

Environment and Climate Change Canada (ECCC) Grant

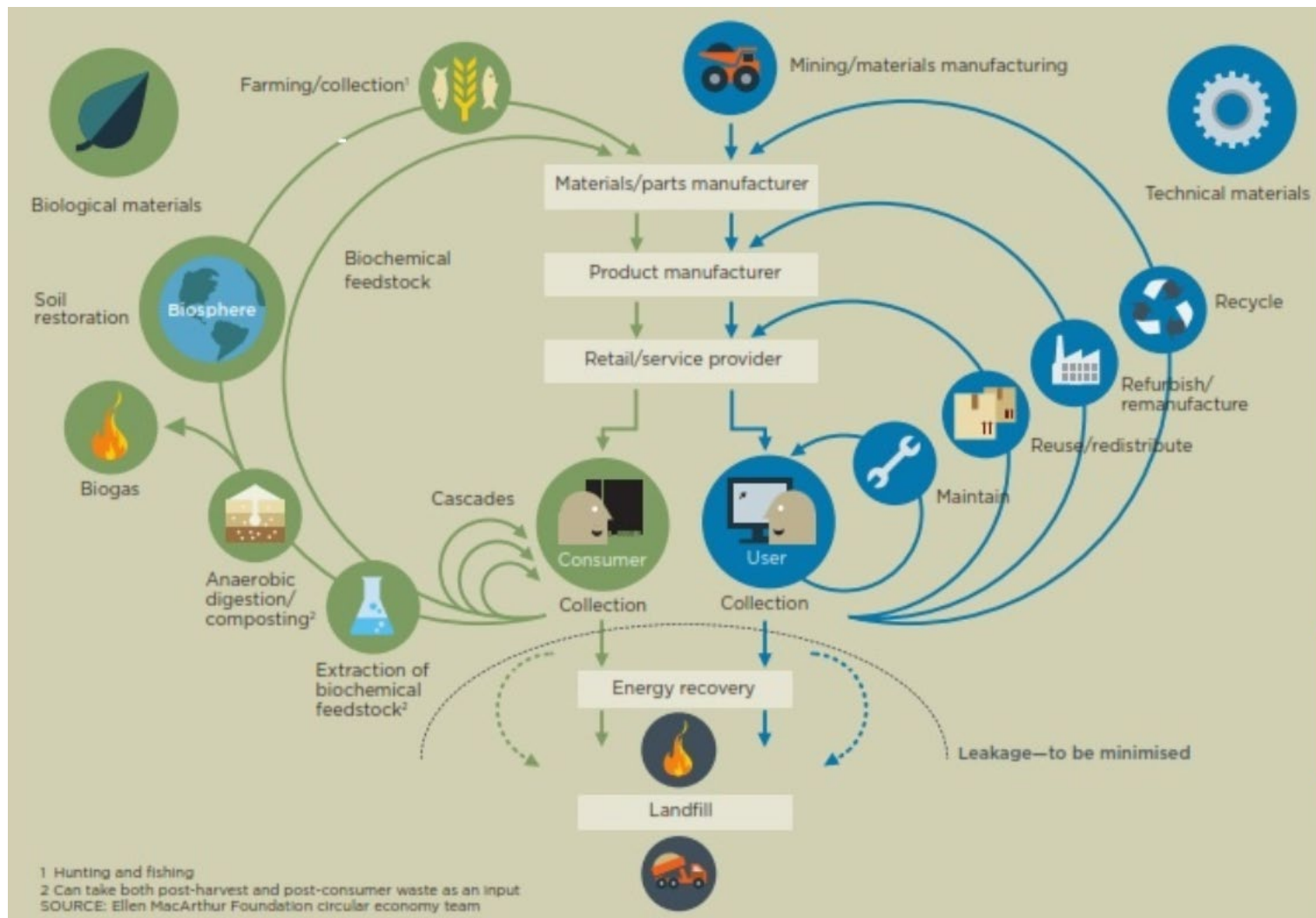
- Project Title: Methane emission reductions in Southeastern European waste sector through application of GMI resources Project
- 1st April 2023 – 31st March 2025



