Research Article

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Exploring the Cave Rock Art of Siberian Trans-Baikal: Fertility, Shamanism, and Gender

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Abstract: The paper explores the phenomenon of rock art found in and around rock art cavities in Trans-Baikal region of South-East Siberia. Although many researchers noticed that caves have had a special value in cultures around the globe, no research has been carried out specifically into the cave rock art of Trans-Baikal which was not distinguished from other rock art found in open localities and shelters. This study was conducted based on field data collected by the author in 2017. In order to answer the question whether the cave sites had a specific role in the cultures of Bronze Age Trans-Baikal, the sets of motifs of the cave sites were compared to those of the closest open sites. Drawing on the stylistic difference revealed by the analysis and landscape context, it is suggested that the cave rock art sites could be places where rituals of more restricted nature took place. Ethnographic records may imply that these ceremonies were aimed at the fertility increasing being performed by shamans or shamannesses or without their assistance. It is also possible that the ceremonies could be gender-exclusive, conducted only for women, although this interpretation needs further research.

Keywords: Siberia, rock art, caves, Bronze Age

1 Introduction

1.1 Significance of the Cave Setting, the Definition of Cave, and the Novelty of the Research

Around the world, caves were noticed to exhibit a special value in religious life of different societies and were places where various rituals were performed (see David, 2017; Moyes, 2012b). For instance, in the Ancient Maya culture, caves were related to water rituals (Moyes, 2007). In Palaeolithic Europe, caves were suggested being places of initiation and shamanic journeys (Lewis-Williams, 2002). In Bronze Age Italy, caves were related to initiation, and a restricted access to the religious knowledge was noted (Whitehouse, 1992). In California, the symbolics of rock art sites and specifically those associated with caves was shown to contain reversed gender metaphors within shamanic religious system. Rock art sites were female-gendered, but were owned by male shamans (Whitley, 1988, 2000). Researchers studying different regions and cultures noticed that caves or other settings with restricted light and other conditions may have had a particular impact on human psychological state restricting or altering people's sense, thus heightening the feeling of sacred (Lewis-Williams, 2002; Montello & Moyes, 2012; Skeates, 2007; Tilley, 2008). Rock art found in caves adds more symbolic significance to a setting.

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Cave has many definitions and is usually understood quite broadly. An exhaustive review of this term definition, its usage, and applicability for cultural studies is presented in Moyes (2012a). She emphasised the importance of distinguishing between rockshelters and caves where the difference lies in the quality of light. While rockshelters feature only light and twilight zones which might have been used for habitation, caves contain a dark zone rarely utilised for this purpose. Importantly that notions about caves influencing people's senses mentioned above refer to the dark zones of the caves.

Trans-Baikal is a region in South-East Siberia in Russia. It is located to the east from Lake Baikal bordering Mongolia and China. Administratively, this area is constituted by the Republic of Buryatia, which is geographically referred to as Western Trans-Baikal, and by Zabaykalsky Krai, or geographically Eastern Trans-Baikal. Eastern and western parts of Trans-Baikal are divided by the Yablonovy Range. The landscape is mountainous with the taiga forest dominating on higher altitudes and steppes found at the bottoms of valleys between ranges. In Trans-Baikal, 18 rock art sites are found in caves or at the cave entrances, which is a small portion from about 200 rock art sites known in the region (Figure 1). The majority of these caves are concentrated in Buryatia, in the area which is defined as Selenga Dauria by speleologists. Few caves in the area are of karst nature, while the majority being a result of weathering; thus, they are not large and they lack the dark zone (Filippov, 1993). Although these sites do not strictly fit the Moyes' definition of caves, it is suggested to retain the term 'cave,' since the rock cavities in which the rock art sites are found are traditionally referred to as caves in the literature and by local people. The Trans-Baikal caves can be put in a category of shallow caves without the dark zone since they still differ from open rock art sites in that the latter might feature small protective overhangs which could be described as shelters but generally open to three dimensions, while the caves are enclosed spaces with an entrance. Therefore, even though the Moyes's approach appears to be well-founded for cultural studies of caves, in this paper, the cave is

Figure 1: Rock art sites of Trans-Baikal located in or associated with caves and grottos (green dots – surveyed in 2017, yellow dots – sites which were not examined by the author). *destroyed sites or sites which were not located after the initial report. (1) Nyukholty Grotto; (2) Sarbaduy; (3) Ust'-Kyakhta; (4) Gorodovoy Utyos; (5) Temnikovskaya Cave; (6) Povorot; (7) Gil'bira; (8) Ostraya Sopka (Bain-Togod); (9) Itantsa; (10) Nadeino; (11) Staraya Bryan'; (12) Bain-Khara; (13) Kashkarga; (14) Shaman-Gora; (15) Kirochi; (16) Dono; (17) Volch'ya (Avvan); (18) Irkutskaya Cave (Aikta).

understood as a natural cavity in a rock which is enclosed from four sides (background, two walls, and a ceiling). This is an instrumental definition to explore the question whether these enclosed spaces, or shallow caves, had a different role in the Bronze Age culture of the region compared to other rock art sites.

This issue has not been investigated, although the rock art of Trans-Baikal has a long and rich history of exploration and research which is briefly outlined below (for a review, see Ponomareva, 2019) along with a short introduction to the rock art of the region. Then the article proceeds with the outline of methods used, followed by the descriptions and analysis of cave rock art sites. The analysis is summarised in the section on the results, the meaning of which is attempted to unveil in the discussion.

1.2 A Brief History of Rock Art Research in Trans-Baikal

The first mention of the rock art of Trans-Baikal belongs to the eighteenth century, but it was not in the focus of explorers until the mid-second half of the nineteenth century. The period from 1840s to 1920s can be described as the time when more and more information on rock art has appeared in press and the initial suggestions on the age and cultural attribution were offered. Compared to other regions of Siberia, Trans-Baikal rock art was much less explored at the time, and the major advance was made in the Soviet period. In 1947–1958, the systematic research of Trans-Baikal rock art was conducted by the Buryat-Mongol archaeological expedition which was led by Alexey Okladnikov, the result being a two-volume monograph (Okladnikov & Zaporozhskaya, 1969, 1970). Okladnikov significantly advanced Siberian and Central Asian rock art research by bringing it into a prominent position within the broader field of archaeology and by providing the first reliable chronology of Siberian rock art. However, although Okladnikov provided information on eight cave rock art sites, no special research attention has been paid to the peculiarity of the cave context. Okladnikov's rock art research has been continued by Alexander I. Mazin in Eastern Trans-Baikal and by Alexey V. Tivanenko in Western Trans-Baikal in 1970s–1980s (Mazin, 1986, 1994; Tivanenko, 1989, 1990). They discovered and reported more rock art sites including some in caves and advanced further the understanding of regional rock art in general, but again cave rock art as a phenomenon was not in the focus of their research. In the last decades, many new rock art sites were reported by regional archaeologists, but with the demise of the Soviet Union, the epoch of large expeditions and big projects ended. In 2016–2019, I carried out my PhD project, and during fieldwork in Trans-Baikal, examined 91 rock art sites including ten found in/at caves. Viewing personally unique setting of each site inspired conducting the exploration on the nature of rock art found in the caves of Trans-Baikal.

