

Press release

Norske Skog Skogn explores the opportunity for a large-scale biogas facility

Norske Skog Skogn and Levanger Drift og Montasje, in consultation with Norsk Landbruksrådgiving, the County Governor of Trøndelag, and farmers in Trøndelag, explores the opportunity for a significant climate initiative in Norwegian agriculture. The ambition is to collect up to 700 000 tonnes of livestock waste in Trøndelag for production of environmentally sustainable biogas, which would significantly reduce greenhouse gas emissions, reduce costs and provide access to bio fertiliser.

The climate agreement between farmers and the Ministry of Agriculture targets 25 percent of all livestock waste in Norway to be used for biogas production. Today, only one percent of such waste (ca. 70 000 tonnes) is used for this purpose. A large-scale biogas plant at Fiborgtangen would be able to increase the national share up to 10 percent by collecting a significant amount of the livestock waste in Trøndelag. The project has already entered into supplier agreements with around 20 farmers, and will now investigate the wider interest for participating. Interested parties can make contact via skogn.biogass@norskeskog.com.

"Norwegian biogas production from livestock waste is currently far too low, despite the potential to be a very important contributor to reducing agricultural greenhouse gas emissions. One of the largest challenges relate to transport, i.e. the delivery of livestock waste to the biogas plant and the bio fertiliser back to the farmers. This challenge, as well as the opportunity to realise significant positive environmental and climate effects through biogas production, was the reason why a transport grant scheme was established in 2012 and that this scheme was further strengthened in 2021. It is very encouraging to see that the agricultural industry now invests in biogas," says Bjørn Huso, Section Leader in the Ministry of Agriculture.

Livestock waste has a low energy and dry matter content, and it is therefore necessary to make large-scale investments to ensure an economically sustainable project. This includes investments in logistics systems, digestion and upgrading tanks, as well as facilities for liquefaction. Collaborating with a large number of farmers is therefore necessary to achieve the required economies of scale.

"Norske Skog Skogn already has very low greenhouse gas emissions. We want to contribute with our industrial expertise and infrastructure so that the agricultural industry in Trøndelag will become a national leader in reducing its greenhouse gas emissions through establishing a large-scale biogas plant. A biogas project at Fiborgtangen headed by Norske Skog Skogn will be able to draw on decades of experience with large-scale process industry and logistics, as well as many years of experience with biogas production in Norway. Fiborgtangen has large nearby livestock production, high capacity for efficient inbound and outbound logistics, as well as large and suitable land areas for biogas production. A biogas plant of this size will contribute 10-15 jobs directly related to production, as well as positive ripple effects both during construction and operations," says Håvard Busklein, Managing Director at Norske Skog Skogn AS.

By receiving and using up to 700,000 tonnes of livestock waste, the plant would be able to produce large quantities of biogas annually, which can replace fossil natural gas in Norway, the Nordics and Europe. Trøndelag today has several well-established biogas plants that handle waste streams from the marine industry and households. Farmers in Trøndelag are currently requesting similar solutions for agriculture to complement current biogas plants. By using livestock waste as raw material in the production, a new biogas plant at Fiborgtangen would address this need. Since the production will be based on large amounts of livestock waste and other raw materials from the agricultural sector, it will generate large amounts of bio fertiliser of high quality that farmers can use to reduce their use of artificial fertilisers. If the biogas project is realised, it will serve as an example for potential new facilities in areas with a high livestock density.

"For the agricultural sector, livestock waste is an important raw material, but it is also a source of greenhouse gas emissions and generates large costs for several farms. By providing livestock waste for biogas production, farmers will receive transportation grants from the Ministry of Agriculture, attain access to bio fertiliser to replace expensive

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artificial fertilisers, and reduce their greenhouse gas emissions. All in all, this project is very positive for the agricultural sector," says Frode Lund, Gårdbruker.

"More agricultural-based biogas plants is a national goal. The climate agreement between farmers and the Ministry of Agriculture states that 25 percent of livestock waste in Norway should go to a biogas plant by 2030. The bio fertiliser from the process produce less odor and less greenhouse gas emissions compared to livestock waste. The bio fertiliser can be spread on fields in a similar manner as livestock waste using ordinary spreading equipment. Bio fertiliser contains the same proportion of plant nutrients as livestock waste before biogas production, and adds important nutrients to the soil, which is positive for plant growth and soil life. This investment will be a positive contributor to the farmers' climate accounts, and strengthens the economy and the sustainability of the agricultural sector," says Jan Arve Langørgen, Adviser at Norsk Landbruksrådgiving.

Norwegian agriculture has reduced greenhouse gas emissions by 4.7 percent in the period 1990 to 2021. Agriculture still accounts for 9.4 percent of total greenhouse gas emissions in Norway. Production of biogas and bio fertiliser from livestock waste will both help to reduce emissions of methane and nitrous oxide. The project will also contribute positively to several of the UN's Sustainable Development Goals.



"We have contributed statistics, professional advice and local knowledge about agriculture and livestock in our area. Livestock waste is an important resource for the agricultural sector, but can also be a challenge for the soil and water environment as well as for achieving agriculture's climate goals. Biogas production based on livestock waste can be a good and timely measure," says Ivar Stokkan at the County Governor of Trøndelag.

The project will now enter a feasibility study where a detailed project plan will be prepared, supplier agreements will be entered into with farmers, and financing opportunities explored. The project aims to conclude these processes by late in the second half of 2023.

About Norske Skog Skogn AS

Norske Skog Skogn has 360 employees and a turnover of around NOK 3.0 billion as well as a production capacity of 480,000 tonnes of newsprint and packaging paper with main markets in Europe.

About Levanger Drift og Montasje AS

Levanger Drift og Montasje specialises in handling livestock waste; Stirring, transport and spreading of wet manure, loading and spreading of dry manure and removal of dry manure from tallow and poultry houses.

About the Ministry of Agriculture

The Ministry of Agriculture shall take care of tasks for the Ministry of Agriculture and Food. The Ministry of Agriculture provides professional advice, implements agricultural policy and facilitates agriculture and the food industry.

About Norsk Landbruksrådgiving Trøndelag SA

Norsk Landbruksrådgiving Trøndelag SA is a membership organisation that offers neutral advice to 3,700 members in Trøndelag. NLR has expertise in agriculture and plant culture, mechanical engineering, agricultural construction, economics, accounting and HSE. Advisers have broad expertise in many fields and the advice is based on research, local conditions and long experience.

About the County Governor of Trøndelag

The County Governor of Trøndelag is the state's representative in the county and is responsible for following up decisions, targets and guidelines from the Parliament and the Government. The County Governor is also an important link between the municipalities and central authorities. Around 270 employees working across seven departments, or in staff under the County Governor.

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