Неандертальцы Северной Азии

А. Кривошапкин

PNAS
Proceedings of the National Academy of Sciences of the United States of America

RESEARCH ARTICLE

Archaeological evidence for two separate dispersals of Neanderthals into southern Siberia

Kseniya A. Kolobova, Richard G. Roberts, Victor P. Chabai, Zenobia Jacobs, Maciej T. Krajcarz, Alena V. Shalagina, Andrey I. Krivoshapkin, Bo Li, Thorsten Uthmeier, Sergey V. Markin, Mike W. Morley, Kieran O'Gorman, Natalia A. Rudaya, Sahra Talamo, Bence Viola, and Anatoly P. Derevianko

PNAS February 11, 2020 117 (6) 2879-2885; first published January 27, 2020 https://doi.org/10.1073/pnas.1918047117

Edited by David Lordkipanidze, Georgian National Museum, Tbilisi, Republic of Georgia, and approved December 30, 2019 (received for review October 15, 2019)

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FAU FRIEDRICH-ALEXANDER UNIVERSITÄT ERLANGEN-NÜRNBERG
FACULTY OF HUMANITIES, SOCIAL SCIENCES, AND THEOLOGY

ИНСТИТУТ АРХЕОЛОГИИ И ЭТНОГРАФИИ · СО РАН ·

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Національна академія наук України

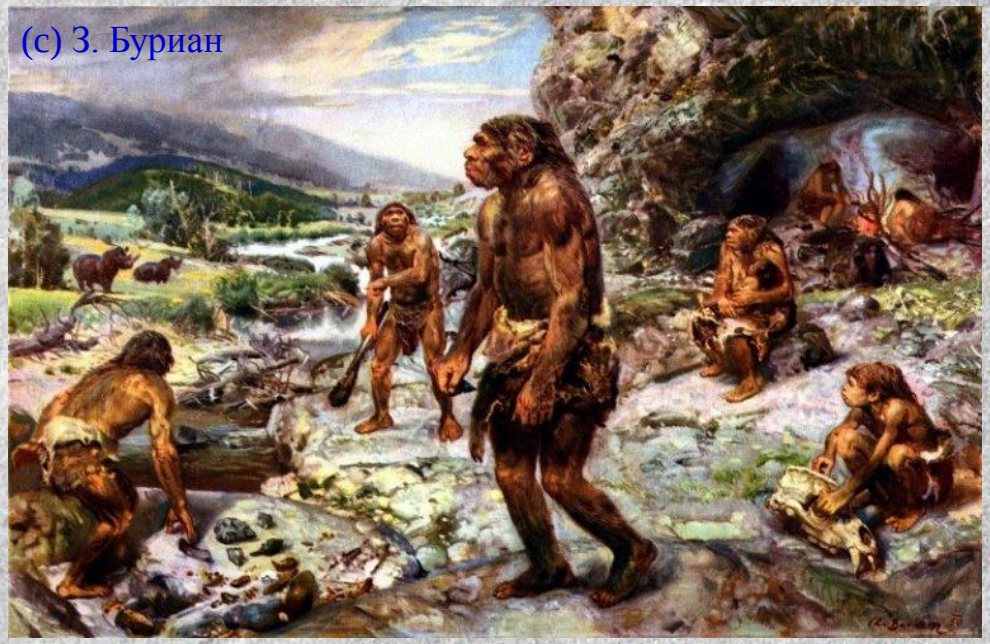
UNIVERSITY OF TORONTO

ING PAN

Визуализация образа неандертальца в XIX – сер. XX вв.

(с) Ф. Купка

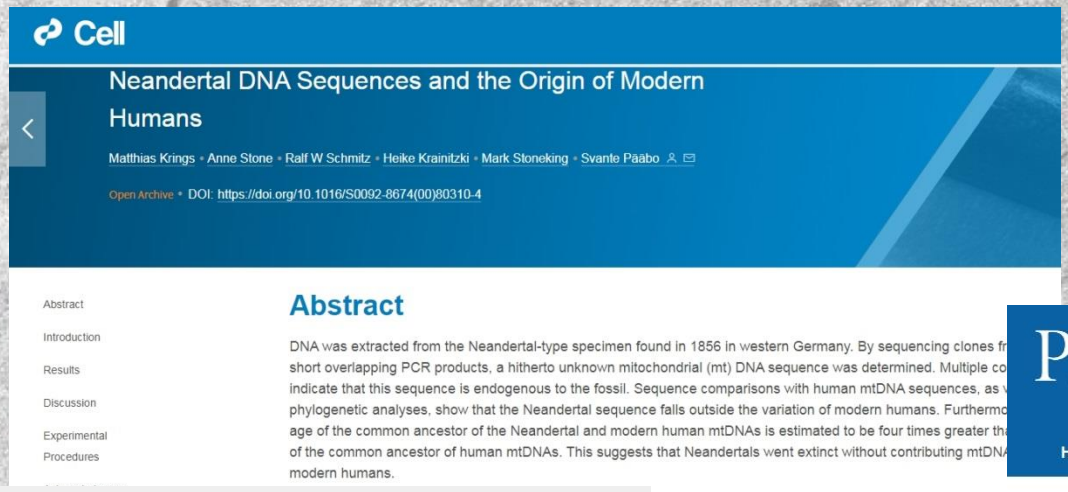
Photograph: Corbis



(с) З. Буриан

http://ramanujan25449.blogspot.com/2015/12/volver-escribir-de-nuevo-nuestro-pasado.html

Палеогенетические данные (1997 – 2006). Неандертальцы – не наши предки!



Cell

Neandertal DNA Sequences and the Origin of Modern Humans

Matthias Krings • Anne Stone • Ralf W Schmitz • Heike Krainitzki • Mark Stoneking • Svante Pääbo

Open Archive • DOI: https://doi.org/10.1016/S0092-8674(00)80310-4

Abstract

Introduction

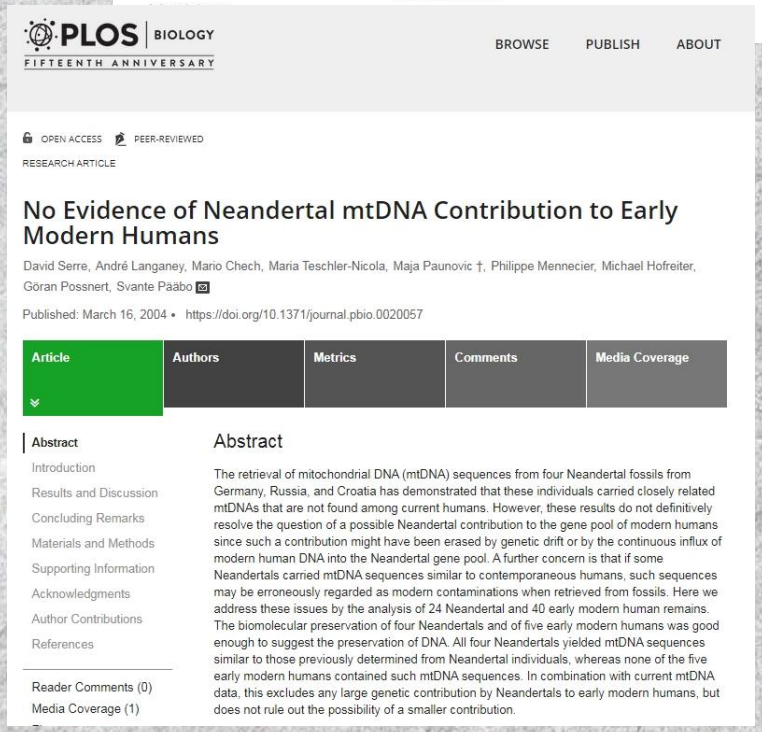
Results

Discussion

Experimental Procedures

Abstract

DNA was extracted from the Neandertal-type specimen found in 1856 in western Germany. By sequencing clones fr
short overlapping PCR products, a hitherto unknown mitochondrial (mt) DNA sequence was determined. Multiple co
indicate that this sequence is endogenous to the fossil. Sequence comparisons with human mtDNA sequences, as v
phylogenetic analyses, show that the Neandertal sequence falls outside the variation of modern humans. Furthermo
age of the common ancestor of the Neandertal and modern human mtDNAs is estimated to be four times greater th
of the common ancestor of human mtDNAs. This suggests that Neandertals went extinct without contributing mtDNA
modern humans.



PLOS BIOLOGY

FIFTEENTH ANNIVERSARY

BROWSE PUBLISH ABOUT

OPEN ACCESS PEER-REVIEWED

RESEARCH ARTICLE

No Evidence of Neandertal mtDNA Contribution to Early Modern Humans

David Serre, André Langaney, Mario Chech, Maria Teschler-Nicola, Maja Paunovic †, Philippe Mennecier, Michael Hofreiter, Göran Possnert, Svante Pääbo

Published: March 16, 2004 • https://doi.org/10.1371/journal.pbio.0020057

Article | Authors | Metrics | Comments | Media Coverage

Abstract

Introduction

Results and Discussion

Concluding Remarks

Materials and Methods

Supporting Information

Acknowledgments

Author Contributions

References

Reader Comments (0)

Media Coverage (1)

Abstract

The retrieval of mitochondrial DNA (mtDNA) sequences from four Neandertal fossils from Germany, Russia, and Croatia has demonstrated that these individuals carried closely related mtDNAs that are not found among current humans. However, these results do not definitively resolve the question of a possible Neandertal contribution to the gene pool of modern humans since such a contribution might have been erased by genetic drift or by the continuous influx of modern human DNA into the Neandertal gene pool. A further concern is that if some Neandertals carried mtDNA sequences similar to contemporaneous humans, such sequences may be erroneously regarded as modern contaminations when retrieved from fossils. Here we address these issues by the analysis of 24 Neandertal and 40 early modern human remains. The biomolecular preservation of four Neandertals and of five early modern humans was good enough to suggest the preservation of DNA. All four Neandertals yielded mtDNA sequences similar to those previously determined from Neandertal individuals, whereas none of the five early modern humans contained such mtDNA sequences. In combination with current mtDNA data, this excludes any large genetic contribution by Neandertals to early modern humans, but does not rule out the possibility of a smaller contribution.

PNAS

Proceedings of the National Academy of Sciences of the United States of America

Keyword, Author,

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NEW RESEARCH IN Physical Sciences Social Sciences

RESEARCH ARTICLE

Neanderthal taxonomy reconsidered: Implications of 3D primate models of intra- and interspecific differences

Katerina Harvati, Stephen R. Frost, and Kieran P. McNulty

PNAS February 3, 2004 101 (5) 1147-1152; https://doi.org/10.1073/pnas.0308085100

Communicated by Craig Morris, American Museum of Natural History, New York, NY, December 5, 2003 (received for review February 27, 2003)

Article | Figures & SI | Info & Metrics | PDF

Abstract

The taxonomic status of Neanderthals lies at the center of the modern human origins debate. Proponents of the single-origin model often view this group as a distinct species with little or no contribution to the evolution of modern humans. Adherents to the regional continuity model consider Neanderthals a subspecies or population of *Homo sapiens*, which contributed significantly to the evolution of early modern Europeans. Paleontologists generally agree that fossil species should be equivalent to extant ones in the amount of their morphological variation. Recognition of fossil species therefore hinges on analogy to living species. A previous study by one of the authors and recent work by other researchers

Современная визуализация неандертальцев

Neanderthal Museum
https://www.neanderthal.de/

Палеогенетические данные. Неандертальцы в Сибири.