1.3 Rock Art of Trans-Baikal

Several rock art traditions and groups are present in the region. The earliest rock art possibly belongs to the Late Pleistocene-Early Holocene depicting extinct fauna such as bison and rhinoceros. The majority of Trans-Baikal rock art is related to the Bronze Age. These are (1) painted Selenga tradition found throughout the region, usually on granite outcrops in the Steppe areas; (2) the sites of the painted Taiga/Forest group found in forested areas, some of them are possibly related to the Neolithic; (3) petroglyphs of the Kyakhta group found in a small area in South Buryatia; (4) petroglyphs on deer stones and decorated burial slabs (for more details, see Ponomareva, 2019, 2020).

The rock art found in caves solely belongs to the Selenga tradition; therefore, a short introduction is needed. The tradition includes the following motifs (in order of prevalence) (Figure 2): (1) non-figurative such as rows of dots and chaotic assemblages of dots which often occur in compositions with (2) simple and stick anthropomorphic figures with herringbone-like or square shoulders. Anthropomorphs are often depicted in rows. These compositions also might include (3) ornithomorphs. They are quite diverse in

Figure 2: Motifs and types of the Selenga rock art tradition (I. Ponomareva).

the manner they are depicted and include the following types: naturalistic, stylised, and schematic. All listed motifs are sometimes found within (4) enclosures, which can be round or rectangular and dominated by a simple variant featuring only assemblages of dots inside. The Selenga tradition is a complex and multi-componential phenomenon having its origin in the Early Bronze Age rock art tradition of the Taiga zone (4th–3rd Millennium BC) of Siberia and flourishing in the Late Bronze Age–Early Iron Age (13th–3rd Centuries BC).

2 Methods

The analysis is based on the previous author's research on the rock art of the region (Ponomareva, 2020). A stylistic and spatial analysis of this rock art led to better definitions of rock art styles and traditions through the elaboration on motifs and their types (see Ponomareva, 2020, Appendix 1). This typology and style definitions are used throughout this paper to compare the rock art found in caves and closest to them open-air sites (Figure 2). In addition to the analysis of sets of motifs and their types, the landscape context is also taken into account, such as the location near a watercourse and visibility of and from a site. The results of the rock art analysis are discussed with references to global research on caves sites and more importantly to regional ethnography. It is acknowledged that the patterns revealed in the motif compositions of the sites may have been the results of temporal change. Although it is currently impossible to provide this rock art with a higher chronological resolution than outlined in the Introduction, it appears that it is still possible to offer some suggestions regarding a possible function of the sites because they all belong to the same rock art tradition. This also implies that all motifs which are characteristic for the tradition are present at all sites. Therefore, the aim of the analysis below is to find differences in proportions of these motifs or specific types

of the motifs and thus to uncover patterns in rock art assemblages of the sites. In the following section, each cave site description includes previous research, any archaeological work that was carried out there, rock art assemblage, open-air rock art sites located in vicinity, their rock art assemblages, and the comparison of both.

2.1 Materials

More sites are found in the Republic of Buryatia, and this review starts from the south-west of the region moving to the east (Figure 1).

2.1.1 Sarbaduy Cave

Okladnikov documented three locations of the Sarbaduy rock art site, the third one being the cave (Figure 3: 1–4), and the other two being related to the Middle Ages (Okladnikov & Zaporozhskaya, 1969, pp. 46–47). He reported excavating a test pit with dimensions of 0.5×0.5 m and the depth of 0.35–0.3 m in the Sarbaduy cave. Pieces of bark, sheep astragali, fragments of horn, and two fragments of an osseous ornamented artefact were unearthed. The author's survey revealed that the paintings in the cave are very faded and blurred, almost unrecognisable, damaged by black coating, possibly soot, chalk outlines, and chalk graffiti left by vandals.

Figure 3: The case of the Sarbaduy cave. (1) A view from the Sarbaduy cave at the dzhida River valley; (2) Distribution of motifs in the Sarbaduy cave and closest open-air sites; (3) location of paintings in the Sarbaduy cave; (4) Sarbaduy cave, Panel 1, enhanced through DStretch-CRGB; (5) Narin-Khunduy, enhanced through DStretch-YRD; (6) Perevoznaya-3, enhanced through DStretch-YRD (Photo I. Ponomareva).

There are 20 figures recorded at this site, nine of them are undefined, eight non-figurative, and three ornithomorphs (Figure 3: 3 and 4). This site assemblage will be now compared to the imagery of two open-air rock art sites documented in the vicinity, Narin-Khunduy located in 3 km to south-east, and Perevoznaya-3 located in 2 km to south-west, on the same left bank of the Dzhida River (Figure 3: 2, 5 and 6). The Sarbaduy cave is located at the top of the mountain, overlooking the valley of the Ichetuy River which joins the Dzhida River here (Figure 3: 1), while Perevoznaya-3 is located at the foothill on the other side of this mountain, and the Narin-Khunduy is found also at the bottom, on the other side of the Ichetuy River, near the bank of the Dzhida River. The Narin-Khunduy site was documented by Okladnikov, and a horse burial was reported being unearthed at the site (Okladnikov & Zaporozhskaya, 1969, p. 40). There are 16 figures in total, six of them are zoomorphs, four non-figurative, four anthropomorphs, one ornithomorph, and one enclosure (Figure 3: 2 and 5). Six figures of zoomorphs are something rather unusual for the Selenga rock art sites because they are not normally dominated by zoomorphic imagery. The Perevoznaya-3 site was discovered by the author in 2017, and it features a single panel with eight figures on it, namely, three zoomorphs, one ornithomorph, one anthropomorph, two non-figurative, and one undefined (Figure 3: 2 and 6).

The Sarbaduy cave is dominated by non-figurative depictions, while both open-air sites by zoomorphs (Figure 3: 2). There is also a difference in the type of non-figurative motifs. The Sarbaduy cave is dominated by single crosses with one single saltire and one single vertical line also present, while both Narin-Khunduy and Perevoznaya-3 feature mostly rows of dots and “chaotic” assemblages of dots. Anthropomorphic figures are not found in the Sarbaduy, and only simple ones are present at Narin-Khunduy and Perevoznaya-3. More ornithomorphs are found in Sarbaduy, these are three figures, one is a cross-like, another is a stylised-square, and yet another one is undefined. Narin-Khunduy features one naturalistic depiction of a bird, and Perevoznaya-3 yielded one undefined in terms of type zoomorphic depiction. As was already stated, no zoomorphs are found in Sarbaduy, while six figures are found in Narin-Khunduy and three in Perevoznaya-3. The ratio of styles identified is similar at both sites, the majority being Selenga-associated group and the remainder stick figures. One enclosure motif is found only at the Narin-Khunduy site.

