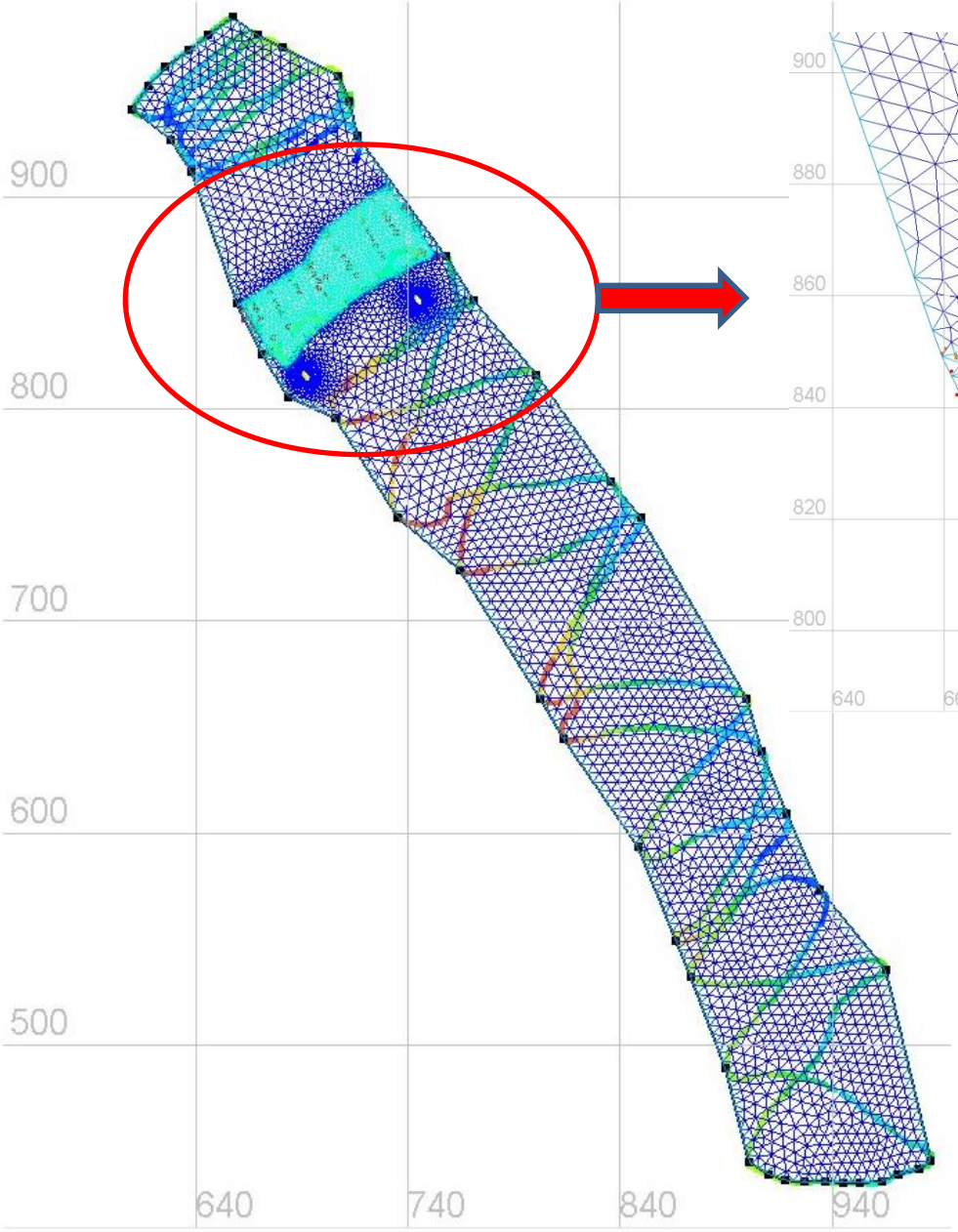
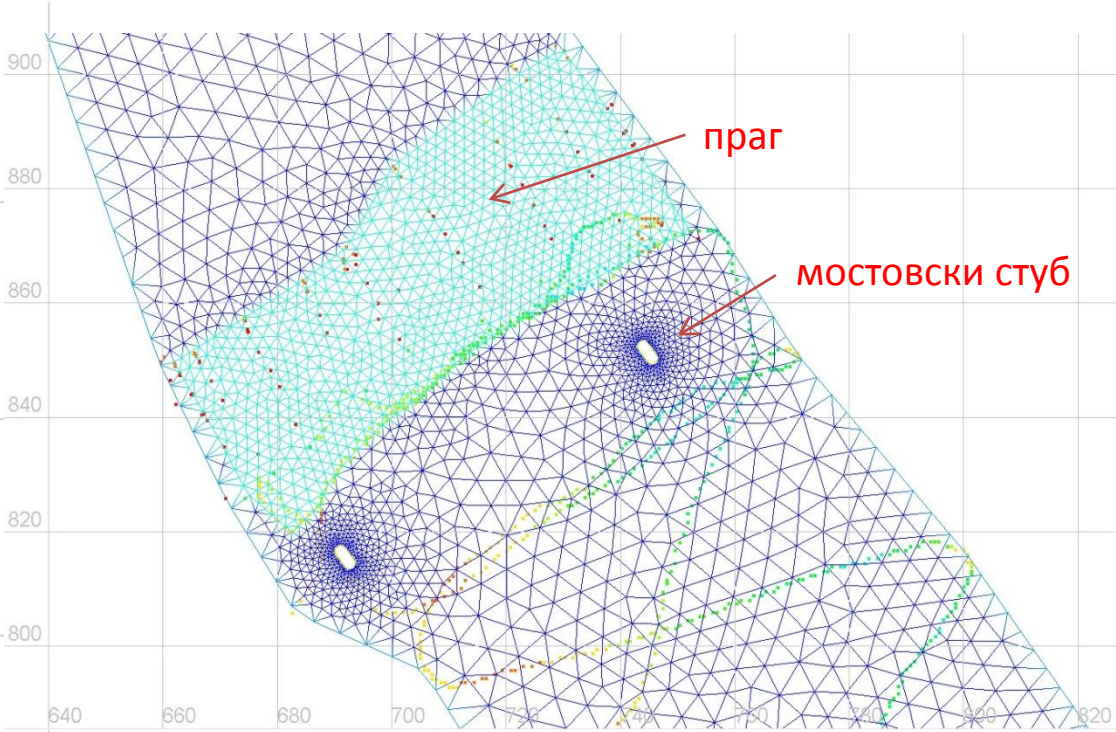
Нумеричке симулације струјања воде у зони прага низводно од Марковачког моста

Рачунска мрежа и батиметрија из 2015. год.

Праг на Морави – 2016.