Environment and
Climate Change Canada

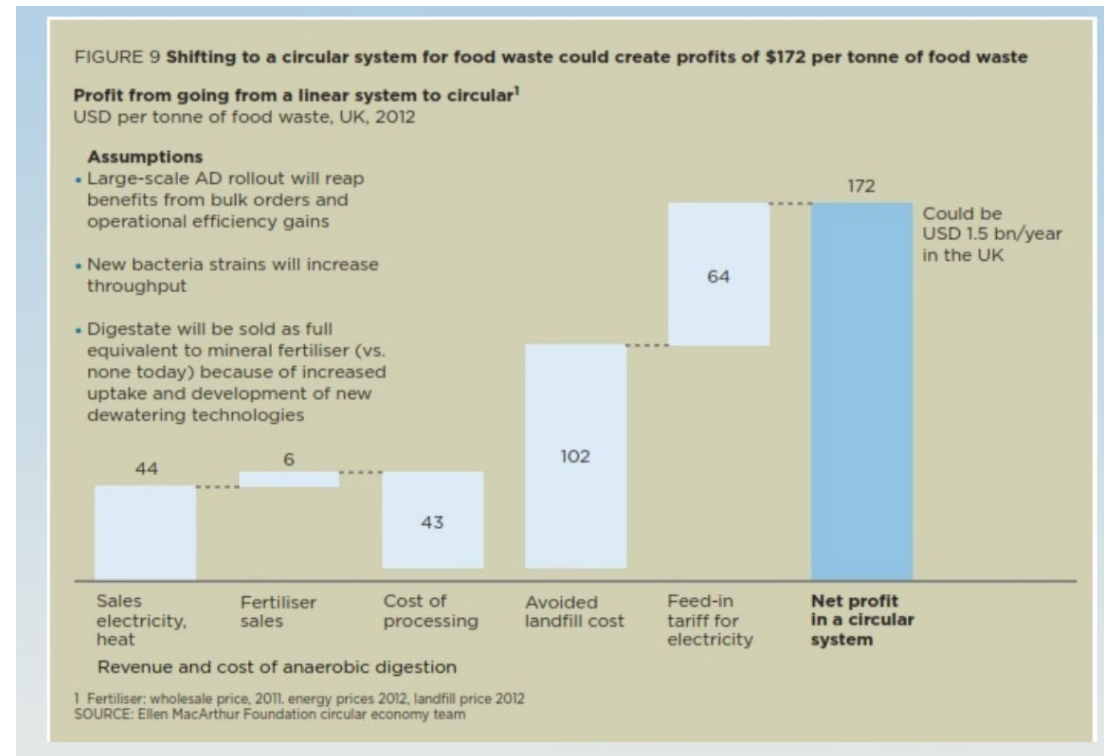
WTE as Integrated Part of Circular Economy

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Problem for transition country

- Linear economy
- Middle class
- Waste system
- Price for fossil fuels
- Investment cost

