

Large scale maps from Regions point of view



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1. Digital cadastral map and Digital technical map

- ❑ There are two major large scale digital vector maps in the Czech republic:
 - Digital cadastral map (DCM)
 - Digital technical map (DTM)

- ❑ They have fundamentally different content, but they have some same features (eg.buildings)

- ❑ They complement each other—together they provide an important source of information for the agendas of state-government and self-government

2. Digital cadastral map

The map is created for need of cadastre of real estate in the Czech republic

- ❑ cadastral map is an obligatory State Map Series of a large scale
- ❑ displays the boundary of a plot, building objects, boundary of cadastre unit, description and other subjects in the extent prescribed by annex decrees Nr. 26/2007 Coll.

3. Sample of the Digital cadastral map

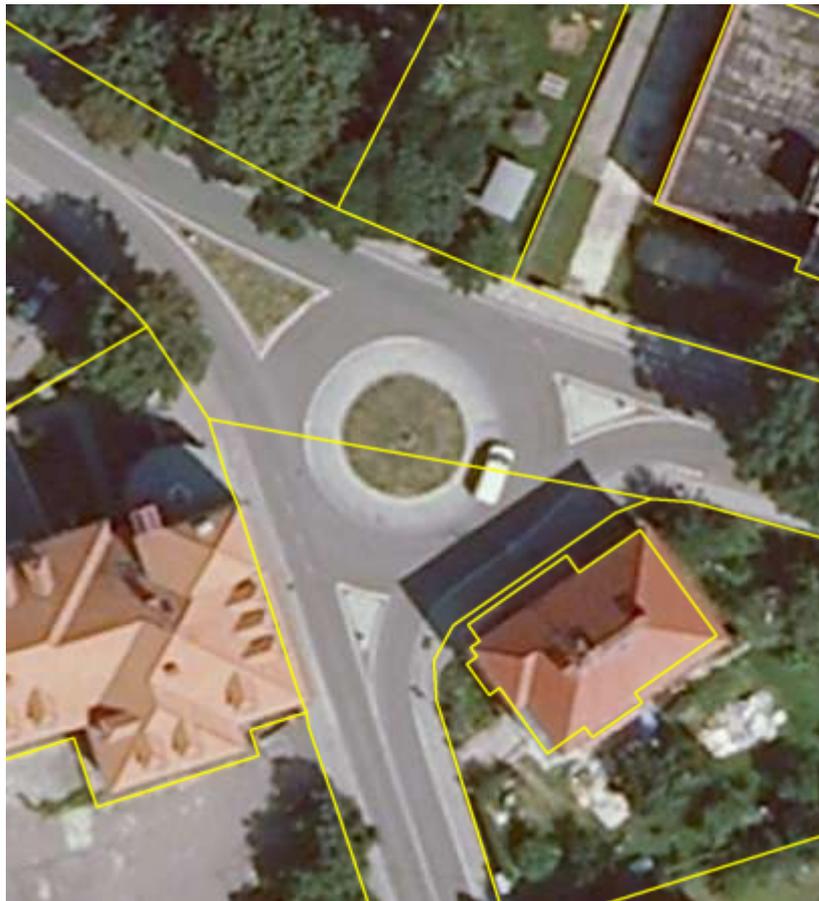


4. Digital technical Map - map of town utilities

- ❑ The map is created to obtain the actual situation in the territory
- ❑ Digital Technical map consists:
 - From the planimetry situation
 - displays objects (eg. buildings, interface areas, surface features of utilities line, pillars, fences)
 - From the utilities line (aboveground and underground)
 - water line, sewage system, gas pipelines, telephone lines etc.

6. The comparison of the maps I

Digital cadastral map



Digital technical map



7. The comparison of the maps II

Digital cadastral map



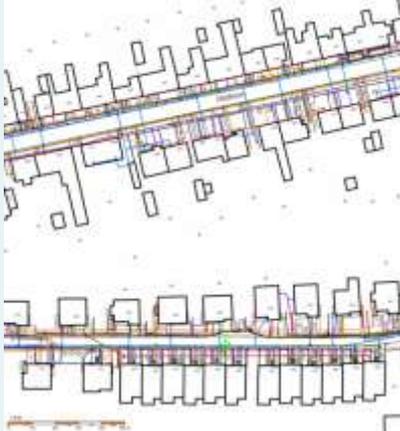
Digital technical map



8. The comparision of DCM and DTM - I.

	Digital cadastral map	Digital technical map
Status in legislation	State Map series	No State Map series
Guarantee	Czech Office for Surveying, Mapping and Cadastre (ČUZK) obligation	Municipalities (They cooperate with the administrators of utilities, Regions) oportunity
Altimetry	NO	YES
Data model	Uniform	Diverse