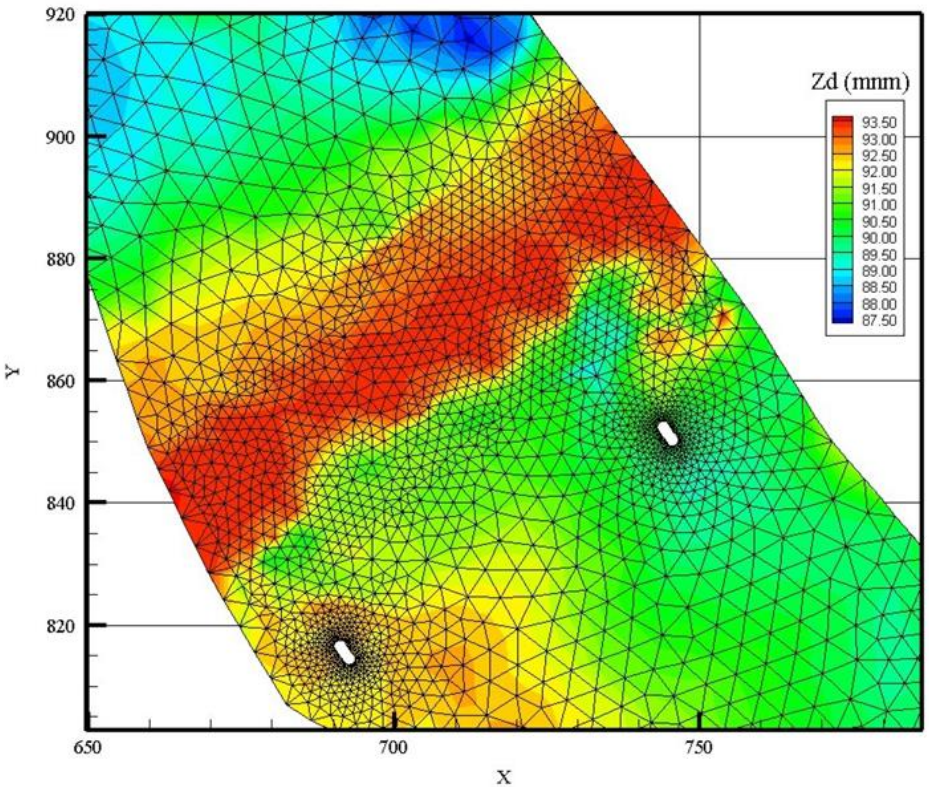


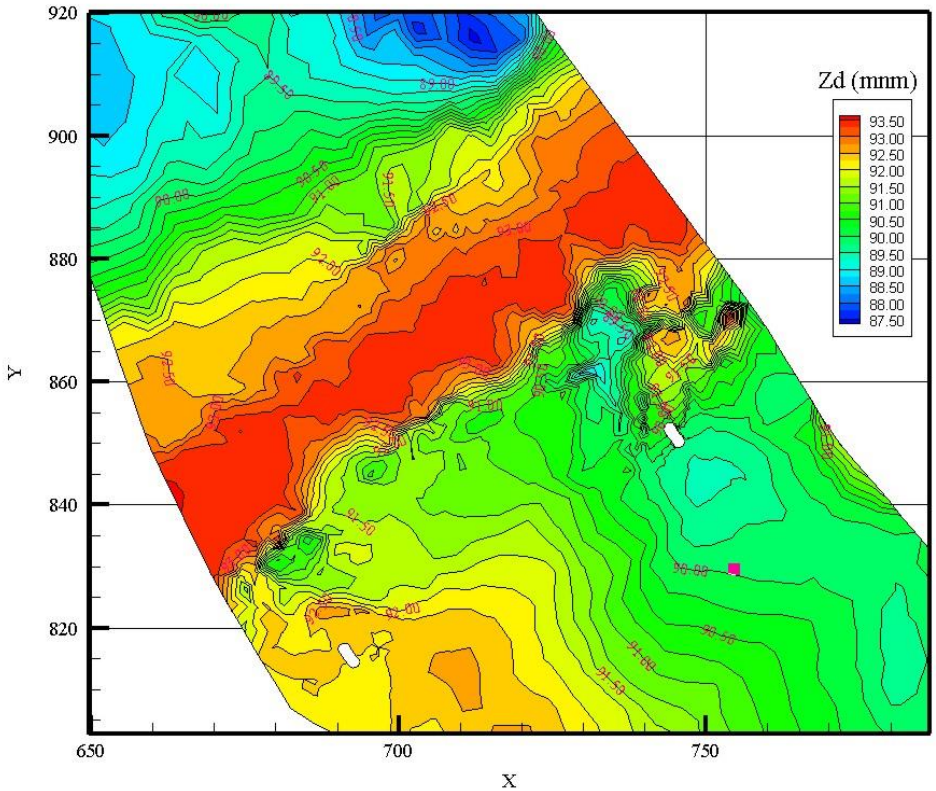


Рачунска мрежа

- чворова: 3992
- елемената: 7619
- дужина елем.: 1,7-4 m

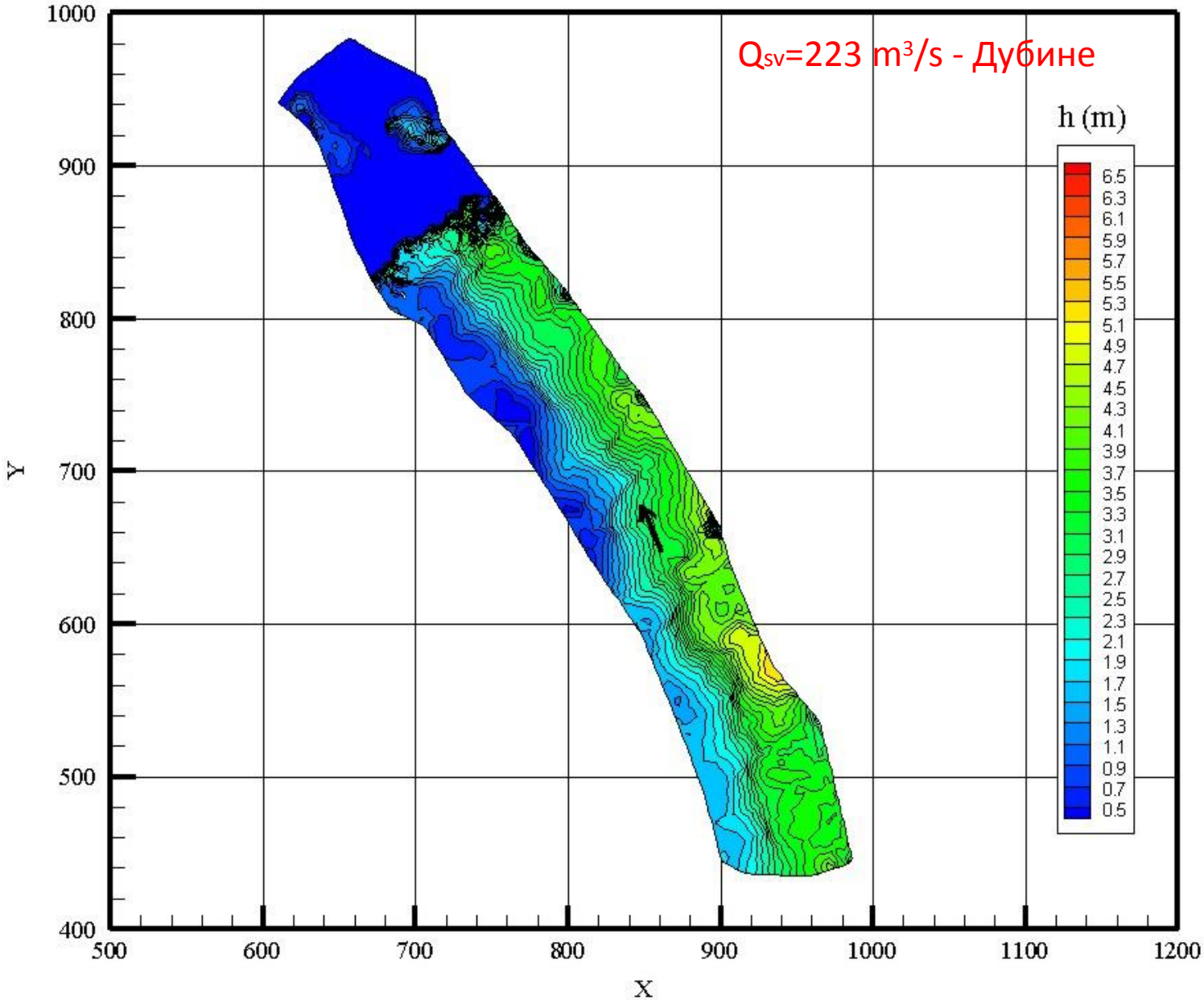
Мрежа (детаљ) + батиметрија (2015)



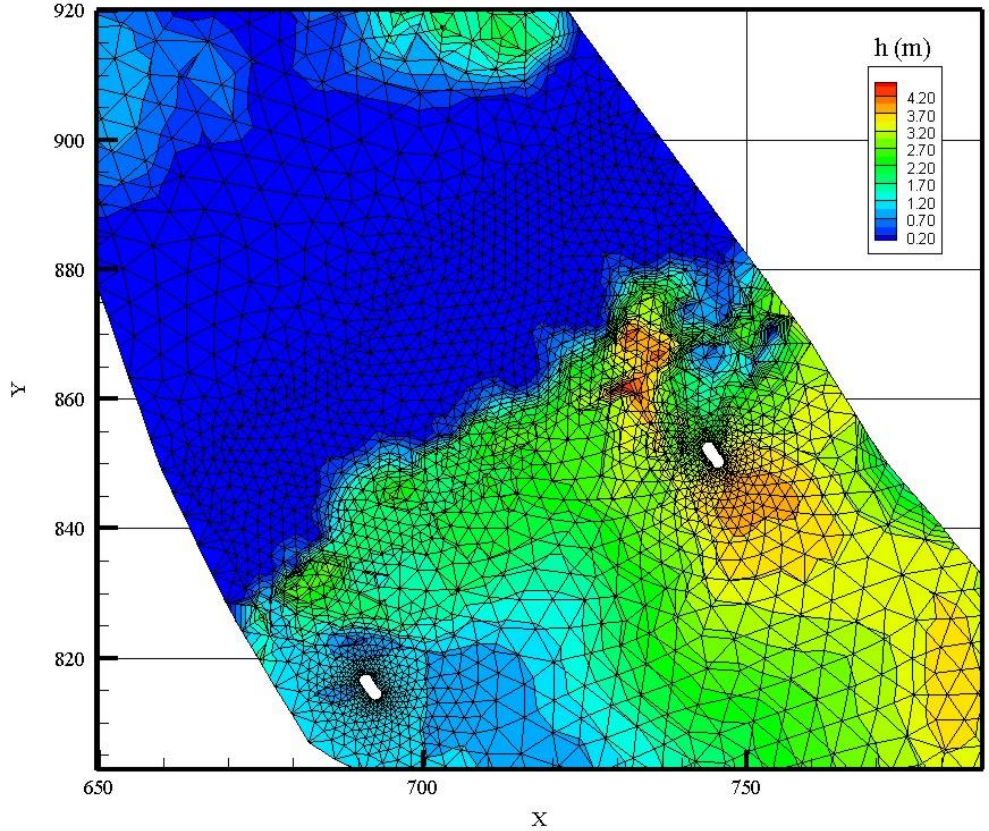


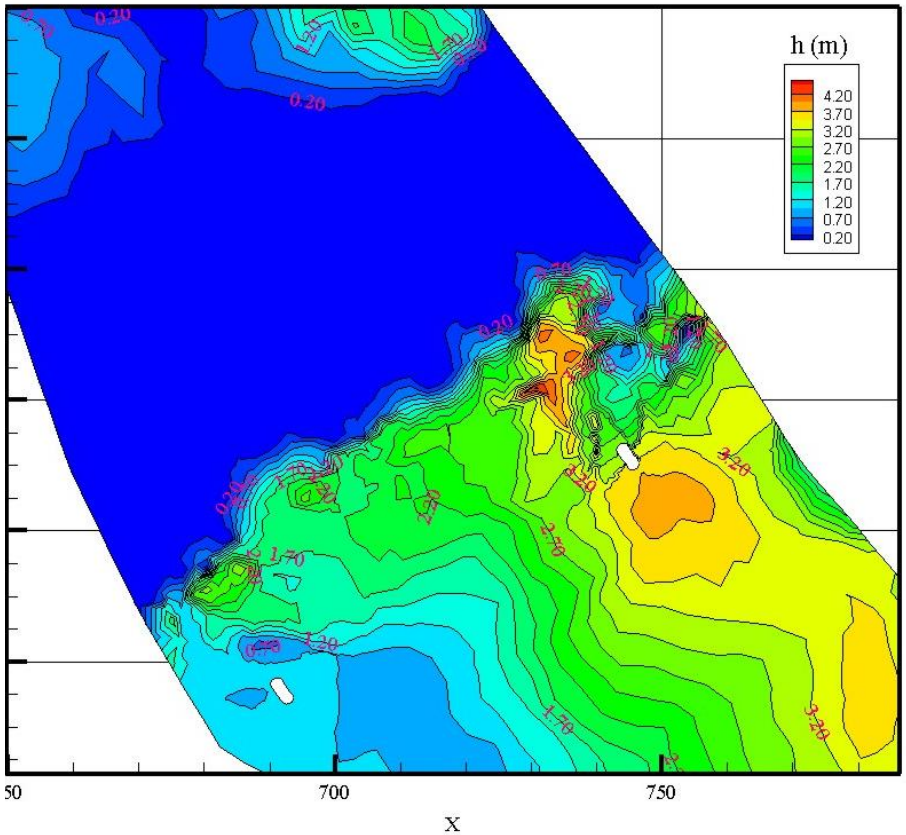
2D нумеричке симулације

Праг на Морави – 2016.

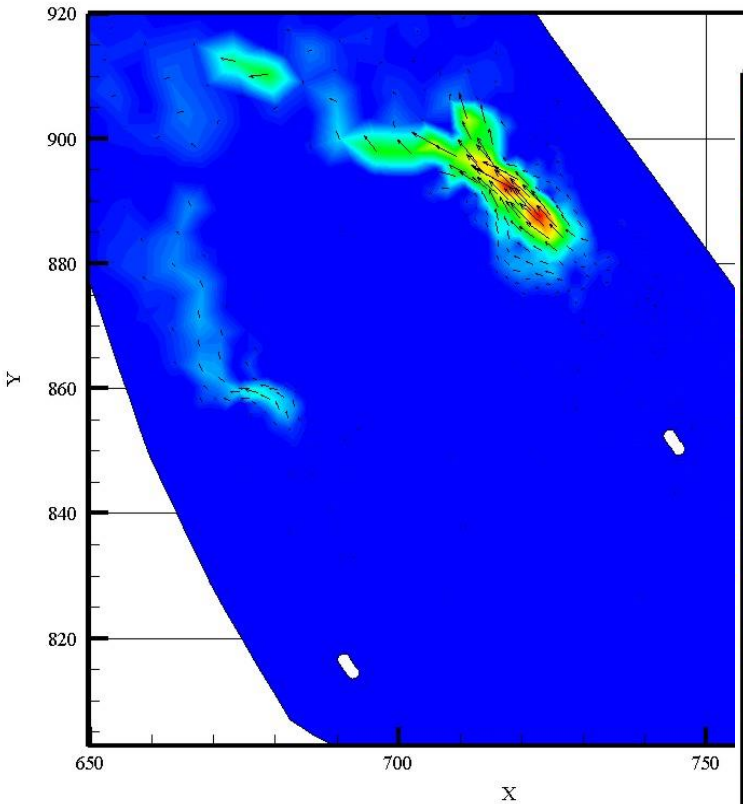


Q_{sv}=223 m3/s – Дубине (детаљ)