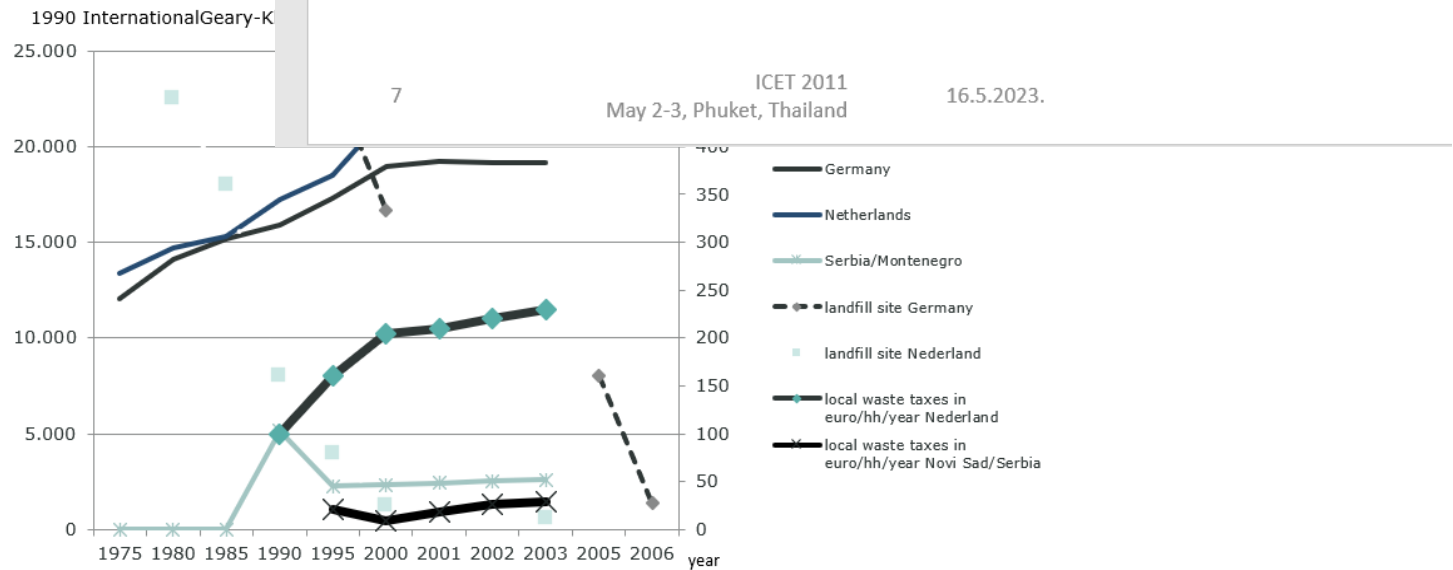
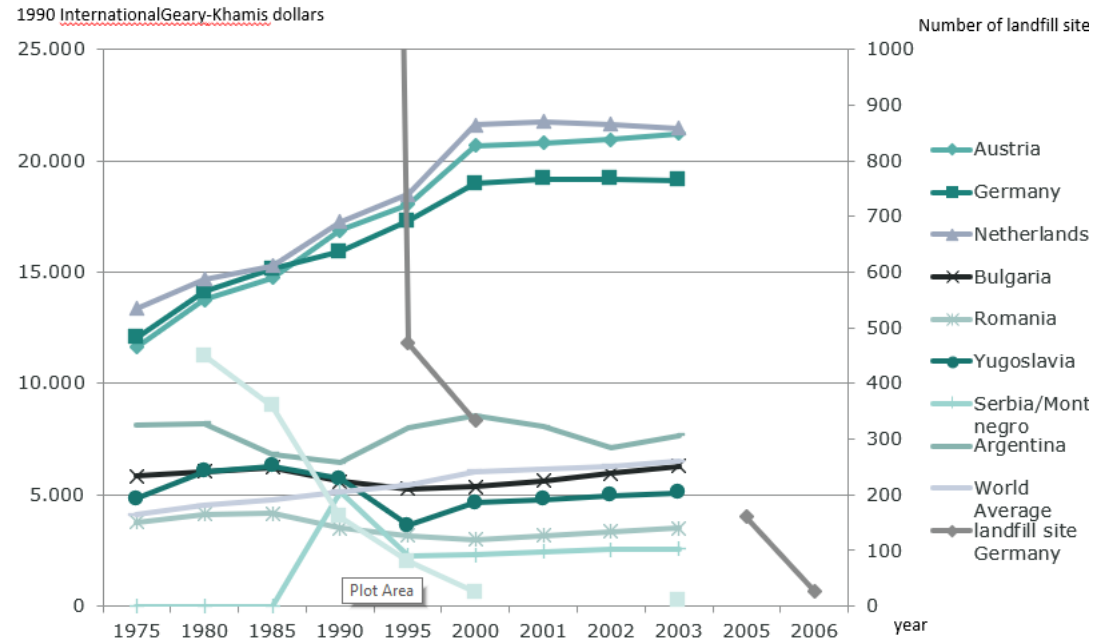
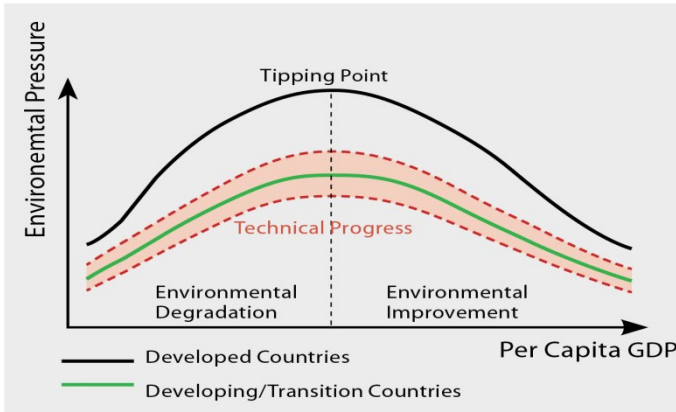