2007 г.

MENU

nature

Letter | Published: 30 September 2007

Neanderthals in central Asia and Siberia

Johannes Krause, Ludovic Orlando, David Serre, Bence Viola, Kay Prüfer, Michael P. Richards, Jean-Jacques Hublin, Catherine Hänni, Anatoly P. Derevianko & Svante Pääbo

Nature **449**, 902–904(2007) | Cite this article

Abstract

Morphological traits typical of Neanderthals began to appear in European hominids at least 400,000 years ago[1] and about 150,000 years ago[2] in western Asia. After their initial appearance, such traits increased in frequency and the extent to which they are expressed until they disappeared shortly after 30,000 years ago. However, because most fossil hominid remains are fragmentary, it can be difficult or impossible to determine unambiguously whether a fossil is of Neanderthal origin. This limits the ability to determine when and where Neanderthals lived. To determine how far to the east Neanderthals ranged, we determined mitochondrial DNA (mtDNA) sequences from hominid remains found in Uzbekistan and in the Altai region of southern Siberia. Here we show that the DNA sequences from these fossils fall within the European Neanderthal mtDNA variation. Thus, the geographic range of Neanderthals is likely to have extended at least 2,000 km further to the east than commonly assumed.

Средний палеолит Алтая

Сибирячихинский вариант

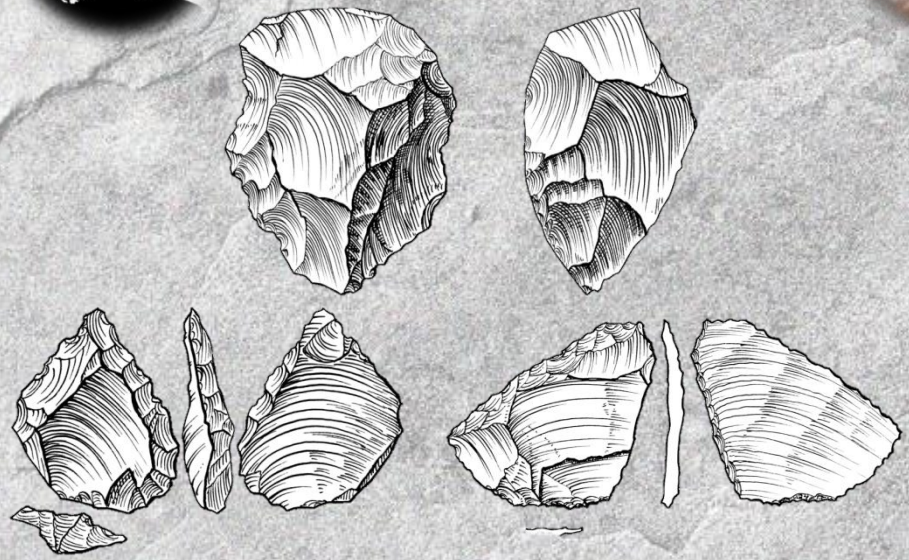
Денисовский вариант

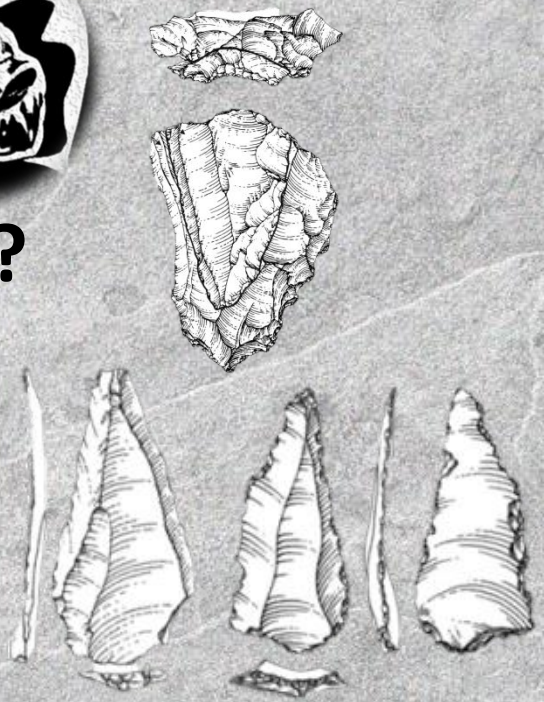
Карабомовский вариант

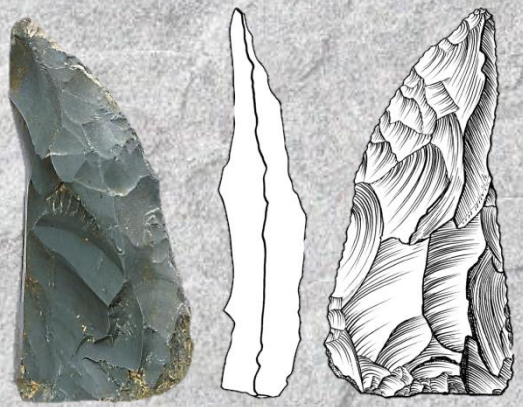
Сибирячихинский вариант

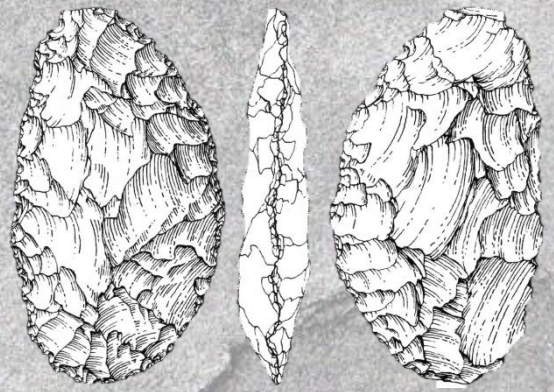
Денисовский и карабомовский вариант

?





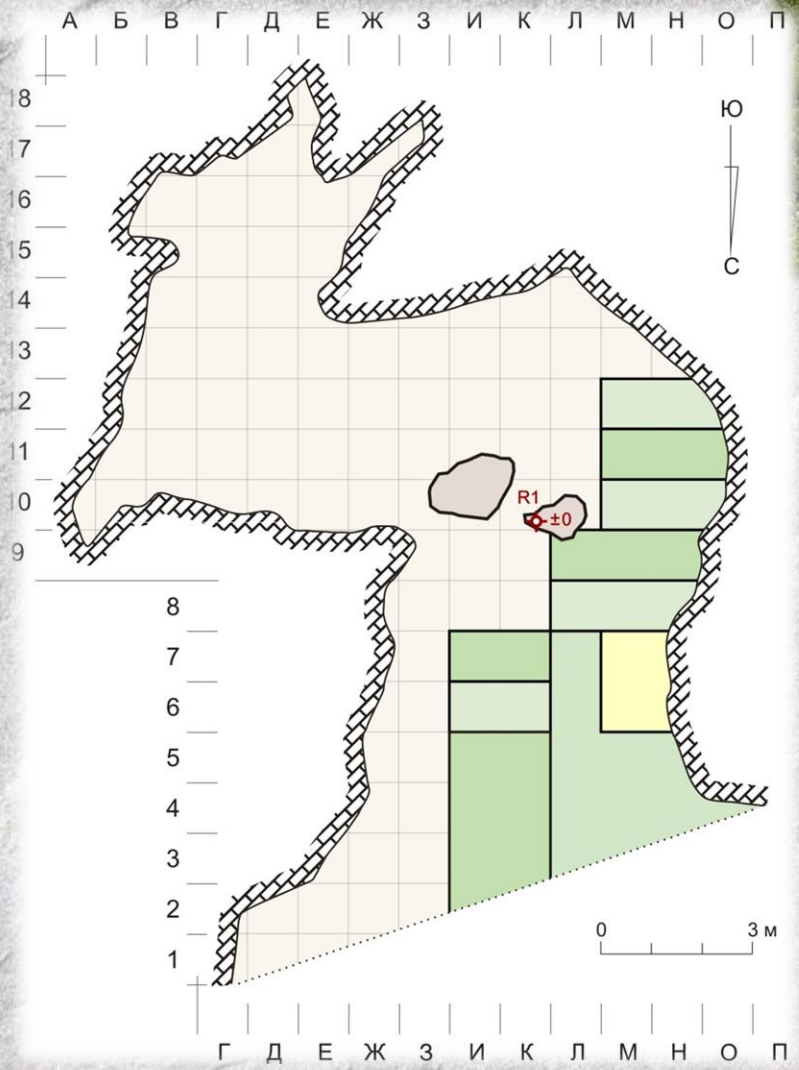




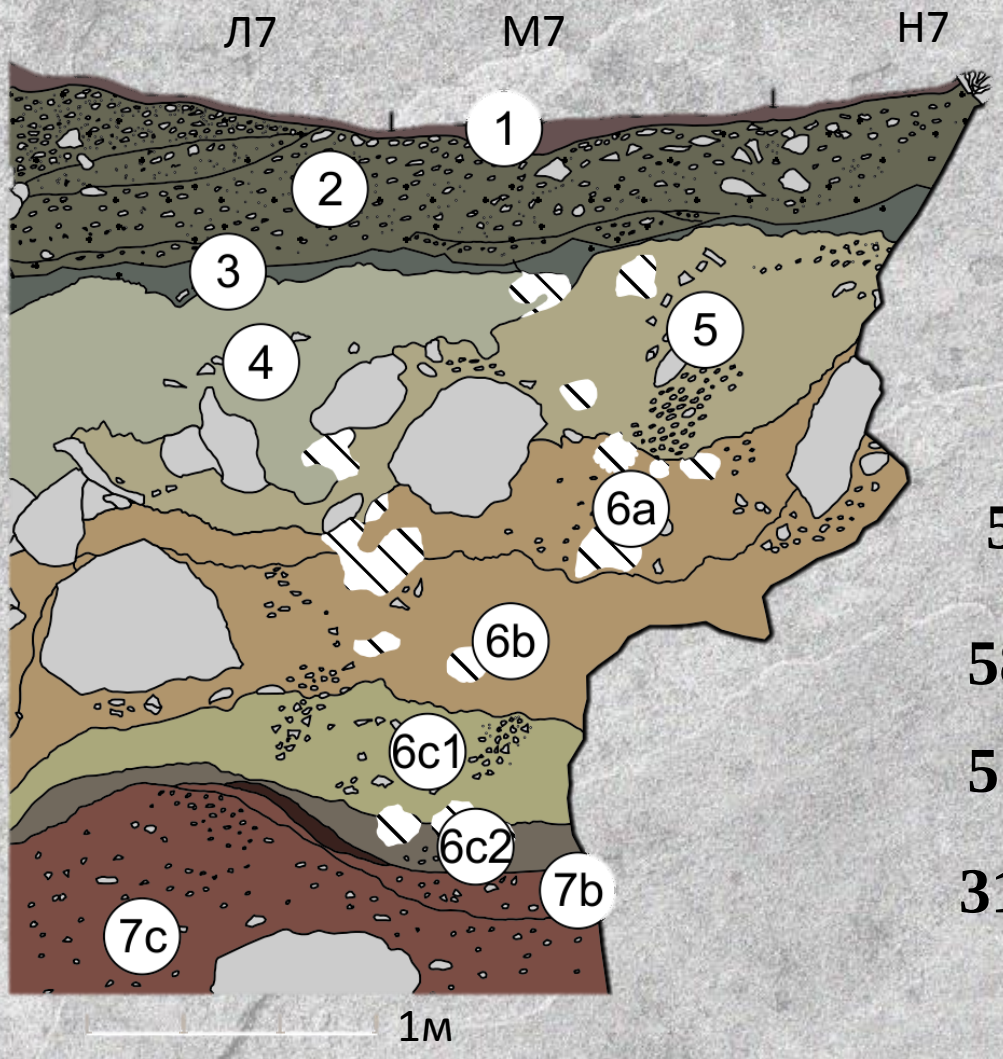
По: Derevyanko et.al., 2002; Khatsenovitch, Rybin, 2018

