in medium and light brown leather with an envelope flap and has been restored at some point. The doublures and the inside of the flap show limited tooling, but the cover is decorated with very fine patterns tooled on a border, framing a decorated cusped oval (turanj) with two small pendants and four corner pieces. The outer spine of the flap is similarly tooled with the same decorative motifs, and encompasses an inscription in thulth script:

لاه خلد دولة السلطان الاعظم بالبغد خان حان الله مماثلاً

“O God, perpetuate the kingship of the magnificent Sultan, Bāyahunghur Bahādur Khān, may God perpetuate his kingdom.”

The other binding that Mihan added to the list of extant original bindings is binding of the Nasayih-I Iskandar. The binding is of medium brown leather of the finest quality with very similar decorative motifs and the same subtle technique of tooling and pressure molding [16, p. 53].

Luxury bindings of the manuscripts of the libraries of the Timurids

Even before the patronage of Bāyahunghur on the book art in Herat, there was a kitabkhana created by his father Shah Rukh. He is less known as a patron of calligraphers and painters than his nephew Iskandar Sultan ibn Umar Shaykh or his sons Bāyahunghur and Ibrahim Sultan, but he was a man of broad views and interests, he loved poetry, valued painting, knew music and was especially interested in history. Under him, such outstanding historians as Sharaf il-Din Ali Yazdi, the son of Shahrukh Mirza Ibrahim Sultan, Kamol al-Din Abdulrazzok Samarkandi, as well as the famous geographer and historian Hafiz-i Abru, the great artist Ghiyath al-Din Naqqash worked in Khorasan, but he seems to have been a particularly zealous collector manuscripts. After Shahrukh dies in 1447 Mirza Ulugh Beg led some masters to Samarkand to continue the artistic techniques characteristic of the Herat, but in 1449, after the death of Mirzo Ulugbek, the workshop ceased its work. The Timurid’s art of the book in Herat was restored during the time of Sultan Husayn Bayqara (1469–1506) and his vizir Alisher Navaï (1441–1501), they established a brilliant court which flourished for the next thirty-six years. Herat reached its apogee, while the city was famous for its magnificence throughout the Muslim East. Babur (1483–1530), the founder of the Baburid dynasty and the nephew of Sultan Husayn Bayqara, visited Herat before the conquest to India. Later, he wrote: “His (Sultan Husayn) was wonderful Age; in it Khorasan, and Herat above all, was full of learned and matches men. Whatever the work man took up, he aimed and aspired at bringing that work to perfection...”

All the arts of the book - painting, calligraphy, illumination, and binding - flourished under the patronage of the Timurids. Nowadays, numerous preserved manuscripts from Kitabkhana of the Timurids, which some of them have the original binding. One of the valuable examples is the binding incloses a luxurious manuscript of the poems of Farid al-Din Attar (d. 1221), which was copied in Herat in the year 841/1438 for the library of Shah Rukh Mirza [See: 14; 1; 7; 4; 9]. The inscription in thulth on the outer spine of the flap shows the originality of the binding:

لخز سلطان الاعظم مهين الدولة و الدين شاهرخ بهادر خان حان الله مماثلاً

“For the treasure of the great sultan, the Supporter of the religion and State, Shahrukh Bahadur, May Allah eternalize his kingdom”.

Ornamental floral designs with both fantastic and real animals decorate both faces of this masterpiece. The upper cover, was stamped with a single large block. The upper cover represents a landscape containing various animals, birds, and fabulous beings: two deer, two dragons are fighting with each other, two legendary creatures of Far Eastern origin, two antelopes and two monkeys are at play; the sky is indicated by means of flying ducks and stylized cloud bands. The composition of the landscape is filled with trees, flowers, and shrubs.
The inner covers, worked in filigree against a deep-blue ground, are equally splendid and are masterpieces of their kind. The medallion of the central panel inside the upper cover has as its chief motif two mythical animals of Chinese origin separated by a tree on a branch of which is perched a pheasant. The border of the medallion is decorated with "grotesque" arabesques – monster heads which are symmetrically framed by pairs of dolphins and heads of foxes. The pendants of the medallion have identical monster heads connected with heads of camels and ducks. The quarter medallions in the four corners have rabbits and deer among peonies. The wide border consists of a quatrefoils alternating with elongated shields. The quatrefoils contain hares, the shields a succession of different animals - monkeys, foxes, antelopes, lions, birds, surrounded by flower arabesques.