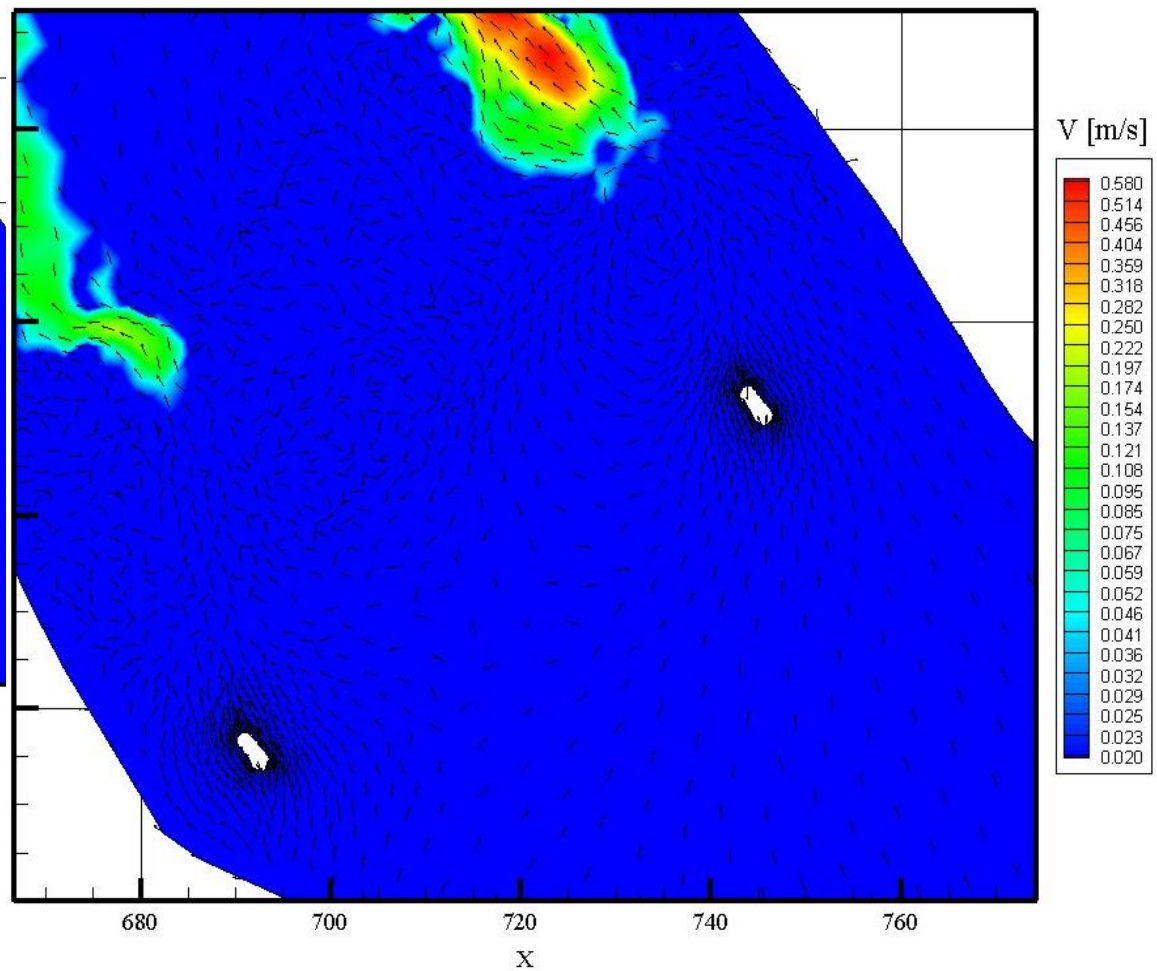




Q_{sv}=223 m^3/s – Поље брзине

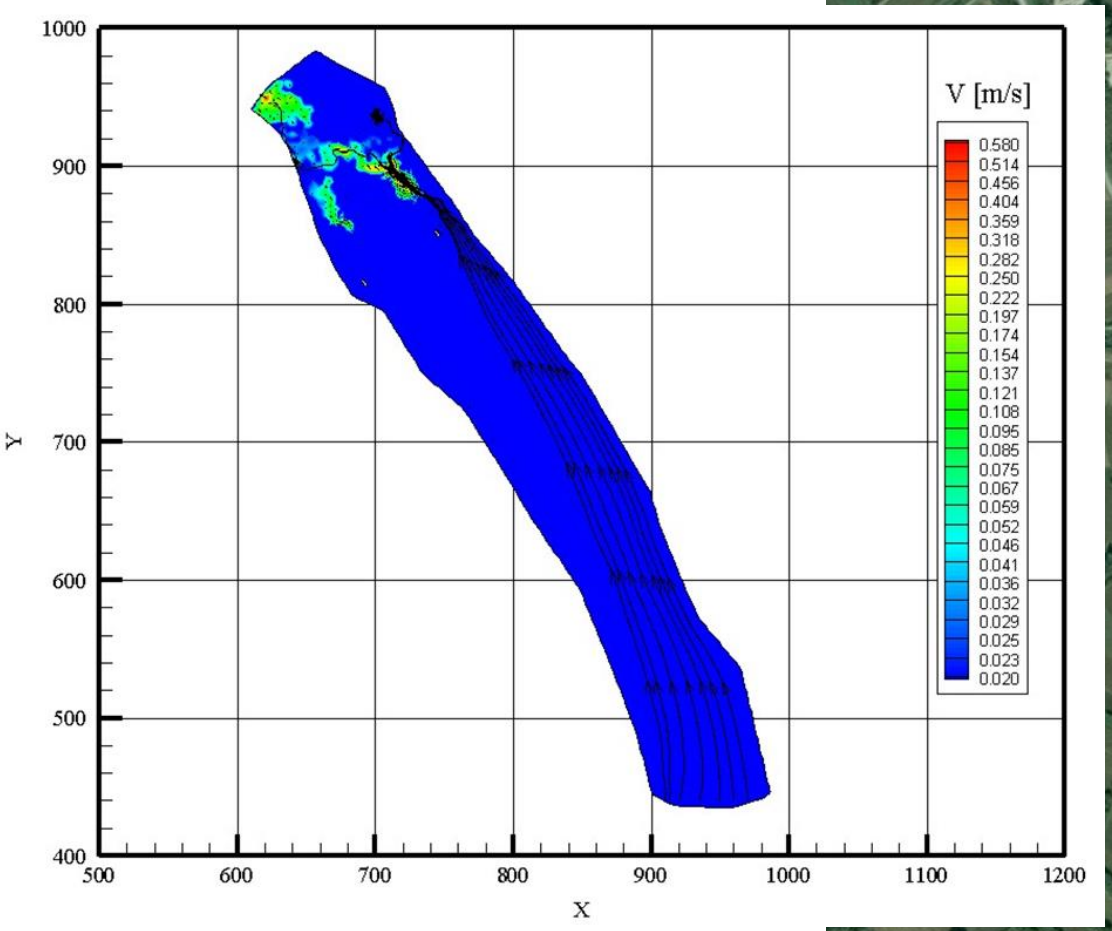


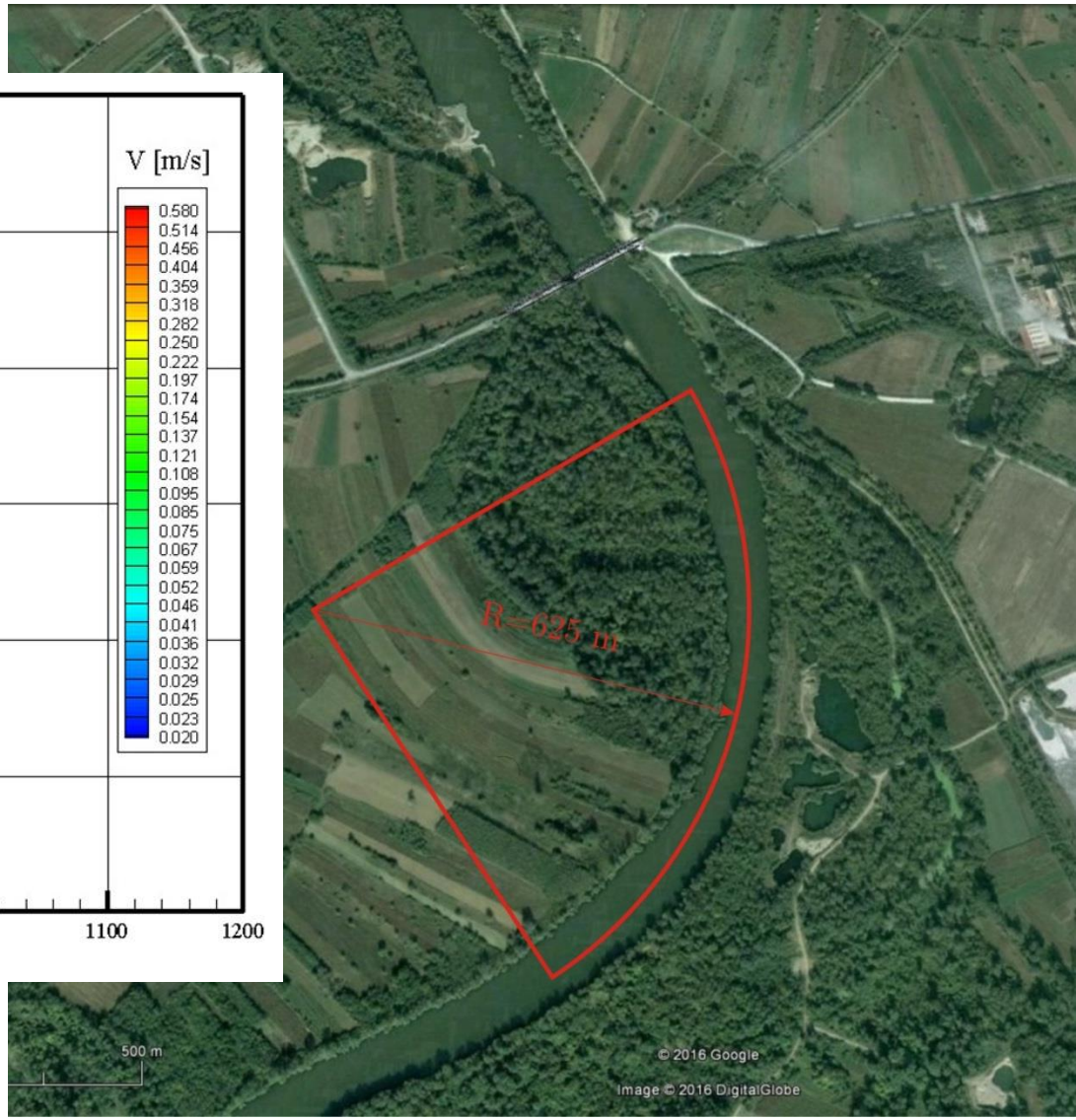
(Дужина вектора пропорционална интензитету)



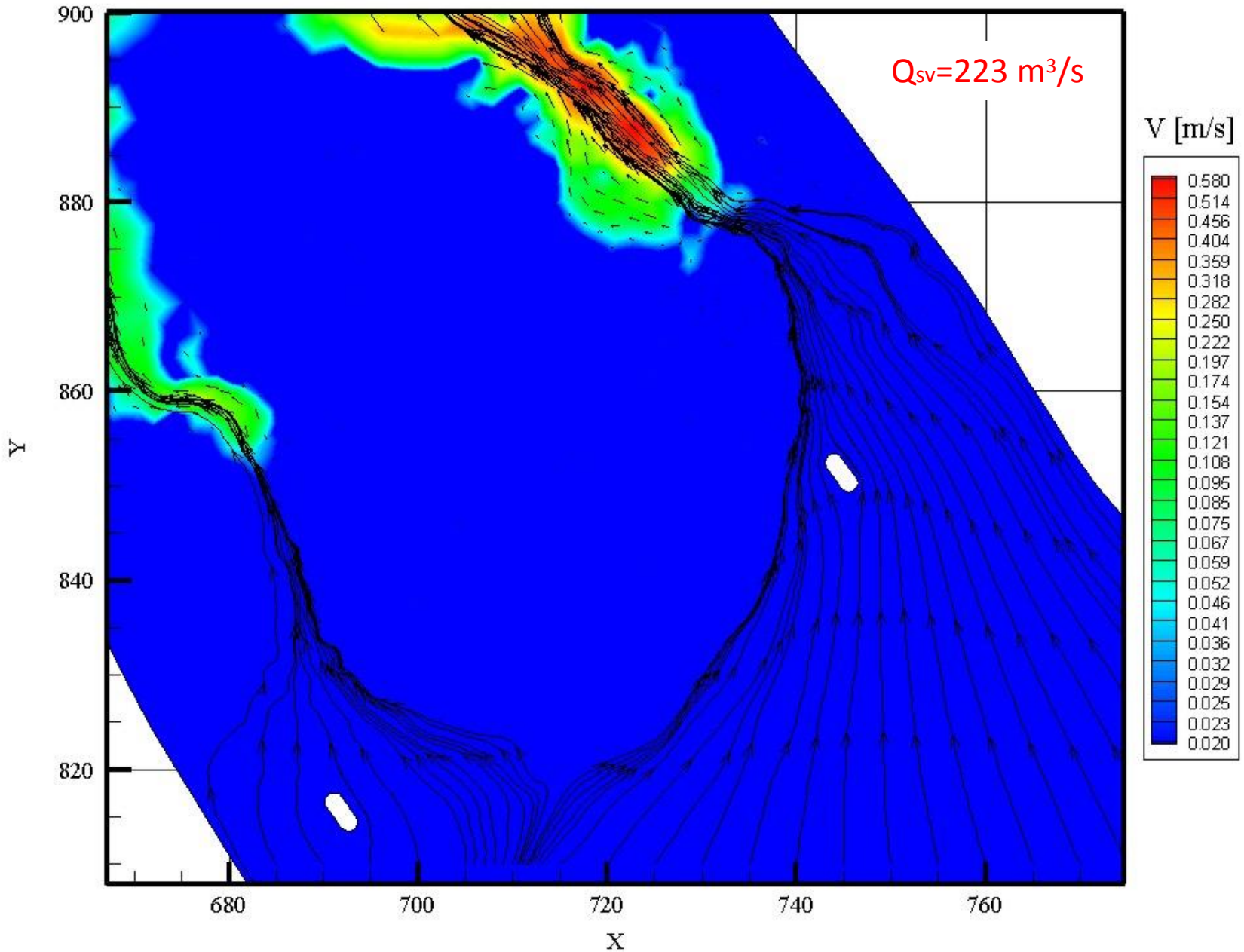
(Дужина вектора константна)