EU Waste Goals

Tab.4: General and specific waste management goals defined by EU directives

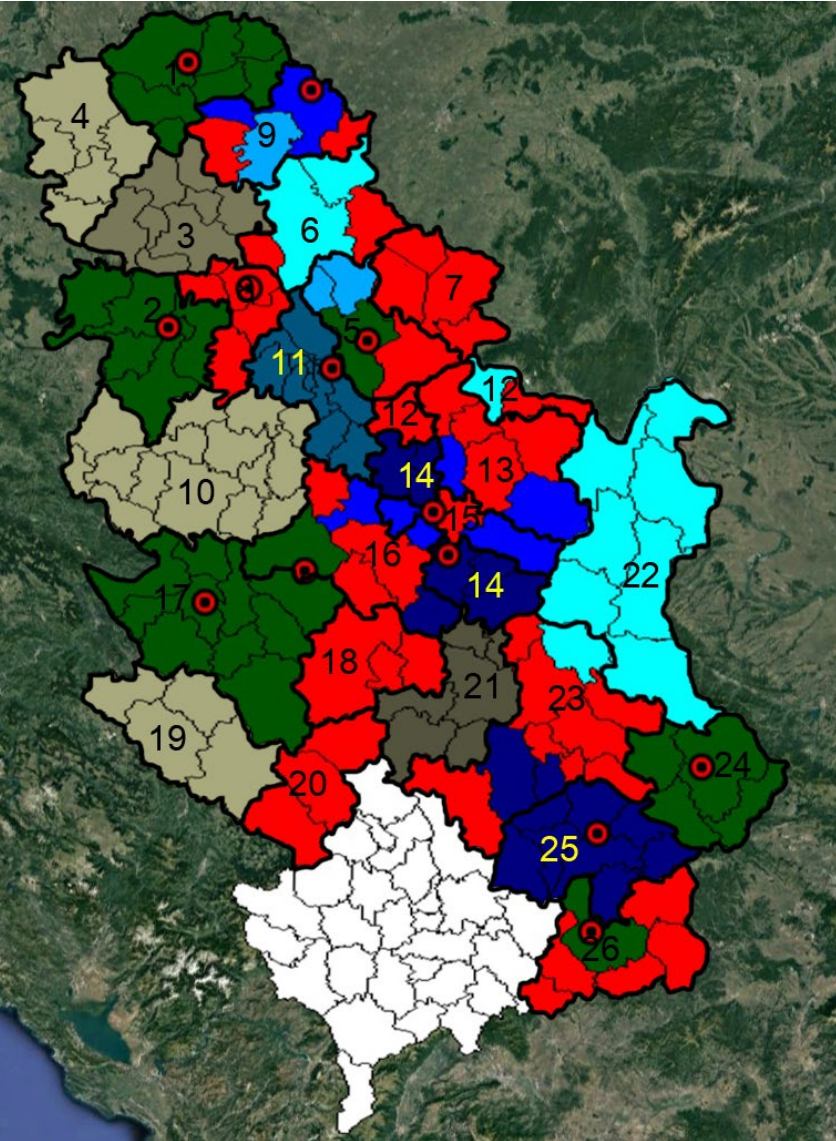
Type of waste	Year	MIN Reuses	MIN recycling	Collection coverage
Packaging waste	in 2008	60%	55%	
	in 2025	Separate collection for paper, metal, plastic, glass and textiles		
	2030	70% recycling (55% plastic, 30% wood, 80% ferrous metals, 75% glass, 85% paper and cardboard)		
Biodegradable waste removed from landfills	in 2006	A reduction to 75% of the 1995 level.		
	in 2009	A reduction to 50% of the 1995 level.		
	in 2016	A reduction to 35% of the 1995 level.		
It was waste	in 2023	Separate and recycle at source, or collect separately and do not mix with other types of waste		
Municipal waste	in 2020	50% recycling of municipal waste		
	in 2035	65% reuse and recycling		
Municipal hazardous waste	in 2024	Separate collection		
Shot	in 2020	70% recycling, reuse of shot		
Vehicles	in 2015	95	85	100
Electro	in 2006	70%	50%	min 4kg per inhabitant per year
Batteries	in 2011	50-75 efficiency		
	in 2012			25%
	in 2016			45%
Tires		0% deposit		

