

Role of Biomass in Heating Sector Transformation

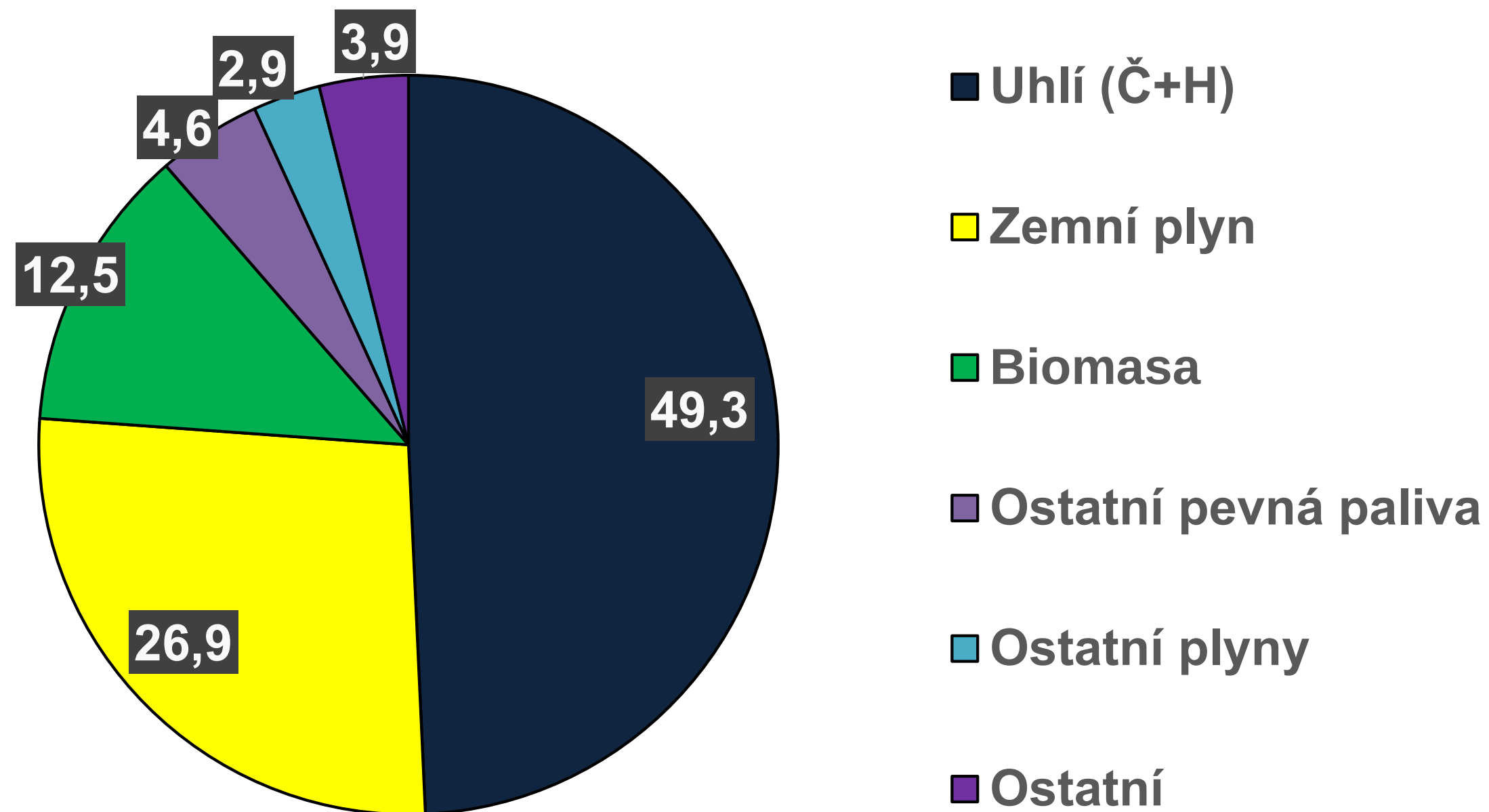
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Association for the District Heating of the Czech Republic

November 11th, 2025

Turning Biomass into Watts, Prague

Fuel mix of heat supply in 2024



Biomass in district heating in 2025

Total installed capacity 1350 MWt

Biggest plants:

Planá nad Lužnicí 250 MW

Strakonice 205 MW

Krnov 99 MW

Příbram 92 MW

Kutná Hora 64 MW

Třebíč 55 MW

Pelhřimov 50 MW

14 plants 10 – 49,9 MW

46 plants 1 – 9,9 MW

Coal phase out until 2030

1. phase 2021-2024

10 smaller district heating systems

Investment 6 billion CZK

Coal consumption decreased by 514 ths. tons per year

CO₂ emissions decreased by 600 ths. tons per year

2. phase 2027-2030

Bigger district heating plants in regional capitals

Total investment over CZK 200 billion CZK

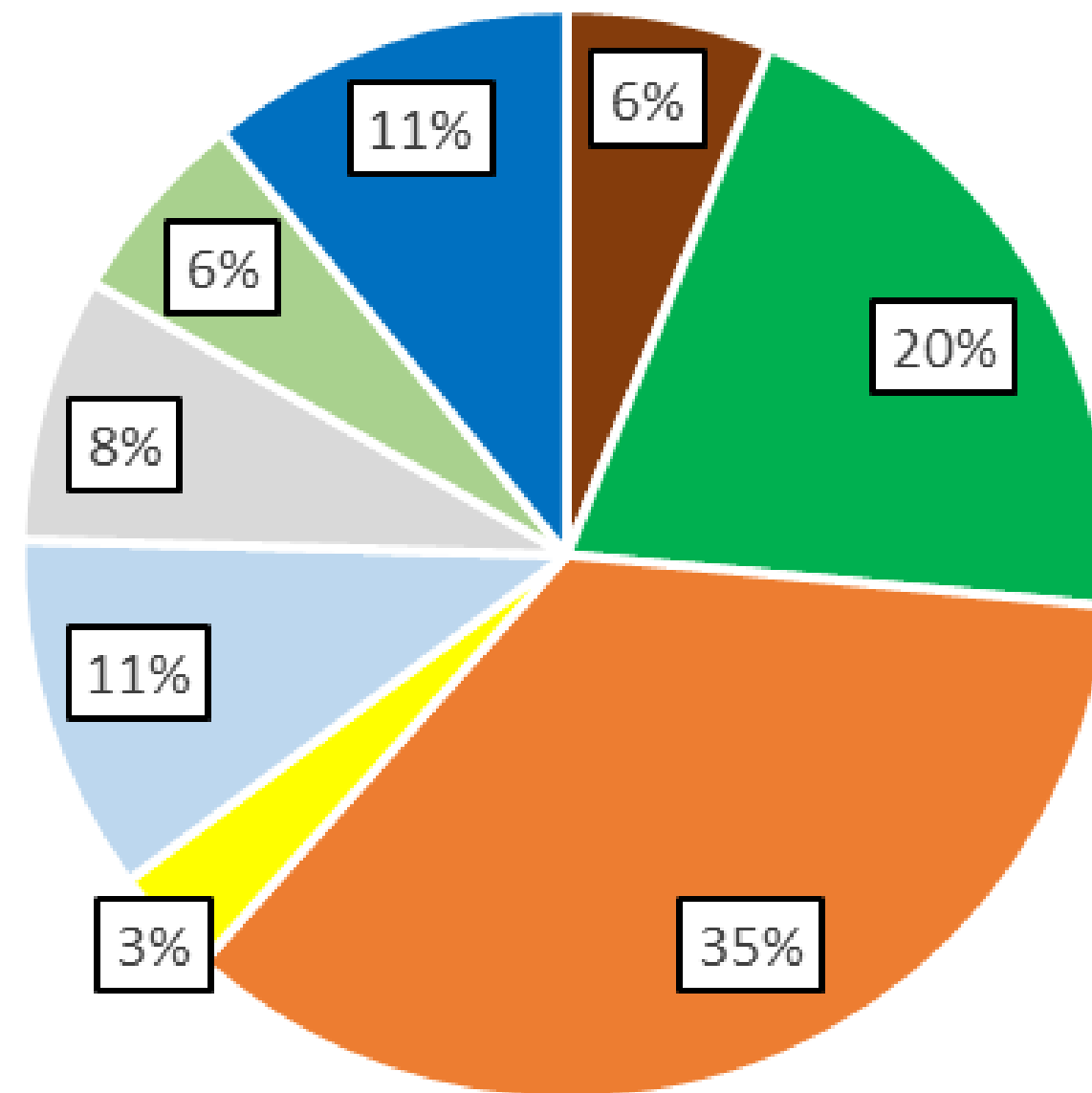
CO₂ emissions will decrease by 6 million tons (2/3)

Projects under preparation/construction

Brno	43 MW (2025)
Dětmarovice	8 MW (2025)
Mladá Boleslav	57 MW + retrofitting 2x71 MW (2027)
Prunéřov	2x17,5 MW (2027)
Trmice	32 MW (2029)
Poříčí	2x25 MW (2029)
Ledvice	? (2030)
Olomouc	? (2030)

