



Biogas and Biomethane Report

Market Intelligence

May 2024

SPAIN

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Current Market Overview

Spain has become one of Europe's hottest biomethane markets, with major investments announced for the coming years. Spain has access to a wealth of knowledge and experience from the broader European market, which is flocking to the Iberian Peninsula.

In October of 2023, there were 146 biogas facilities, contributing 2.74 TWh to the Spanish electrical grid. A new draft strategy from the Spanish government is targeting 20 TWh of biogas within Spain by 2030. Of this total, there are 12 biomethane facilities currently operational across Spain, with another 22 under construction and 60 in development. It is further estimated that up to 64 new facilities will be operational in Spain by the end of 2024.

More information on EPCs active in Spain can be found in Appendix 1; the list of equipment suppliers is available in Appendix 2.

In September of 2023, the European Commission released a set of fiches on the biomethane markets of its member countries, which can be viewed for more details: [EU Country Fiche](#) for Spain.

For further analysis of the Spanish market, as well as the entire biogas and biomethane value chain within Europe, BiogasWorld recommends viewing the [EBA statistical report](#).



Upgrading Snapshot

There are currently 12 operating facilities upgrading biogas to biomethane, with membrane being the most used upgrading technology.

As seen on the graph below, the companies active within the market include Greenlane, Bright Renewables, Prodeval, DMT, FNX, Sysadvance, WAGA Energy.