Q_{sv}=223 m³/s - Струјнице



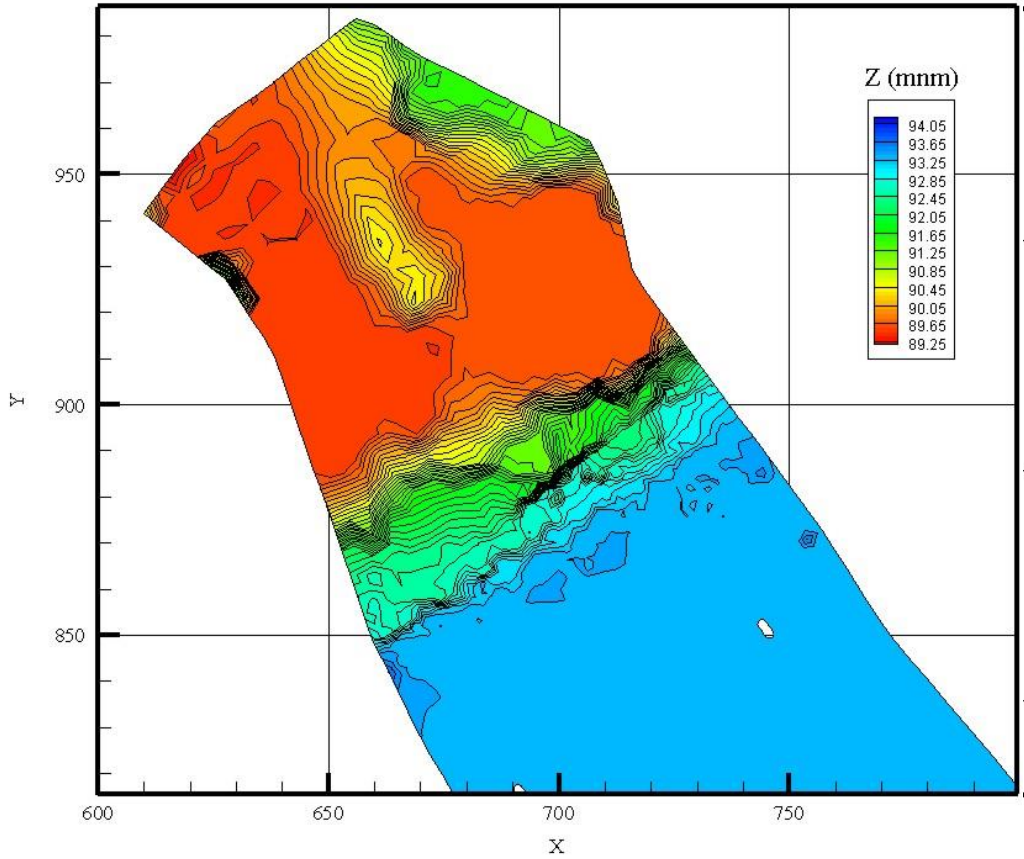


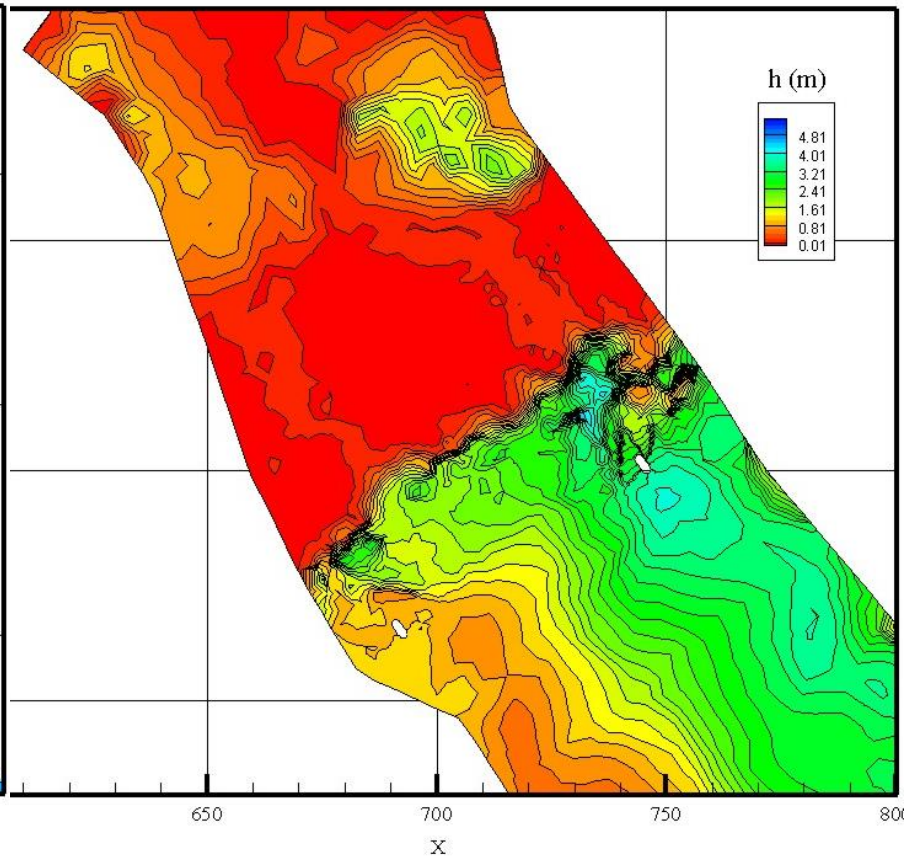
Праг на Морави – 2016.