Антропологический и археологический материал пещеры Окладникова (Сибирячиха)

Чагырская пещера



ОСЛ-датировки



53.1±3.2

56±3.4

53.4±3.3

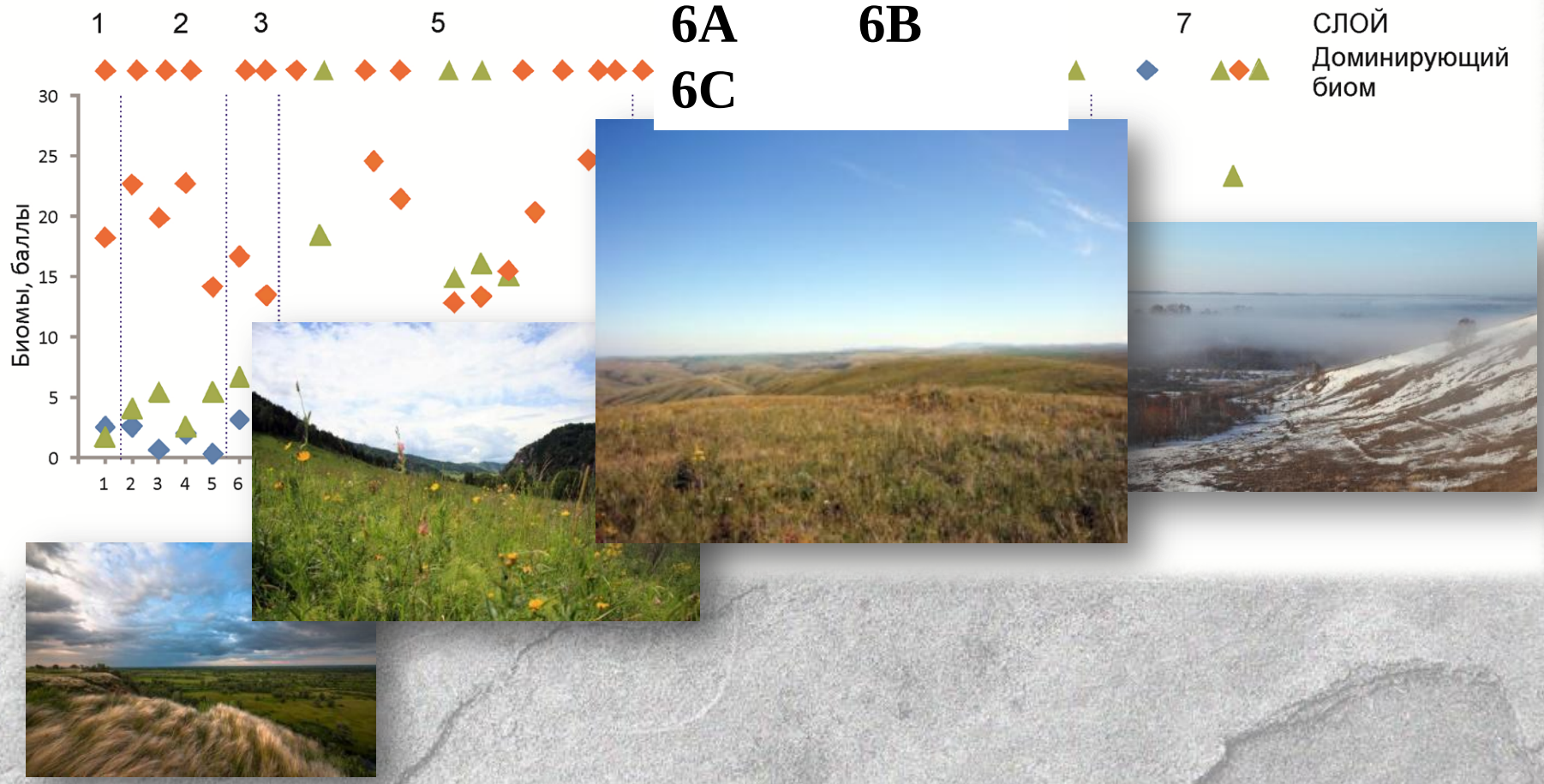
58.9±3.4

51.4±1.9

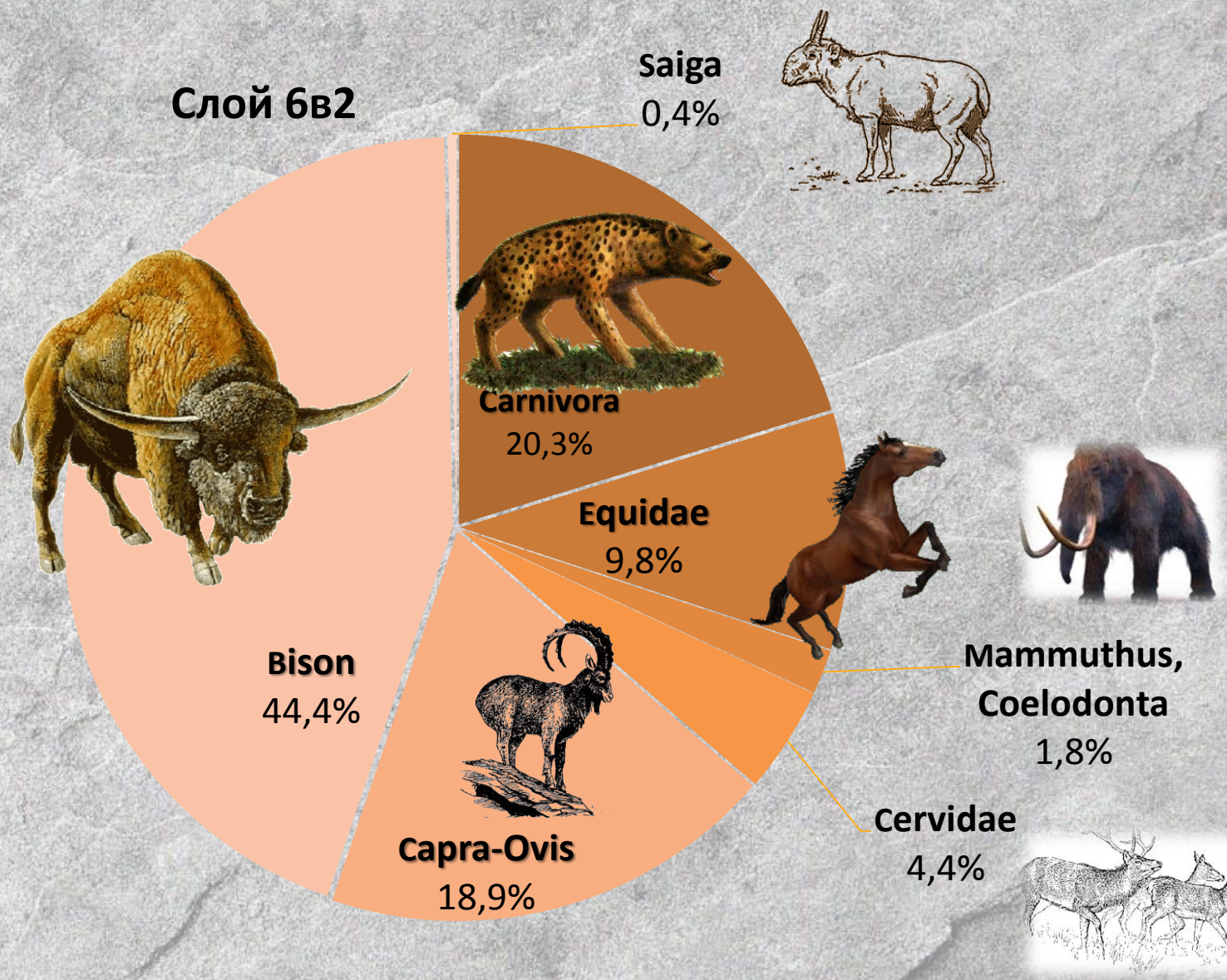
314±18,22

Чагырская пещера. Слой 6с2

Результаты палинологического анализа



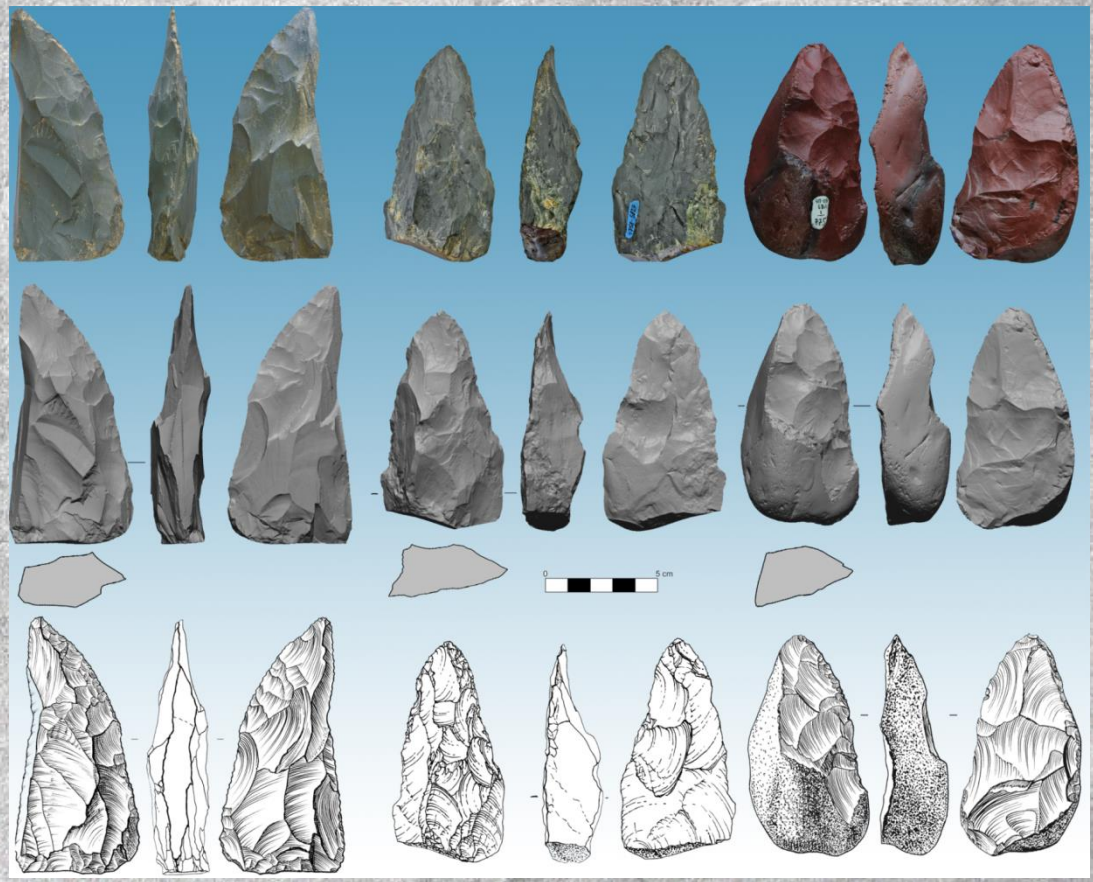
Результаты палеонтологического анализа