2.1.2 Ust'-Kyakhta Cave (Figure 4)

Three locations of the Ust'-Kyakhta rock art sites were documented on the right bank of the Selenga River by Okladnikov, two of which are open-air sites and the other, Location # 3, is found outside a cave (Okladnikov & Zaporozhskaya, 1969). Lbova and Khamzina (1999, p. 127) informed that the site was also surveyed by Mazin in 1986, and that Okladnikov studied the site in 1976, although the monograph was published in 1969. It is not clear where this information comes from. There is a non-backfilled excavation pit in the Location # 3, outside the cave entrance. Okladnikov and Zaporozhskaya (1969, p. 17) reported surveying the cave (Location # 3) and excavating 3 × 1 m pit inside the cave, near the entrance, where no ancient artefacts were unearthed. Lbova and Khamzina (1999, p. 127) mentioned excavating a test pit at the Location # 3, but did not provide any details on the outcome.

There are 180 figures in total recorded at the Ust'-Kyakhta cave, of which 52 are non-figurative, 51 are anthropomorphs, 35 are ornithomorphs, 10 are enclosures, and 31 are undefined (Figure 4: 1). The Ust'-Kyakhta cave is compared to other locations found nearby and to another open-air site Derevenskaya Mountain located on the other bank of the Selenga River in 8 km upstream. Ust'-Kyakhta # 2 is located in 1 km upstream from the cave (Figure 4: 1). There are 41 figures in total, of which 11 non-figurative, seven anthropomorphs, 19 ornithomorphs, one enclosure, and three undefined. Ust'-Kyakhta # 1 is located in 5 km upstream from the cave. There are 38 figures in total, of which 22 are non-figurative, 4 anthropomorphs, three ornithomorphs, two enclosures, four zoomorphs, and three undefined. Derevenskaya Mountain yielded 149 figures in total, of which 37 non-figurative, 29 anthropomorphs, 54 ornithomorphs, four enclosures, and 24 undefined.

So far there seems to be no apparent pattern in motif composition if the cave site is compared to other open-air sites. This observation is further supported by the analysis of each motif and their types found at the sites.

Figure 4: The case of the Ust'-Kyakhta cave. (1) Distribution of motifs in the Ust'-Kyakhta cave and closest open-air sites; (2) Ust'-Kyakhta cave, enhanced through DStretch-CRGB; (3) general view at the Ust'-Kyakhta cave (Photo I. Ponomareva).

When non-figurative motif is considered, it can be seen that all sites are dominated by rows of dots and “chaotic” assemblages of dots except Ust'-Kyakhta Location # 2 where a large proportion of single crosses is found. Anthropomorphic motif also represents a quite even picture. All sites are dominated by stick anthropomorphic figures except Ust'-Kyakhta Location # 1 where the dominant type is simple figures. Simple figures are also present at the Ust'-Kyakhta cave and Derevenskaya Mountain. In addition, these two sites are dominated by different types of stick figures; the cave has a larger proportion of stick-herringbone type while Derevenskaya Mountain yielded a larger proportion of stick-long tail type figures. When ornithomorphs are compared, no apparent pattern opposition can be defined between the cave and open-air sites. The cave is more similar to Derevenskaya Mountain in that all types of ornithomorphs are represented, although the latter is dominated by cross-like figures. However, this similarity can be explained by the large total number of figures which therefore may imply a diversity of types and styles. The other two sites feature different sets of motifs, Kyakhta Location # 2 being dominated by cross-like figures and Ust'-Kyakhta # 1 featuring three main types of ornithomorphs in even proportions. Zoomorphs are present in very small amounts at three sites, namely, one of Taiga style at the Derevenskaya Mountain, one undefined in terms of style at the Kyakhta cave, and four of Selenga-associated group at the Ust'-Kyakhta Location # 1. Enclosures are present at all sites; both types are identified at larger sites, Ust'-Kyakhta cave and Derevenskaya Mountain, and only one rectangular type is present at smaller open sites Ust'-Kyakhta # 1 and # 2.

Therefore, no apparent opposition can be seen in the sets of motifs in the case of Ust'-Kyakhta cave. The site exhibits some resemblance to another site of similar size across the Selenga River. Possibly, although

the Ust'-Kyakhta cave site is associated with a cave, all the paintings are found outside of it; therefore, strictly speaking this rock art is rather an open-air site, especially in the light of this analysis which did not reveal any special prominence of the Ust'-Kyakhta cave rock art site compared to the open-air rock art sites present in the vicinity.

2.1.3 Temnikovskaya Cave (Figure 5: 1–4)

The cave was first surveyed in 1888 by Ptitsyn who measured the cave and noticed the evidences of contemporary ritual worshipping such as Buryat *khadags* (traditional ceremonial scarf), several clay Buddhist stupas, and an image of Buddha (Ptitsyn, 1896, pp. 99–100). Later, the cave was studied by Tivanenko in 1977 (Tivanenko, 1990). He undertook excavations in the south-eastern corner of the cave and identified three layers. In the upper layer, artefacts of twentieth century were unearthed (a coin, a wooden case from Buddhist books, and a wooden plate with initials marked as 1941). The second layer yielded an accumulation of ash, burnt bones, three stone flakes, and a small piece of bronze. The third layer did not give any artefacts (Tivanenko, 1989, pp. 138–140; 1990, pp. 46–50).

There are 94 figures in total, of which 36 are non-figurative, 25 are anthropomorphs, 22 ornithomorphs, one enclosure, and nine undefined. The site is compared to an open-air site Galtay II found just in 0.4 km to north-west, upstream the Temnik River (Figure 5: 1). This site was discovered by the author in 2017. The set of motifs here differs from that of the cave. There are 34 figures in total, of which nine are non-figurative, 13 anthropomorphs, four enclosures, and eight are undefined. The difference is in that the cave is dominated by non-figurative motif, while the open-air site by anthropomorphs (Figure 5: 5). Another difference is that there is a substantial proportion of ornithomorphs in the Temnikovskaya cave and only

Figure 5: The case of the Temnikovskaya cave. (1) Distribution of motifs in the Temnikovskaya cave and the closest open-air site; (2) a view from the cave at the Temnik River valley; (3) Temnikovskaya cave, enhanced through DStretch-LRE; (4) plan of panels in the Temnikovskaya cave; (5) galtay II, enhanced through DStretch-CRGB (Photo I. Ponomareva).

one enclosure (Figure 5: 3), while at the Galtay II there are more enclosures present and no ornithomorphs recorded.

