



# Šal'a region, waste management and vision for the future

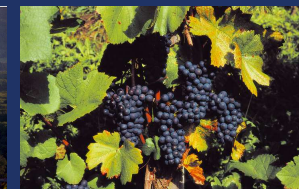
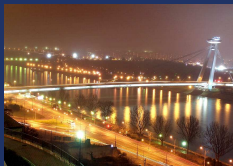
**WASTE TO ENERGY**

Peter Benko



2nd Interregional Seminar

10 March 2011, Bratislava



# Šal'a Region



**Area: 355,9 km<sup>2</sup>**  
**Inhabitants: 54 095 (1.1.2007)**  
**Density: 152 obyvatel'ov na km<sup>2</sup>**  
**Towns: 1**  
**Villages: 12**

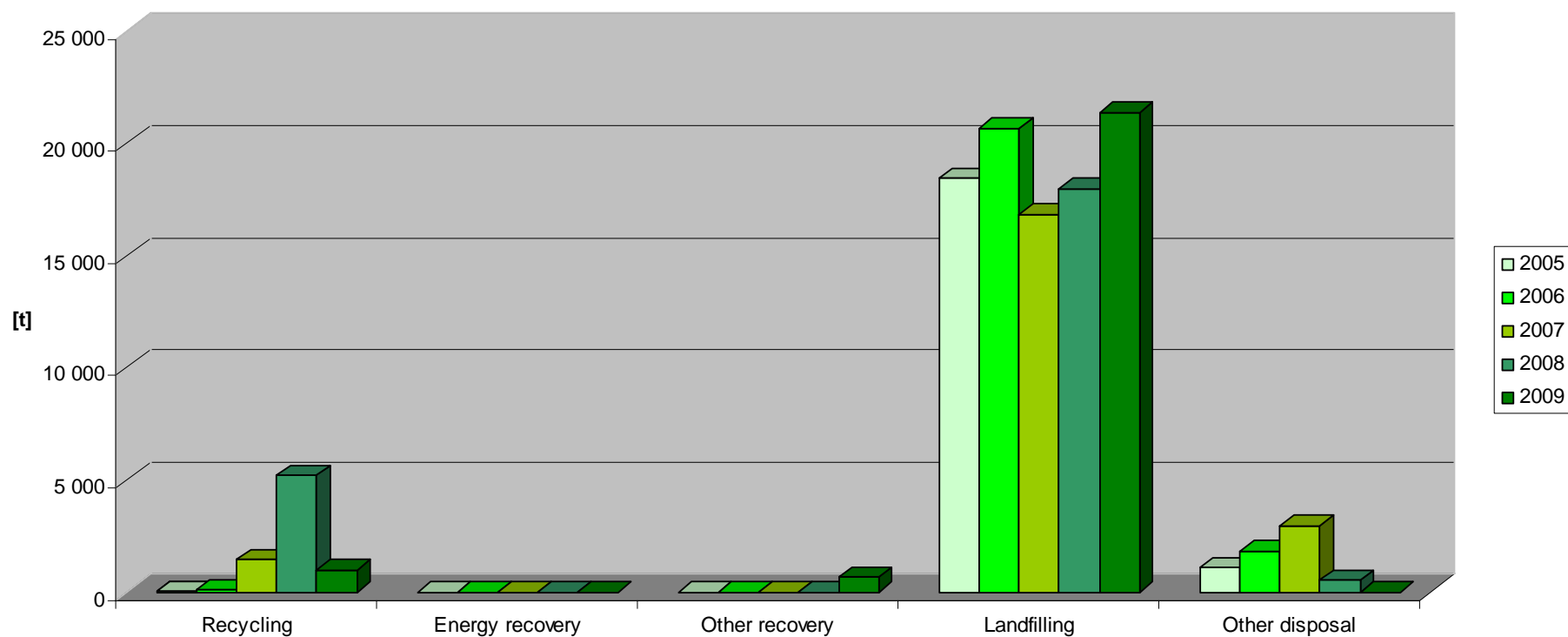
**MSW 20 000 tons/y (50% town Šal'a, 50% other villages)**  
**Recyclables – paper, plastic, glass 5% of total wolume**  
**Green waste composting – 2000 tons/y**



# MSW statistics – Šal'a district



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# Waste management



- Each municipality is responsible individually for MSW management
- Waste management plan for whole republic expired – no update yet
- No regional integrated approach to waste management

## Challenge

is to recognise and utilise local (regional) specific synergies of industry, Municipalities and Waste management companies

## Big players here:

- SITA Slovakia (Suez group – France)
- A.S.A (F.C.C. group – Spain)
- Marius Pedersen (Veolia group – France)

WHY they do nothing???

Answer: They are more cost effective than environmentally effective



# Šal'a region – synergies and possible development to W2E



Chance for synergies and integrated waste management



- Common approach on municipal regional level
- Negotiation with strong industrial partners
- – (Duslo, Thermal plants, cement plants, Waste service provider...others?)