Окрестности Чагырской пещеры в плейстоцене

https://www.pinterest.ru/pin/216383957079380184/

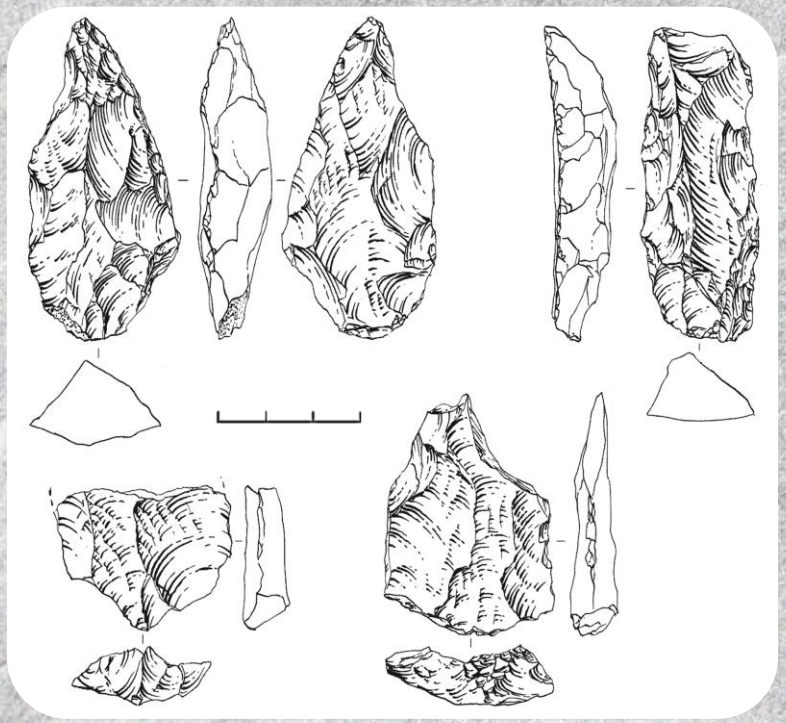
Антропологический материал и бифасиальные орудия из Чагырской пещеры

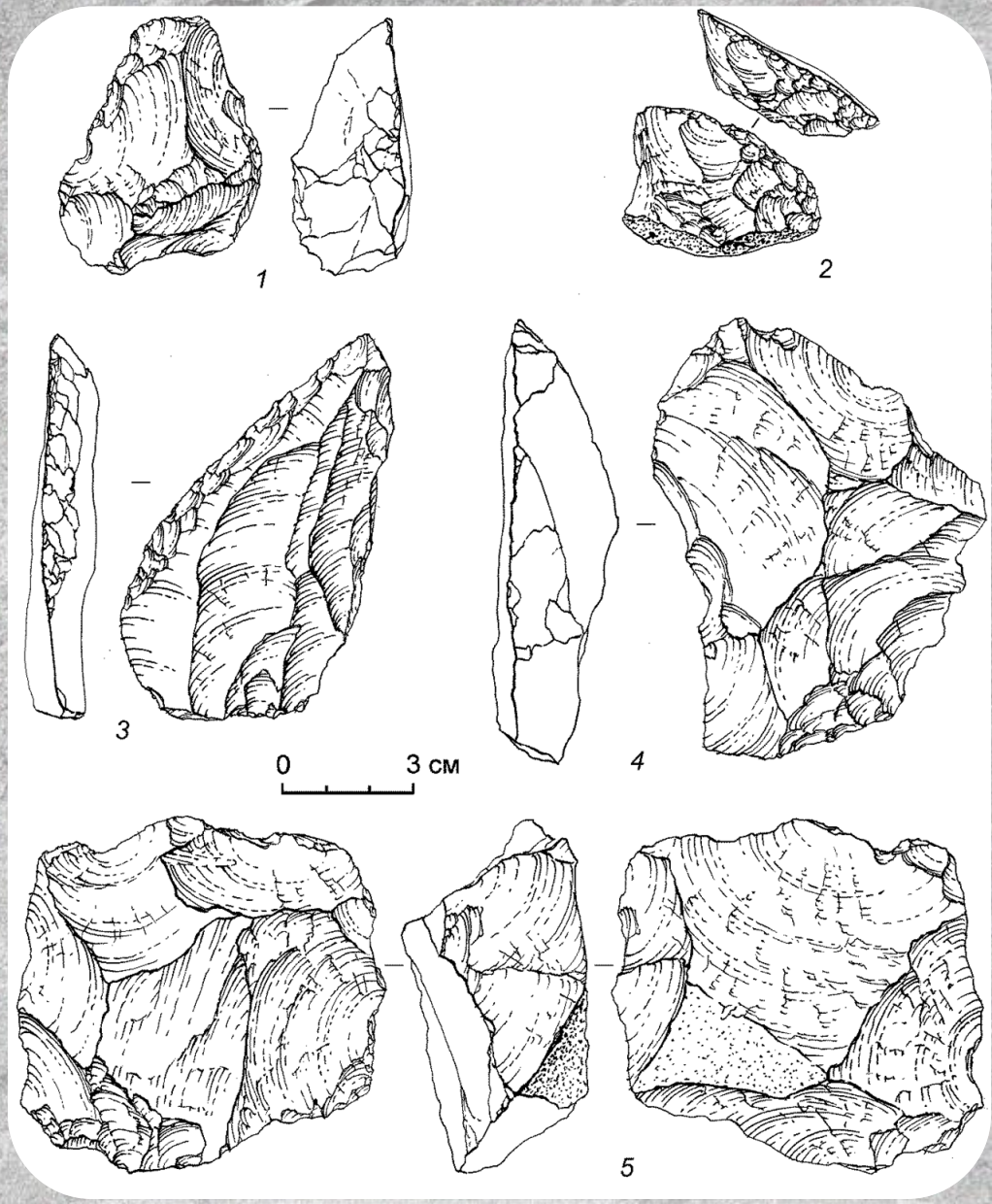


Страшная пещера: денисовский вариант среднего палеолита

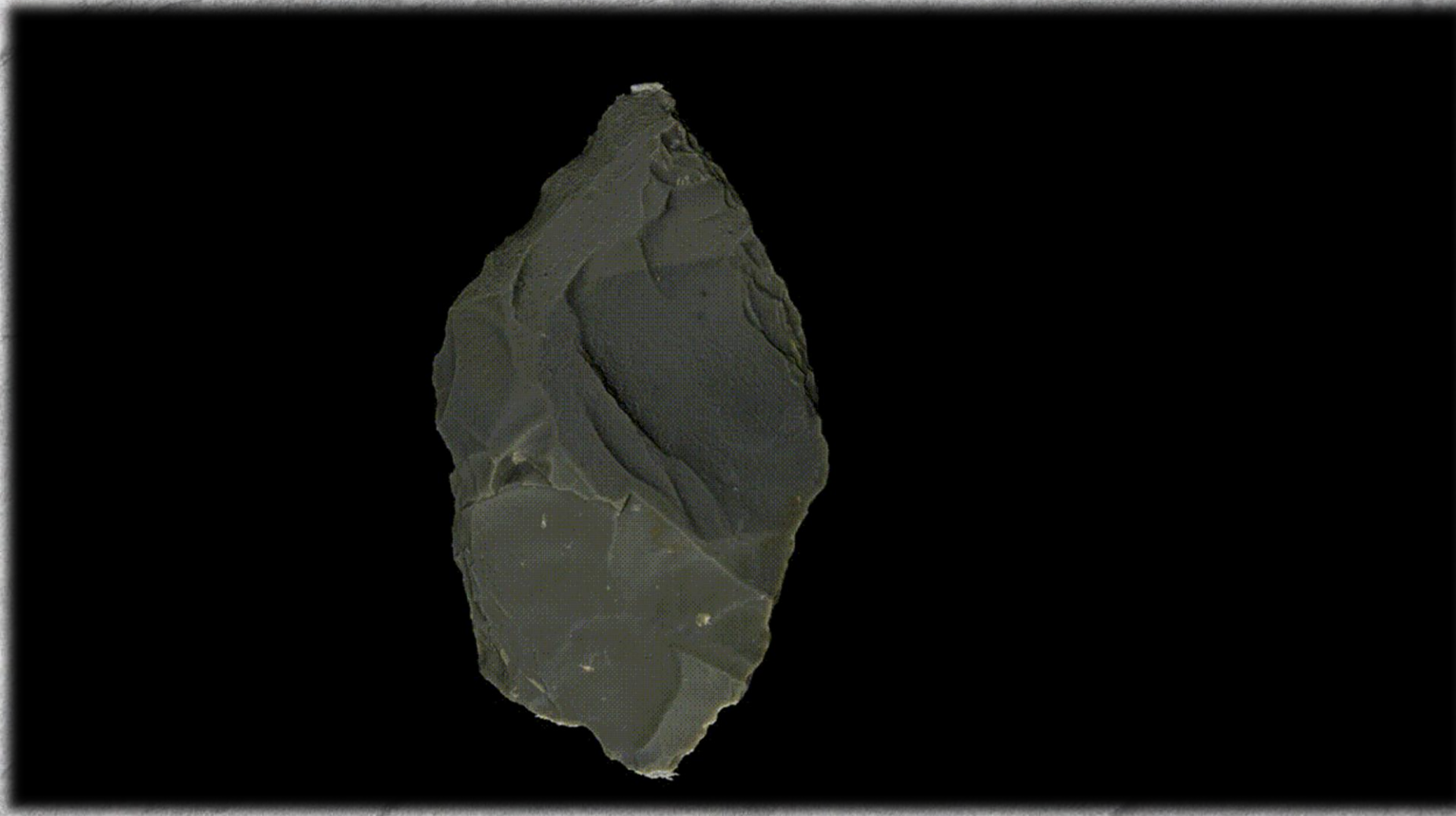
Средний палеолит Страшной пещеры

2013 – 2018 гг.