Figure 1. Biogas Upgrading in Spain

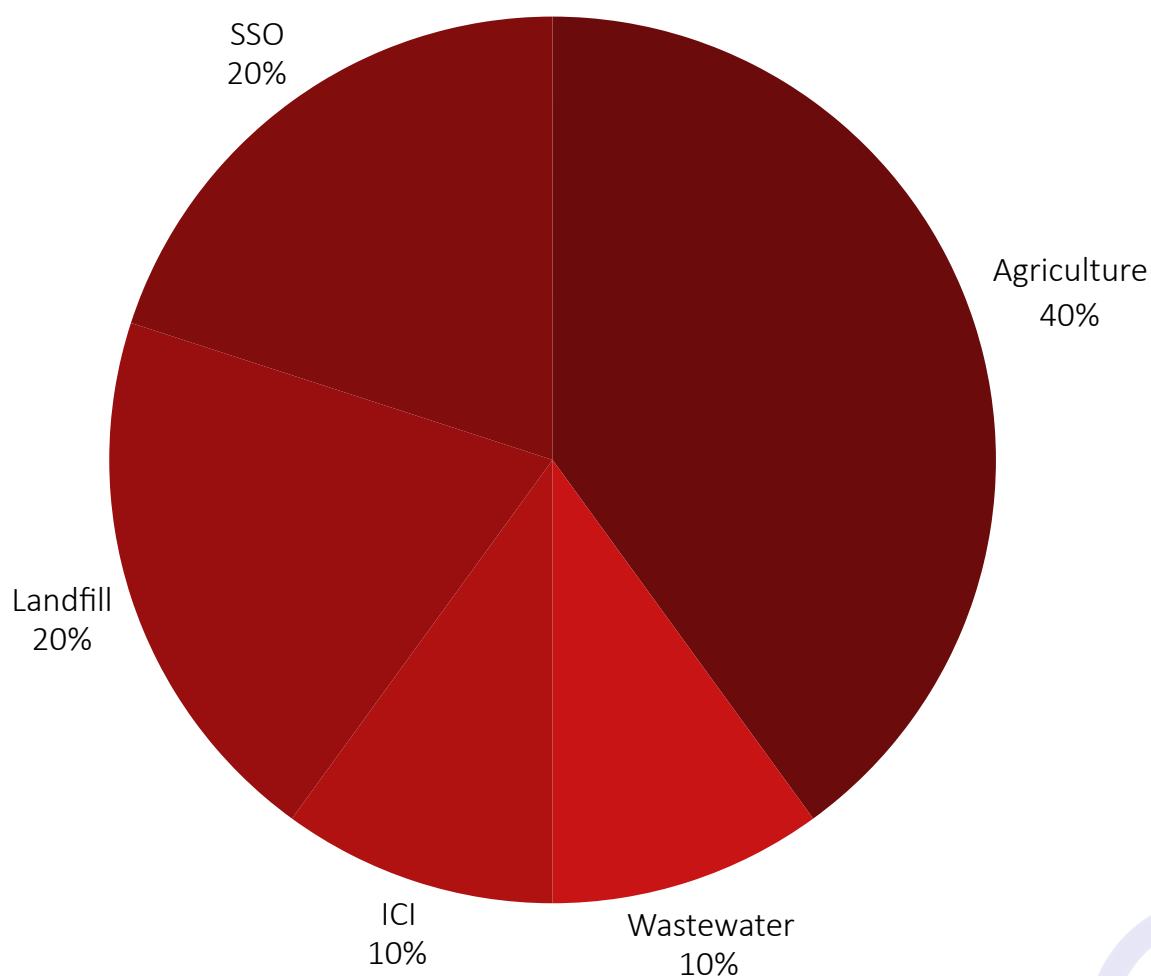


Facilities Under Construction and in Development

Although many facilities in operation are utilizing commercial wastes and landfills, this trend is slowly changing, with the majority of facilities under construction located at agricultural sites.

Wastewater, landfill, SSO, and ICI feedstocks still account for a sizeable chunk of upcoming facilities.

Figure 2. Feedstock Type of Facilities Under Construction

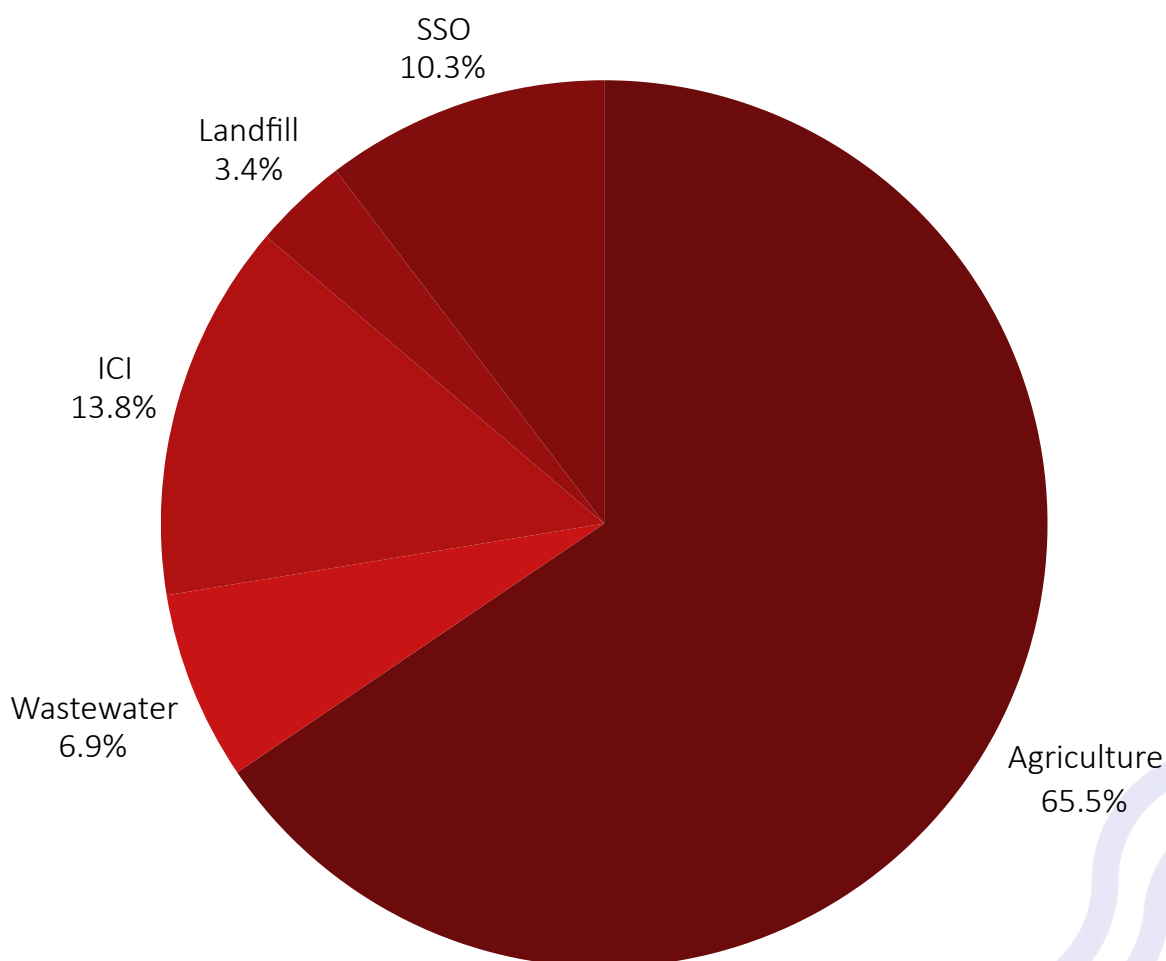


For facilities announced and in early stages of development, agricultural sites are accounting for a large majority of new projects.

