

## ■ GOLD NUGGETS OF SIBERIA AT THE EXHIBITION OF THE DIAMOND FUND

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1. **Gold** nugget. Diamond Fund # 299. Weight 7,100.0 gramme, 26.6 x 17.4 x 8.7 cm. Extracted in 1938, Novosibirsk Mining Administration, Zapsibzoloto Trust, Novosibirsk Ohlast.

The shape is elongated, flattened to angular with ctenoid cusps, oriented along the elongation of the nugget. The outline of the nugget is very rough. It is partly rounded. Its surface is cavernous, tuberous-pitted, parallel-ctenoid, spongy.

All specimens: Diamond Fund of Russian Federation.

Photo: Michael B. Leybov.

2. **Gold** nugget "Pistolet (Pistol)". Diamond Fund # 264. Weight 92.9 gramme, 4.8 x 3.4 x 1.2 cm. Recovered in 1955 at the Altaiskiy Placer Operation, Zapsibzoloto Trust, Altai Krai.

Its shape is angular elongated and flattened, with lateral branch and two small holes. The outlines are even and slightly curvilinear. It is a well-rounded nugget with smoothed surface.



his article continues publications dedicated to collection of the unique gold nuggets from the exposition of the Diamond Fund. The first article of this series was devoted to the oldest nuggets in this collection (Orlov, 2008), all recovered from the Urals placers in the 19<sup>th</sup> century. In 2013, we returned to this collection and published an article about nuggets, discovered in the 20<sup>th</sup> century (Orlov and Taishcheva, 2013). Here, we follow geographic and historic principles, giving description of nuggets, found in the Siberian placer deposits. In the Diamond Fund collection, however, these deposits are fragmentarily presented. Regardless of the governmental edicts, the gold miners would not always preserve the recovered unique nuggets in their original shape, rather sending them to the refinery plants. It is noteworthy that all nuggets at the exposition of the Diamond Fund were extracted in Soviet (after 1935) or post-Soviet time.

The nuggets to be discussed here were extracted in the seven regions of Siberia: Novosibirsk, Kemerovo, Irkutsk Region, Republic of Sakha (Yakutia), Altai, Krasnoyarsk (including Khakass Republic), and Khabarovsk Krai.

The development of these territories by gold miners started in the 1820s in western Siberia (Tomsk Province) and soon expanded far eastward to the Pacific Ocean. During almost 200 years, these territories produced a huge amount of gold, with significant portion (up to 40% according to some estimates) sold illegally to the world markets through China (Leshkov and Avlov, 1994). Certainly, the smugglers did not worry about preserving the unique nuggets. They had different goals.

This is why collection of the Diamond Fund is especially valuable. Unique in size, weight and odd shapes, these nuggets are true natural masterpieces. They are especially valuable because of historical descriptions. The creation of such descriptions is a true research work. Many of the cited descriptions are products of long and careful archive studies. Undoubtedly, they are also an important scientific achievement. For this reason, we publish them with photographs of the nuggets, most of them for the first time, and as detailed as possible description of geography and history of the finds.

There are four nuggets # 299 (Fig. 1), # 264 "*Pistolet (Pistol)*" (Fig. 2), # 286 (Fig. 3) and # 586 "*Zubr (Aurochs)*" (Fig. 4) from the Altai gold-sulphide-quartz province, spreading across the **Novosibirsk** and **Kemerovo Oblasts** as well as **Altai Krai**.

Two outstanding nuggets represent **Krasnoyarsk Krai**. These are # 138 from the Khakass Republic (Fig. 5) and # 12 (Fig. 6) from the South Yenisei province (River Murozhnaya watershed).

One of these nuggets – # 138 (Fig. 5) was extracted at the Neozhidannyi operations, not far from the Balyksa Village. The latter was founded in 1848, mostly for the purposes of gold mining.

Nugget # 12 (Fig. 6) was found at the *Gerfed* Operation, established on the 8<sup>th</sup> of August 1839 by the traders Shchegolev and Kuznetsov. It was then named

15. **Gold** nugget. Diamond Fund # 738.
Weight 5,135.3 gramme, 34.0 x 15.4 x 4.7 cm.
Extracted in 1958, Artemovskoe Mining Administration, Lenzoloto Trust.
A placer in the valley of the River Bodaibo, Bodaibo District, Irkutsk Oblast.
The shape is elongated, angular to rounded, slightly flattened, with fragments of single caverns and crack-like deepenings.



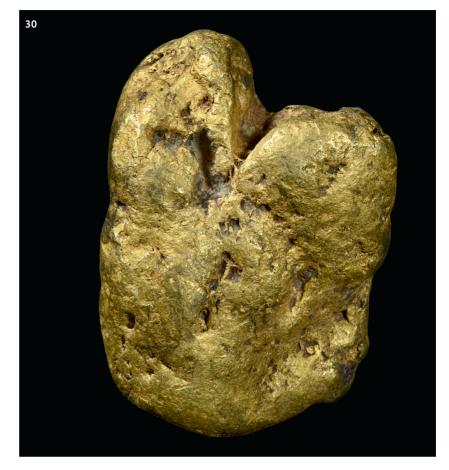
16. **Gold** nugget. Diamond Fund # 225.

Weight 4,414.2 gramme, 16.7 x 12.7 x 7.6 cm.