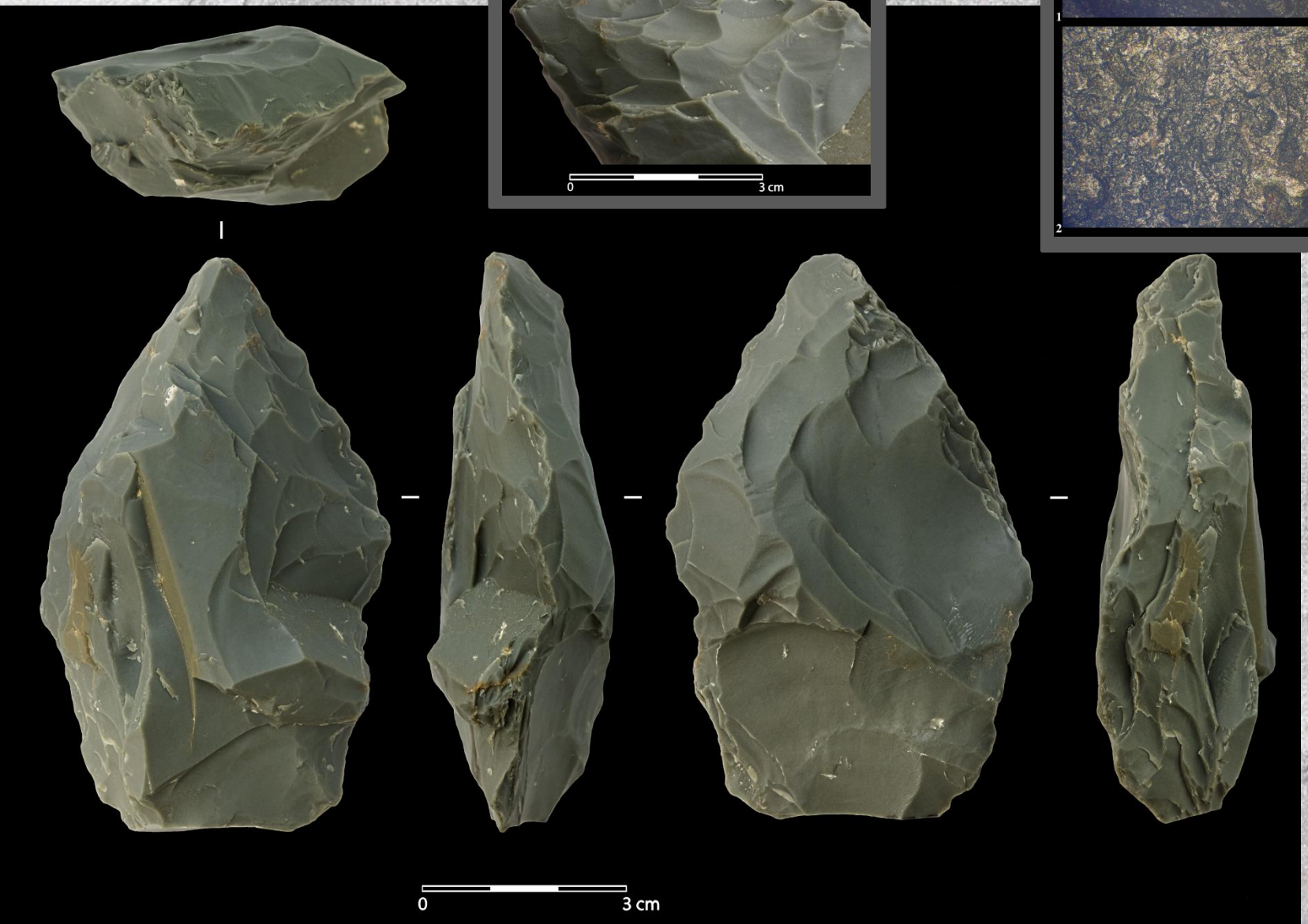


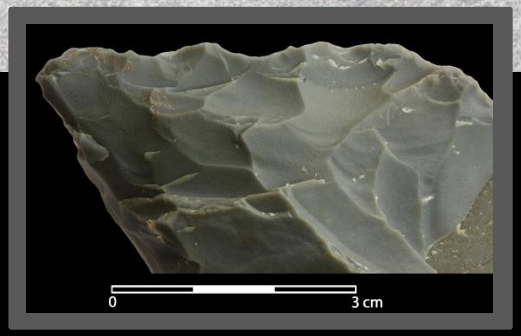


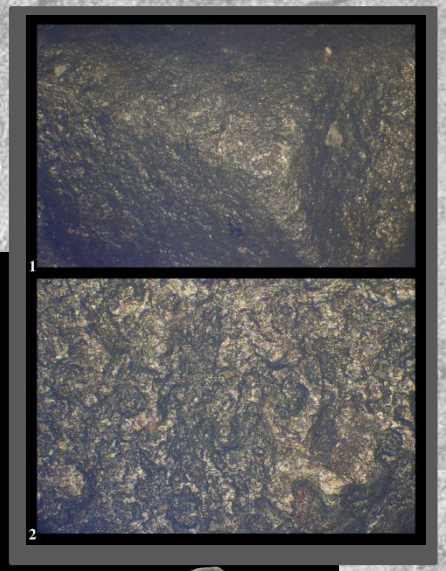
Бифас из Страшной пещеры



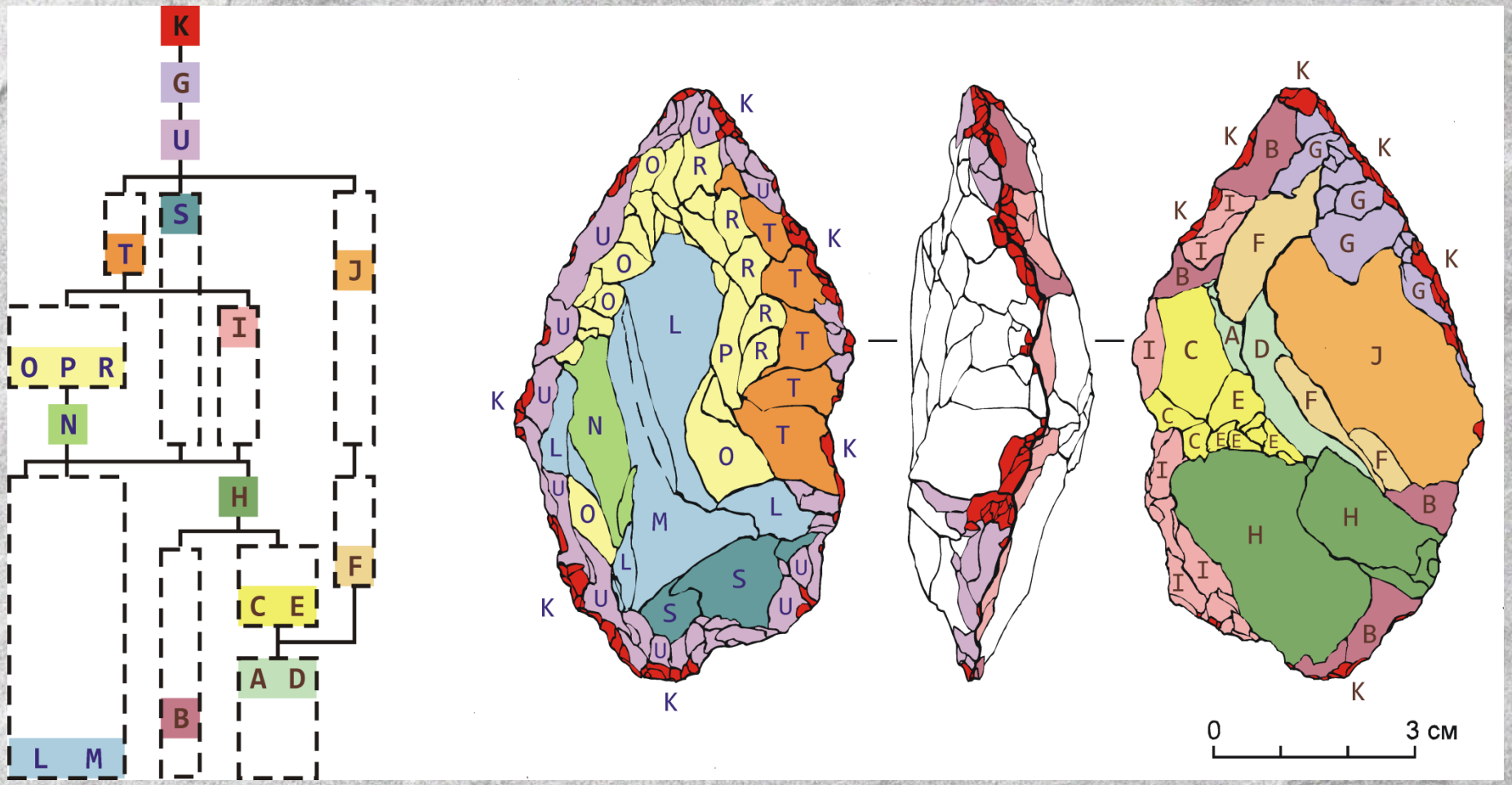
Анализ следов использования на бифасе из Страшной пещеры



