

GOOD PRACTICES AND TECHNOLOGIES

Reducing footprint in water

El Agua Nos Une – Suiza Agua América Latina



Treatment of pig farm effluents by means of biodigestion for use.

SDG: 6.3 Improvement in water quality



Company / implementer

Grupo Aliar Porcícola

Sector:

ISIC 0144 Pig farming

Location:

Hacienda Machijure Puerto Gaitán, Meta.
N 04° 09' 57", W 72° 08' 08".

Update: 02 Feb. 2018



Results

- Treatment and use of **10,220m³/year** in pig farm effluents.



Other benefits

Savings:

- USD 108,274** in the use of manure for fertilization. In addition, no fertilizers were purchased since manure is added in the appropriate proportions according to the requirements of the soil (720 kg nitrogen/Ha per year).

Non-monetary savings:

- Irrigation of 1,656 Ha with manure.
- Reduction of odors and volatile organic compounds.



Supplier References

Supplier: Internal development



Implementing Company

Company in charge of implementing

the solution: Grupo Aliar Porcícola.

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Description

The biodigestion process consists in the digestion of manure from pig farms. This process produces methane gas, carbon dioxide and manure. The gas is used to generate electricity.

Manure is an organic fertilizer rich in nitrogen (1.2 kg/m²), phosphorus (0.24 kg/m²) and potassium (0.85 kg / m²), which is added to the soil used for livestock farming.

These values lead to savings in energy and fertilizer consumption.



Investment and Operating Costs

Implementation Costs: 470,846 USD in the construction and commissioning of biodigesters.

Operating Costs: 53251 USD.

Life span: Approximately 20 years.



Cases of Application

N/A



References

Good practices and technology sheet:

- Generation of energy through biogas at pig farms.