This trend is supported by the release of a number of new reports on the potential of the Spanish agricultural market.

From developers, Repsol has announced 10 are in development in Galicia, CycleØ stated 20 will be either online or under construction by the end of 2024, Cepsa is targeting 15 by 2030, with the first 5 online by 2025/2026, and Ence is building 6, all to be commissioned by 2026.

Figure 3. Feedstock Type of Facilities in Development



Developer Commitments and Major Investments

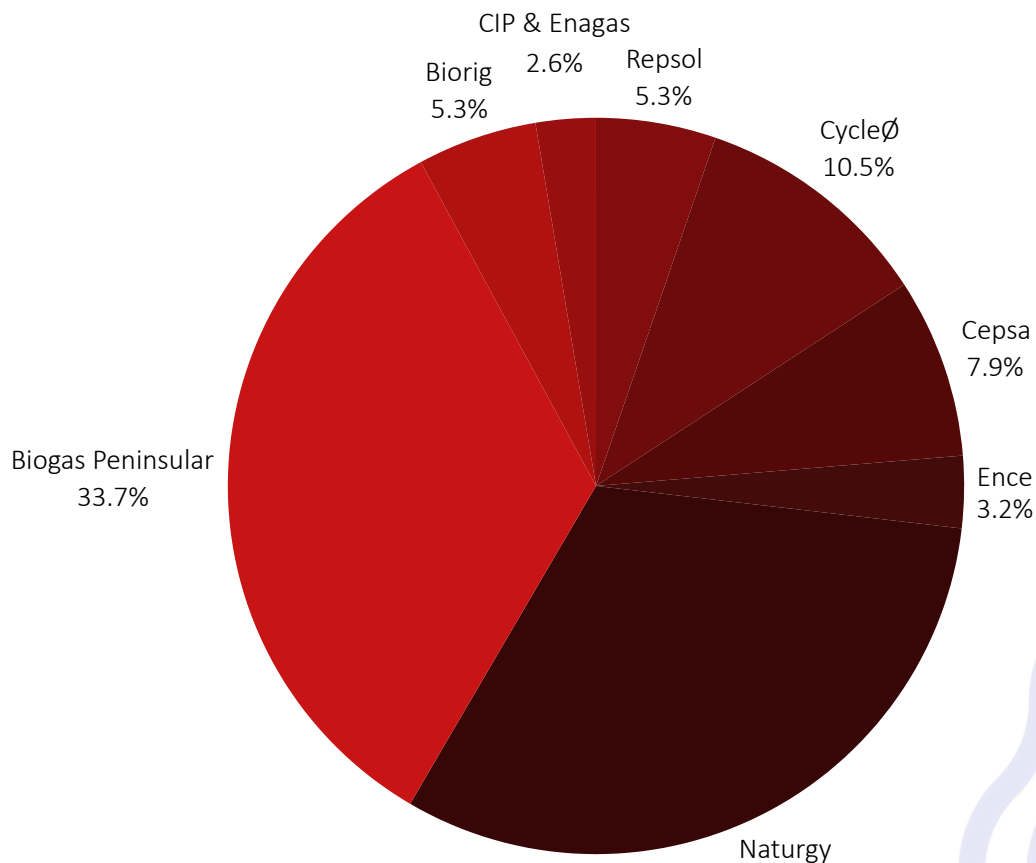
Major project developers have committed to nearly 200 new biomethane facilities in Spain. Notable commitments include 64 new facilities by Biogas Peninsular, and 60 new facilities by Naturgy, one of Spain's major gas utilities. Other commitments include 20 facilities by CycleØ, 15 from Cepsa, and 10 by both Repsol and BIORIG.

Other developers present in the market include Ence, PreZero, HAM Group, Copenhagen Infrastructure Partners, Enagas Renewable, RIC Energy, Lundsby, Sinia Renovables, Shell Energy, Total Energies, Renera Energy, Biovic, AGR, Axpo, Vertex, VORN Bioenergy, Bioenergy Ibérica, Nortegas. and Nippon Gases. Spanish insurance company Mapfre has launched a fund to raise EUR 100 million and build 25 new plants, and BIORIG is investing EUR 250 million to build 10 in Castilla y Leon.