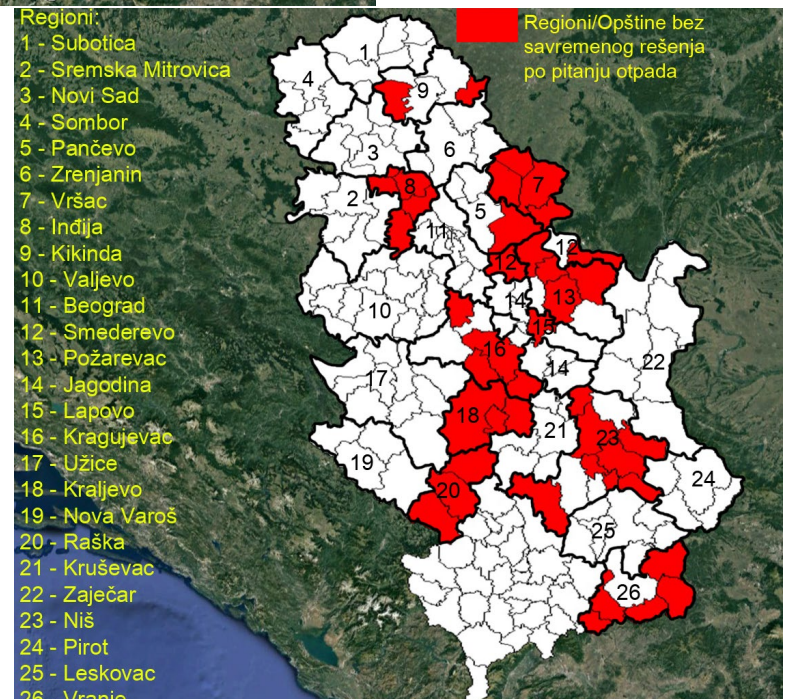
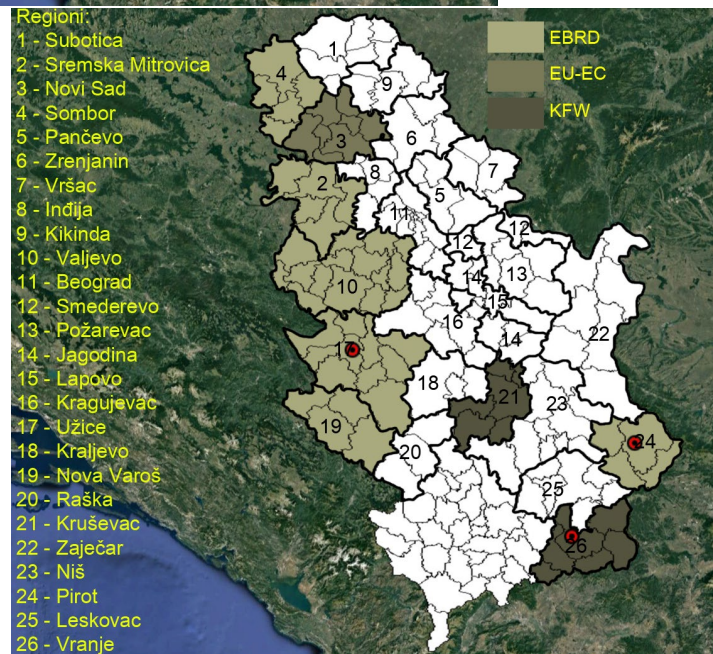
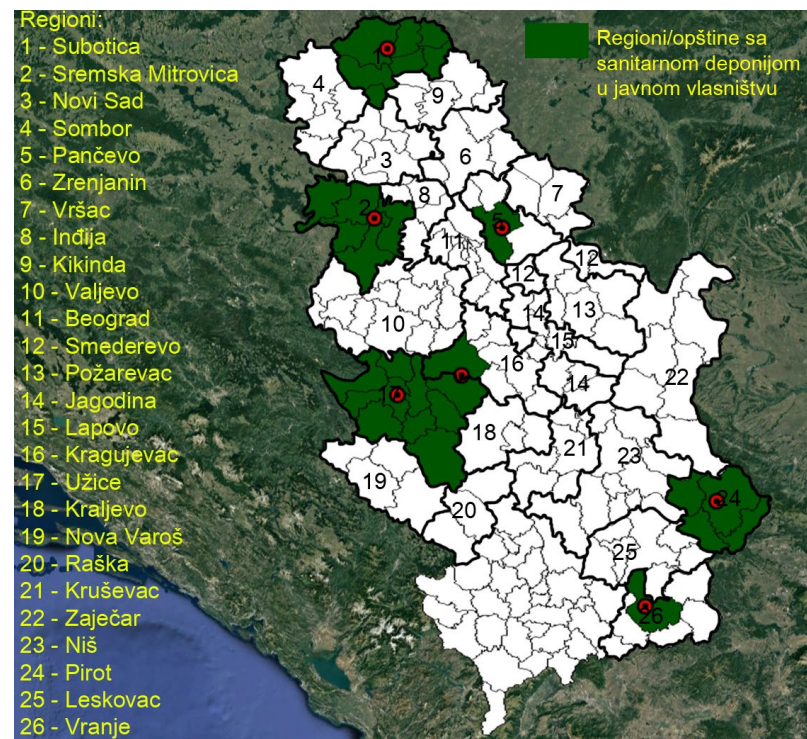
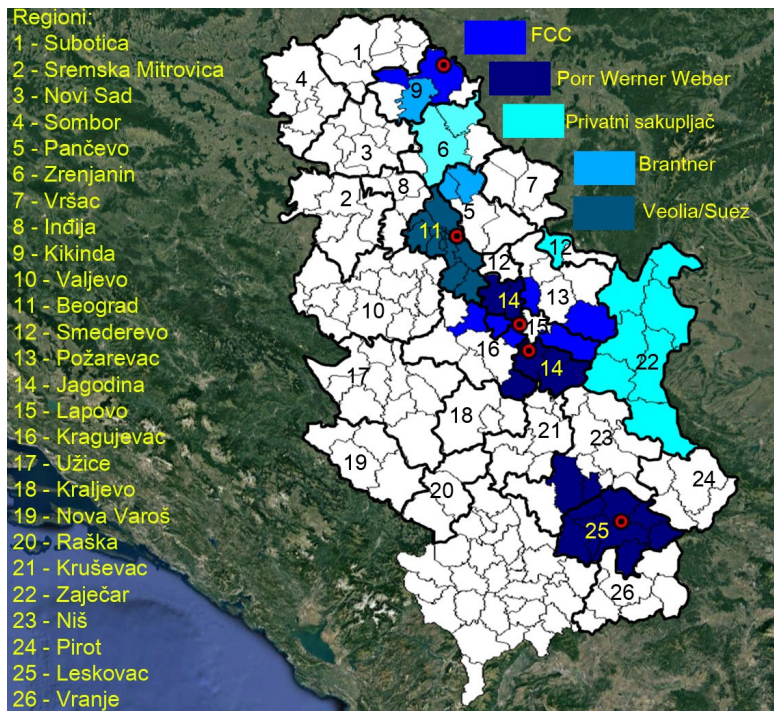
Is it possible to reach EU goals? is it time?



