

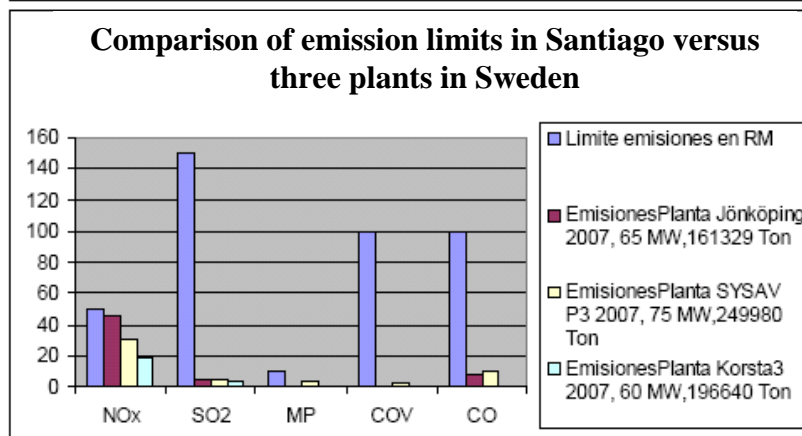
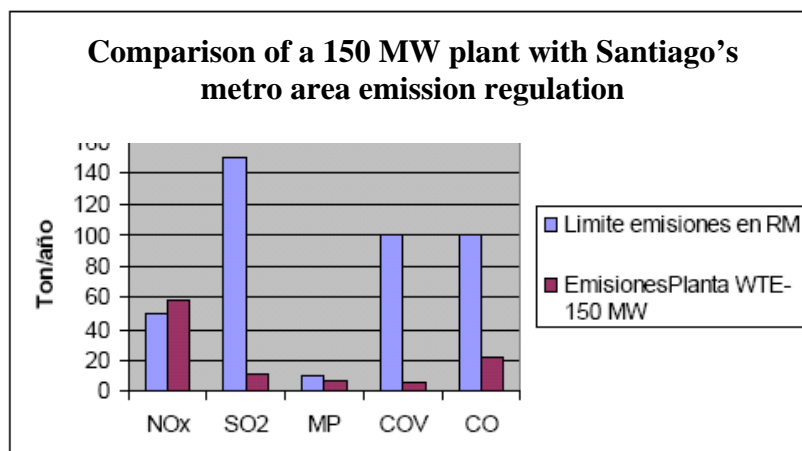
Results

Among the main results coming out of the project we can highlight the following:

- Analysis of the local energy situation.
- Waste classification taken on three campaigns from 24 municipalities in Santiago.
- Analysis of the Inferior Heat Power (IHP) extracted from waste.
- Study of different incineration and exhaust gas technologies available.
- Analysis of the several ways to get energy produced during waste incineration: electricity, heat, and cold air.
- Use of the Life Cycle analysis to compare different scenarios for waste treatment.

Conclusions

- The three classification campaigns allowed to demonstrate no variation on the waste collected in different weather seasons from the 24 municipalities.
- The results from the classification of waste and the heat power analysis entering the Quilicura Transfer Station allow us to conclude that waste can be treated through an incineration technique with energy recovery.
- The emission levels of this type of plant comply with PPDA requisites, making it viable to build near industrial and / or populated areas in the Santiago metro area. The installation of these incineration technology plants have the potential to make use of heat or cold.
- The analysis of the life cycle shows that it should be possible to reduce the green house gas emissions to about 500,000 tons/ year of CO₂ equivalent



in a period of ten years or up to 1 million tons /year of CO₂ equivalent in a longer period. Incineration appears to be the best options since recovering energy from waste substitutes the combustion of fossil fuels.

- Given the magnitude of the investment required, we expect a combined public-private initiative as it has been the experience in Europe. Otherwise, this renewable energy should have a special tax treatment.

Alliances / Cooperation

During the project duration we established important alliances with waste treatment-related Swedish research centers and companies.

- Swedish Environmental Research Institute (IVL) www.ivl.se
- Borlänge Energi www.borlange-energi.se
- FALU Energy and Water www.fev.se
- Fortum www.fortum.se
- Hammarby Sjöstad www.hammarbysjostad.se
- Compost Plant TUNA Hastberg
- Dala Hazardous Waste Plant
- Kvarnsveden Paper Plant -STORA ENSO www.storaenso.com
- A.S. Borlänge Treatment Plant www.borlange-energi.se
- Fagelmyra Treatment Plant www.borlange-energi.se
- SRV Plant www.srvatervinning.se