





Europeiska jordbruksfonden för landsbygdsutveckling. Europa investerar i landsbygdsområden

Green proteins: Mapping of actors & projects in Sweden

Skånebönan

www.skanebonan.se

Skånebönan (The Skåne bean) is a plattform for cooperation between different actors in the green proteins value chain. These include food business, agriculture, university, and research institutions as well as the public sector. The goal is to increase cultivation and processing of protein crops in Skåne. The cooperation is formalised in the form of a 2-year action plan.

NON PROFITS (regional clusters)





LIVSMEDELSAKADEMIN SKÅNE

Skåne Food Innovation Network is a non-profit association for the food sector. Our partners are businesses and organizations from the food sector and value chain, academia and public organizations. We work with regional, national and global issues such as sustainability, innovation and health. creating an innovative, competitive and sustainable food industry. #skåne #food cluster #green proteins



AGROVÄST LIVSMEDEL AB

A private, non-profit company. Gathers research, society and business in region Västra Götaland, such as Chalmers, Swedish University of Agricultural Sciences, the County Administrative Board, the Federation of Swedish Farmers and several companies within the AgTech and food industry #västra götaland #agricultural cluster



VRETA KLUSTER

A business park and an arena of development for the green industry, i.e. those working in agriculture, forestry, animal husbandry, food, renewable energy, aquaculture and gardening. We provide research, company and funding networks and contacts along with support for business development and applications #öster götland #agricultural cluster



AGRO SÖRMLAND

A development arena for biobased businesses in the Sörmland county. #sörmland #agricultural cluster

NON PROFITS (interest organisations)





SWEDEN FOOD ARENA

Stakeholders in the food industry collaborate on research and innovation for an innovative, sustainable, competitive, and growing food sector. Some of the biggest actors from the food industry are on board. #business interest organisation #research & innovation #national





LRF

The Federation of Swedish Farmers – LRF – is an interest and business organisation for the green industry with approximately 120 000 individual members. Together they represent some 60 000 enterprises, which makes LRF the largest organisation for small enterprises in Sweden. #farmers' federation

PLANT BASED SWEDEN

A branch organisation for companies that work for increased production and consumption of plant based foods. #business interest organisation #plant-based #national

NON PROFITS (business incubators and research institutes)



RISE RESEARCH INSTITUTES OF SWEDEN

Research institute and innovation partner. Through international collaboration with industry, academia and the public sector, we ensure business competitiveness and contribute to a sustainable society. #national #research #sustainable food systems

#alternative proteins



SWEDISH INCUBATORS AND SCIENCE PARKS (SISP)

The branch organisation for Swedish incubators and science parks.

#national #science park
#incubator #innovation



KRINOVA

Based in the local business community, Krinova's mission is to increase the attractiveness and growth of Kristianstad and northeastern Skåne. In parallel, Krinova has developed a unique regional and national position in the food sector and has a mission that includes the development of the food sector throughout both Skåne and the nation as a whole. Krinova also has an incubator with a national intake.

#skåne #science park #innovation



INNOVATUM SCIENCE PARK

Innovatum Science Park helps companies, academia and society to meet, collaborate and develop sustainable innovations, primarily in the field of industrial technology. Today, more than 300 companies engage with us through our testbeds, startup incubator, development projects, corporate networks, events and our community for entrepreneurs. Work with blue bioeconomy. #västra götaland #science park



NON PROFITS (other)







Established in 1791, Hushållningssällskapet offers agricultural advisory services and competence development. Hushållninsgsällskapet is acting in between the private and public sphere. National reach. #national #agriculture



BJÄRE HÄRADS HEMBYGDSFÖRENING

Work with a <u>project</u> with the goal of preserving old culture crops (small-scale cultivation). Cultural centre for crops that are connected to our food culture from a historical perspective . #skåne #culture crops



HUT SKÅNE

HUT Skåne is an NGO working close to municipalities in the Swedish county of Skåne. HUT has wide experience from cooperating with municipal kitchen staff, meal planners and procurers to increase the share of locally produced and vegetabilia in their menus. #skåne #sustainable municipalities



EKOMATCENTRUM

The Organic food centrum have been part of the LOBA network working with school and hospital kitchens to increase the legume content in their meals through, for instance, vegetarian kebab meat. #skåne #organic food

Albaeco

ALBA ECOLOGICAL INFORMATION INSTITUTE

Co-founder of Stockholm Resilience Centre. Strategic sustainability consulting connected regenerative agriculture among other things. Work between research and business.