When each motif compared separately, some patterns can also be seen. At both sites, such non-figurative motifs as “chaotic” dots, rows of dots, and single dots are predominant with a quarter being rows of vertical lines or single vertical lines, although “chaotic” dots prevail in the cave and single vertical lines prevail at the Galtay II. There is a substantial difference in what types of anthropomorphs are present at the sites. While the cave has a quite diverse array of types, such as stick-herringbone, stick-wide, and short, simple, V-shaped, “unique” and square shoulders with stick figures dominating the anthropomorphic imagery, the open site yielded mostly square anthropomorphic figures with small amounts of stick-herringbone and “unique” figures. Ornithomorphs cannot be compared since none of them are found at the Galtay II site. In the cave, the type of cross-like figures (Figure 5: 3) is dominant with smaller proportions of stylised and naturalistic also present. No zoomorphs have been documented at either Temnikovskaya Cave or Galtay II. More enclosures are found at the open Galtay II site, majority being rectangular (Figure 5: 5), and only one round enclosure was recorded in the cave. Additionally, the setting of Temnikovskaya cave is alike to that of Sarbaduy cave described above. It is located about 600 m above the sea level with a magnificent view at the valley of the Temnik River (Figure 5: 2). Galtay II is located at the lower level with a more restricted view blocked by the rock outcrop and vegetation.

2.1.4 Nadeino Cave (Figure 6: 1–3, 6)

The site was reported in Okladnikov and Zaporozhskaya (1969) who provided tracings which do not match what was recorded during this survey. Tivanenko (1989, pp. 140–141) reported excavating two test pits, but provided stratigraphic description for only one without giving details about where exactly those test pits were. He identified five cultural layers featuring cultural assemblages from the Neolithic to modern time which included split animal bones, stone tools, ceramics, hearths, and accumulations of coals. No details about stratigraphic belonging of these finds were provided. The paintings are faded and damaged by exfoliation (Figure 6: 6). The site is graffitied over by vandals, and the paintings inside the cave are damaged by black coating.

Figure 6: The case of the Nadeino cave. (1) Distribution of motifs in the Nadeino cave and the closest open-air site; (2) general view at the Nadeino cave entrance; (3) plan of the Nadeino cave; (4) general view at the Nadeino Mountain site; (5) Nadeino Mountain, enhanced through DStretch-CRGB; (6) Nadeino cave; enhanced through DStretch-LRE (Photo I. Ponomareva).

Thirty-two figures in total have been recorded in the cave, of which 11 are anthropomorphs, eight non-figurative, seven ornithomorphs, three enclosures, and three undefined. The site is compared to the Nadeino (Pavlova Mountain) open-air site located in 2.5 km to south-west (Figure 6: 1). This site contains 130 figures in total featuring similar composition and proportion of motifs, namely, 45 ornithomorphs, 38 anthropomorphs, 29 non-figurative, eight zoomorphs, one enclosure, and nine undefined. The difference is in that ornithomorphs are less abundantly present in the cave, while zoomorphs are present only at the open Nadeino site (Figure 6: 4 and 5).

When each motif is considered separately in terms of types and styles, a few differences can be noticed; as at any other Selenga site, “chaotic” dots and rows of dots dominate the non-figurative imagery; however, the open Nadeino site yielded more diverse set of types, such as single crosses, single saltires, circle/rings, and single oblique line. Anthropomorphic figures also show a contrast. The cave site only features stick figures with stick-wide and short figures prevailing, while the open Nadeino site yielded a half of all anthropomorphs being square and square shoulders figures. Ornithomorphs are more abundantly present at the open site, the vast majority being naturalistic type with only two cross-like figures. In the cave, only six stylised ornithomorphs are present. Zoomorphs are only present at the open Nadeino site, the majority being Selenga-associated group. More enclosures were recorded in the Nadeino cave, all of them are round type (Figure 6: 6), and only one rectangular figure was documented at the open site.

Interestingly, the Nadeino cave differs in that while other caves can be described broadly as semi-circular cavities in the rock, this cave is a narrow long corridor with three panels recorded in the twilight zone in 20 m from the entrance (Figure 6: 3). One panel exhibits a group of anthropomorphic figures in an enclosure and another a composition consisting of several ornithomorphic figures and faded enclosure figures which may indicate some bird-human symbolism behind (Figure 6: 6).

To sum up, this case demonstrates a pattern opposite to the one seen in the previous case of the Temnikovskaya cave where ornithomorphs prevailed at the cave site and enclosure at the open-air site.

2.1.5 Staraya Bryan' Cave (Figure 7: 2 and 5)

The site was reported by Tivanenko (1990). According to Lbova and Khamzina (1999, p. 89), the site was discovered in 1974 by Okladnikov, but it is unclear where this information comes from. There are archival materials in Okladnikov's fund in Saint-Petersburg which contain tracings marked as Staraya Bryan'-73;¹ they match to some figures recorded during this survey, but they are not those published by Tivanenko (1990). There is also correspondence between Okladnikov and Tivanenko,² and in a letter dated to 28 March 1975, Tivanenko informed on discovering 50 new sites. There is Novaya Bryan' site on the list with a drawing attached which depicts the same scene present among Okladnikov's copies, but differs in some details. Thus, this is a different copy, and it does not match neither Okladnikov's copies nor those published later in Tivanenko (1990). According to Tsybiktarov (2011, p. 47), the site was discovered by Komisarova, a staff member of National Museum of the Republic of Buryatia who made tracings and gave them to Tivanenko. Thus, it is not clear who is the author of the discovery of this site. In 1992, excavations were undertaken in the cave which revealed cultural remains related to the Bronze Age (Lbova & Khamzina, 1999, p. 89).

There are 67 figures in total recorded in the Staraya Bryan' cave, and the majority (44) are non-figurative motifs such as groups of dots and vertical lines. The remainder is six anthropomorphs, six ornithomorphs, and 11 undefined. This site is compared to the Golubinka rock art sites located just in 11 km to the north, along the same river course (Figure 7: 3). It is a nice spot for gatherings, this place is still visited, and there is evidence of worshipping the site (Figure 7: 1, 4). Branches of trees around the rock are adorned with colourful *khadags* which are quite usual thing to find near rock art sites of Buryatia. The rock art here is badly damaged by weathering and vandalism. The total number of figures is 29 and half of them

¹ The Archive of The Russian Academy of Sciences St. Petersburg Branch, Fund 1099, Inventory 1, File 760.

² The Archive of The Russian Academy of Sciences St. Petersburg Branch, Fund 1099, Inventory 1, File 357.