Extracted in 1955, Artemovskoe Mining Administration, Lenzoloto Trust. A placer in the valley of the River Bodaibo, Bodaibo District, Irkutsk Oblast. The shape is elongated and flattened. In plan view, it is oval, with somewhat curvilinear outlines and two lateral cusps. The nugget has two crack-like and one almost circular holes. The nugget is a fragment of gold-quartz vein. It is well-rounded. The surface is smooth, smoothly-tuberous, locally cavernous.

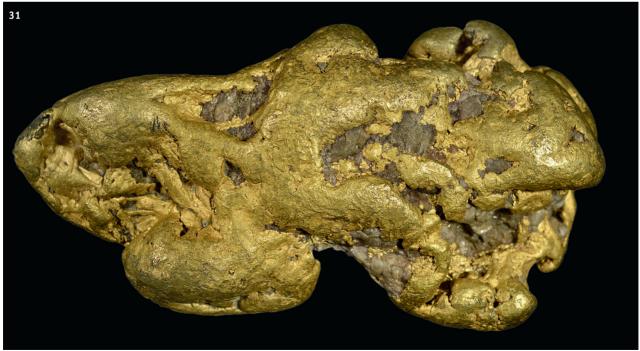


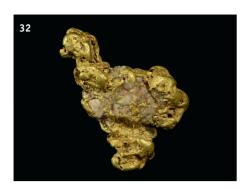
30. **Gold** nugget. Diamond Fund # 949. Weight 170.4 gramme, 4.5 x 3.0 x 2.0 cm. Extracted in 1968. Deguniya-Kvartsevyi Spring (a left tributary of the River Echenka that joins River Indigirka), Oimyakon District, Republic of Sakha (Yakutia). The shape is flattened-cloddy, rounded and lens-shaped. The outlines are gentle. One edge has a V-shaped cut. The nugget is perfectly rounded. Its surface is smoothened, somewhat wavy, with fragments of small caverns.



31. **Gold** nugget. Diamond Fund # 951. Weight 395.5 gramme, 8.2 x 4.5 x 2.5 cm. Extracted in 1968. Deguniya-Kvartsevyi Spring (a left tributary of the River Echenka that joins River Indigirka), Oimyakon District, Republic of Sakha (Yakutia).

The shape is elongated, rounded, slightly flattened, with elongated-cloddy lateral cusp. In long section, it is wedge-shaped. The nugget is well-rounded. Its surface is smoothened, tuberous-pitted, somewhat wavy, cavernous. The deepenings and caverns are of diverse shape: funnel, cup, crack, isometric and elongated.



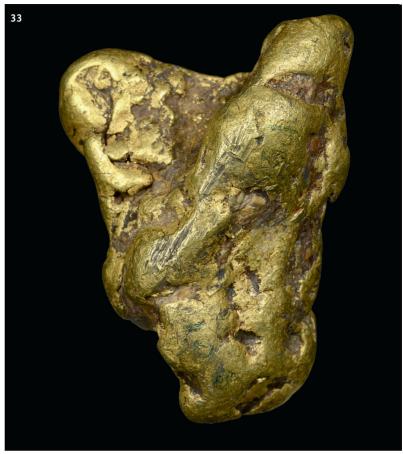


32. **Gold** nugget "Utenok (Duckling)". See also photo on page 1 of this issue.

Diamond Fund # 955.

Weight 169.1 gramme,  $5.6 \times 3.5 \times 1.5$  cm. Extracted in 1968. Deguniya-Kvartsevyi Spring (a tributary of the River Echenka that joins River Indigirka), Oimyakon District, Republic of Sakha (Yakutia).

The shape is elongated-flattened. In long projection, it is lens-shaped; in cross-section, it is wedge-shaped; in plan, it is oval, with two lateral cusps. The nugget has a hole. It is partly rounded. Its surface is finely tuberous-pitted, locally cellular, cavernous.





33. **Gold** nugget. Diamond Fund # 946.
Weight 125.4 gramme, 4.4 x 3.5 x 1.7 cm.
Extracted in 1968, Yubileinyi Operation, Indigirzoloto Combine,
Yakutzoloto Enterprise. A placer at the River Levaya Kuobakh-Baga (a
tributary of the River Bolshoi Kuobakh-Baga that joins River
Indigirka), Oimyakon District, Republic of Sakha (Yakutia).
The shape is angular, slightly elongated and flattened, with even gently curvilinear outlines. In plan, it is a triangle with rounded tops and
smoothened ctenoid cusps. The nugget is well rounded. Its surface is
smoothened, slightly wavy, locally cavernous. The caverns are irregularly distributed on the surface of the nugget.

34. **Gold** nugget. Diamond Fund # 947.
Weight 176.7 gramme, 4.6 x 4.2 x 1.8 cm.
Extracted in 1968, Yubileinyi Operation, Indigirzoloto Combine,
Yakutzoloto Enterprise. A placer at the River Levaya Kuobakh-Baga (a tributary of the River Bolshoi Kuobakh-Baga that joins River
Indigirka), Oimyakon District, Republic of Sakha (Yakutia).
The shape is angular, flattened, with low ctenoid cusps. In plan, it can be outlined as a high trapeze, whose wide base has three lateral semi-circular cusps. In one angle of the narrow part of trapeze is the elongated-cloddy bulging. The nugget is semi-rounded. Its surface is uneven, smoothened on cusps, locally wavy.