Regioni:

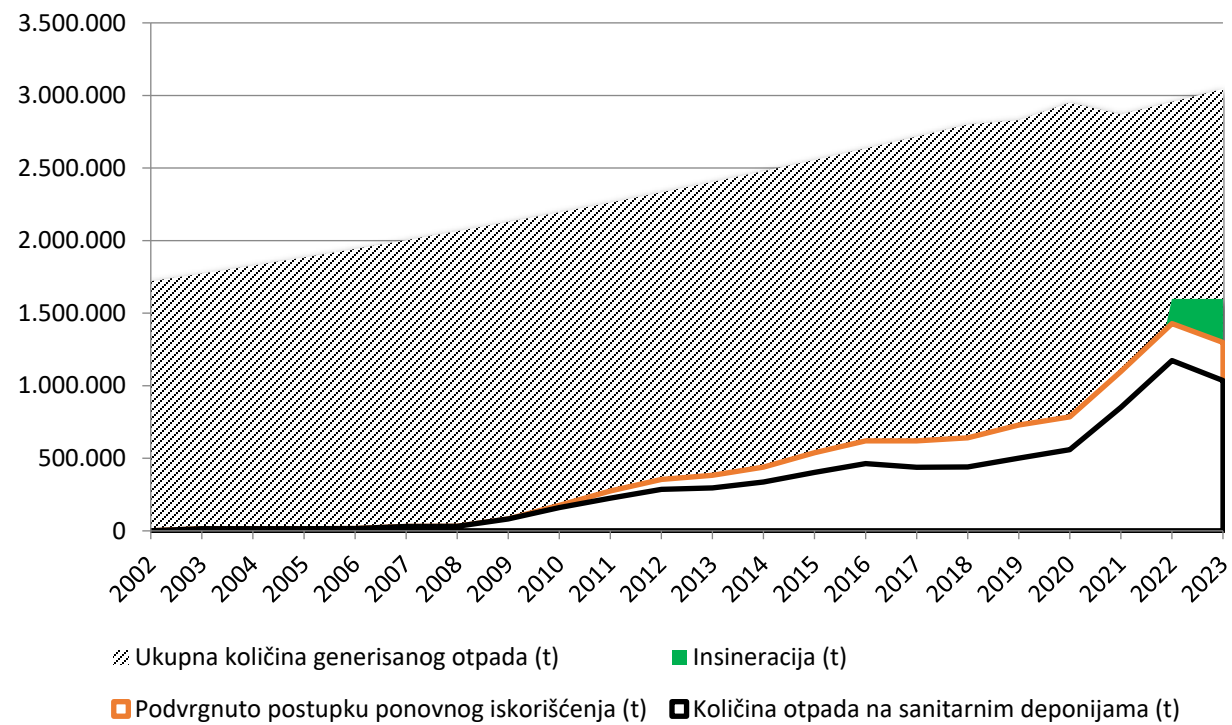
- 1 - Subotica
- 2 - Sremska Mitrovica
- 3 - Novi Sad
- 4 - Sombor
- 5 - Pančevo
- 6 - Zrenjanin
- 7 - Vršac
- 8 - Indija
- 9 - Kikinda
- 10 - Valjevo
- 11 - Beograd
- 12 - Smederevo
- 13 - Požarevac
- 14 - Jagodina
- 15 - Lapovo
- 16 - Kragujevac
- 17 - Užice
- 18 - Kraljevo
- 19 - Nova Varoš
- 20 - Raška
- 21 - Kruševac
- 22 - Zaječar
- 23 - Niš
- 24 - Pirot
- 25 - Leskovac
- 26 - Vranje