Figure 7: The case of the Staraya Bryan' cave. (1) Obelisk at the Golubinka site; (2) plan of Staraya Bryan' cave; (3) distribution of motifs in the Staraya Bryan' cave and the closest open-air site; (4) general view at the Golubinka site; (5) general view at the Staraya Bryan' cave (Photo I. Ponomareva).

are anthropomorphic figures. If we compare the set of motifs for both sites, there are some differences. In Staraya Bryan', the abstract designs prevail, while in Golubinka anthropomorphic figures dominate. Regarding each motif type, the non-figurative designs in the cave site are dominated by rows of dots with the remainder being “chaotic” assemblages of dots, single dots, and single vertical lines, while at the Golubinka site only three groups of “chaotic” dots were recorded. Although anthropomorphic figures prevail in the open Golubinka site, both sites are dominated by stick-herringbone type. The difference is that one simple figure is found in Golubinka, and two stick-wide and short figures in the Staraya Bryan' cave. There is similar amount of ornithomorphs at both sites, six in Staraya Bryan' and five in Golubinka; however, they are of different types. While the cave is dominated by schematised cross-like figures, the open site features mostly naturalistic depictions of birds of prey.

2.1.6 Bain-Khara Cave (Figure 8: 2 and 3)

The site was first mentioned by Popov (Chenkirov & Popov, 1928), and later fully documented and published in Okladnikov and Zaporozhskaya (1969, pp. 89–91), which also mentions a test pit in the cave where pottery sherds resembling the Bronze Age or Iron Age ceramics were unearthed.

The site is one of the most prominent in the region featuring the largest amount of 647 figures recorded at a single site. The paintings are found outside and inside the cave, made with pigment of different tints of red and in various styles. The set of images is very diverse and includes all types of motifs recorded at the

Figure 8: The case of the Bain-Khara cave. (1) Distribution of motifs in the Bain-Khara cave and the closest open-air sites; (2) general view at the Bain-Khara cave; (3) Bain-Khara cave, enhanced through DStretch-CRGB; (4) Gol-Tologoy, enhanced through DStretch-LRE; (5) Bom, enhanced through DStretch-LRE (Photo I. Ponomareva).

Selenga tradition rock art sites of the region (Figure 8: 1, 3). This set is slightly dominated by non-figurative motifs (235), then followed by anthropomorphs (192), ornithomorphs (128), enclosures (34), zoomorphs (13), and undefined (45).

There are several much smaller sites found around the Bain-Khara Cave, each featuring slightly different set of motifs (Figure 8: 1). Narsatuy located in 6 km to the west yielded 15 figures in total, the prevailing motif being anthropomorphs, Gol-Tologoy located also in 6 km but to the north-east with 52 figures in total is dominated by ornithomorphs, and Bom located in 7 km to the east featuring 21 figures in total, the majority being non-figurative. Regarding motif types, there are similarities and differences. Concerning the non-figurative motifs, at all sites the motif of rows of dots prevails. The types of anthropomorphs are present in different proportions. While in the cave all types are present with stick-herringbone figures being predominant, in Narsatuy only this type is present, in Gol-Tologoy almost all types, such as simple, stick-herringbone, square, and square shoulders are present in equal proportions, and in Bom simple figures prevail. In Bain-Khara, all types of ornithomorphs are also present, and this motif is dominated by the schematised cross-like figures. In Narsatuy, only two naturalistic kite-like figures were recorded. In Gol-Tologoy and Bom, two types dominate, naturalistic and stylised-geometric in the former, and cross-like and naturalistic kite-like in the latter. The next motif, zoomorphs, is represented at two sites, Bain-Khara Cave and Gol-Tologoy (Figure 8: 4), and Selenga-associated group dominates at both of them. Enclosures are present at all four sites. While in the cave, rectangular and round figures represent almost equal proportions, only round ones are present at Gol-Tologoy and Narsatuy, and rectangular ones prevail at Bom (Figure 8: 5).

To sum up, the Bain-Khara Cave yields a very diverse set of motifs and styles, while smaller satellite open sites differ in what motif types prevail.

2.1.7 Gorodovoy Cliff (Figure 9)

The site is located on the mountain Khutgei-Khan above the Chikoy river overlooking the valley (Figure 9: 3). The Chikoy river there serves as an actual border with Mongolia; the mountain was used as an observation post

Figure 9: Gorodovoy Cliff cave rock art site. (1) Plan of the cave and ornithomorphic depictions on the ceiling; (2) general view at the cave; (3) a view at the Chikoy River valley from the cave (Photo I. Ponomareva).

by Cossacks and the cave was used as a shelter to watch Mongols. The mountain is still worshipped by local people. There are two smaller caves on the mountain, but no rock art is present in them. The site was first mentioned by Khoroshikh (1972) and later documented by Tivanenko in 1977 (Tivanenko, 1990).

The total number of figures is 213, and the dominating motif again is non-figurative designs. There are also 31 anthropomorphs, 36 ornithomorphs, two enclosures, and 22 undefined. Concerning the types of motifs, “chaotic” assemblages and rows of dots dominate among the non-figurative. Within the body of anthropomorphs, two types prevail, simple figures and stick-herringbone ones, although other types such as stick-wide and short, square, square shoulders, and “unique” are also present. Concerning the ornithomorphs of the site, more than a half is schematised cross-like figures, and the rest are naturalistic and stylised. No zoomorphs are present in the Gorodovoy Cliff site. Two types of enclosures, round and rectangular, are equally present at the site.

Importantly, it is to be emphasised that ornithomorphic figures have quite a prominent position at this site. The most outstanding painting is located on the ceiling of the cave where in the centre of the composition consisting of various motifs three large birds are depicted (Figure 9: 1). There are a couple of *khadags* attached to a tree at the entrance of the cave (Figure 9: 2). However, the cave is badly damaged by tourists who made fires in the cave and left their initials on the walls. There are no known open rock art sites in the vicinity of the Gorodovoy Cliff to compare the set and proportion of motifs. It is important to note that this is another site located quite high at the top of the mountain with a breathtaking view at the river valley.

2.1.8 Shaman-Gora (Figure 10)

The site considerably differs from the ones described above; however, it is important to consider it here because it is also a cave and maybe this is an important characteristic in the context of continuity in worshipping of rock art places in the region.

The site was discovered in 1996 by the Chikoy archaeological expedition led by Konstantinov (Konstantinov, Ekimova, & Vereshhagin, 2008; Konstantinov, Konstantinov, Vasil’ev, Yekimova, & Razgil’deeva, 2003). The authors related the site to the Neolithic–Bronze Age, although the site imagery features depictions of extinct fauna such as Steppe bison. The site is known for its splendid panel in a grotto

Figure 10: Shaman-Gora grotto. (1) General view at the grotto; (2) Tracing of the main panel (Photo and tracing I. Ponomareva).

depicting a herd of bison and other fauna (Figure 10: 2). However, there are five locations all found on the same slope of a mountain. Location # 1 is a grotto with a single panel where 49 figures were identified, most of them are naturalistically depicted bull-like animals and two figures are anthropomorphic.