#stockholm #regenerative agriculture #alternative proteins

UNIVERSITIES / HIGHER EDUCATION





SWEDISH UNIVERSITY OF **AGRICULTURAL SCIENCES (SLU)**

SLU Grogrund - Centre for

Breeding of Food Crops joins forces from academia, society and the business sector to develop competence within plant breeding. We want to secure access to resilient crop varieties and contribute to a sustainable and competitive agricultural and horticultural production throughout Sweden. #crop breeding #legumes

SLU Future Food

a platform that stimulates and develops cross-disciplinary research and collaboration for economically, ecologically and socially sustainable food systems. #sustainable food consumption



LUND UNIVERSITY, **DEPARTMENT OF PROCESS** AND LIFE SCIENCE ENGINEERING

LTH Profile Area Food and Bio provides the knowledge and technology to engineer sustainable, healthy, accessible food and biobased processes and products. The research areas include among others innovation for more appealing vegan meat. #antinutrients #bioavailability #meat analogues #extrusion #textured green proteins



ÖREBRO UNIVERSITY **PAN SWEDEN**

H Högskolan KR Kristianstad

a variety of disciplines.

#gastronomy

HÖGSKOLAN I KRISTIANSTAD

Education within gastronomy

for future food professionals in

PAN Sweden is an interdisciplinary research centre focusing on healthy plant-based proteins and influencing consumer' decisions making towards more plant-based. #antinutrients #bioavailability



STOCKHOLM RESILIENCE CENTRE

Part of Stockholm University. Research among sustainable food systems and diets. #sustainable diets #food security



LINNÈ UNIVERSITY

One of the university's research areas is sustaiable health where legumes have a natural role. #sustainable health #legumes and diabetes

PRODUCT DEVELOPMENT, PILOTING & UPSCALING





BALSGÅRD FOODTECH

development for food

production.

Product and technology

BIOTECH HEIGHTS

A research hub with focus on bioprocess technologies and new food and material solutions. Cooperation between Lund University and Tetra Pak. #scalable biotechnology #fermentation #plant based foods

RISE BIOECONOMY ARENA ÖVIK

RI. SE

Test and demonstration facility offering support for upscaling of production. Furthermore, RI.SE Göteborg can offer a spray drying technology (to convert liquid into dry powder) and solid liquid separation with the help of a decanter (to remove solid residues such as fiber and starch from the liquid protein solution.



TECHNOLOGY COMPANIES & PROCESSING OF RAW MATERIALS





TETRA PAK Food processing technology, including for plant-based proteins.



LANTMÄNNEN

In September 2024 Lantmännen announced the construction of Sweden's first protein isolate factory using mainly peas and also faba beans as raw material. The facility will be operational in 2027.



ALFA LAVAL Processing systems for plant based proteins

plant based proteins such as plant-based drinks.



KALMAR ÖLANDS trädgårdsprodukter

KALMAR ÖLANDS TRÄDGÅRDSPRODUKTER

A farmers cooperative that today dry, package and sell legumes produced on Öland.



GRO PRO

GroPro manufactures Swedish protein and flour concentrates from peas and other legumes grown in Swedish fields. With our unique technology, we release the components of the legume from each other instead of breaking them. Unlike many of our competitors, we do not use any chemicals at all in our process to enrich the protein. The whole process is dry.



ECOLEAN

A system supplier of lightweight packages, filling machines, downstream equipment and services for the liquid food industry. Both chilled and ambient products within dairy categories as well as plantbased and still drinks.



PROTEINISH

Proteinish has the amibiton to be a private/white-label supplier of Swedish textured proteins for the food industry's needs.

FARMERS' COOPERATIVES





LANTMÄNNEN

Lantmännen is an agricultural cooperative (owned by 18 000 farmers) and Northern Europe's leader in agriculture, machinery, bioenergy and food products. Lantmännen has announced the construction of Sweden's first plant-based protein isolate plant, operational in 2027. The GoGreen product range is owned by Lantmännen.



ALMAR OLANDS rädgårdsprodukter

KALMAR ÖLANDS TRÄDGÅRDSPRODUKTER

A farmers cooperative that dry, package and sell legumes and onions produced on Öland.

VÄSTRA SKÅNES ÄRTODLARFÖRENING

This association based din the West och Skåne county does not have a website.

VÄSTRA SVERIGES KONSERVVÄXTODLARFÖRENING

This association based in western Sweden does not have a website.