Fuel mix for district heating in 2030

- Uhlí
- Biomasa a bioplyn
- Zemní plyn
- Jaderné teplo
- Biometan a vodík
- Tepelná čerpadla
- Ostatní OZE
- Ostatní



MPO, Aktualizace Posouzení dekarbonizace dálkového vytápění v ČR, září 2024

Key source of financing – HEAT program

**Most successful program from
Modernization fund**

Committed funds 92 mld. CZK

Submitted 101 projects with total subsidy
101 mld. CZK

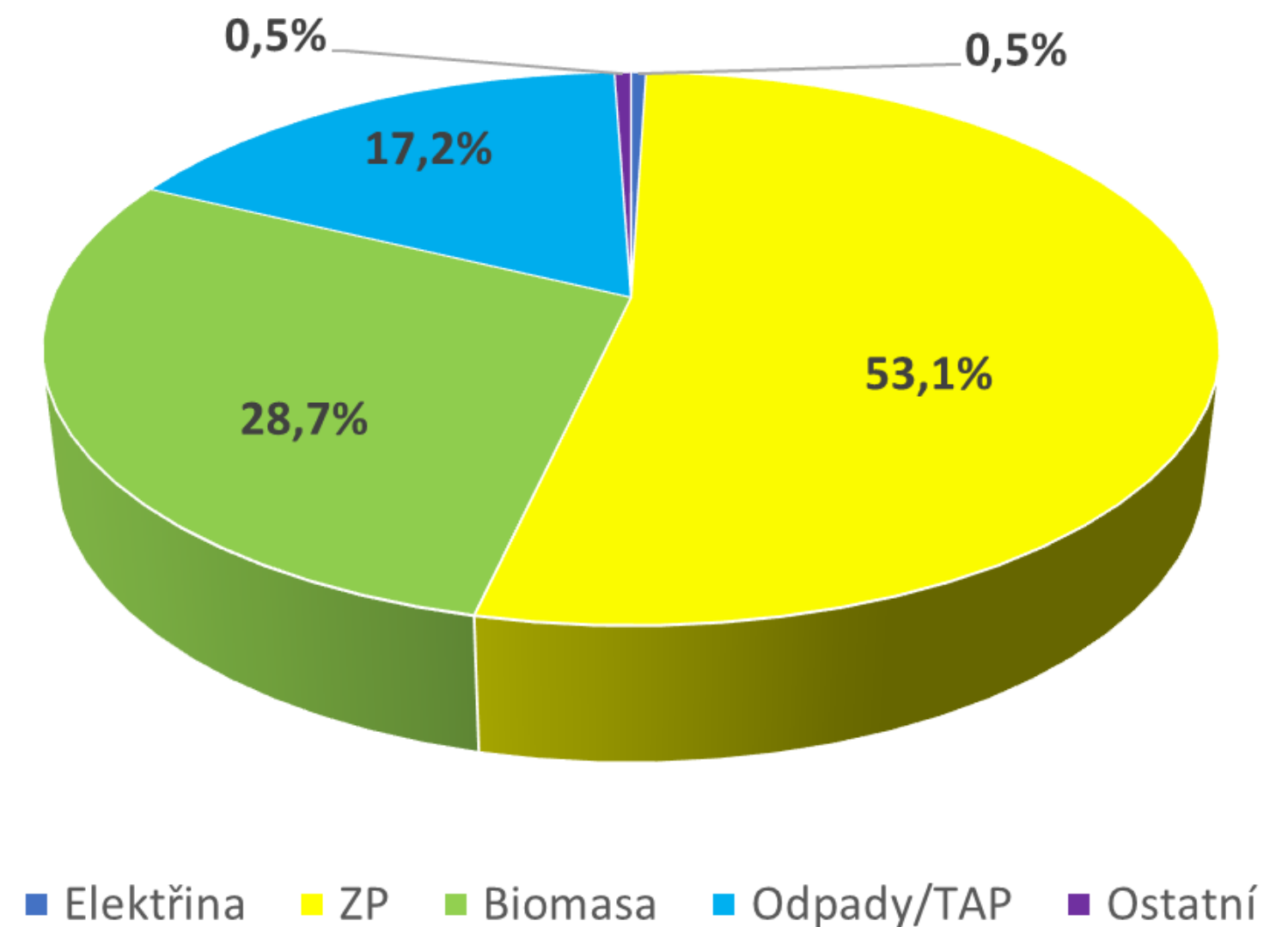
Approved 47 projects with total subsidy
75 mld. CZK