9. The comparison of DKM a DTM - II.

	Digital Cadastral maps	Digital Technical maps
Types	<p>They have different way of creation and with that associated accuracy and content</p> <ul style="list-style-type: none"> <input type="checkbox"/> Digital cadastral map(DCM) <input type="checkbox"/> Cadastral map digitalized (CDM) 	<p>They differ by completeness of measurement</p> <ul style="list-style-type: none"> <input type="checkbox"/> Complete (cities) 

10. The comparison of DCM and DTM - III.

	Digital cadastral maps	Digital technical maps
Types	<ul style="list-style-type: none"> ❑ In areas without Digital Cadastral map (DCM or CMD) is Special-purpose cadastral map (UKM)  <p>It does not include all parcels</p>	<ul style="list-style-type: none"> ❑ „Street line“ – municipalities 

11. The comparison of KMD a DTM - IV.

	Digital cadastral maps	Digital technical map
Coverage of the area	<ul style="list-style-type: none"><input type="checkbox"/> Today is about 70 % of all cadastral unit finished (DCM + CMD)<input type="checkbox"/> 2017 – 100 %	<ul style="list-style-type: none"><input type="checkbox"/> Only in some cities and municipalities<input type="checkbox"/> It is hard to estimate the number – about 1000 ?

12. The comparision of KM and DTM - V.

	Digital Cadastral map	Digital Technical map
Accessibility	Absolutely accessed (One-time, online, seVICES)	Accessed partially
Accuracy	<ul style="list-style-type: none"> <input type="checkbox"/> DCM – complies with all tasks <input type="checkbox"/> CMD – does not comply with all tasks due to positional accuracy <input type="checkbox"/> UKM(OMP) – does not comply to all tasks due to content and positional accuracy 	Complies with all tasks

13. How is Digital technical map created ?

- ❑ By the cooperation between cities and municipalities with administrators of utility networks:
 - City (municipality) in cooperation with managers of utility lines create DTM and its management system
 - By decree they define obligation to builders to document changes in DTM
 - The creation and updating is funded by the city and managers of UL
 - Since 2012, there is full legislative support for production and management of digital Technical maps of cities and municipalities

14. Why are self-governments involved in the DTM?

- DTM is used in many agendas of self-government and state-government, especially in:
 - in territorial planning
 - in emergency management
 - in property passport (even municipalities own utility lines)
 - in project work

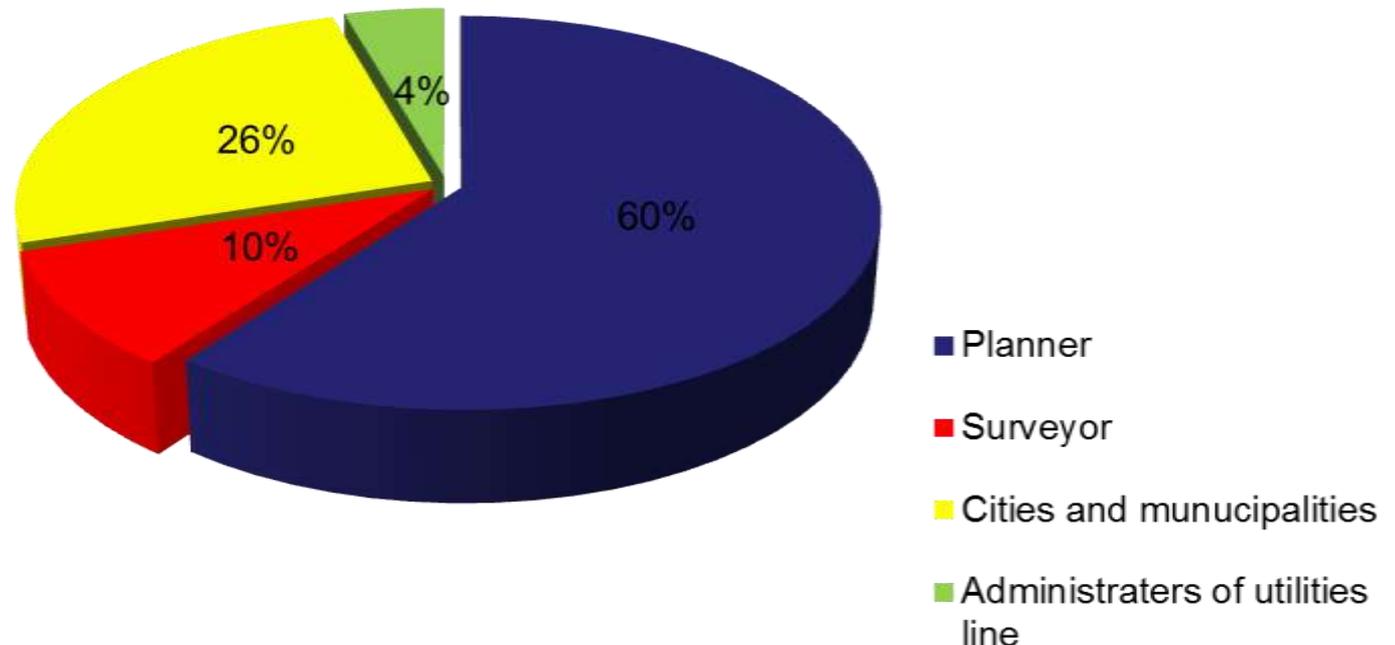
- To simplify and accelerate the processes associated with the construction management
 - service for citizens