The other locations are open-air sites found nearby (Konstantinov et al., 2003). Location # 2 has two panels with 19 figures on them, most of which are abstract motifs such as rows and pairs of parallel vertical lines. Panel 2 exhibits a composition with two anthropomorphic figures and groups of vertical lines. Location # 3 has a group of vertical lines and a composition consisting of a small anthropomorphic figure and three vertical lines to the right, and Location # 4 has a single panel with vertical lines painted on it, probably the remains of some exfoliated figure. Location # 5 features a single composition consisting of two anthropomorphic figures and a boar-like zoomorphic figure. These locations were preliminarily related to the Neolithic–Bronze Age, and authors reported collecting surface artefacts identified as Paleolithic and Neolithic in the vicinity of the rock art locations (Konstantinov et al., 2003).

The site was visited during this project fieldwork and recorded using Structure from Motion (SfM) photogrammetry which allowed producing a better tracing of the painting (Figure 10: 2) for more thorough interpretation.

It may be concluded that the main panel of the Shaman-Gora is multilayered and related to a period of at least eight thousand years, assuming that the identification of the taxa in rock art imagery is fully correct. It can be quite confidently stated that some of the images, first of all the depictions of steppe bison, appeared no later than 8,000 bp. The aurochs could have been painted any time from the Pleistocene and during the Holocene period since they become extinct only several hundreds of years ago (Stuart & Lister, 2012). A possible image of an elk could have been painted any time during the Holocene, and its occurrence on the right edge of the composition points to its relative late appearance compared to the core composition. The anthropomorphic figure in the top left corner of the composition is related to the Selenga tradition, and another anthropomorphic figure on the exfoliated part of the panel more likely is also related to the Bronze Age.

Concerning other locations, at Location # 2 a composition with an anthropomorphic figure with a similar headdress is present in a composition with groups of vertical lines – a motif often found in the context of Bronze Age rock art. Location # 3 also has an anthropomorphic figure and vertical lines characteristic for the Selenga tradition. In Location # 4, only oblique lines are present which can be of any age. And finally, Location # 5 has a composition consisting of a boar-like animal, the earliest osteological remains of which were found in the Mesolithic cultural layers, and two anthropomorphic figures not typically found in Selenga rock art. Thus, this composition could have appeared any time from the Mesolithic onward.

Therefore, the complex Shaman-Gora rock art could appear as early as 8,000 bp and functioned in the cultures of the Neolithic and Bronze Ages. It is interesting to note that the grotto of Shaman-Gora is surrounded by smaller satellite sites in a way similar to the case of Bain-Khara cave.

2.1.9 Dono and Avvan

Dono was discovered in 1983 by Mazin (1986). Information about the Avvan site was reported in a book on local history and lore (Fedotov & Myasnikov, 2015). These two cave sites feature a small and uniform imagery. Dono yielded 12 figures, 10 of which were non-figurative and the remainder was undefined. Avvan yielded four figures in total, three of which were also non-figurative and the remainder undefined. The closest open site is Chandaicha, located to the south-west, in 46 km from Dono and 112 km from Avvan. Twenty-four figures were recorded in total, containing 11 anthropomorphs, seven non-figurative, one ornithomorph, two zoomorphs, and three undefined. Although this case conforms to the pattern described above that non-figurative imagery dominates cave sites, the fact that two cave sites are badly damaged by weathering and feature a small quantity of images does not allow for generalisations.

3 Results

Every rock art site is unique in its setting and art. However, the analysis of sets of motifs in the caves as compared to open sites found nearby revealed some interesting patterns which are summarised below and in the Table 1.

First, non-figurative art dominates in the cave sites. Exceptions to this rule are Ust'-Kyakhta which did not yield any pattern in this comparison and Shaman-Gora which presents a unique case of possibly the earliest imagery in the region. Second, ornithomorphs have a prominent position in the caves being often dominated by the cross-like type. Exceptions are Nadeino cave which is the only case when an open site is considerably larger than the cave site, and again Ust'-Kyakhta and Shaman-Gora. Third, more anthropomorphic figures occur at the open sites, and last, zoomorphs are more often present also at the open sites.

To sum up, not all the sites considered above feature the same pattern. The sites Sarbaduy, Temnikovskaya cave, Staraya Bryan' cave, and Gorodovoy Cliff cave not only have analogous sets of imagery dominated by non-figurative and ornithomorphic figures, but also exhibit similar landscape settings characterised by the location at or close by the mountain top with a broad perspective onto a river valley. The sites Bain-Khara and Shaman-Gora are similar in that they resemble a planetary system with the main large site yielding multi-style and diverse rock art surrounded by several small satellite sites with one or a few panels. Two sites, Nadeino cave and Ust'-Kyakhta cave, do not fit in the patterns identified above. Ust'-Kyakhta cave is a large site with diverse imagery and is technically not a cave site which might be an explanation. Nadeino cave represents an interesting case, because although it does not fit in the pattern of the four cave rock art sites, it exhibited bird symbolism discussed in the next section.

4 Discussion

As was noted in the Introduction, when interpreting rock art or other artefacts associated with caves, researchers highlight the restricted nature of the cave setting which might have impact on human senses and consciousness. An important characteristic of caves is their liminality; they “cut across so many physical and conceptual boundaries” (Skeates, 2007, p. 94) being “neither inside, nor outside the mountain; neither above, nor below the ground” (Haaland & Haaland, 2011, p. 27). While some scholars uncovered the role of cave as an essential element in the shamanic religious system (Lewis-Williams, 2002), others suggested caves

Table 1: Summary of the comparison of cave and open-air rock art sites

Site name	Cave sites	Open-air sites	Location of depictions
Sarbaduy	>non-figurative Single crosses and saltires >ornithomorphs	>zoomorphs dots	Inside the cave
Ust'-Kyakhta	None	none	Outside the cave
Temnikovskaya cave	>non-figurative >ornithomorphs (cross-like) >"chaotic" dots Diverse anthropomorphs	>anthropomorphs >enclosures >single vertical lines >square anthropomorphs	Inside the cave
Nadeino cave	>"chaotic" dots and rows of dots >square janthropomorphs >enclosures	Zoomorphs >diverse non-figurative >stick and wide anthropomorphs >ornithomorphs (naturalistic)	Inside the cave, the open site is larger
Staraya Bryan' cave	>non-figurative (rows of dots) >cross-like	>anthropomorphs >more naturalistic ornithomorphs	Inside and outside the cave
Bain-Khara cave	>non-figurative Diverse and all the types and motifs are present	Various compositions Narsatuy > anthropomorphs Gol-Tologoy > ornithomorphs, zoomorphs Bom > non-figurative	Inside and outside the cave
Gorodovoy Cliff	>non-figurative ("chaotic" and rows of dots) Ornithomorphs on the ceiling >cross-like	—	Inside and outside the cave
Shaman-Gora	>zoomorphs Earlier imagery	>non-figurative (rows and pairs of vertical lines) >anthropomorphs	Inside the grotto
Dono and Avvan	>non-figurative	—	Inside and outside the cave

being used for initiation rituals, possibly into secret societies because they are not suitable for large-scale ceremonies (Owens & Hayden, 1997; Whitehouse, 2007). Both venues of interpretation are reasonable depending on the context of a site in question. Some Siberian rock art was demonstrated to evidence shamanic worldview and practices in not only scenes depicted, but also being associated with clefts, depressions, and cracks in rocks, "In the landscape of Siberian peoples, rocks were perceived as dwelling places of spirits and the rock faces were believed to be a veil through which the otherworld was hidden, usually inside a mountain" (Rozwadowski, 2017a, p. 76).