Other major investors in projects with these and other developers include SUMA Capital, Verdalia Bioenergy (Goldmann Sachs), Eiffel Investment Group, SWEN Capital Partners, Green Arrow Capital, Qualitas Energy, Efedos Sevilla, Redexis, and ING Bank.

The EBA estimates that [investments in Spain total](#) approximately EUR 948 million

Figure 4. Developer Commitments



Market Barriers

As with all developing markets, there are a number of barriers that are inhibiting accelerated market growth in Spain. Some of these barriers include the lack of legal and regulatory frameworks at the national level, and the lack of a framework for biomethane applications not related to electricity production. Other inhibitors include the absence of a Guarantee of Origin System for biomethane (currently in development), and market stakeholders have accused the national Biogas Roadmap to be 'unambitious'.

On the administrative and economic side, the process of obtaining permits can be cumbersome, err on the side of caution, and differ across each autonomous region. Finally, there is a lack of incentives at the national level for projects, and funding primarily originates from EU programs.

Many of these inhibitors are not unique to Spain, and experiences can be drawn from other European countries to support Spanish market development.

Appendices



Appendix 1: EPCs in Spain

*Note: This list is not exhaustive and is based off of information collected by BiogasWorld using mainly public sources of information.

Company	Headquarters	Website
Méthalac	France	https://www.methalac.com/
Anaergia	Canada	https://www.anaergia.com/
Biogest	Austria	https://www.biogest.at/
HoSt	Netherlands	https://www.host-bioenergy.com/
Veolia	France	https://www.veolia.com/
AAT Biogas	Austria	https://www.aat-biogas.at/
AGF Procesos	Spain	https://agfprocesos.com/
AGR Biogás	Spain	https://www.agrbiogas.es/
Apergas	Spain	https://apergas.cat/
Biovic	Spain	https://biovic.es/
Botres Global	Austria	https://www.botres.com/
Catalana de Biogás Iberia	Spain	https://www.catalanadebiogas.com/
CVE España	Spain	https://www.cvegroup.com/
Enerlan Solutions	Spain	https://www.enerlan.es/
Envitec	Germany	https://www.envitec-biogas.com/
Genia Bioenergy	Spain	https://geniabioenergy.com/
Grupo Arrate	Spain	https://grupoarrate.com/
Inbiogas	Spain	https://www.inbiogas.com/
KEON Group	France	https://www.keon-group.com/
Kepler	Spain	https://www.kepler.es/
Krieg & Fischer	Germany	https://www.kriegfischer.de/
Norvento Enerxía	Spain	https://www.norvento.com/
Ökobit	Germany	https://www.oekobit-biogas.com/
REVIS Bioenergy	Germany	https://www.revis-bioenergy.de/
Rota Guido	Italy	https://www.rotaguido.it/
Schmack Biogas	Germany	https://www.schmack-biogas.com/
Sebigas	Italy	https://www.sebigas.it/
Seko Industries	Italy	https://sekoindustries.com/
Weltec	Germany	https://www.weltec-biopower.com/

Appendix 2: Equipment Suppliers in Spain

*Note: This list is not exhaustive and is based off of information collected by BiogasWorld using mainly public sources of information.

Category	Company	Headquarters	Websites
Biogas Upgrading	WAGA Energy Bright Renewables Prodeval Sysadvance Veolia agriKomp Ammongas Arol Energy Bimeo CarboTech ETW FNX Gazpack Hitachi Nissen Energy Parker Hanfin Pietro Fiorentini Techno Project Industriale Wärtsilä	France Netherlands France Portugal France Germany Denmark France Spain Germany Germany Spain Netherlands Switzerland Denmark United States Italy Italy Finland	https://waga-energy.com/ https://www.bright-renewables.com/ https://www.prodeval.com/ https://sysadvance.com/ https://www.veoliawatertechnologies.com/ https://www.agrikomp.com/ https://ammongas.europeanenergy.com/ https://www.arol-energy.com/ https://www.bimeo-solutions.com/ https://ct-gs.com/ https://etw-energie.de/ https://www.cycle0.com/ https://gazpack.nl/ https://www.hz-inova.com/ https://nissenenergy.com/ https://www.parker.com/ https://www.fiorentini.com/ https://www.tecnoproject.com/ https://www.wartsila.com/
CHP Engines	2G MWM	Germany Germany	https://www.2g-energy.com/ https://www.mwm.net/
Pumps & Agitators	Netzsch Peters Mixers Steверding Rührwerkstechnik Börger BBA Pumps GEA HRS Heat Exchangers Landia Liberty Pumps Mapner MP Fluids Paulmichl PTM Raimaber Fluid Tech Roto Pumps Stallkamp SUMA Thöni Toro Vogelsang Wangen Pumpen	Germany Belgium Germany Netherlands United States Germany United Kingdom Denmark United States Spain Spain Germany Germany Spain India Germany Germany Austria Spain Germany Germany	https://www.netzsch.com/ https://www.peters-mixer.com/ https://www.ruehrwerkstechnik-steверding.de/ https://www.boerger.com/ https://www.bbapumps.com/ https://www.gea.com/ https://www.hrs-heatexchangers.com/ https://www.landiainc.com/ https://www.libertypumps.com/ https://en.mapner.com/ https://mpfluids.com/ https://www.paulmichl.de/ https://www.propeller-technik-maier.de/ https://www.raimaberfluidtech.com/ https://rotopumps.com/ https://www.stallkamp.de/ https://www.suma.de/ https://www.thoeni.com/ https://toroequipment.com/ https://www.vogelsang.info/ https://www.wangen.com/