Duslo – chemical plant produces fertilizers and rubber (tyres) production additives  
Important – incinerator with free capacity (Is there possibility to burn part of MSW?  
Nobody knows...

1. W2E project can help at least to investigate and recognize possibilities of region
2. Look for synergies only inside but outside with other regions as well
3. Looking for better solutions as we have today
4. Finally to give to stakeholders and decisionmakers tool, which

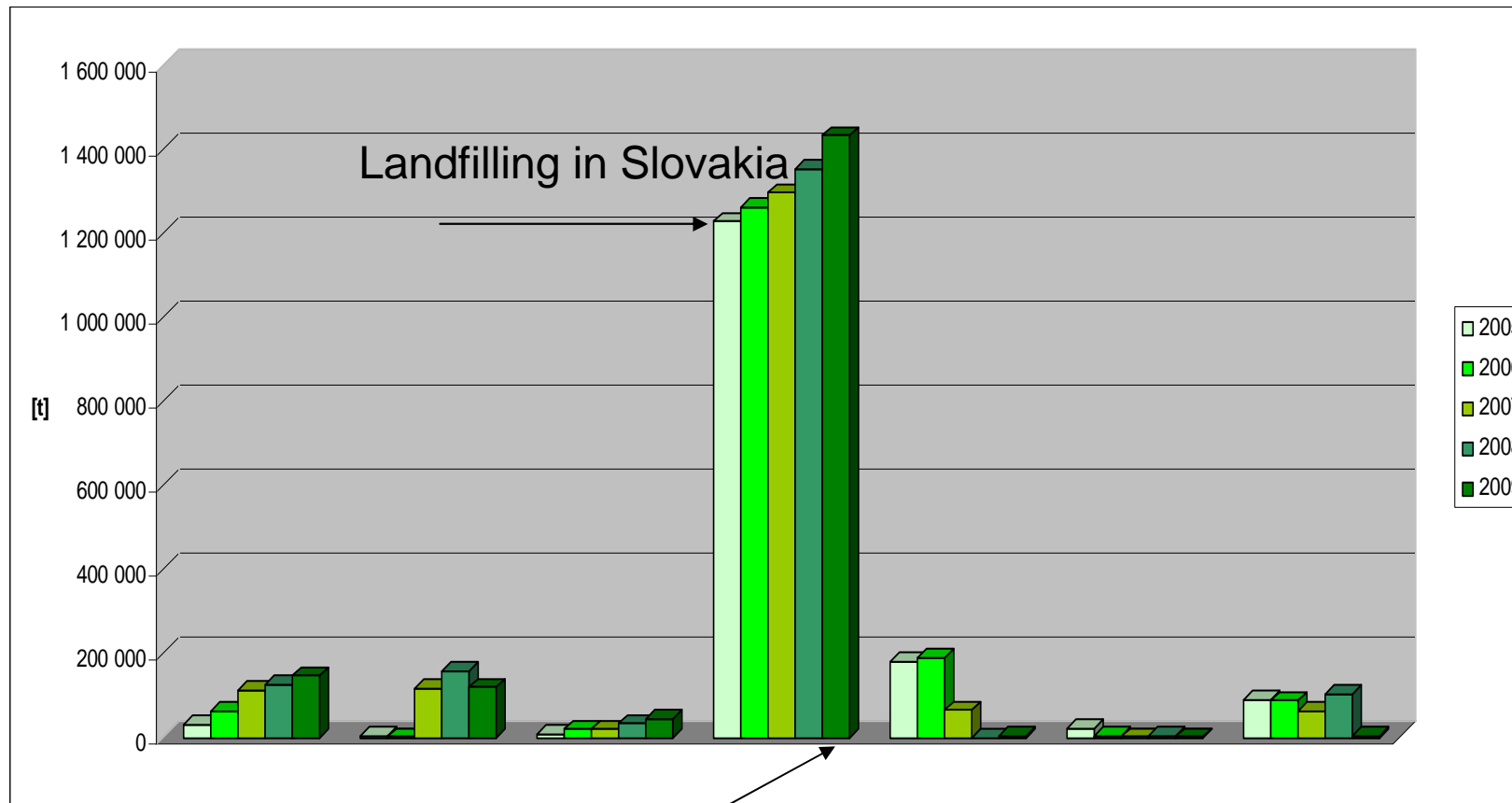
To gives ideas how to proceed in waste management in order to achive economical and environmental sustainability



# ...not Šaľa only...SK situation



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What to do with this??? This year is new Waste law prepared



## WtE Nehlsen – Stavenhagen (D)



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El. En. – 10MWe  
100 000 tons RDF /y  
Steam is used in close plant for potatoes  
Chips production - Pfanni





## WtE AVN Zwentendorf - Austria

MSW 300 000t/y – effective connection with thermal powerplant



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Steam is from WtE delivered  
to thermal powerplant