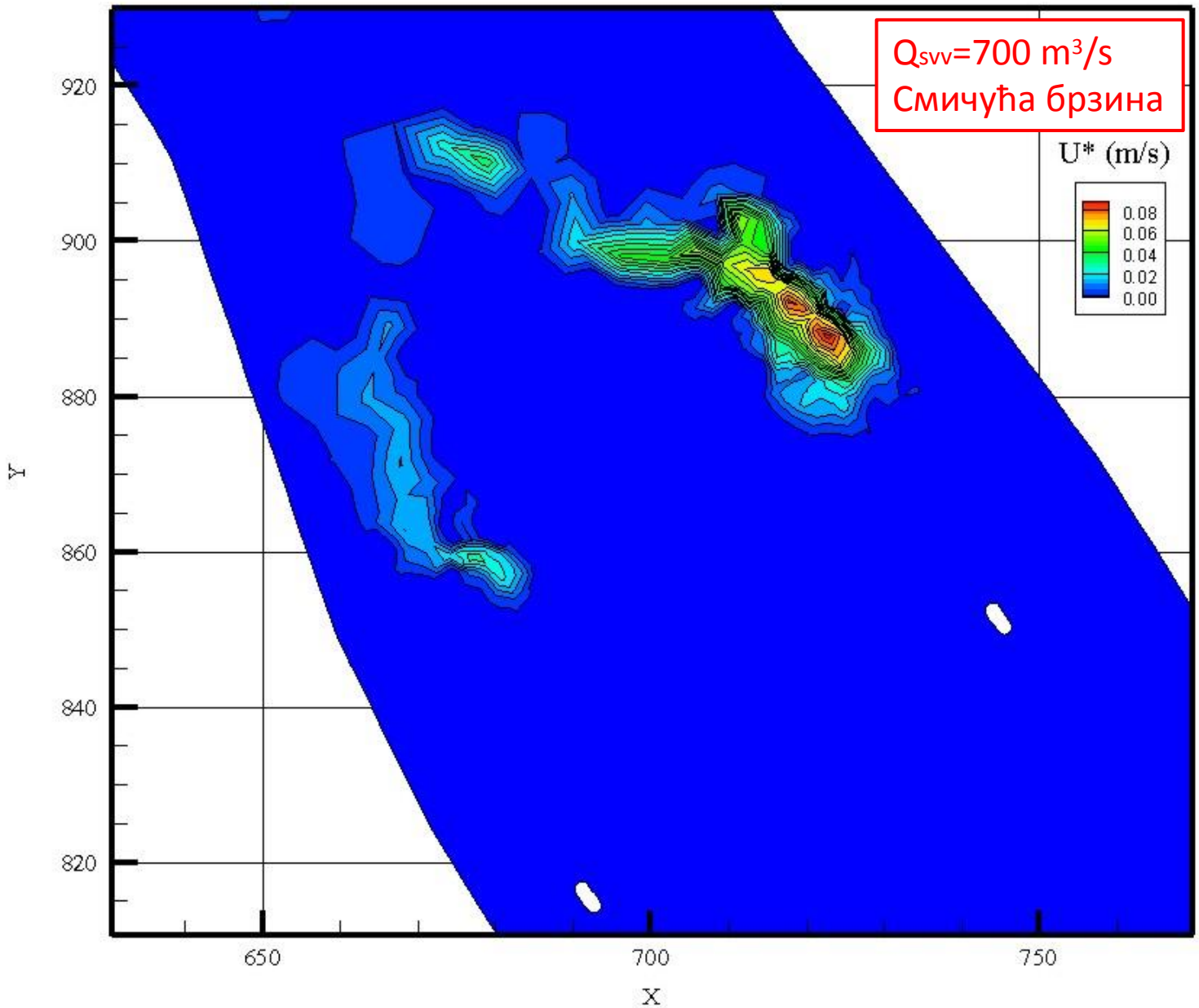
Q_{svv}=700 m³/s – Коте нивоа

Q_{svv}=700 m³/s – Дубине

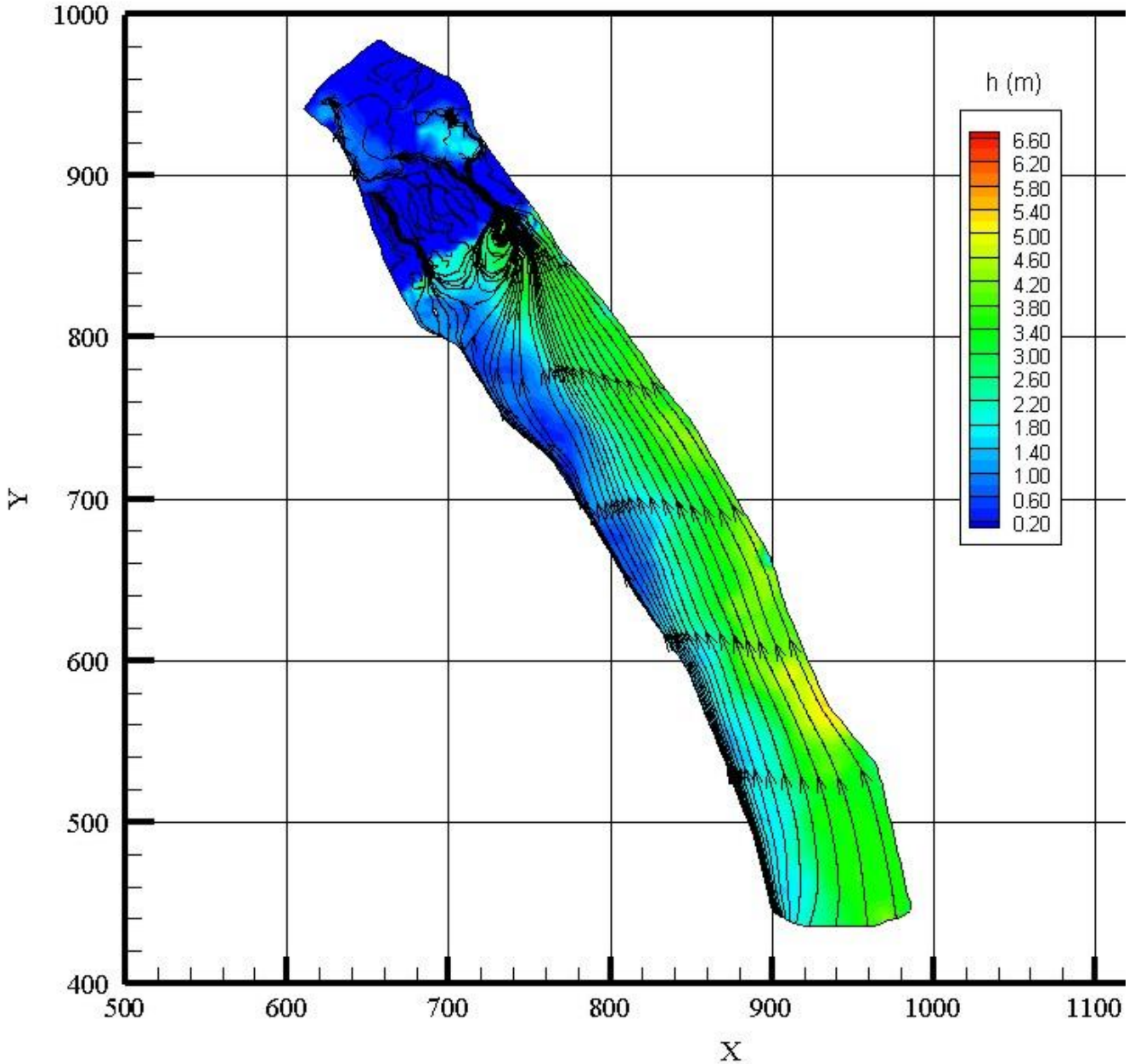




Праг на Морави – 2016.

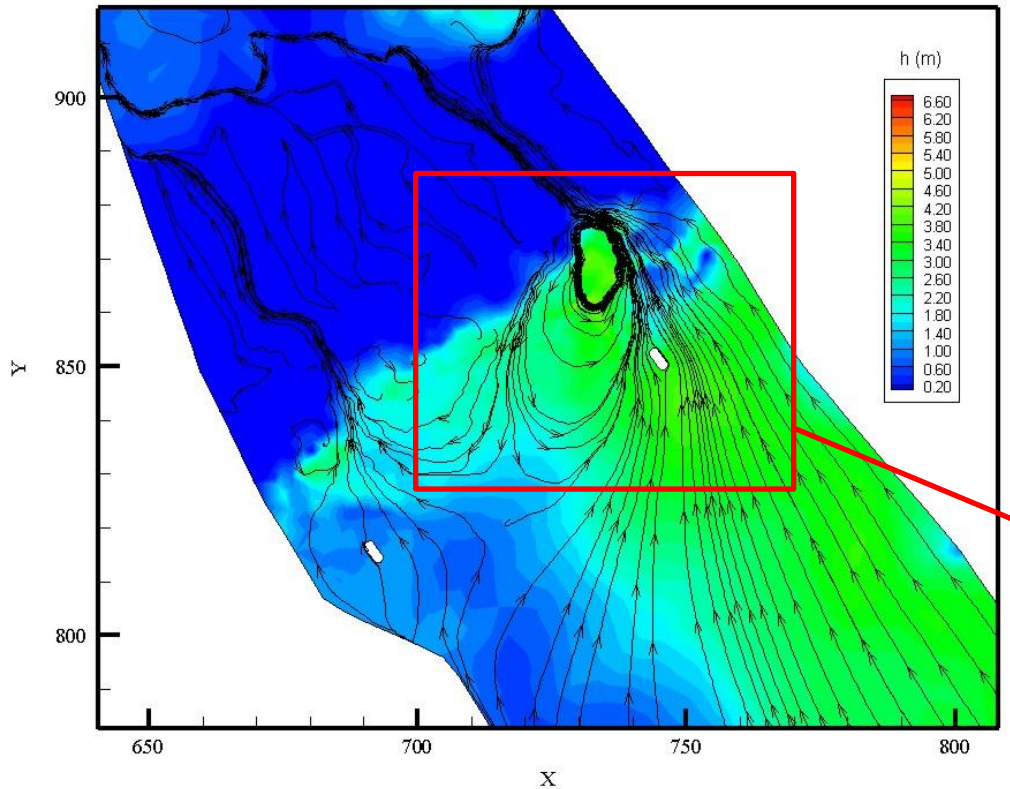


Праг на Морави – 2016.

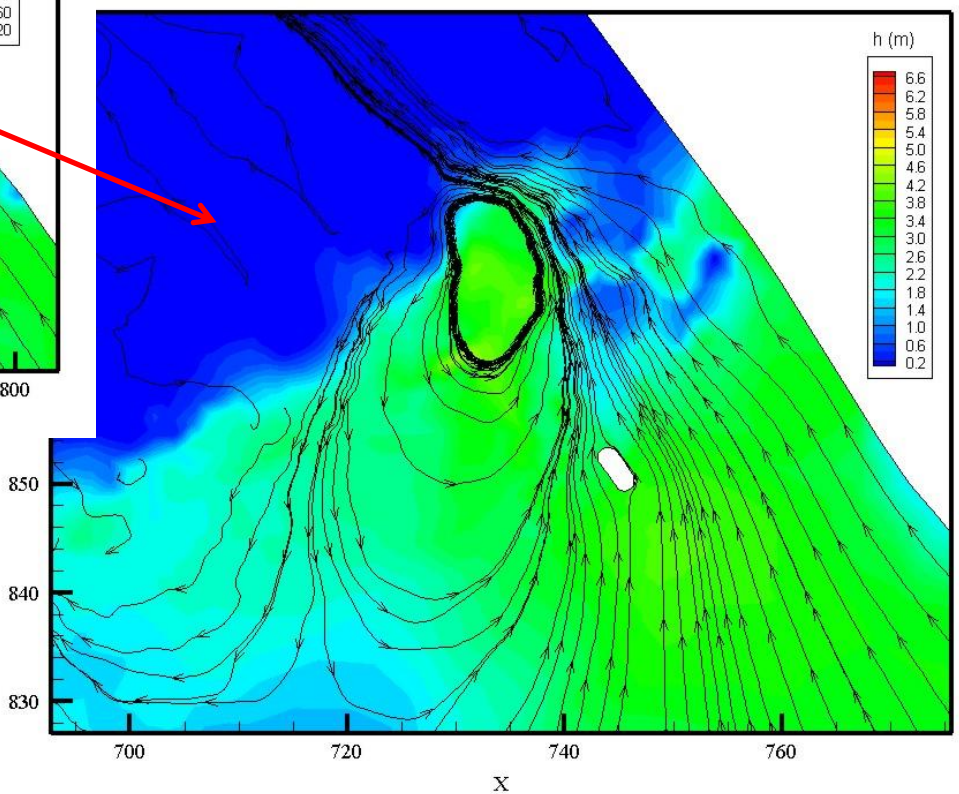


Q_{svv}=700 m³/s
Дубине+струјнице

Праг на Морави – 2016.