Category	Company	Headquarters	Websites
Compressors	BAUER Compressors Adicomp Baglioni Fonovogas Sauer Compressors	Germany Italy Italy Italy Germany	https://www.bauercomp.com/ https://www.adicomp.com/ https://baglionispa.com/ https://www.fonovogas.it/en/ https://www.sauercompressors.com/
Tanks	Schumann Tanks BioDynamics Systeme Wolf W-Tank	Germany Belgium France Spain	https://schumann-tanks.com/ https://bio-dynamics.be/ https://www.wolfssystem.fr/ https://www.w-tank.com/
Gas Detection, Analysis, & Instrumentation	MRU Instruments Awite Exttox Hach Kromschroeder	Germany Germany Germany United States Germany	https://mru-instruments.com/ https://www.awite.de/ https://www.exttox.de/ https://hach.com/ https://www.kromschroeder.de/
Membranes & Covers	Membrane Systems Europe Agrotel Covertex Ecomembrane Hexa-Cover Upbiogas	Netherlands Germany Germany Italy Denmark Spain	https://biogasmembrane.com/ https://agrotel.eu/ https://www.huesker.us/ https://www.ecomembrane.com/ https://www.hexa-cover.dk/ http://www.upbiogas.es/
Gas Preconditioning	Anka Enerji Paques Ahidra Colsen Technologies Aprovis Conveco Deltalys Desotec Econward Ecotec Electrochaea HeGo Biotec Inbiogas Savio Unicarb Activated Carbon	Turkey Netherlands Netherlands Germany Italy France Belgium Spain Spain United States Germany Germany Spain Italy Germany	https://ankaenerji.com.tr/ https://en.paques.nl/ https://www.colsen.nl/en https://www.aprovis.com/ https://www.conveco.com/ https://deltalys.com/ https://www.desotec.com/ https://www.econward.com/ https://www.ecotecco.com/ https://www.electrochaea.com/ https://www.hego-biotec.de/ https://www.inbiogas.com/ https://www.savioclima.com/ https://www.unicarb-ac.com/

Category	Company	Headquarters	Websites
Feedstock Preconditioning/ Preprocessing	Drycake Ambisort Cicular Euromilling Fluiteco Gemidan Mavitec Palmieri Rowan Saveco Iberica Tietjen	Netherlands Spain Denmark San Marino Denmark Netherlands Italy United Kingdom Spain Germany	https://www.drycake.com/ https://ambisort.com/ https://euromilling.dk/ https://www.fluiteco.com/ https://gemidan.dk/ https://mavitec.com/ https://www.palmierigroup.com/ https://rowanfoodandbiomass.com/ https://saveco-water.es/ https://www.tietjen-original.com/
Digestate Treatment	Nijhuis Dorset Pieralisi Purfil Sorain Cecchini Tecno Takora Solutions	Netherlands Netherlands Italy Denmark Italy Spain	https://www.nijhuisindustries.com/ https://www.dorset.nu/ https://www.pieralisi.com/ https://www.purfil.com/ https://www.sctecno.com/ https://takora-solutions.com/
Process Optimisation	Icoda	Spain	https://www.icoda.es/
Digester Additives	Active NS Aegle FerroBio Micronox	Denmark Spain Spain Spain	https://www.activens.uk/ https://aegle-technology.es/ https://ferrobiogroup.com/ https://en.promindsa.com/micronox-biox/

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