

The Department of Earth Observation Science (EOS) of the Faculty of Geo-Information Science and Earth Observation (ITC), University of Twente in Enschede, the Netherlands, has a full-time vacant position:

**PhD Candidate (Promovendus) f/m**  
**“Updating 3D city models using 3D point clouds and topographic maps”**

**The Challenge**

You will work in the project “Up-to-date 3D City Models for Water Management Applications” in collaboration with the Delft University of Technology and Saxion University of Applied Sciences. This project is funded by the Technology Foundation STW, part of the Netherlands Organisation for Scientific Research NWO.

The goal of this project is to develop methods for detecting and updating changes between 2D geo-information and the 3D point clouds. Our objects of interest include all surface objects that are present in the large scale (1:1.000) topographic map, including objects representing road parts, terrain, water surfaces and buildings. The height of these areas is captured with high resolution airborne LiDAR data. The challenge is to detect changes between multiple data sources in order to build a 3D city model which is updated to the most recent dataset. The project involves partners from industry and government to ensure the fit for use of the results for their applications, with a special focus on water management.

**Your profile**

You must hold an MSc degree, obtained no more than 5 years ago, related to geoinformatics, with excellent expertise in laser scanning or photogrammetry/computer vision, and programming. Because of the involvement of companies and end users it is required that you must be at ease communicating and discussing with these partners (in English). In joint meetings research results must be presented to them and next steps discussed. Some limited contributions to education may be required.

**Our offer**

We offer an inspiring and challenging international and academic environment. You will be employed as a University of Twente staff member for a period of 4 years (fulltime). Salary and conditions will be in accordance with the Collective Labour Agreement (CAO-NU) of the Dutch Universities. Your gross monthly salary starts at € 2,174.- (first year) up to € 2,779.- (the fourth year) exclusive of allowances, in accordance with the job profile Promovendus, under the University System for Job Classification (UJC). Costs for moving to Enschede may be reimbursed.

**Information and application**

Additional information about this position can be obtained from Dr. Sander Oude Elberink ([s.j.oudeelberink@utwente.nl](mailto:s.j.oudeelberink@utwente.nl), phone: +31 53 4874 350) or Professor George Vosselman ([george.vosselman@utwente.nl](mailto:george.vosselman@utwente.nl), phone: +31 53 4874 344). You are also invited to visit our homepage: <http://www.itc.nl>.

Please locate this vacancy on <https://www.utwente.nl/en/organization/careers/vacancies/> and submit your application through the web form before 15 May 2015.