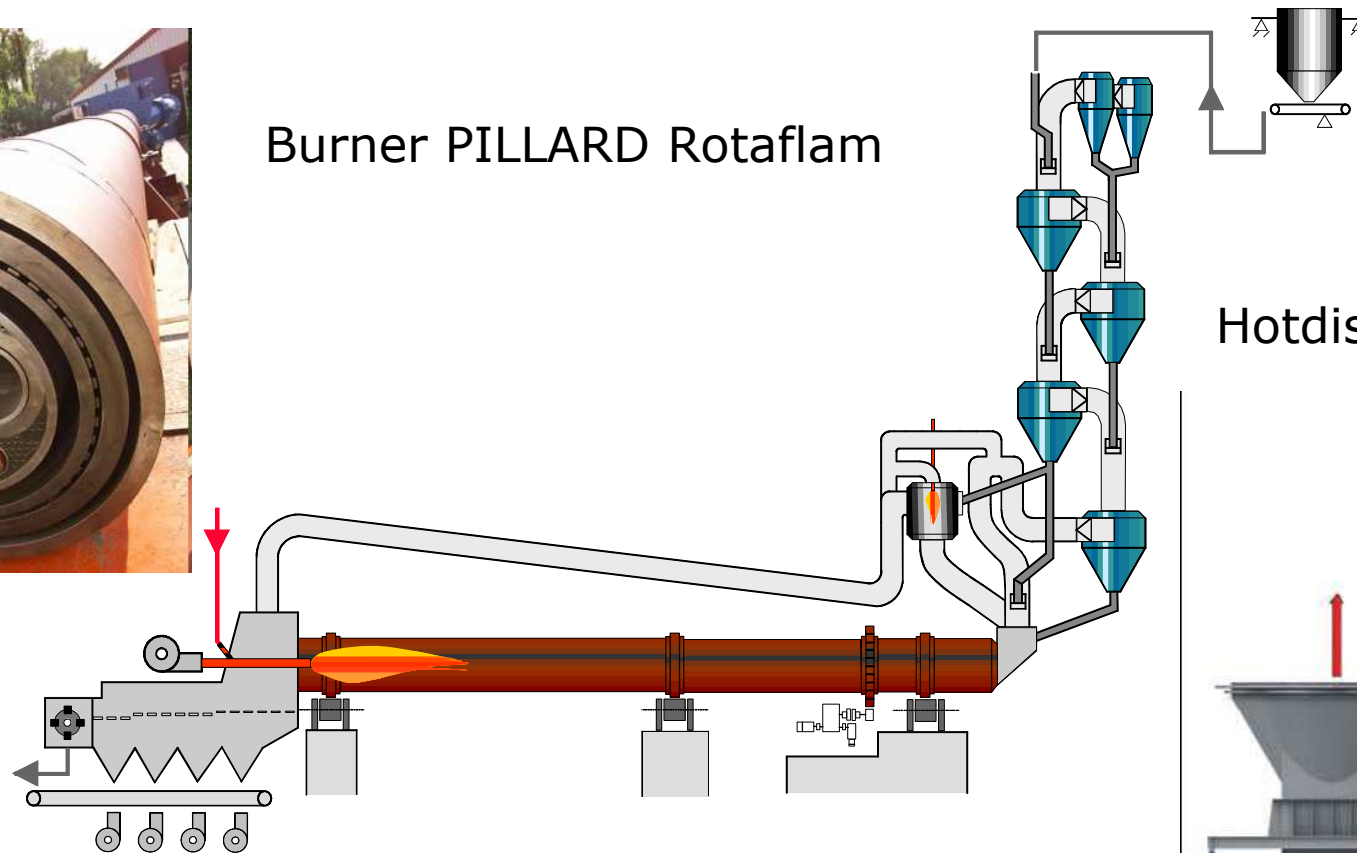




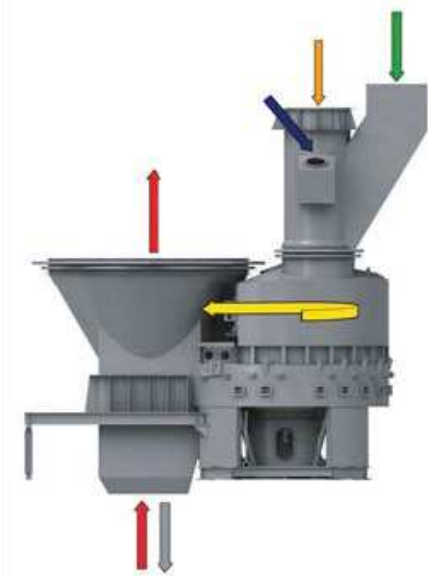
# Modern technologies in cement industry for Waste coprocessing



Burner PILLARD Rotaflam



Hotdisc FLS





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Steam is from WtE delivered  
to thermal powerplant



# Svensk Biogas – „Waste from citizens is going back in usable form“





# E.ON – Norrköping powerplant and co-incineration of waste



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# Thank you for your attention



...small people  
can do big things...

FISKEBY papermill – coincineration  
of industrial and municipal waste  
for energy for their paper production