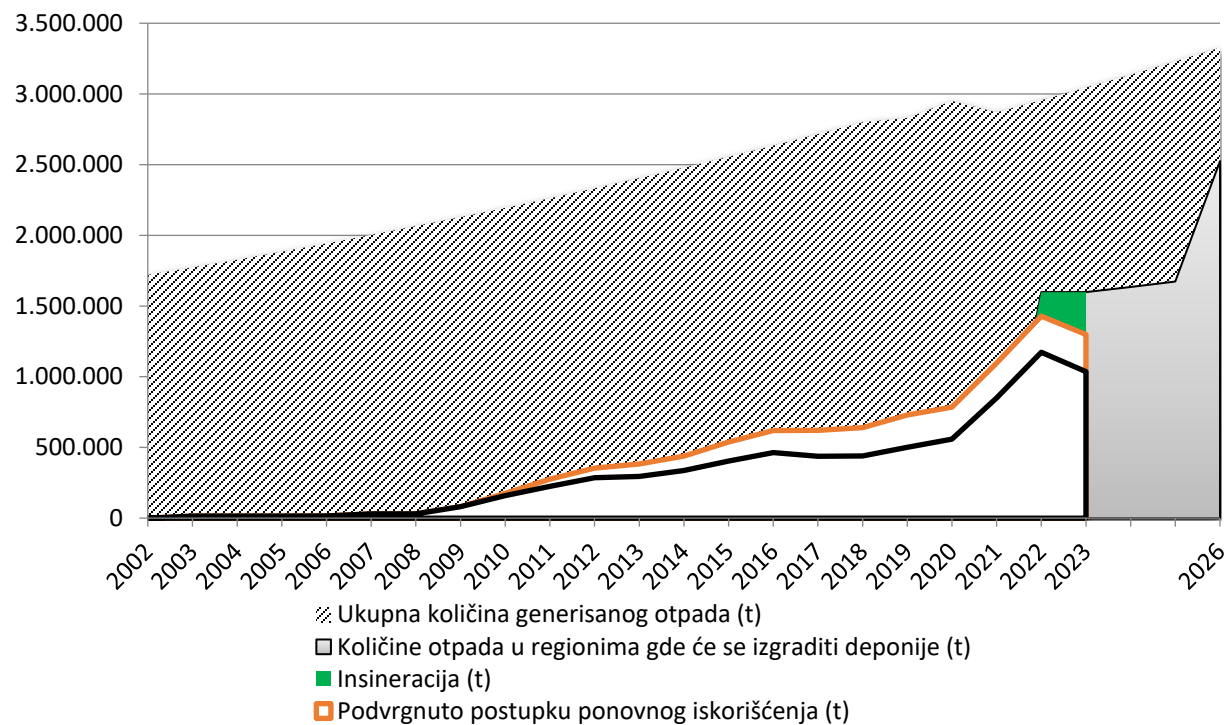




razvijanje broja sanitarnih deponija od 2002.



Tretman otpada u Srbiji po godinama



tretman otpada u bliskoj budućnosti u skladu sa obezbedjenim sredstvima

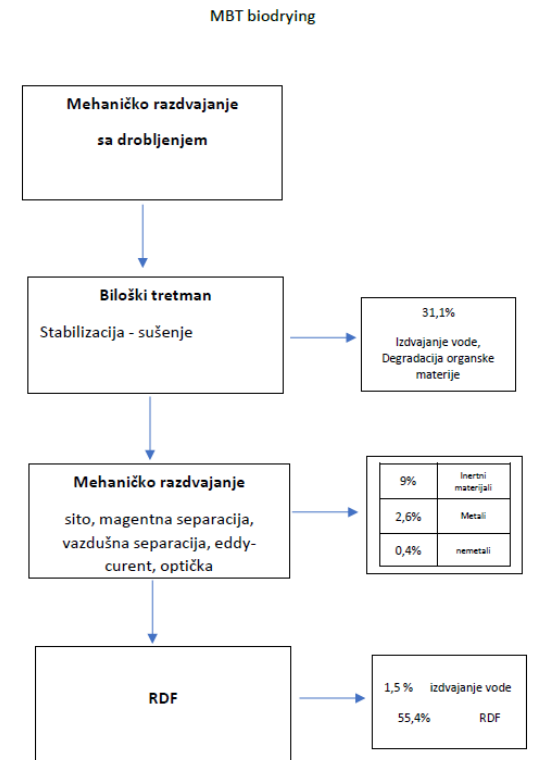
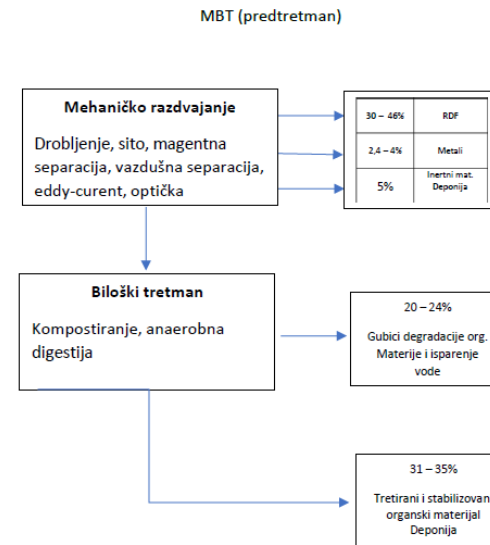
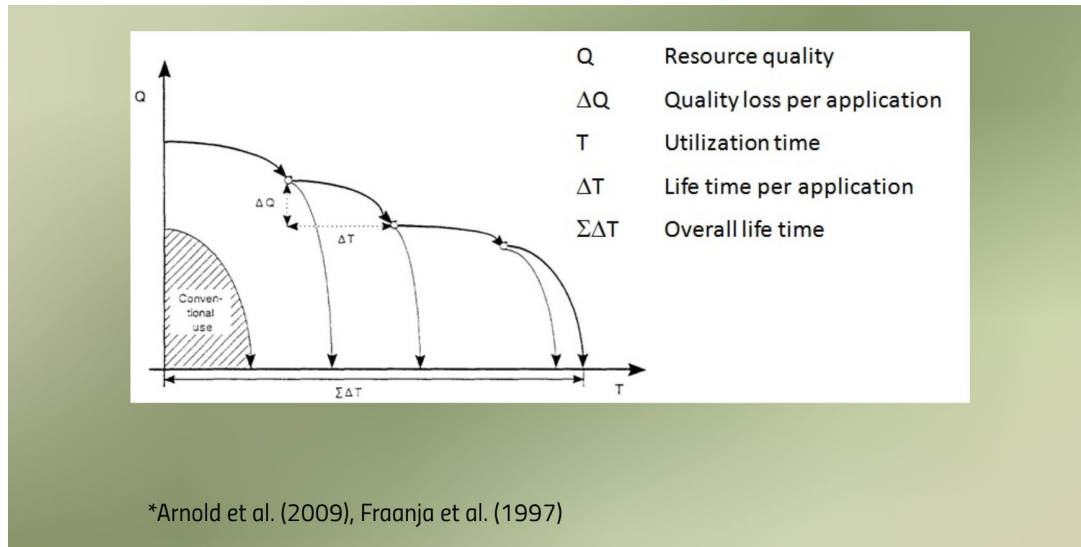
Economic and social condition