15. Regions and Digital technical map

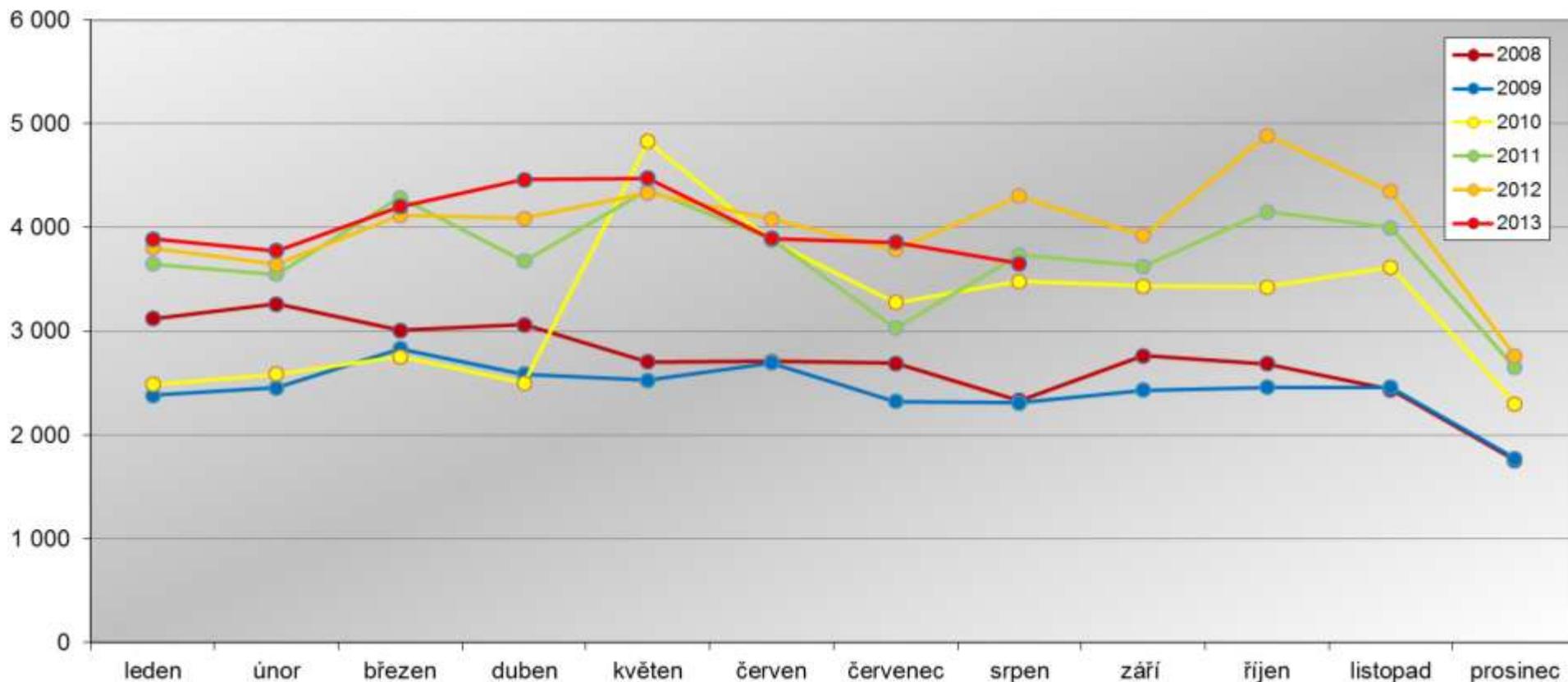
- There is about 6 250 municipalities in the Czech Republic, half of them have less than 382 inhabitants
- It is unrealistic for them to be able to take care of the DTM
- Therefore, Regions help to coordinate the creation and updating DTM in collaboration with the managers of the utility lines
- Regions create uniform system of DTM management for cities and municipalities in its area and standardize data and services
- So far in 7 out of 13 regions