Call for proposals HEAT n. 1/2025

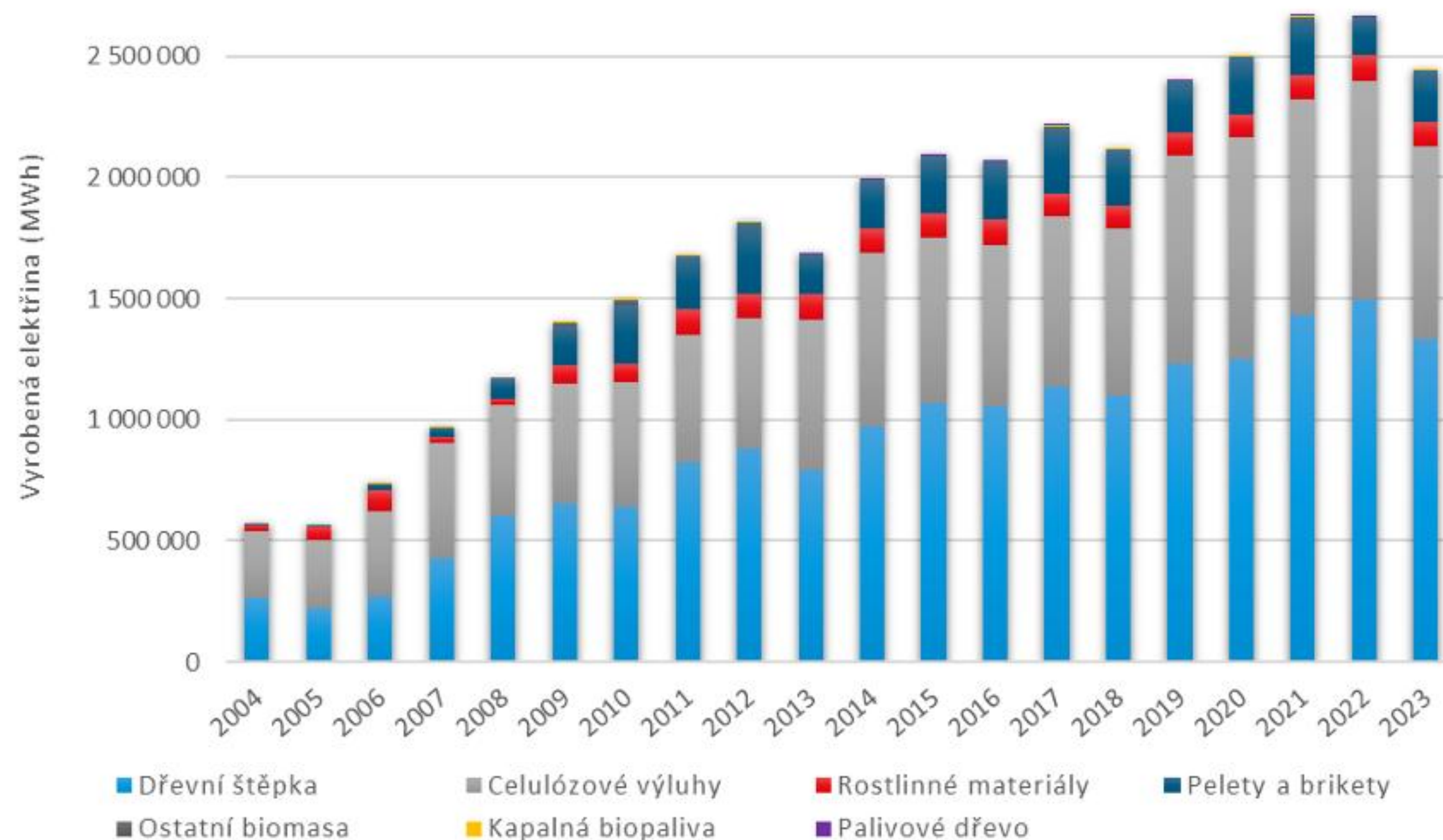
Deadline for submitting proposals

28.11.2025, available funds 6 mld. CZK

Zastoupení paliv v teplárenských projektech programu HEAT
Modernizačního fondu po jejich realizaci