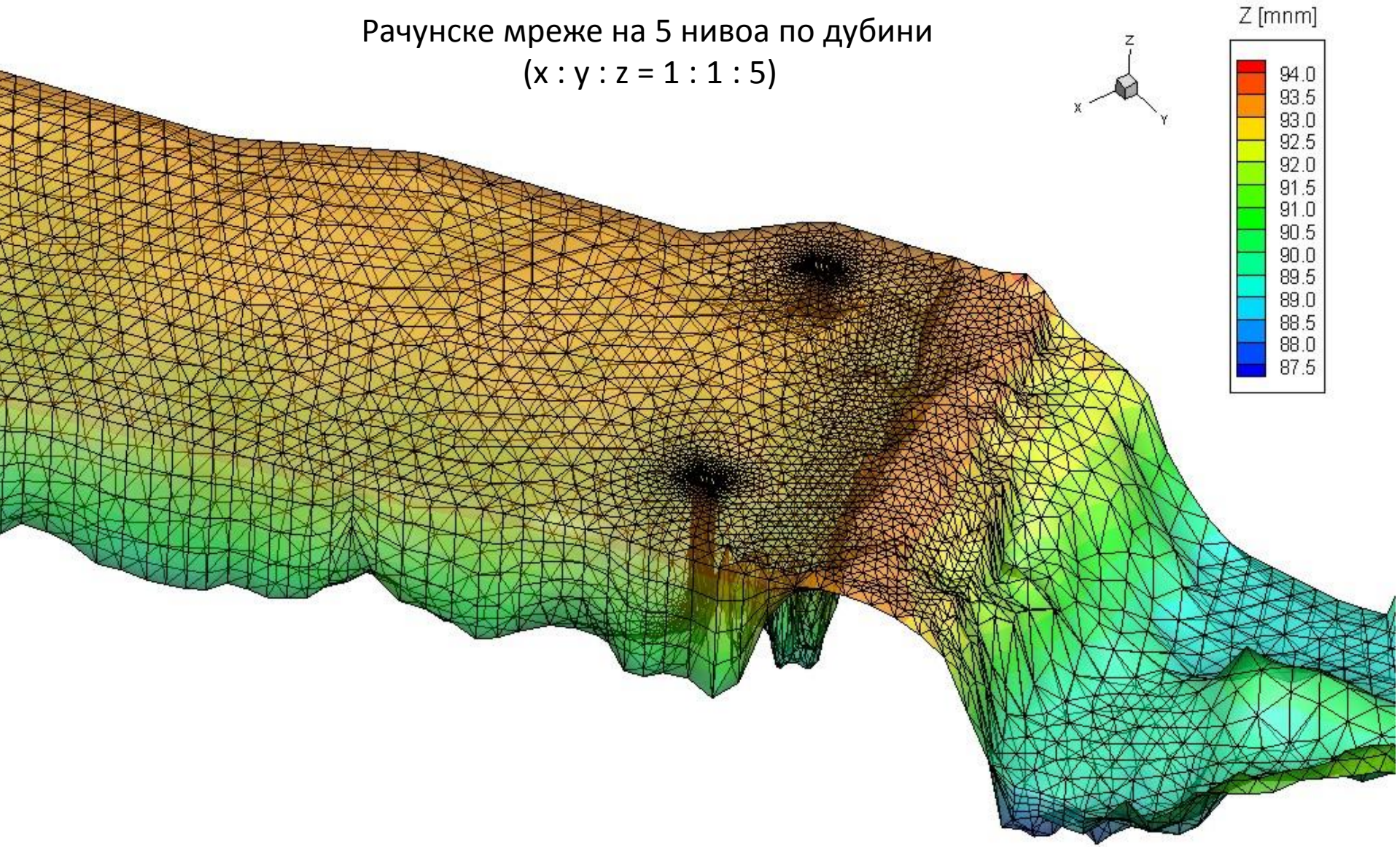


Q_{svv}=700 m³/s

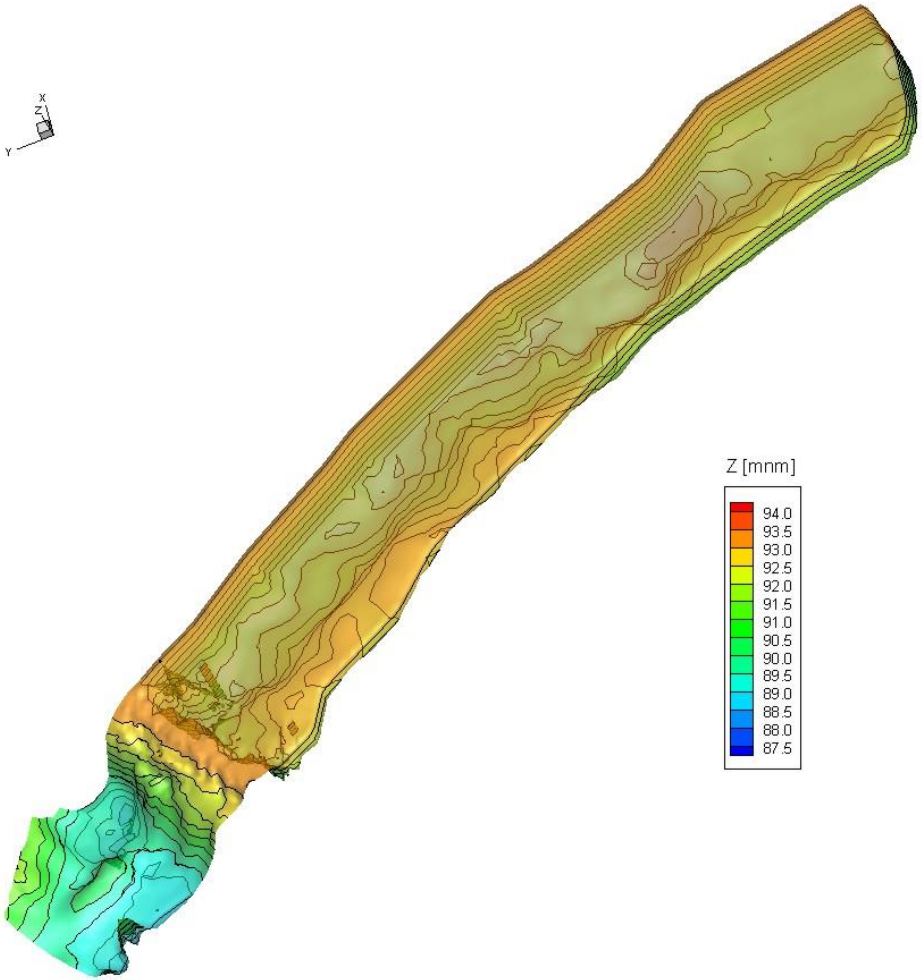


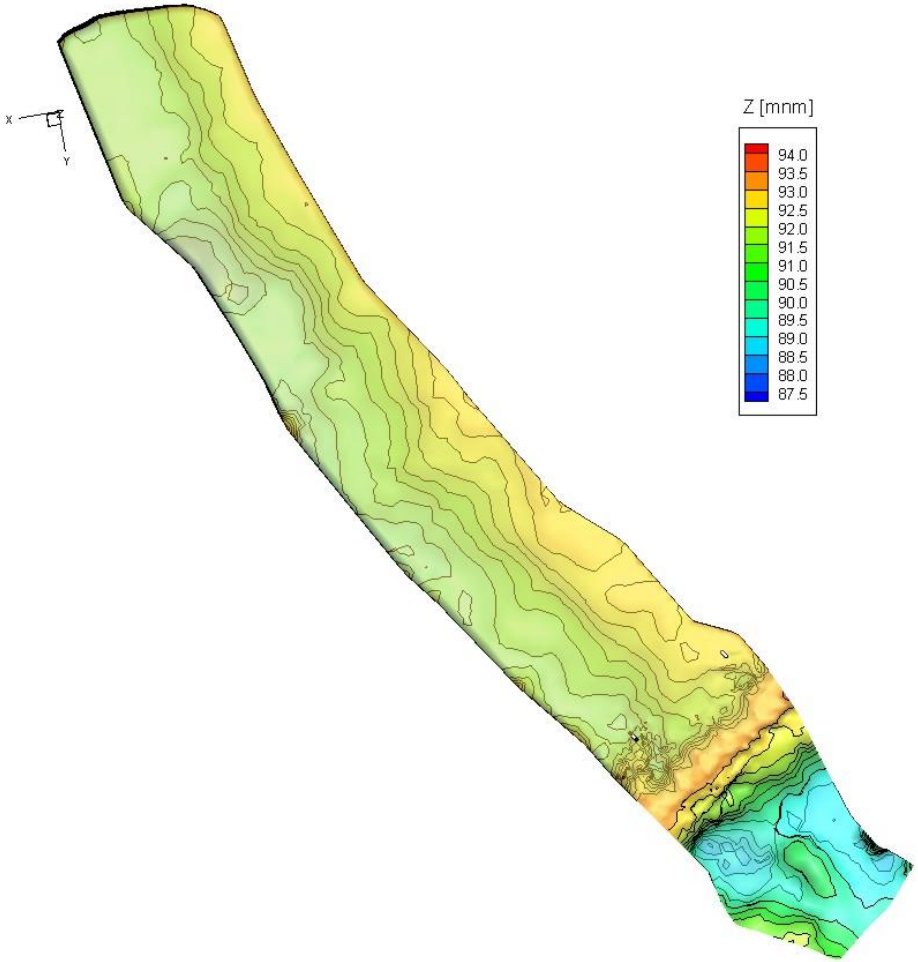
3D нумеричке симулације

Рачунске мреже на 5 нивоа по дубини
(x : y : z = 1 : 1 : 5)

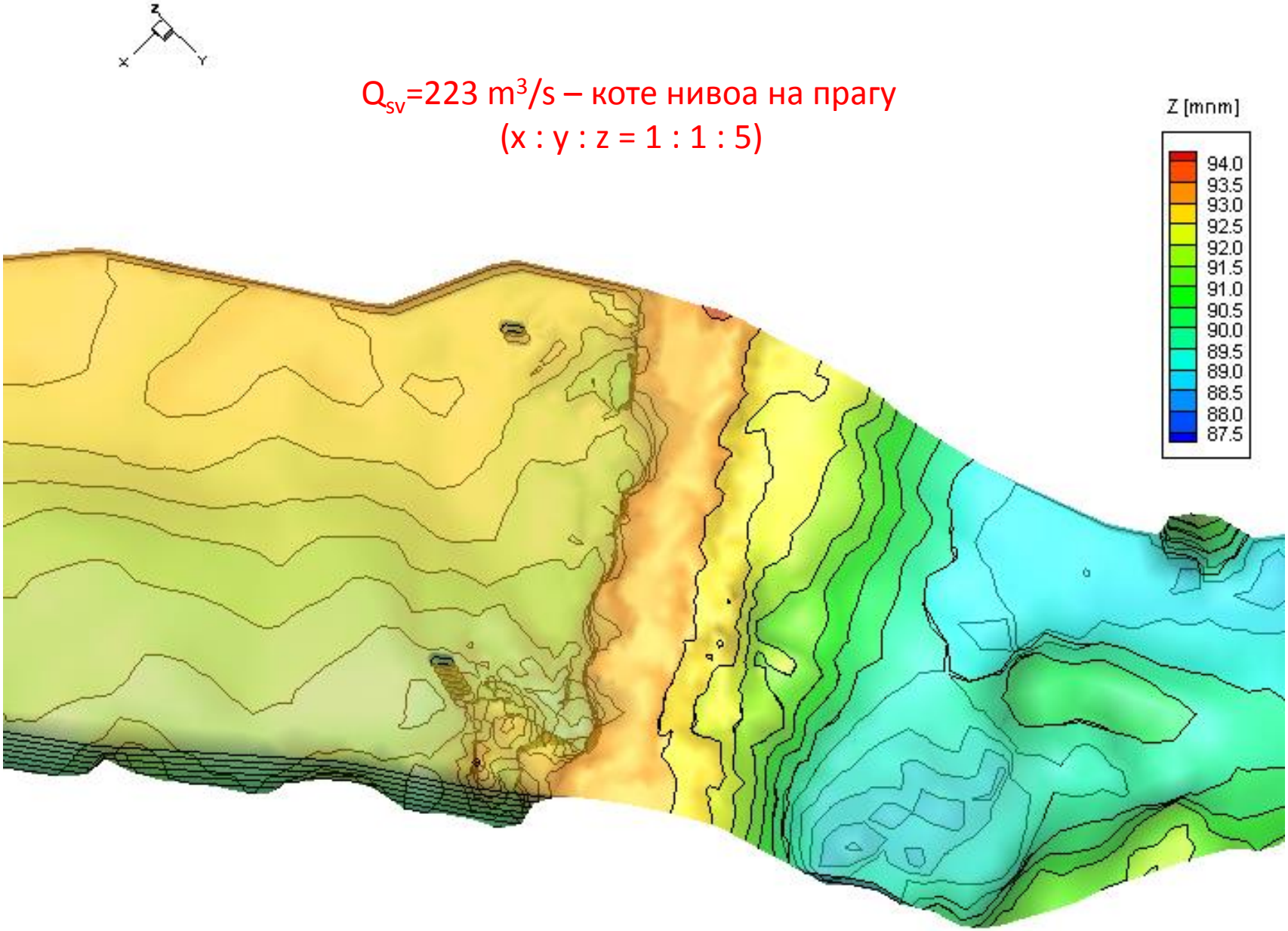


Q_{sv}=223 m^3/s – коте нивоа
(x : y : z = 1 : 1 : 5)