FOOD COMPANIES / SWEDISH RAW MATERIALS (partially or all)



BÄRTA

100% naturally sprouted and fermented Swedish organic pea. Minimally processed whole foods.

k Bönland

BÖNLAND

The only company in Sweden selling legume conservesi metal packagng from legumes grown, proecessed and packaged in Sweden.



FÄRSODLARNA

Plant based mince from legumes grown in Sweden. 97% lower climate foot print than meat-based mince.

STACKY's

STACKY'S

Stacky's slice and mince is made with oats, black bean, onion, carrot, chickpea flour and spices. Those same ingredients are used in our meatballs in combination with Bjärefågel's chicken (hybrid product). Use Sweden produce.

PEAS OF HEAVEN

PEACE OF HEAVEN

Our mission to make it easier for everyone to eat plant-based. Not because we don't like meat. But because the way we eat now is simply unsustainable. Locally sourced Swedish peas for the protein.



LUPINTA

"Oh boy, no soy!" Offers plant-based protein alternative (tempeh) based on locally sourced lupinta beans.

ΝΟ R D I S K R Å V Λ R Λ

NORDISK RÅVARA

Sell dried legumes many of which are culture crops. Their suppliers are local Swedish farms, each of which are presented on the company's website.



TASTY ALLT DET GODA

Plant-based taco meat and nuggets. Swedish peas.



FOOD COMPANIES / SWEDISH RAW MATERIALS (partially or all)



PROTOS





LANTMÄNNEN

Lantmännen is an agricultural cooperative (owned by 18 000 farmers) and Northern Europe's leader in agriculture, machinery, bioenergy and food products. Lantmännen has announced the construction of Sweden's first plant-based protein isolate plant, operational in 2027. The GoGreen product range is owned by Lantmännen.

Orkla

ORKLA

The companies in Orkla Foods Europe (such as the plant-based brand Anamma and Lecora) produce well-known local branded products to consumers in the Nordics, Baltics and Central Europe. Making plantbased foods attractive for everyone is one of Orkla's strategically important focus areas.

FOOD COMPANIES IMPORTED RAW MATERIAL



Axfood

AXFOOD

Axfood owns a number of food chains and offer plant-based products under their own brand Garant. The products are based on imported soya.



ZETA

Zeta offers a range of organic pre-cooked beans that are grown and processed in Italy.

ATRIA

ATRIA

Originally a meat business, Atria Foodservice in Sweden offers, under the brand "Dagens Rätt Grönt", meat analogues based on legumes, among others.



TAMINI

Produce hummus and falafel from imported chickpeas. Malmö based company.



Humus, falafel and

burgers based on

imported chickpeas.

Production facility in

SEVAN

Stockholm.

Sproud[™]

SPROUD

Plant-based milk made from peas cultivated in France.



HÄLSANS KÖK/NESTLÉ Information

Vegan meat analogues based on soya. Raw materials sourcing and production outside Sweden.



FINDUS

Frozen food portions. Falafel of chick peas. Raw material sourcing and production outside Sweden.



DAFGÅRDS

Dafgårds foodservice offers a variety of vegetarian alternatives No special focus on Swedish raw-materials.



LIVEKINDLY COLLECTIVE

A company comprising a range of plant-based brands such as Oumph, based on soya.



KALINO

Food service company with a plant-based product range on green peas and faba bean.

PROJECTS





SKÅNEBÖNAN / THE SKÅNE BEAN

LIVSMEDELSAKADEMIN SKÅNE The Skåne bean is an action plan that brings together those actors in Skåne that want to work towards 4 shared goals:

- 1. Secure that there is a demand for local protein crops from the industry's and grocery sector's side.
- 2. More processing facilities that corresponds to the supply chains needs.
- 3. Share knowledge so that it can be used to the benefit of the green protein chain.
- 4. Make green proteins a national concern after the 2-year action plans

#skåne #shared action plan #green proteins #value chain #legumes



LOBA NETWORK (LOCAL LEGUMES) HUSHÅLLNINGSSÄLLSKAPET

A <u>network</u> and a project with the goal of serving more locally produced green protein meal in public restaurants. #public catering #legumes



FOODJAMS

KLIMATKOMMUNERNA The goal of this <u>project</u> is to reduce CO2 greenhouse gas emissions by increasing the share of locally prodused green proteins in school meals. Includes a FoodJams concept for carrying out cooking activities for different target groups. #cooking #green proteins #public sector

GOOD LOCAL FOOD PARTNERSHIPS

HUT SKÅNE 20 municipalities in Skåne engaged in dialogues with local suppliers to increase the share of local food consumed in municipal public catering (schools, elderly care). The dialogue method from the project "Goda lokala livsmedelssamarbeten" is documented here. #dynamic procurement systems #supplier dialogues #locally produced #public procurement #muicipalities

