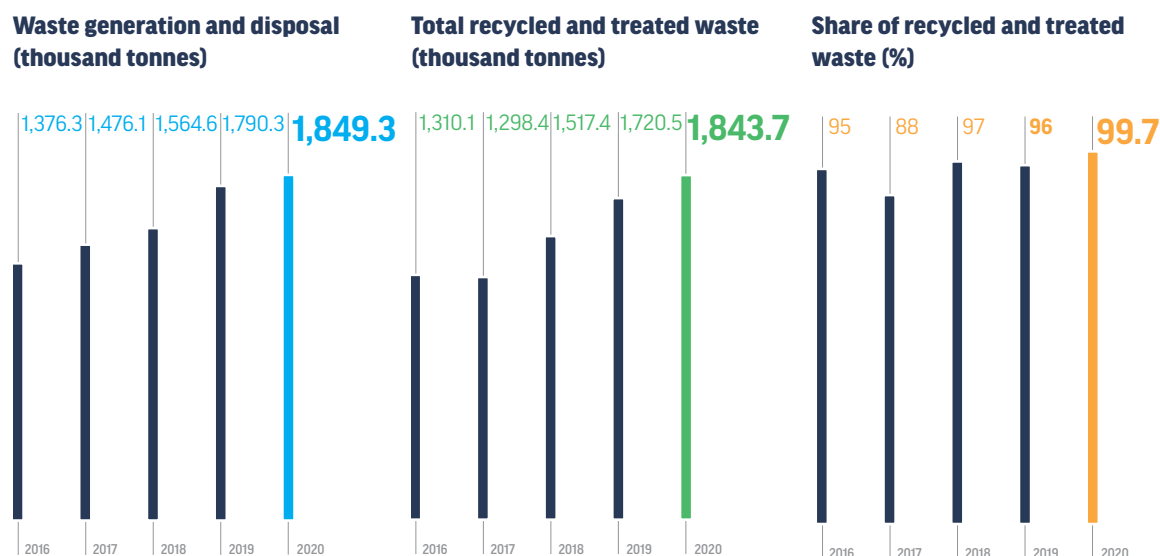


Waste management and land use

The two key pillars of industrial waste management and land use at the company are equipment reliability monitoring and the implementation of new technology. These efforts minimise the risk of soil contamination by crude oil and petroleum products. The company also successfully recycles its production waste.



Large quantities of waste are safely disposed of every year, thanks to improved waste recycling and treatment processes across the company. The Omsk Refinery's efforts to find alternative contractors resulted in increased treatment and recycling of oily sludge, with higher volumes of drilling waste processed by the company's upstream assets.

The bulk of the company's waste is drill cuttings produced in the course of hydrocarbon exploration and production. The company's drilling-waste management framework is designed to reduce environmental risks and standardise waste management requirements.

Drilling rigs currently in use across Gazprom Neft are equipped with a drilling-waste cleaning and drying system to reuse drilling fluids and process water in well drilling.

99.7%
of waste treated and recycled



In 2020, broader efforts to develop infrastructure for the safe management of waste continued. Waste management projects have been completed at two production sites:

- Slavneft-Megionneftegaz completed an upgrade of the landfill for solid municipal and industrial waste at the Aganskoye oilfield;
- Messoyakhaneftegaz (JV) completed the first phase of a 1,800 ktpa solid municipal and industrial waste sorting, treatment and storage complex at the Vostochno-Messoyakhskoye field.

In 2020, producing subsidiaries of Gazprom Neft commissioned six state-of-the-art waste incinerators of different types and from different manufacturers, with a total capacity of up to 7 ktpa.

The company seeks out and implements new technologies to utilise waste in the production of commercial products. In 2020, two public consultations were held on the following agenda:

- technical documentation for new technology to produce and use YAKHONT, a man-made soil based on cuttings (pieces of rock removed by drilling);
- technical documentation for new technology to make pavements on roads and other transport structures using BRIT construction sealant.

6 waste incinerators commissioned

In 2020, the Upstream Division launched a project to develop an integrity and reliability strategy. The strategy will guide programmes at oilfield infrastructure facilities (well pads, pipelines, treatment facilities, and roads)

Waste management technologies

The company has obtained a patent for a technology to produce man-made BRIT soil from locally-available materials and treated cuttings. This product is fit for use in road construction.

Field tests at the Gazpromneft-Noyabrskneftegaz and Gazpromneft-Khantos fields in 2018–2019 demonstrated that this new development boasts a high performance.

In 2020, the man-made BRIT soil was used to repair roads at the Priobskoye field of Gazpromneft-Khantos. The Company intends to put this technology to use on a much larger scale in the next few years.



Aerial surveillance to monitor the condition of forests

Gazprom Neft completed aerial laser scanning of 120 ha of forests at oilfields in the Orenburg Oblast and the Yamalo-Nenets Autonomous Okrug, using the data to build digital models of the areas. The models were used to plot routes for machinery movements in hard-to-reach forested areas with a low environmental footprint that avoided tree felling. Broader use of this approach will enable the company to preserve forests while carrying out future exploration.

The digital models proved to be highly accurate at identifying the locations of individual trees, as well as their characteristics (species and dimensions). The new approach further cut our environmental footprint and minimised the costs of seismic surveys and exploration for oil reserves.

120 ha of forests scanned
in the Orenburg Oblast
in the Yamalo-Nenets
Autonomous Okrug



Aerial scanning of forested areas

Gazprom Neft runs a pipeline reliability and integrity programme, which encompasses pipeline diagnostics, inhibitor protection, corrosion monitoring, repair and upgrade.

Green Seismic project

Gazprom Neft has been developing Green Seismic technology since 2014, which, thanks to its compact size, significantly curbs the number of trees felled for seismic lines and cuts fuel consumption for seismic surveys, all while improving safety. The first phase (Green Seismic 1.0) reduced line width fourfold. This technology saved over 4.5 million trees between 2016 and 2020 over an area of about 3,700 sq km. The current Green Seismic 2.0 project aims to considerably reduce source line width to save even more trees: between 1 and 1.5 million per year.

In 2020, the Green Seismic project won the Vernadsky National Environmental Award in the Science for the Environment category

4.5+ million
trees saved between
2016 and 2020

1-1.5 million
trees saved every year



Gazprom Neft
at a glance



Sustainable
development
management



Customer
care



Health
and safety



Environmental
safety



Employee
development



Social
policy



Appendices