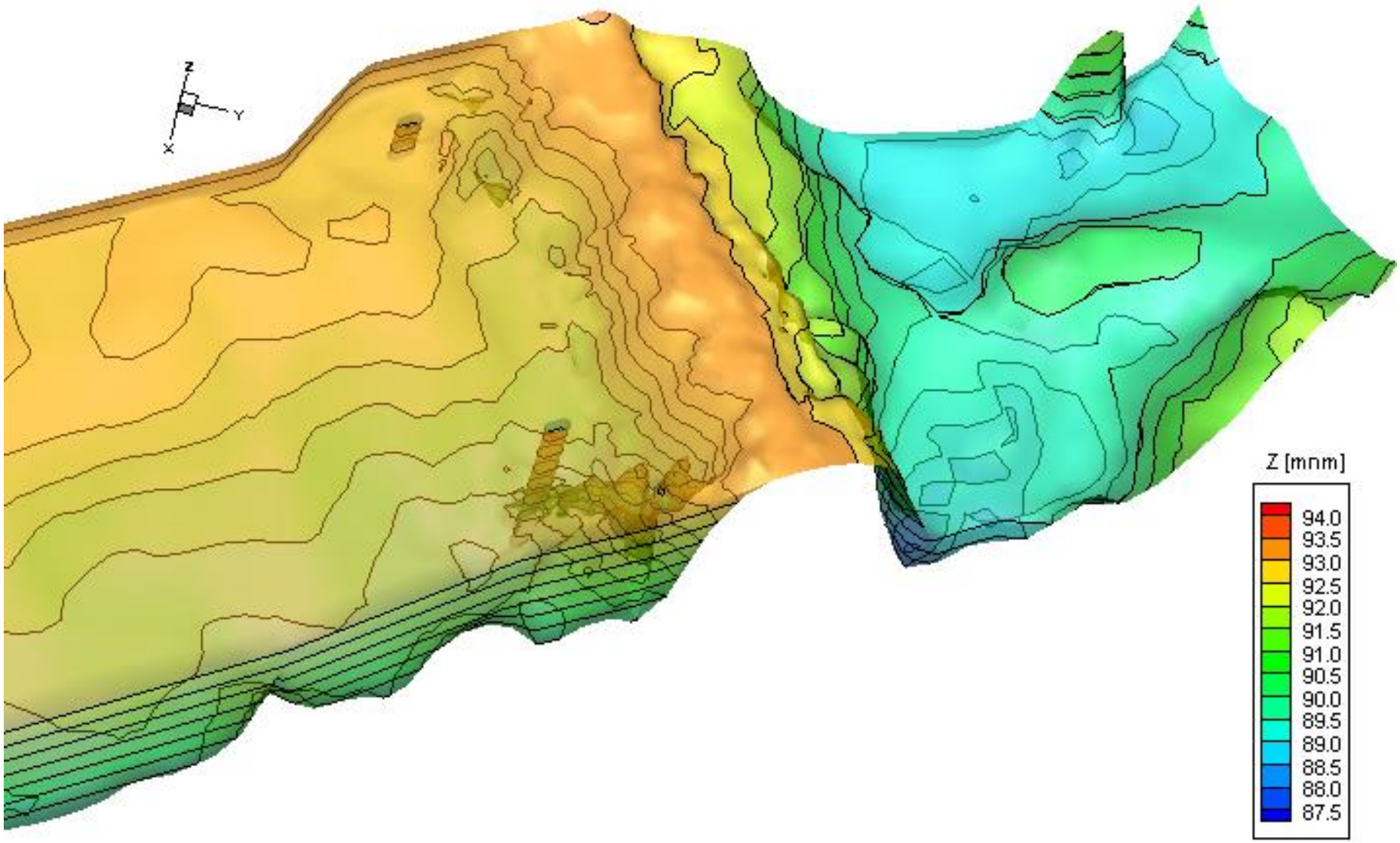




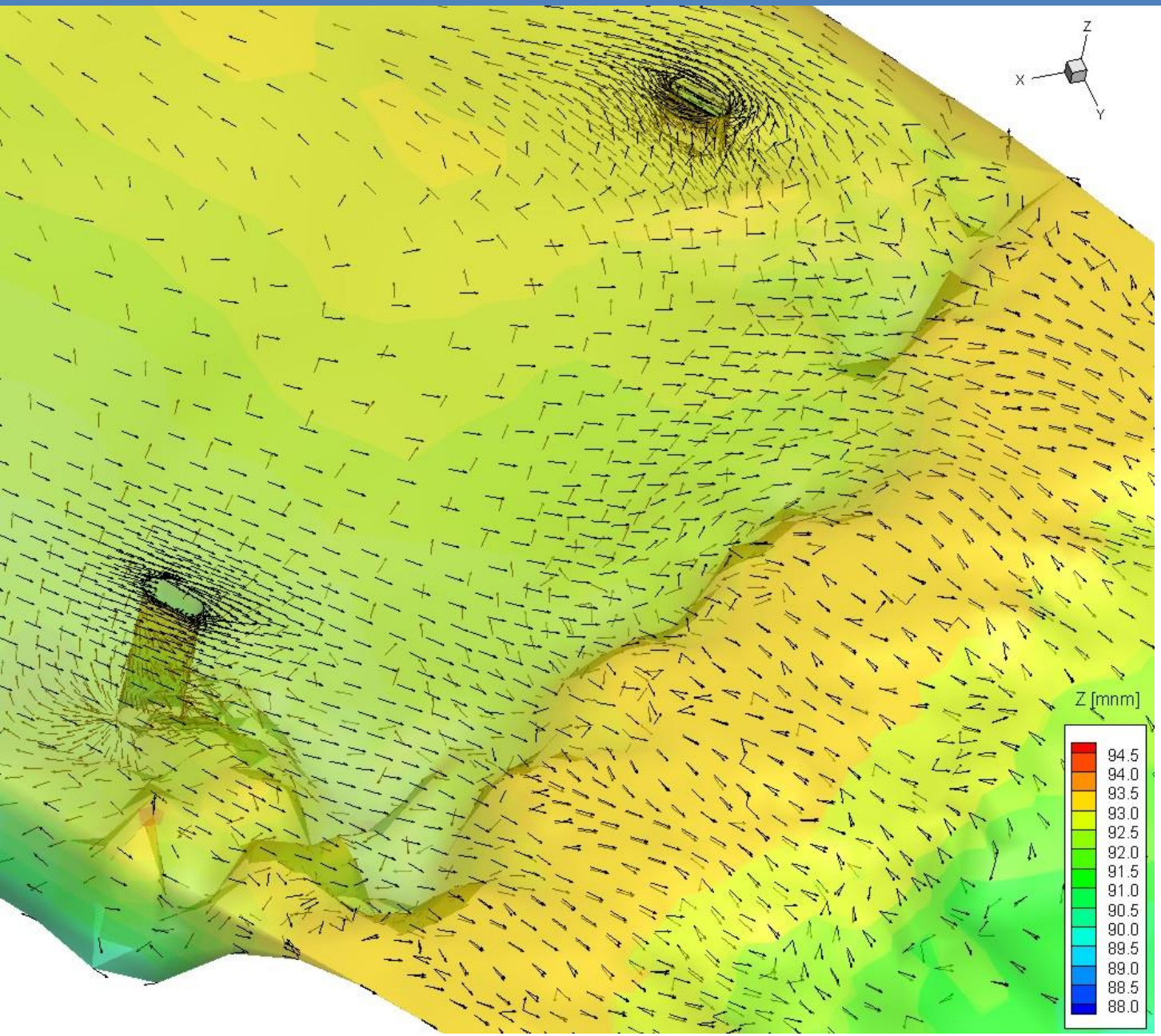
Q_{sv}=223 m^3/s – коте нивоа на прагу
(x : y : z = 1 : 1 : 5)



Q_{sv}=223 m^3/s – коте нивоа на прагу
(x : y : z = 1 : 1 : 5)

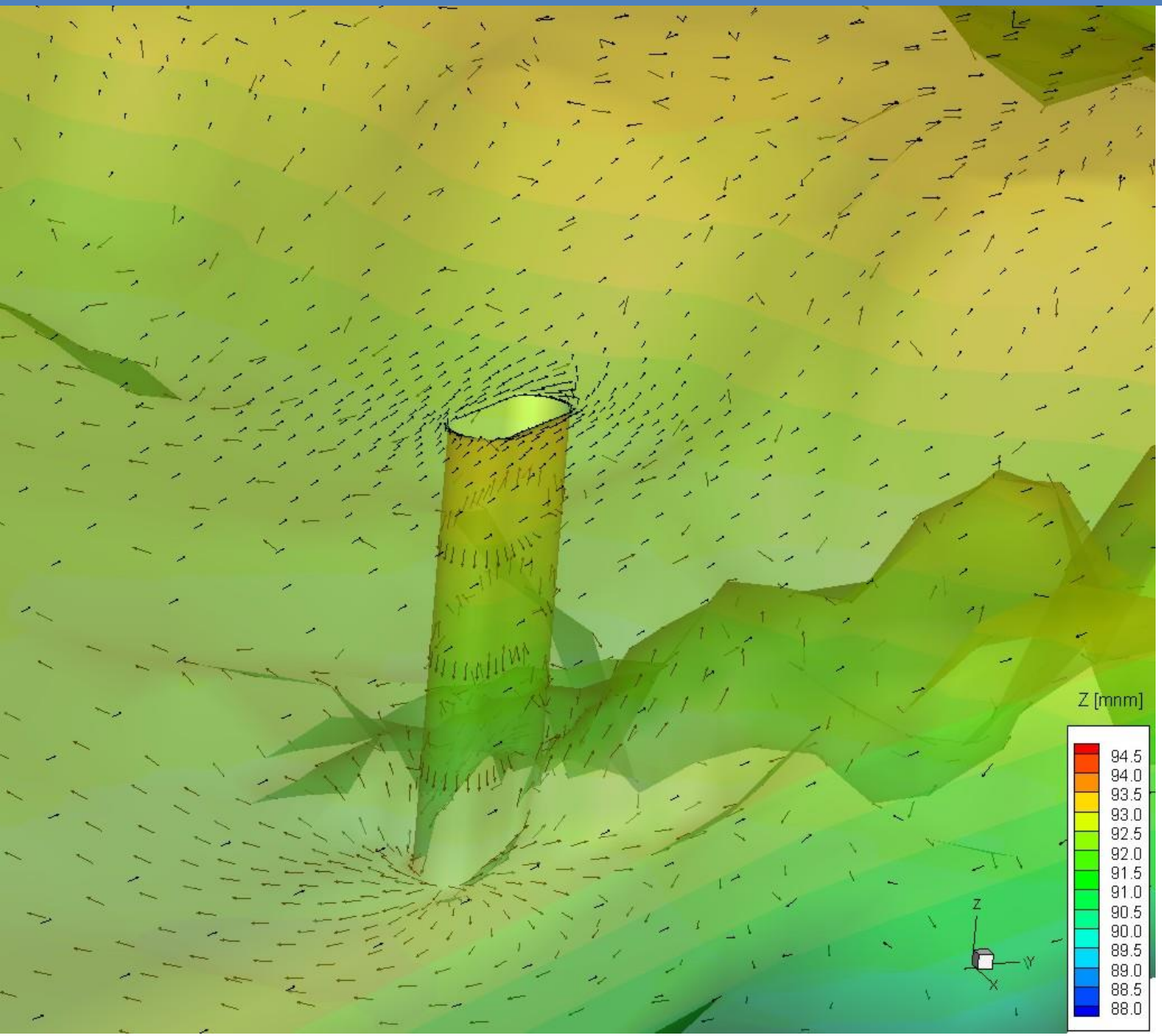


Праг на Морави – 2016.



Q_{sv}=223 m^3/s
(x : y : z = 1 : 1 : 3)

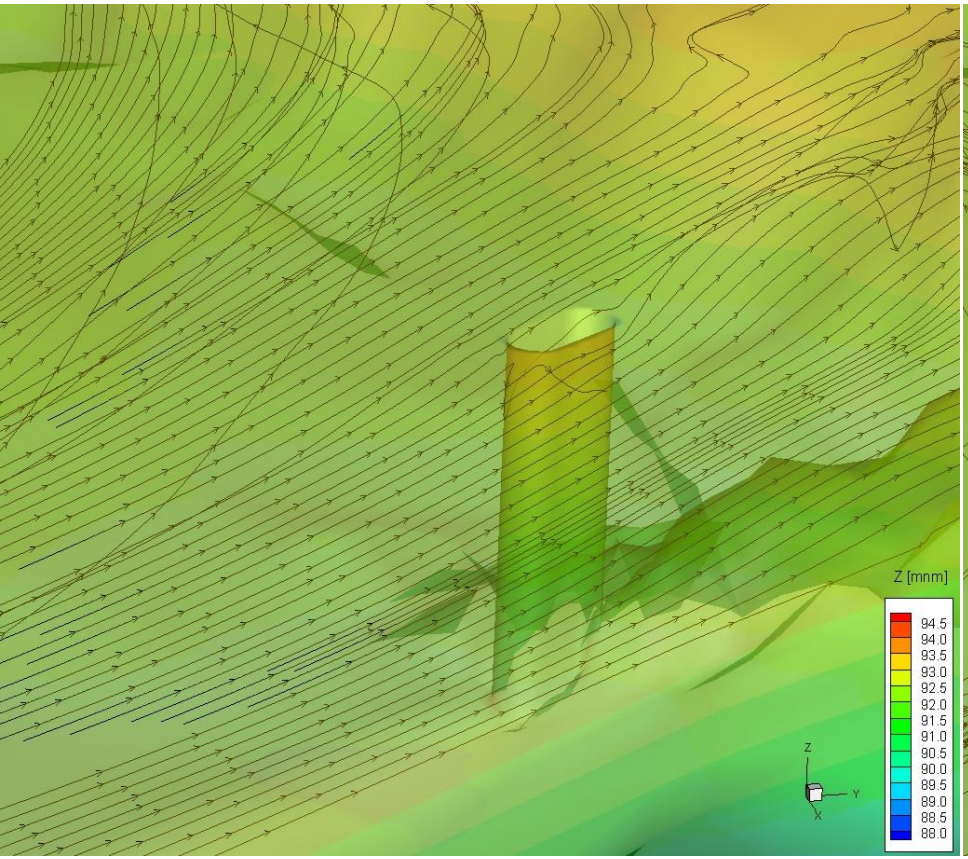
Праг на Морави – 2016.