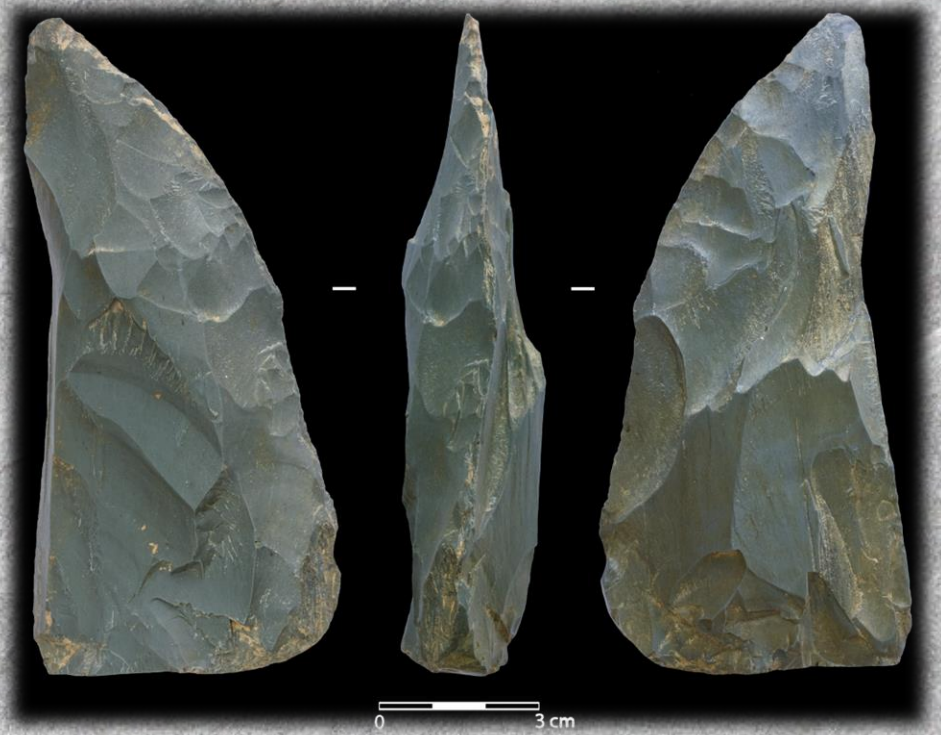




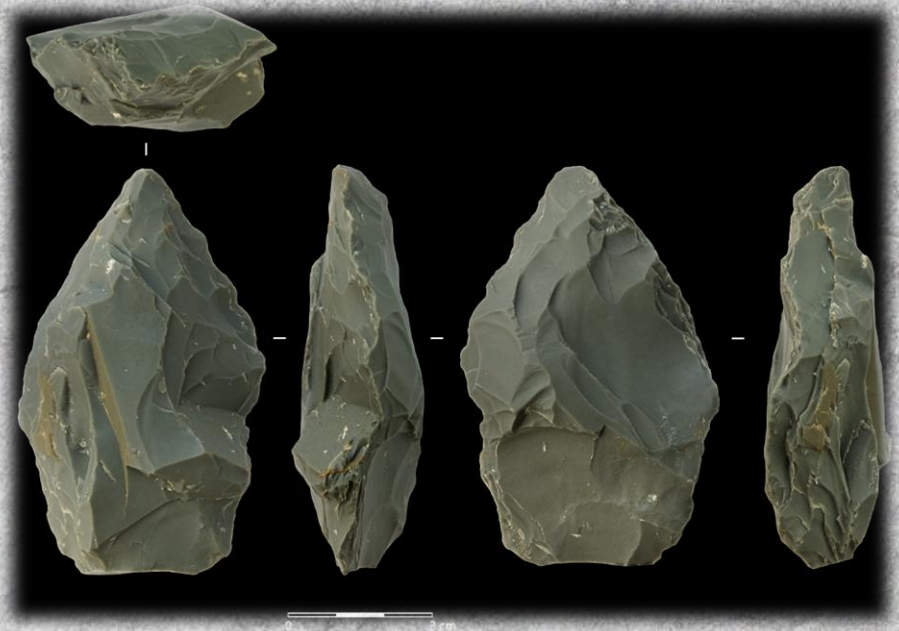
Анализ последовательности снятий на бифасе из Страшной пещеры

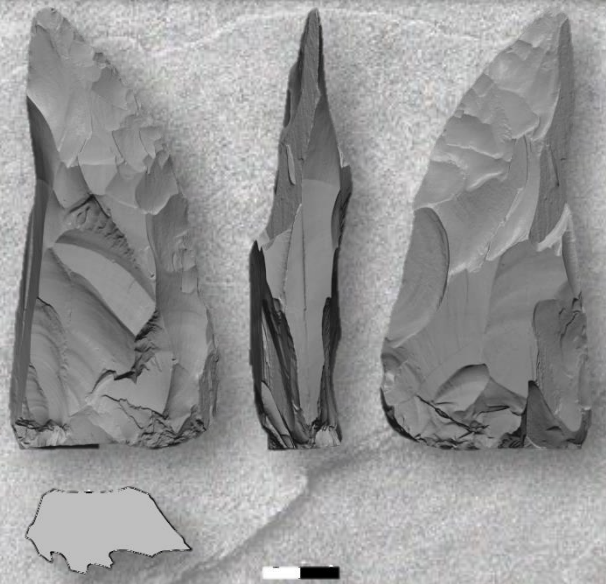


Чагырская пещера



Страшная пещера





Непараметрическое многокомпонентное 3D шкалирование по данным РФА-СИ

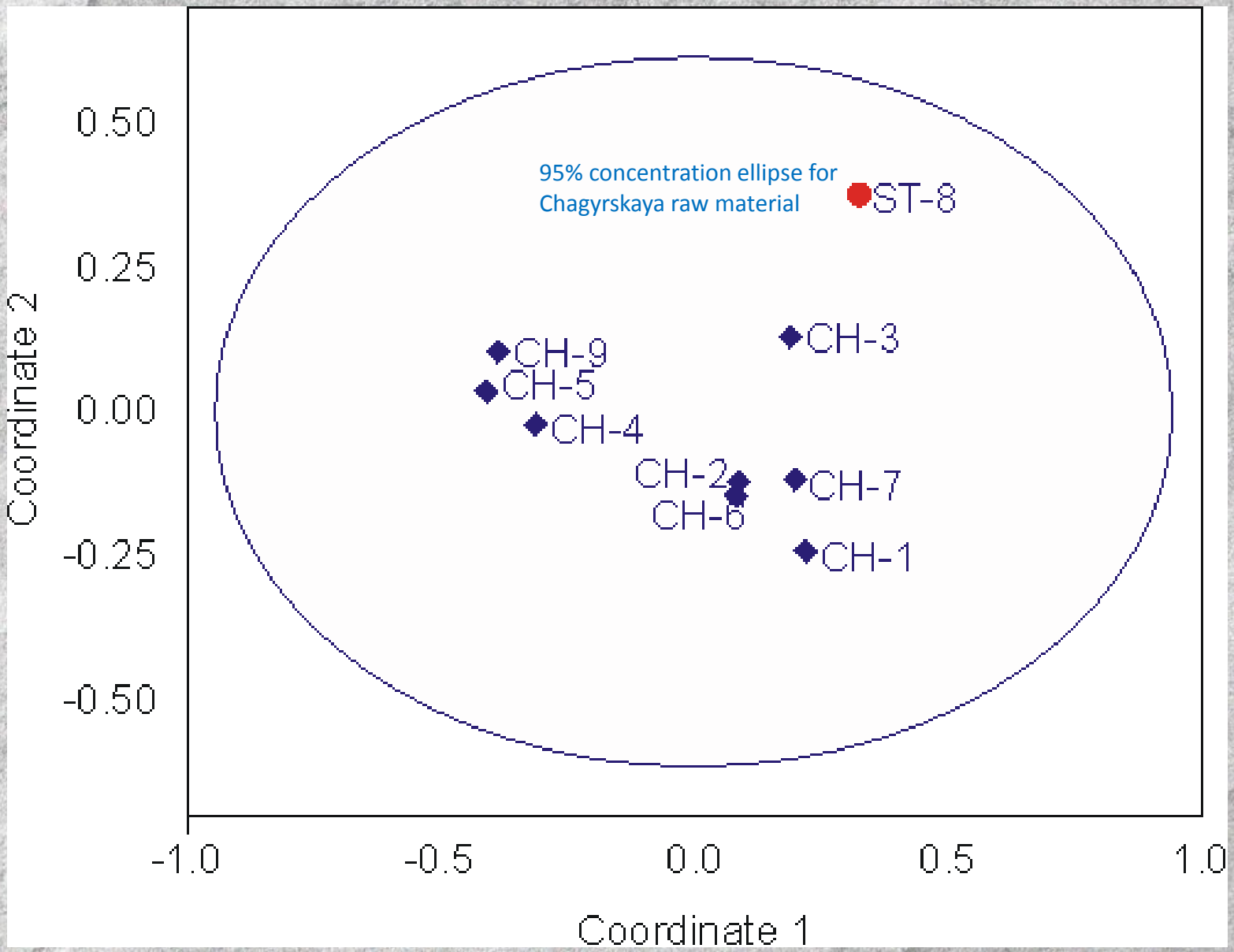
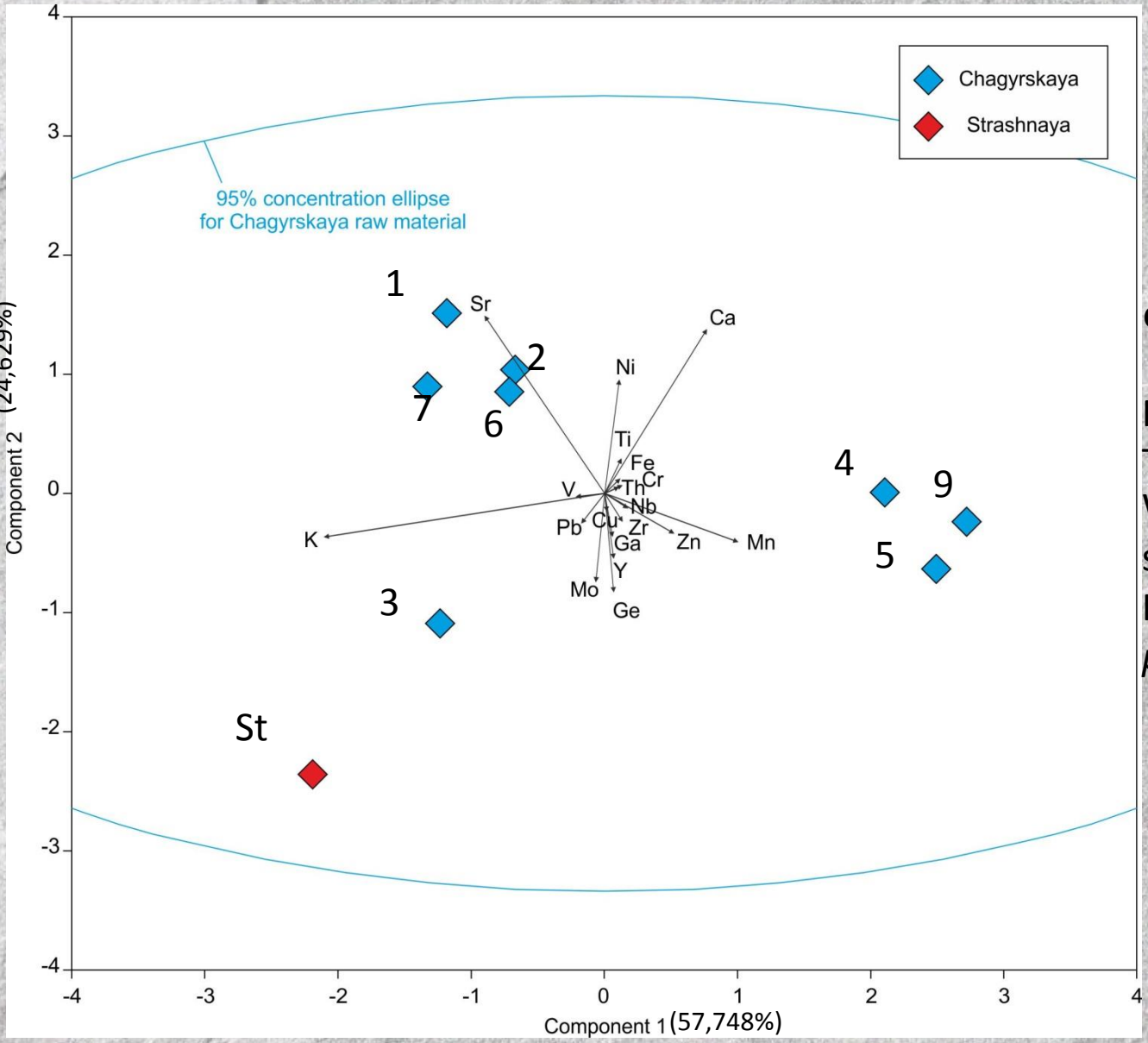