The inner side of envelope flap is filled with monkeys with delicate flower scrolls in filigree. In the center is a landscape showing a lion biting into the trunk of a tree. On side of this motif are two chi'lin and Chinese lion, and the whole background is filled in with naturalistic leaf and flower stems. The fore-edge flap divided into three sections, which is decorated with flower arabesques, shield motifs, an animal, and phoenixes, all executed in filigree. The outer side of the envelope flap depicts a landscape with legendary creatures of Far Eastern origin, one-half of which is a mirror image of the other. In the center has a mass of flame in the shape of a heart, which Chinese lions attack this motive from all sides.

The peoples of Movarounnahr and Khorasan agreed to accept from the Arabs the Islamic religion and the Arabic alphabet, at the same time, they used the technology of Arabic book in their practice. The external protective part of the books - bindings were one of the main elements determining the value of artistically designed manuscripts. Arabic books were small format and the bindings decorated with very modest geometrical ornamentation produced in blind tooling without gilding or fretwork design. The forms of decoration of the bookbindings that were introduced in Eastern countries with the Arabs, although reflecting some local influences, still retain their key appearance until the 15th century. The bindings prepared by the patronage of the Timurids have some peculiarities. First of all, it is noticeable that the shape of the ornaments and the structure of the Herat elements of the bindings have changed, emphasis was placed to make the decoration deeper than the surface the appearance of the floral ornament is clearly reflected in the background. At the beginning to decorate a cover of binding for each element used separate tools or forms made of iron or wood. Because of this, a large number of individual forms were used for one cover. In Herat, individual molds or tools have been abolished: the new technology was discovered and was created the possibility of using a complex-structured single metal block, which consists of geometric and plant decoration with traditional elements. As a result, in the decoration of covers, was the introduction of landscapes in blind tooling and in filigree work. Landscapes was filled with real and fabulous animals, birds, which they were derived from the art of the Far East and with floral design. The process of stamping landscapes in a blind tooling was used by single metal blocks. Usually the upper cover was executed with a single block and the inside cover was filigree decorations, which emphasized by dark blue painted backgrounds. The technique of filigree is an ancient one and was used to decorate Coptic and Manichean codices of tenth century, and begins to appear on covers in Mamluk Cairo at the end of the fourteenth century.

Another group of Herat bindings includes with large central medallions filled with delicate arabesques and floral decoration. An oval or round medallion – tumunj, a pendants – sartumunj are situated in the center of cover, a quarter of medallion –

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goshband is repeated in the each corner. Although medallions had been known before, they became especially popular among the Timurids craftsmen, who developed them considerably. The medallions were frequently cut out of the leather and filled in with paper or with leather filigree patterns.

A further development of the bookbinding of the Timurids was technique of miniature painting on papier-mâché boards under lacquer varnish. As mentioned above, there was an artistic relationship between China and the capital of the state of Temurids. Lacquer work had been introduced by Chinese craftsmen or by artist o. Herat who had visited to China is not known. Lacquered papier-mâché were frequently used in Islamic world after the invention of the Timurids, and not only the bookbinders, and illuminators and miniature painters played as important a part in it.

One of the technologies used in bookbinding of the Timurids period is decorating the cover with embroidery. The entire ornamentation of the covers is produced by embroidery in silk and gold on black leather, this technique was not yet known in the historical development of oriental bookbinding.

Unique bindings made in the Temurid period distinguished by their technical and artistic features in art. During this period, the development of bookbinding is inextricably linked with the desire of the rulers to appreciate the spiritual heritage and take care of it, to show personal interest in the book, to be worthy of respect for people thanks to the attention to the book and constant links between cultural centers of different countries and the growth of urban culture. Artists by the book are invited from different countries and local craftsmen have teamed up in a workshop in the palace of the rulers. Their collective efforts to create books were based on the exchange of creative experiences and cultural traditions. In this collective work of various masters of art there was a consistency and interconnectedness that ensured the unity and integrity of the style of the whole manuscript and its technical perfection.

References:

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