It appears that the results of the Trans-Baikal cave rock art analysis indicated that there are some elements which could reflect shamanic beliefs, especially when also taking into account the role of eagle in Siberian shamanism (e.g. Eliade, 1972, p. 69, 156, 479) and the wide occurrence of the ornithomorphic motif in the rock art of Trans-Baikal, particularly in caves. It is tempting to immediately jump to ethnographical evidence to find explanations for the patterns revealed above; however, the application and utilisation of ethnographical analogues for Bronze Age rock art should be justified and carried out with caution. The Steppe belt of Eurasia was a region of constant movement of nomadic groups since the Late Bronze Age, the period to which the rock art considered here belongs. Notwithstanding such a dynamic cultural context, the rock art sites exhibit continuous religious worshipping over millennia. Therefore, some suggestions and

assumptions can be made regarding their symbolics drawn from ethnography of the Buryats who inhabit the region today, Mongols closely related to them, and Yakuts who share some ancestry with the Buryats (Galdanova, 1987).

The cultural and historic dynamics resulted in the religious complexity of the region. The Buryats are a Mongolic-speaking people whose emergence as an entity with ethnic identity was suggested to occur in the 16th–18th centuries when the Russian colonisation of the region resulted in the appearance of border with Mongolia which stopped the permanent flux of various nomadizing groups to and from Trans-Baikal (Mikhailov, 1980). The Russian missionaries also attempted to christen the Buryats, but had more success with Western Buryats inhabiting the region to the west from Lake Baikal who, however, largely retained their shamanistic beliefs and practices. In Trans-Baikal, which is populated by Eastern Buryats, the Lamaism spread in the eighteenth century resulting in the suppression of Shamanism, though absorbing some of its elements, such as the inclusion of some local religious and mythic characters in the Lamaism tradition and the veneration of specific sacred sites which had been places of shamanic ritual (Heissig, 1953; Humphrey, 1995). Therefore, much of ethnographic information on Buryat shamanism was collected from the Western Buryats.

As was noted above, there is a strong bird symbolism in Siberian shamanism. Especially, important place was occupied by eagle. According to the Buryat, as well as Yakut tradition, one version of the myth about the first shaman was that it was an eagle who was sent by the Gods to protect people from bad spirits (Dashieva, 2014; Neumann Fridman, 2004, p. 90). Eagle and kite were sacred birds for Buryats (Mikhailov, 1980, p. 77). Birds were spirits-helpers of shamans which is expressed in the elements of shaman's costume which turned shaman into a bird-man who could borrow powers from a bird such as an ability to fly or the eagle's eyesight (Balzer, 1996). One type of costume, the eagle *orgoi*, was made from the eagle's skin taken together with the wings (Mikhailov, 1987, p. 109).

However, some Buryat and Mongolian ethnography suggests another link of explanation. The cave rock art sites could also be associated with women's religious practices, and this also raises the question of the gender authorship of rock art.

From ethnography, we know that the Mongols and the Buryats have had cults of mountains, rocks, and other natural places including caves which as they believed were inhabited by spirits-guardians. There were special caves which were related to female fertility cults. They were called *umai* or *ekhyn umai* which means 'mother's womb' and were believed to gift children (Galdanova, 1987, p. 27). Galdanova suggests that these cave rituals are remnants of the archaic cult of the Mother-Earth, or the Goddess of Earth *Etughen*. There are records of female-only rituals related to this cult among the Western Buryats performed as late as the early twentieth century. Interestingly, even young boys were not allowed to enter an area where the ritual took place. Women adorned themselves with the bird cherry flowers, bared their breasts, and prayed to the Sky asking for youth and fertility.

Another indication of the possibility that some caves with rock art could be associated with fertility is some aspects of the cult of eagle among Buryats which is related to the Olkhon Island on Lake Baikal (Galdanova, 1987, p. 37). The Buryats believe that eagle is a son of the master of the Olkhon island, and there are ethnographic records that several Buryat tribes visited the cave of the Olkhon Cliff asking to gift children. The relation of the cult of eagle to the fertility cult can be explained by the belief that the eagle was an ancestor of some groups of Buryats. Interestingly, among Yakuts, childless women prayed the eagle to gift the soul of a child.

The information provided above is provocative to ruminate about the possibility that some cave rock art sites might have been gendered, and the difference in rock art revealed in the caves and at the open sites may be also explained through the gender of artists. However, the rock art analysis did not reveal a dominating pattern, and this could mean that there are several explanations possible, such as that some caves might have been used by shamans, and there is ethnographic evidence to support this. Galdanova (1987, pp. 27–28) gives an account about the cave Dayan Derkhi in Khövsgöl Province in Mongolia where only a shaman could perform a sacrifice of a ram on a stone slab at the entrance to the cave. However, again the rituals that took place there aimed at the abundance of children. It was believed that a person had to crawl through the *ekhyn umai* of the cave in order to become healthy, wealthy, and to have many offsprings.

This is a belief commonly found in Central Asia. Rozwadowski (2004, pp. 104–106) reports a similar place in Uzbekistan where crawling through a natural tunnel in a rock served as spiritual cleansing. He also notes that today this ritual is believed to enhance fertility among women who have problems with pregnancies. Another interesting aspect of the belief associated with *Umai* is found among the Turkic-speaking Khakass who believed that the goddess *Umai* lived inside the Ymai-tas Mountain and guarded the spirits of children who died (Rozwadowski, 2017b, p. 421). This relation of the cult of *Umai* to afterlife shows its connection to shamanic practice. The examples of ritual crawling through the *umai* also have some shamanic dimensions such as the performance of the ritual by a shaman and serving of crawling for spiritual cleansing. Therefore, the discussion of the fertility cult and related beliefs and practices takes us back to the discussion of shamanism, because these two dimensions of cave symbolics are difficult to disentangle. The connection of fertility cult to possibly women exclusive ceremonies and practices of shamanism now turns our attention to female shamanism.