График главных компонент по данным РФА-СИ



тест PERMANOVA на базе счетов главных компонент

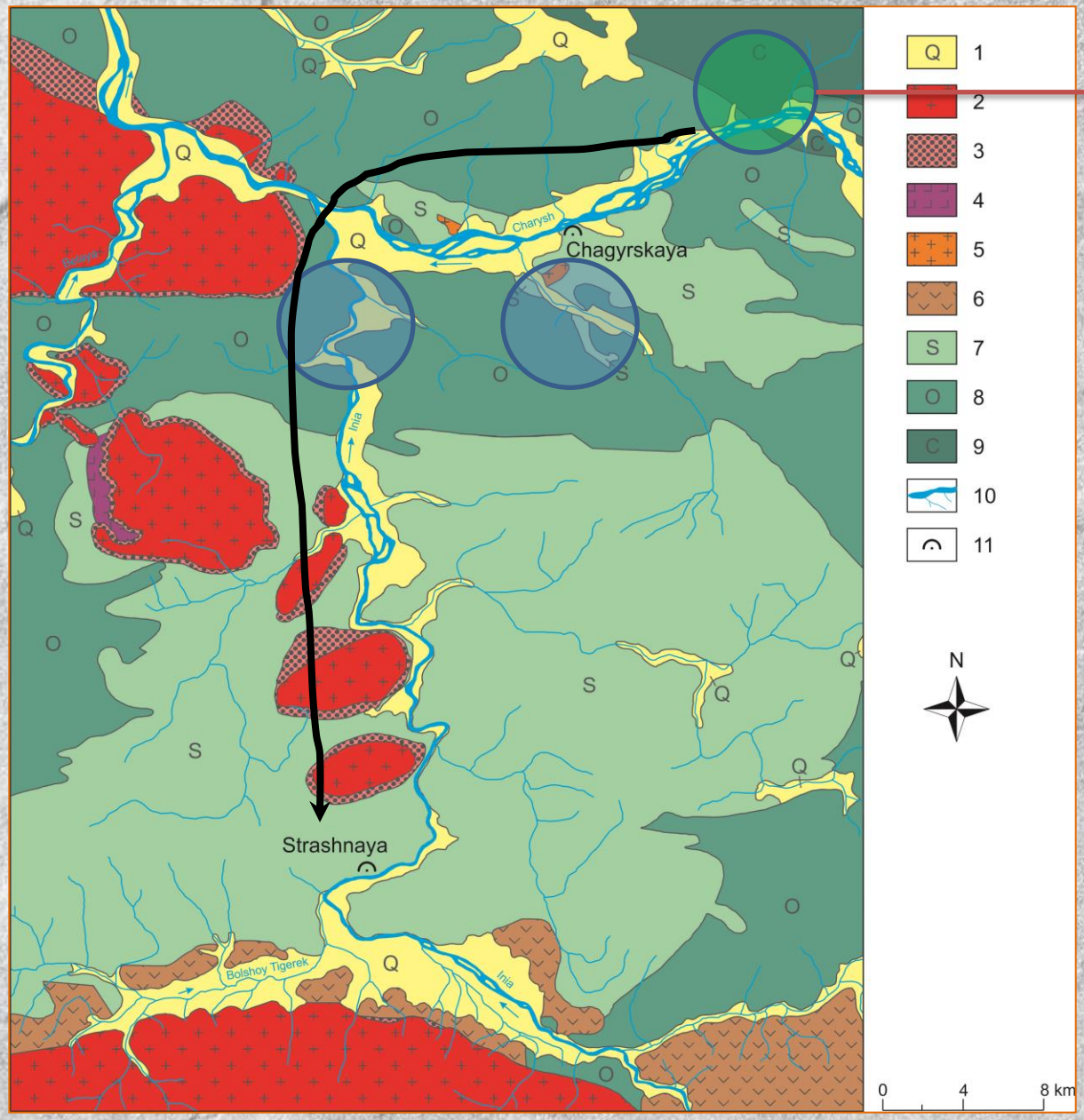
Permutation N:	9999
Total sum of squares:	49,33
Within-group sum of squares:	36,75
F:	2,397
p (same):	0,1112

Каменное сырье

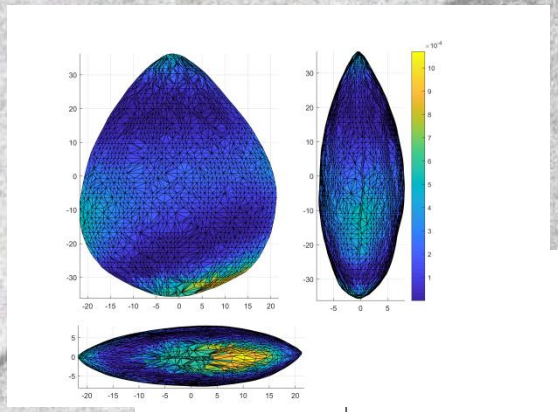
халцедон

яшмоид

Источники халцедона



Геометрико-морфометрический анализ бифасов Страшной и Чагырской пещер

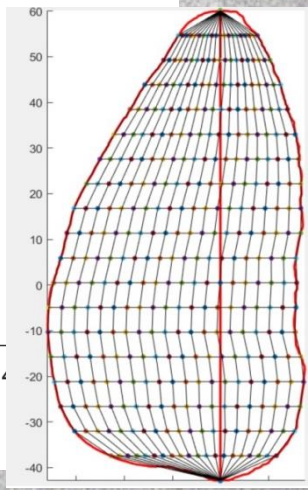


пещера Страшная

пещера Чагырская

PC02 Scores
explains 15.42% of variability

PC01 Scores
explains 34.64% of variability



Чагырская пещера

Охотничий лагерь с эксплуатацией сырья на стоянке

Пещера Окладникова

Охотничий лагерь?