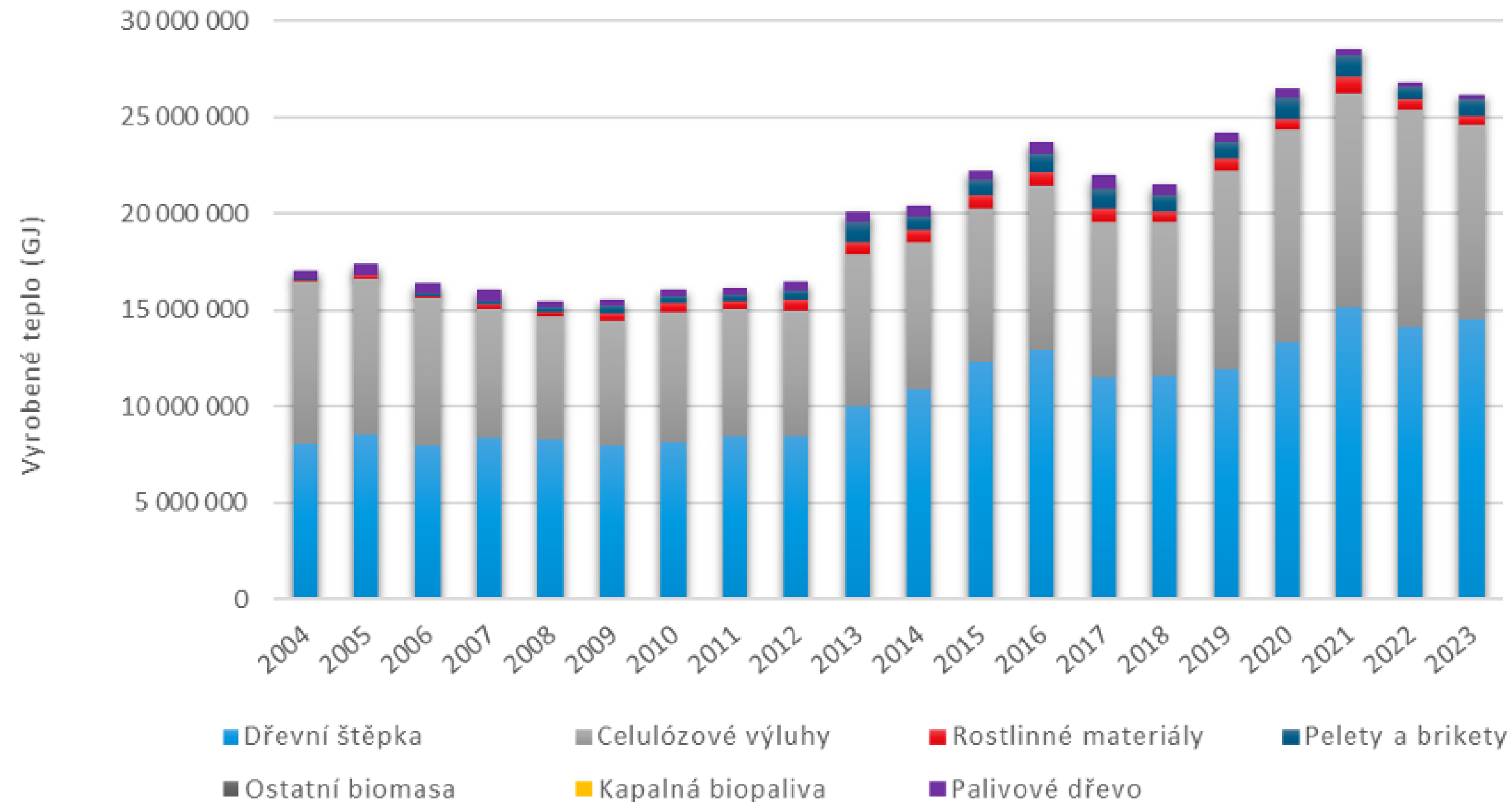


Electricity production from biomass



MPO, Obnovitelné zdroje energie v letech 2022 a 2023

Heat production from biomass



MPO, Obnovitelné zdroje energie v letech 2022 a 2023

Utilisation of biomass for electricity and heat (kt)



MPO, Obnovitelné zdroje energie v letech 2022 a 2023

Is there enough biomass?

Main source of biomass: wood chips

1 349 ths. tons of wood chips used for electricity production mostly in inefficient electricity only plants in 2023

Operating support for electricity production will end in 2029-30, electricity only plants will close down

= no significant net increase in wood chips consumption expected after 2030 compared to 2025

Wood chips will be transferred from inefficient electricity only plants to CHP plants and heating plants

No significant direct biomass projects planned after 2030

Important source after 2030 can be biomethane from waste