The role of eagle in the appearance of the first shamans has already been highlighted. Another important character of this mythic story is a woman who, according to one version, was the first shamanness who received the shamanic gift from eagle, and according to another, she was the mother of the first shaman being conceived from eagle (Dashieva, 2014; Khangalov, 1996). Another story which shows the importance of eagle in creating a shamanness is about a girl who became a shamanness in the age of seven after eagle carried off her sheep which was a sign for her to become a shamanness to protect her village from evil spirits (after Neumann Fridman, 2004, pp. 142–143). Many Soviet scholars believed that women were the first cult specialists being related to very archaic cult of fire (Mikhailov, 1980, pp. 89, 92, 93). An interesting fact is that the epic stories of Siberian people, particularly Turkic groups, only mention shamannesses (Mikhailov, 1980, p. 91). Therefore, female shamanism was very significant in Siberia, and some researchers even suggested that female shamanism was predominant in Siberia emphasizing that shamannesses were endowed with greater sacred power than male shamans (Batianova, 1994; Diakonova, 1997). Mikhailov (1987, p. 124) mentions a story about shaman Tohor who made 99 men and 88 women shamans. In Tuva, according to the census of 1931, there were 411 shamans and 314 shamannesses (after Neumann Fridman, 2004, p. 250). This gives some indication of how many female shamans were there. Among the Buryat, there is a myth about Aisykhan and Khusykhan who were the first shamannesses. They found two boys, Bulagat and Ekhirit, who became the founders of two Western Buryat tribes. Mikhailov (1980, p. 173) sees an analogue of the character of Aisykhat in the Yakut Goddess Aisyt who gifts a soul to a child and helps pregnant women (Popov, 1928). This is an interesting connection of fertility, shamanism, and female ritual practices.

While the cave rock art sites might have been related to the performance of the fertility/shamanic/female rituals, not necessarily gender-exclusive, the open sites could have been places for other kinds of ceremonies. This analysis of cave rock art sites revealed the difference in motif assemblages. If it is possible that the emphasis on abstract motifs implies that cave sites were places where ritual of more restricted nature took place, then this corresponds to the fact that the issue of having more children is of a private character. Open sites feature more depictions of rows and groups of human figures, which together with the availability of space at the sites may indicate the occurrence of some sort of gatherings and communal ceremonies.

Buryats regularly held communal ceremonies called *tailagans* aimed at the prosperity of a clan or a village (Mikhailov, 1987, p. 66). They included animal sacrifices and prayers to Gods and spirits to ensure wealth and well-being of the community and celebrations (feast, competitions, dancing, etc.). *Tailagans* took place from the end of spring to the end of autumn. They were organised in picturesque spots at the foot of mountains, near a river or a lake. Interestingly, only men and children could participate in *tailagan*, (Mikhailov, 1987, p. 68). Women remained in the village and hold their own female *tailagan* called *tohoroon* (Mikhailov, 1980, p. 87). They joined men in the celebration when the men returned to the village. Shamans and their assistants were leading the ceremonies making prayers and sacrifices (Banzarov, 1891), although according to old traditions, among some groups of Buryats shamans were involved in *tailagan* as ordinary participants (Mikhailov, 1980, p. 115) or were not allowed (Manzhigeev, 1978, p. 8). One of the ceremonial elements of *tailagan* was a ritual circle dance called *yokhor*. Mikhailov (1980, p. 86) believes *yokhor* was an important part of *tailagan* in prehistoric times because it imitates roundup hunting. *Yokhor* was performed

at the end of *tailagan* by maidens and women, while men participated in sport competitions (Dashieva, 2009). About *yokhor*, it is worth mentioning that the depictions of rows of anthropomorphic figures holding each other's hands are common in the rock art of Trans-Baikal, and in this analysis, they were observed to be found more often on open-air rock art sites.

In the context of ritual usage of rock art sites, it is interesting to mention recent research on the spatial organisation of ancient 'sanctuaries' in Western Trans-Baikal (Tashak & Antonova, 2019). Although it does not consider any open sites analysed in this paper, the evidence presented on other rock art sites of the same Selenga tradition indicates that the space there was thoroughly organised by stone-built structures of sectoral and semicircular shapes. The construction of these structures is related to the Bronze Age.

It appears that the Bronze Age was the period of the risen religious activity with many sanctuaries being initially constructed during this period (Tashak & Antonova, 2019). This might be explained by intense ethno-cultural processes that took place in the Late Bronze Age which are reflected in rock art (Ponomareva, 2020). However, the continuity in worshipping rock art sites through millennia can also be observed. Shaman-Gora could be at least 8,000 bp and it likely functioned well into the Bronze Age because the main panel in the grotto exhibits Bronze Age figures added to the composition as if respecting what was there before. Note that the anthropomorphic figure on the exfoliated part of the panel has a headdress and something round-shaped next to its left hand which was interpreted as a drum, and therefore, the figure itself was assumed to be a depiction of shaman by previous researchers (Konstantinov et al., 2003). Another example is the Bain-Khara cave. Although the whole complex belongs to the Bronze Age, there are several depictions which could be related to the Neolithic. The amount and diversity of rock art at this site indicate its significance which could not be vanished in a short period of time. Many rock art sites are still worshipped in Trans-Baikal. Colourful *khadags* and *oboos* (sacred stone heaps used as shrines devoted to the masters of places) are common attributes of rock art sites, especially in Buryatia. In some instances, Bronze Age rock art is accompanied by Buddhist blessing inscriptions.

This continuity does not prove that the meaning of places and ceremonies performed there persisted without change through millennia. However, taking together all strands of evidence such as the analysis of rock art, its context, and ethnographic data, the diversity of ritual usage of rock art sites could be suggested. Cave sites could be places of more private ceremonies. The symbolics of cave ritual usage and related beliefs show several dimensions which are impossible to disentangle. These are the cult of eagle, fertility cult, shamanic religious system, and women-associated religious beliefs and practices. All these elements appear to be interconnected in a fascinating way. Open sites could be used for gatherings and various communal ceremonies similar to the Buryat *tailagan*. Interestingly, *tailagans* used to be male-exclusive ceremonies. Whether open-air rock art sites were male religious places as an opposition to the female caves is an intriguing question. The diversity of types of Bronze Age sanctuaries in the region (Tashak & Antonova, 2019) implies the diversity of rituals that could have taken place at the open rock art sites. This paper revealed similar religious complexity of cave rock art sites.

5 Conclusion

The paper explored the phenomenon of cave rock art in Trans-Baikal which had not been in a researchers' focus previously. Some of the materials presented here are published for the first time being the author's field discoveries made in 2017. Although there is no large amount of cave rock art sites in the region, they represent a particular type of religious places. Stylistic analysis revealed that the rock art in caves is dominated by non-figurative and ornithomorphic motifs. The wide occurrence of the non-figurative art may imply the private or restricted nature of ceremonies in the caves. The presence of the ornithomorphic motif and the landscape setting of the caves high above the river valleys with magnificent views may suggest the relation of the caves to the cult eagle. It is inferred that the eagle symbolism together with the meaning of the cave in the cultures of the Siberian peoples may imply that the caves could be associated with the practice of shamanism and the performance of fertility increasing rituals.

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