16. The experience of the Zlín Region – users of DTM

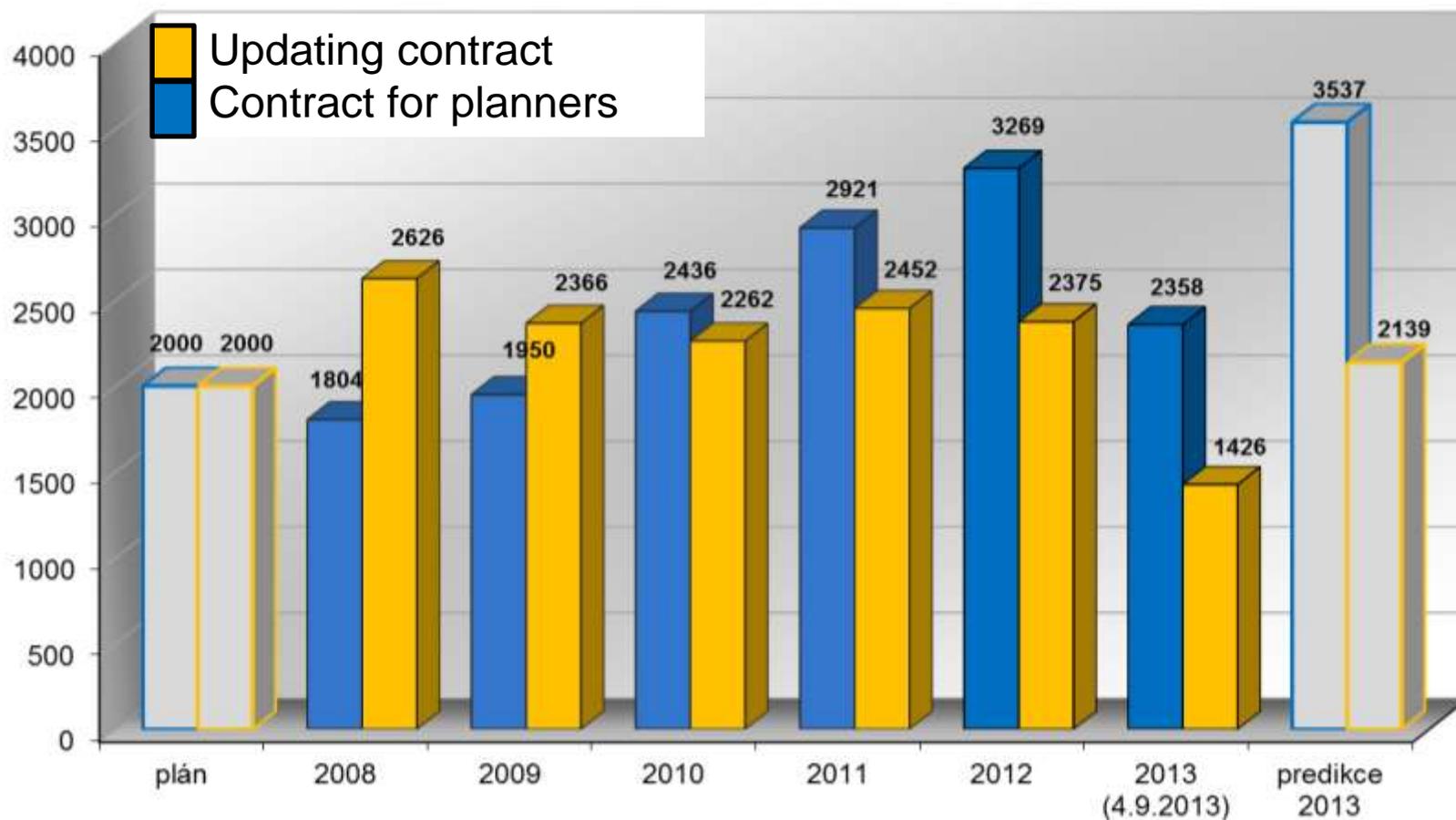
- ❑ Uniform formation of Digital Technical maps since 2003
- ❑ Involved 300 of 306 municipalities in the region
- ❑ Involved 8 crucial managers of utility lines
- ❑ 2490 registered users



17. The experience of the Zlín Region – access to the Portal DTM



18. The experience of the Zlín Region – contracts in DTM Warehouse



Thank you for the attention.

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