TESTBED FOR SCHOOL MEALS

HUT SKÅNE In this project municipalities engaged in finding innovative ways to include more local produce in school meals. #school meals #test bed #side streams #food waste #plant-based proteins

STRONGER VALUE CHAIN FOR PLANT-BASED PROTEIN

VRETA KLUSTER <u>The project</u> "Stronger value chain for plant-based protein" (Starkare värdekedja för växtbaserat protein) identified development needs in the legumes value chain through interviews and estimated the unutilised potential for cultivation of legumes in the Swedish county of Östergötland. #calculating the potential #value chain analysis

PROJECTS



SKÖNA BÖNOR SLU

A <u>project</u> by SLU Future Food focusing making food products with great taste with legumes as raw material. Development of an integrated strategy for crop development (based on two previous projects and market study made by IPSOS), raw material processing and development of food products. Financed by FORMAS. #legumes #taste #crop development

BÖNAN TILL BORDET

This project's focus was to identify and remove obstacles that stop farmers from cultivating more legumes for human consumption. The method used was documented dialogues between diferrent actors in the regional value chain. #farmer #obstacles #legumes for human consumption

THE PLANT PROTEIN FACTORY SLU

A test scale factory for the extraction of plant based proteins. The <u>project</u> was run by the Plant protein group at the Swedish University of Agricultural Sciences. #plant based protein #demonstration #test #factory



ROLIS – ROBUST FOOD SUPPLY THROUGH COOPERATION

Livsmedels-

akademin

THE MUNICIPALITY OF GRÄSTORP Which crops and processed products is the industry interested in and can they be produced locally? Test cultivation and production of food that is suitable in times of crisis. <u>A project</u> owned by the municipality of Grästorp and financed by the European Agricultural Fund for Rural Development.

#crisis management #crisis food #test cultivation #municipalities

FRAMTIDENS GRÖNA PROTEIN – THE FUTURE GREEN PROTEIN

SLU

This is a plant breeding <u>project</u> focusing on creating a gen bank of various types of peas from around the world. Taste, area of usage, and nutritional aspects are considered. **#gen bank #peas**

FRAMTIDENS ÅKERBÖNA FÖR MAT OCH FODER

SLU

This <u>project</u> utilises modern plant breeding technologies to explore quality characteristics in faba beans that can contribute to more healthy and tasty food products. #faba bean #breeding #health #taste

SVENSK KOLINLAGRING / SWEDISH CARBON SEQUESTRATION

ALBAECO (among others) Creating a Swedish market place for biochar credits in close cooperation with farmers. #carbon sequestration #biochar

PROJECTS





MISTRA FOOD FUTURES

SLU, RI.SE, Stockholm A reasearch programme with focus on economically, environmentally and socially sustainable food systems by 2045.

#sustainable food systems



finest Rise

National centre financed by FORMAS with the goal of enabling innovations for a sustainable food sector. Develops the value chain for legumes among others. #innovation #sustainable food systems



A NEW RECIPE FOR A PROTEIN SHIFT RISE

National <u>transformation platform</u> "Ett nytt recept for prteinskiftet" coordinated by RI.SE and financed by Vinnova. "Year 2040 9 of 10 meals consumed in Sweden are within the planetary boundaries." #green proteins

LIKE:MEAT

RI.SE

The goal of this project was to develop nutritious and appealing second generation plant-based meat analogues. The project was run by RI.SE and financed by Vinnova. The technologies applied were fermentation followed by extrusion. #meat analogues #innovation

FROM (SMALL SCALE) PLOT TO FULL SCALE) COMMERCIAL

RI.SE

The project "Från parcell till kommersiell" investigated what measures are needed to achieve Sweden's full farming potential concerning plant based proteins. #cultivation #potential #plant-based proteins

NILLA – NATIONAL INNOVATION SYSTEM – EQUALLY EASY ACCESS FOR ALL

SWEDISH INCUBATORS AND SCIENCE PARKS The purpose of this <u>project</u> (Nationellt innovationsstödssystem – Likvärdigt och lättillgängligt för alla) is to develop a modell that optimises and makes innovation support more accessible for all Swedish companies, regardless of location.



THE PROTEIN REVOLUTION ALBAECO

National transformation platform for mobilizing radical innovation for world class Swedish proteins. Coordinated by Albaeco and financed by Vinnova. #green proteins