- Politička stabilnost
- Srednja plata
- Zaposlenost
- Povećanje standarda
- Razvoj svesti
- Zakonska regulative

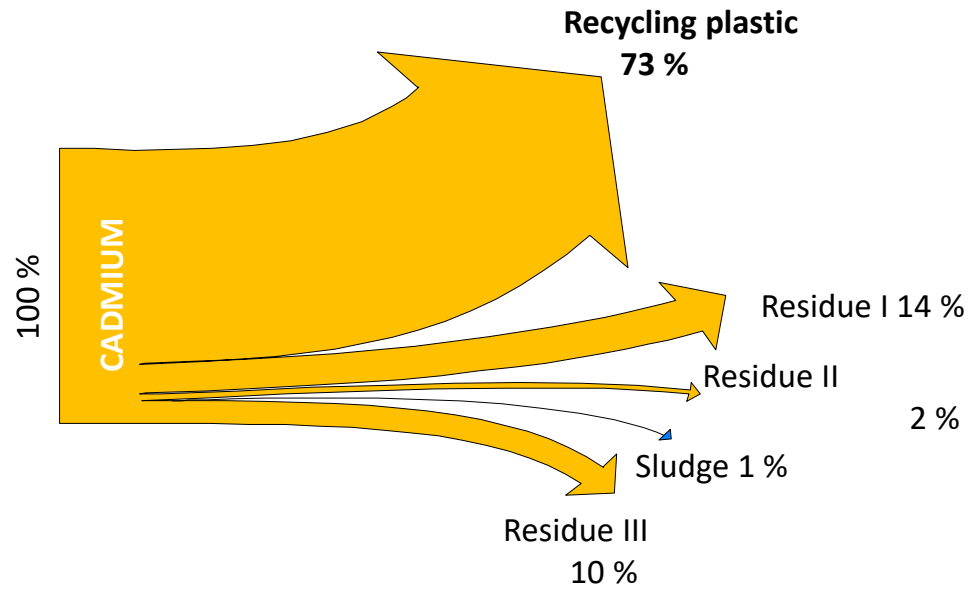
WTE part of Circular economy???

- MBT

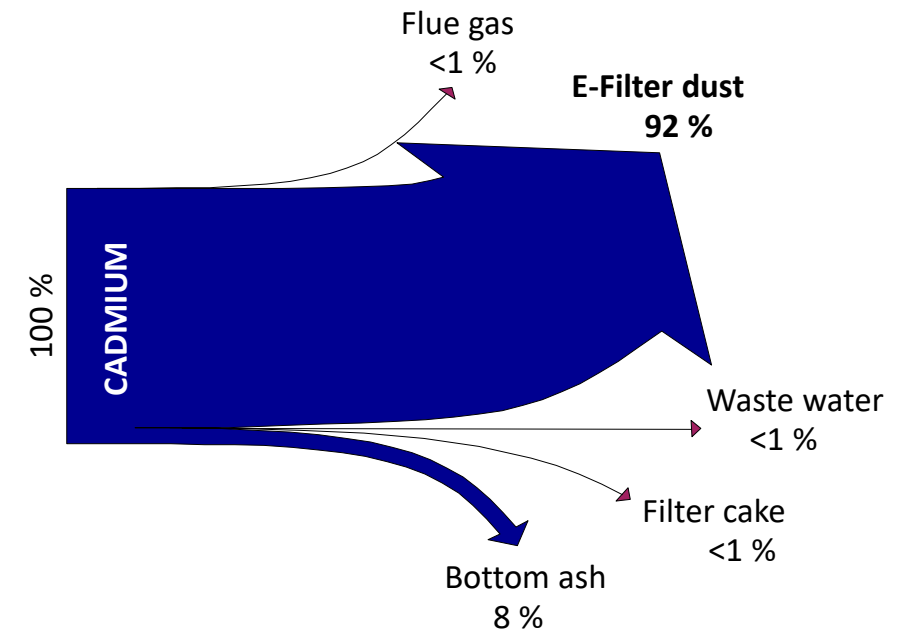


Recycling VS incineration

Plastic recycling



MSW incineration



Conclusion

- WTE has to be part of National policy as part of circular economy
- Not according to current EU waste policy !?
- Industrial boiler has to include Waste (RDF/SRF) as alternative fuel