технология

морфология

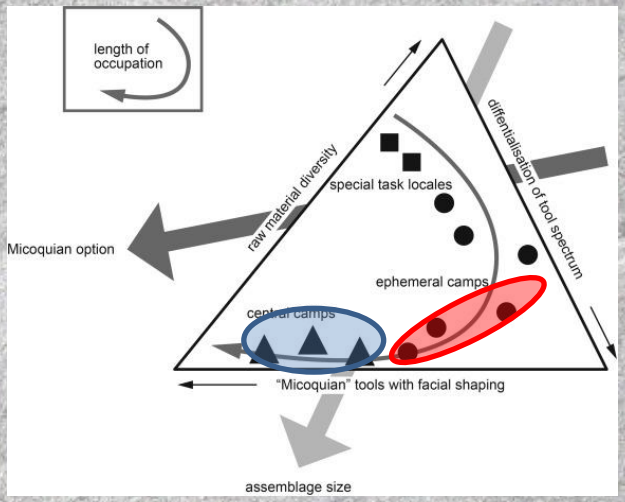
хронология

сырье

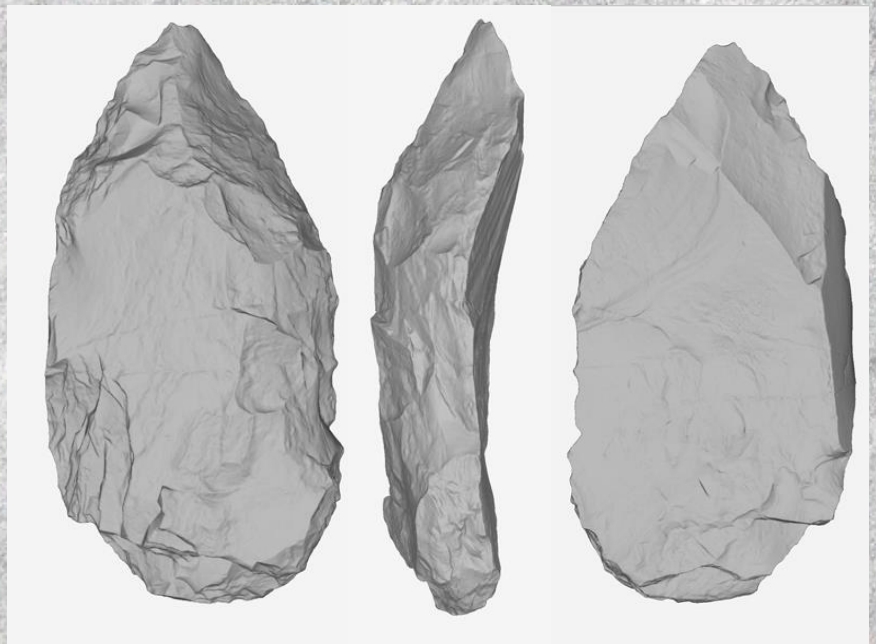
территория

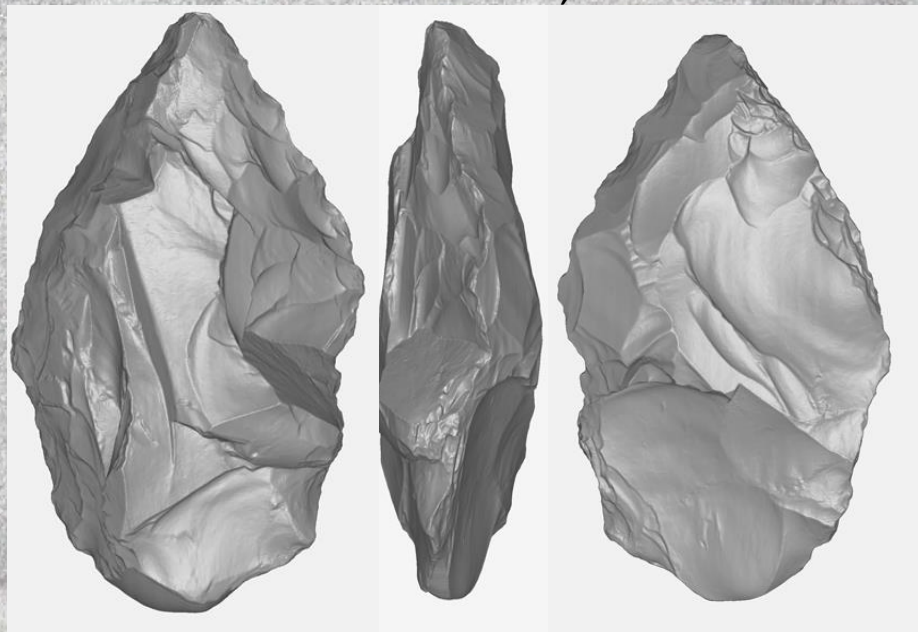
Страшная пещера

Кратковременный лагерь

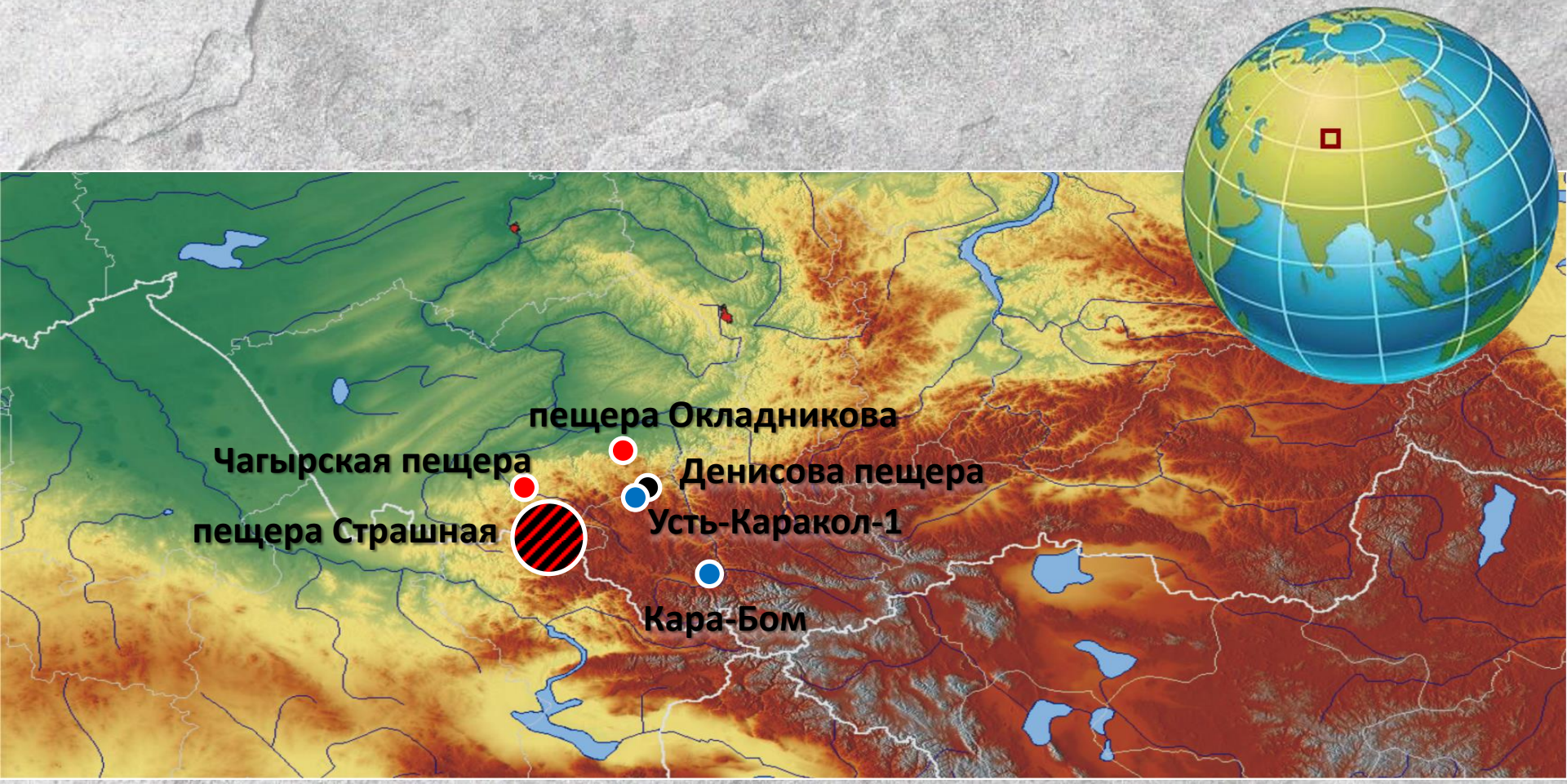


По: Rihter, 2016





Средний палеолит Алтая



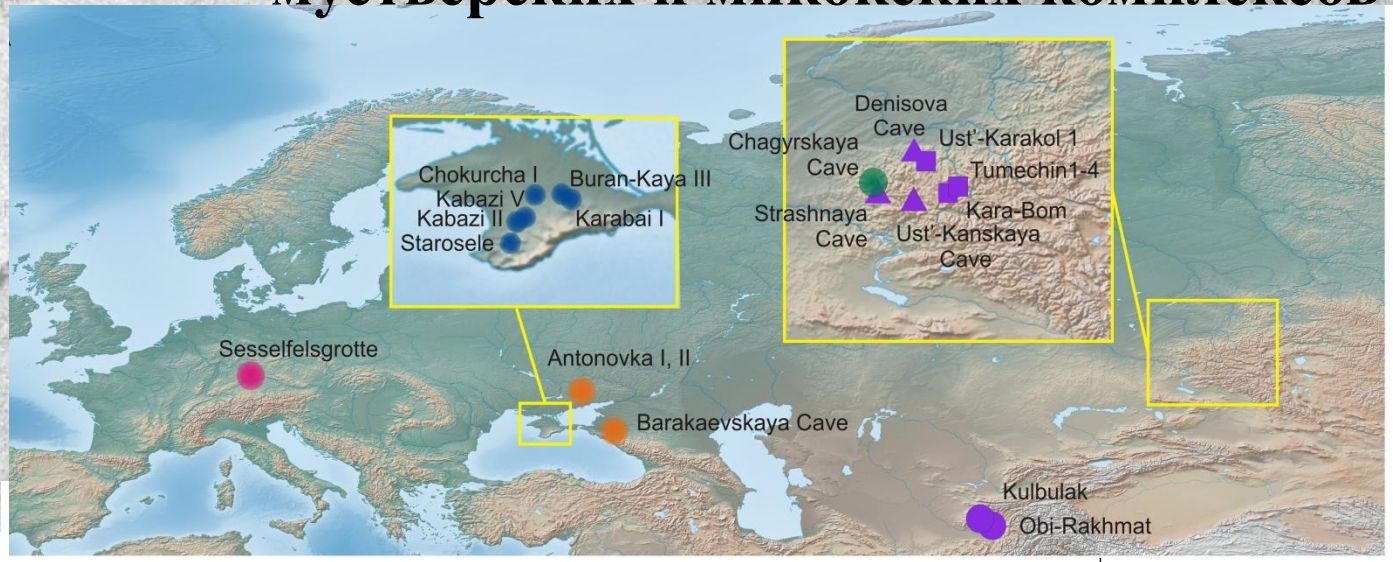
Сибиричихинский вариант

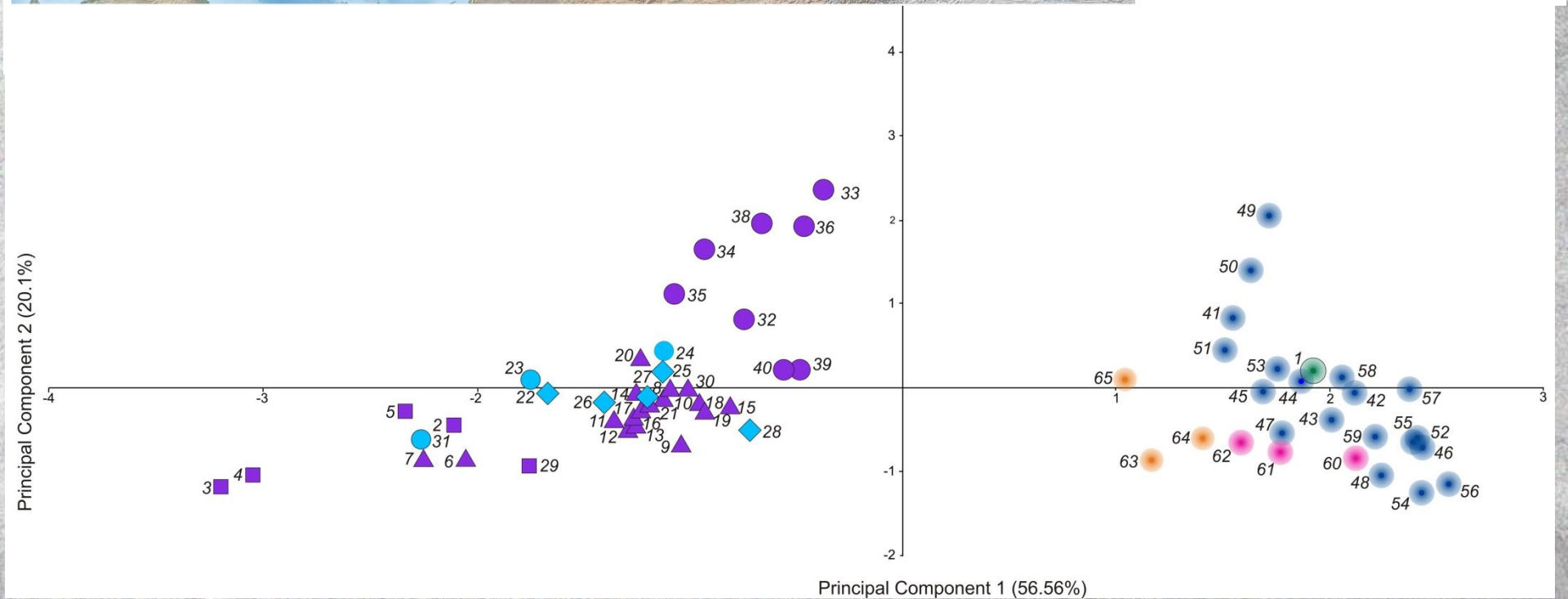
Денисовский вариант

Карабомовский вариант

Чередующееся заселение

Индустрия Чагырской пещеры в контексте леваллуа-мустьерских и микокских комплексов Евразии





Широтный коридор «мамонтовой степи»

http://domovenok.name/dir/chelovek/pervobytnyj_chelovek/20

Альтметрия статьи

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Archaeological evidence for two separate dispersals of Neanderthals into southern Siberia

Overview of attention for article published in Proceedings of the National Academy of Sciences of the United States of America, January 2020

SUMMARY | News | Blogs | Twitter | Facebook | Wikipedia | Reddit | Dimensions citations

Title	Archaeological evidence for two separate dispersals of Neanderthals into southern Siberia
Published in	Proceedings of the National Academy of Sciences of the United States of America, January 2020
DOI	10.1073/pnas.1918047117
Pubmed ID	31988114
Authors	Kseniya A. Kolobova, Richard G. Roberts, Victor P. Chabai, Zenobia Jacobs, Maciej T. Krajcarz... [show]

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Благодарности:

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А. Федорченко, С. Шнайдер,
Е. Бочарова, В. Ковалев, П. Чистяков

Финансовая поддержка проекта:
Российский научный фонд–
Deutsche Forschungsgemeinschaft Cooperation
(проекты 19-48-04107 и UT 41/8-1)

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