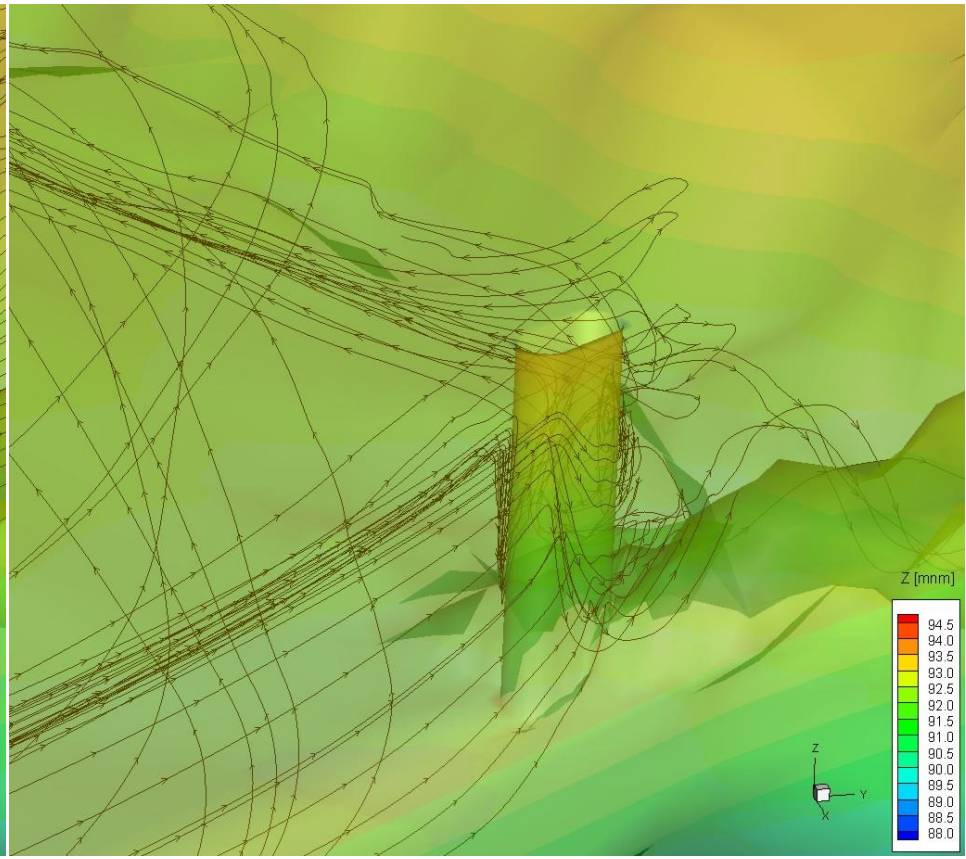
Q_{sv}=223 m^3/s
(x : y : z = 1 : 1 : 3)

Q_{sv}=223 m^3/s (x : y : z = 1 : 1 : 3)

Површинске струјнице са коте 93,3 mnm

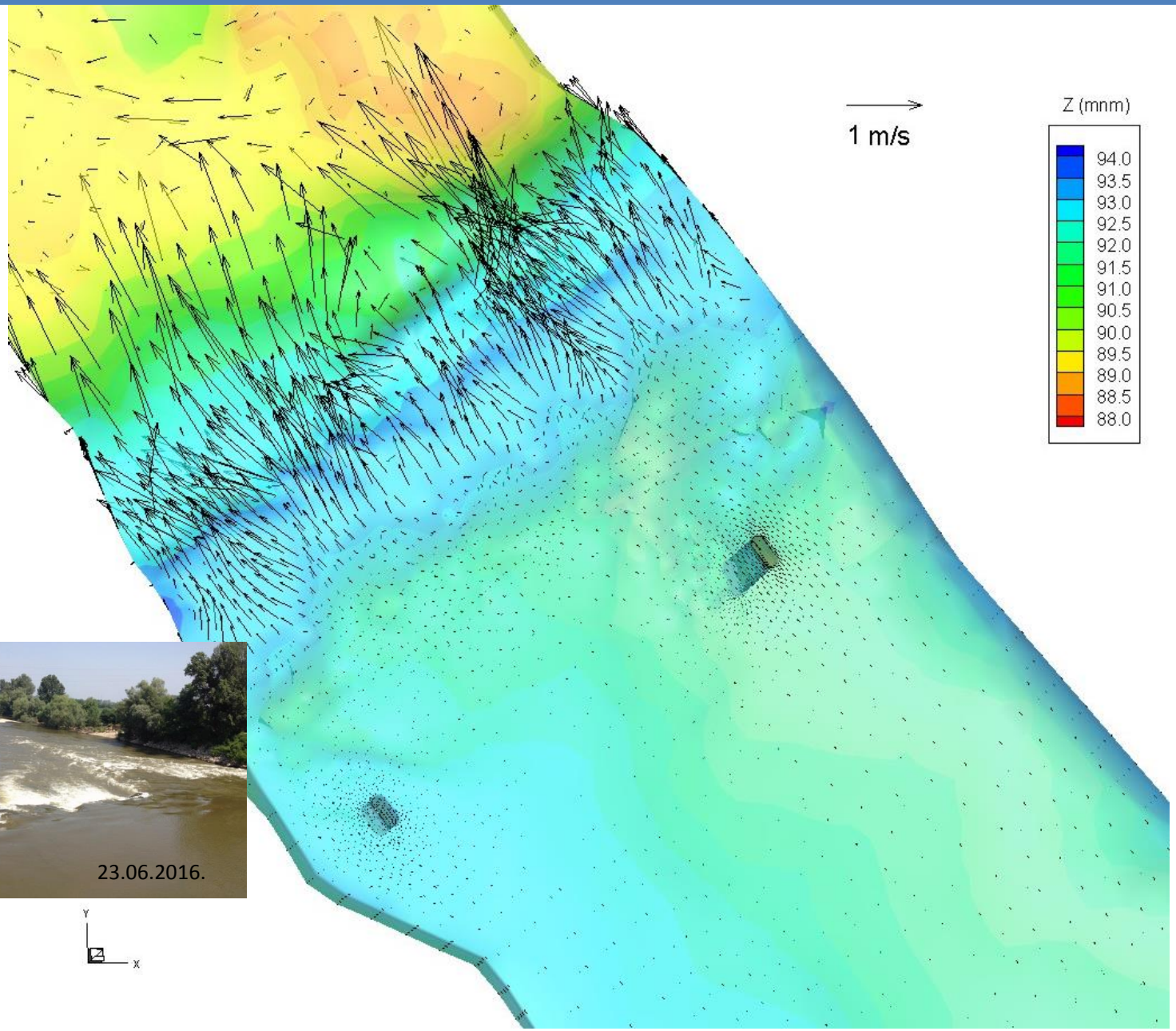


Дубинске струјнице са коте 91,0 mnm



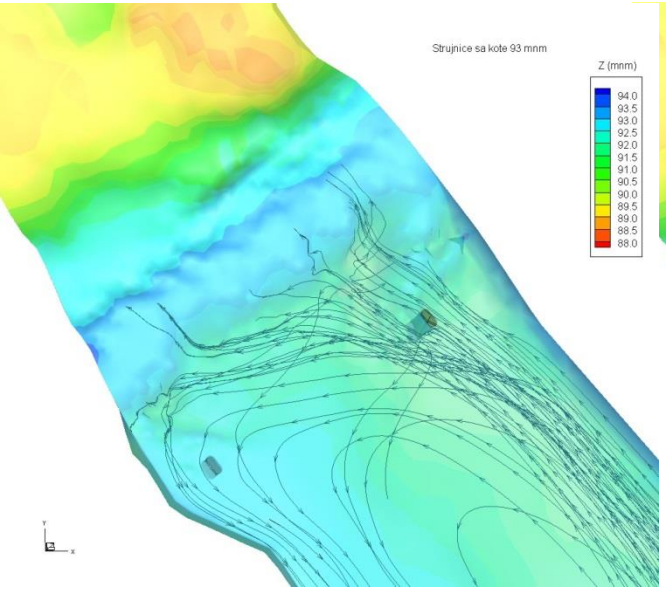
Праг на Морави – 2016.

Q_{svv}=700 m^3/s
(x : y : z = 1 : 1 : 3)

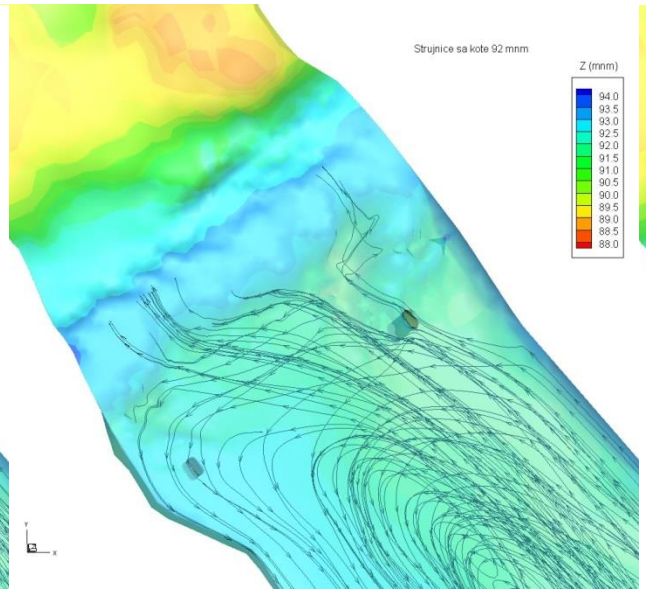


Q_{svv}=700 m^3/s
(x : y : z = 1 : 1 : 3)

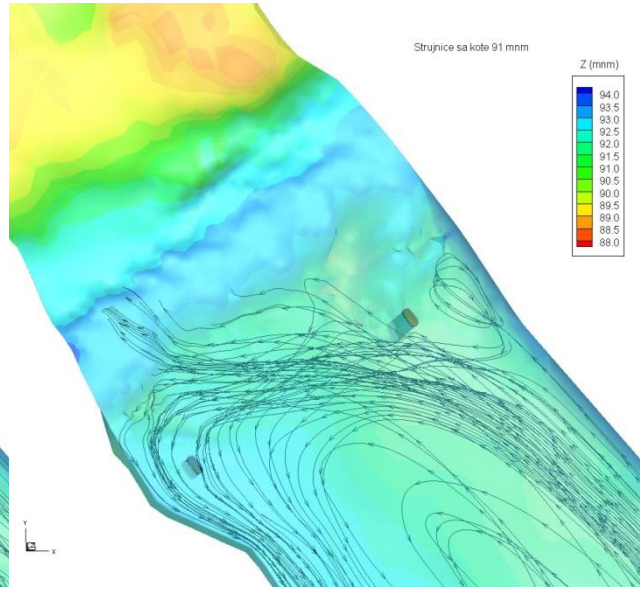
93,0 mnm



92,0 mnm



91,0 mnm



Праг на Морави – 2016.