The Institute of Information Technology at the Alpen-Adria-Universität Klagenfurt invites applications for:

Doctoral Student Positions (100% employment)
within the Christian Doppler (CD) Pilot Laboratory ATHENA
"Adaptive Streaming over HTTP and Emerging Networked Multimedia Services"

at the Faculty for Technical Sciences. The monthly salary for these positions is according to the standard salaries of the Austrian collective agreement, min. € 2,795 pre-tax (14x yearly) (Uni-KV: B1, <a href="www.aau.at/uni-kv">www.aau.at/uni-kv</a>; German only). Expected start date of employment is May 1st 2019.

ATHENA stands for Adaptive Streaming over HTTP and Emerging Networked Multimedia Services and has been jointly proposed as a CD Laboratory (<a href="https://www.cdg.ac.at/">https://www.cdg.ac.at/</a>) by the Institute of Information Technology (ITEC; <a href="http://itec.aau.at">http://itec.aau.at</a>) at Alpen-Adria-Universität Klagenfurt (AAU) and Bitmovin GmbH (<a href="https://bitmovin.com">https://bitmovin.com</a>) to address current and future research and deployment challenges of HTTP Adaptive Streaming (HAS) and emerging streaming methods.

AAU (ITEC) has been working on adaptive video streaming for more than a decade, has a proven record of successful research projects and publications in the field, and has been actively contributing to MPEG standardization for many years, including MPEG-DASH; Bitmovin is a video streaming software company founded by ITEC researchers in 2013 and has developed highly successful, global R&D and sales activities and a world-wide customer base since then.

The aim of ATHENA CD Lab is to research and develop novel paradigms, approaches, (prototype) tools and evaluation results for the areas (1) multimedia content provisioning (i.e., video coding), (2) content delivery (i.e., multimedia networking) and (3) content consumption (i.e., HAS player aspects) in the media delivery chain as well as for (4) end-to-end aspects, with a focus on, but not being limited to, HTTP Adaptive Streaming (HAS). The new approaches and insights are to enable Bitmovin to build innovative applications and services to account for the steadily increasing and changing multimedia traffic on the Internet. In addition, according to the CD Lab model of "application-oriented basic research", the goal is to publish the results in international, high quality professional journals and conference proceedings.

## Your profile:

- Master or diploma degree of Technical Science in the field of Computer Science or Electrical Engineering, completed at a domestic or foreign university (with good final degrees);
- Interest and experience in one or more of the above identified areas, namely (1) multimedia content provisioning (i.e., video coding), (2) content delivery (i.e., multimedia networking) and (3) content consumption (i.e., HAS player aspects) in the media delivery chain as well as (4) end-to-end aspects, with a focus on, but not being limited to, HTTP Adaptive Streaming (HAS);
- Excellent English skills, both in written and oral form.

## Desirable qualifications include:

- Excellent programming skills, especially C, C++, Java, JavaScript;
- Relevant international and practical work experience;
- Social and communicative competences and ability to work in a team;
- Experience with university teaching and research activities.

The working language and the research program are in English. There is no need to learn German for this position unless the applicant wants to participate in undergraduate teaching which is optional.

Submit all relevant documents, including copies of all school certificates and performance records, by email to:

## **Dr. Christian Timmerer**

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Klagenfurt, situated at the beautiful Lake Wörthersee – one of the largest and warmest alpine lakes in Europe – has nearly 100.000 inhabitants. Being a small city, with a Renaissance-style city center reflecting 800 years of history and with Italian influence, Klagenfurt is a pleasant place to live and work. The university is located only about 1.5 kilometers east of Lake Wörthersee and about 3 kilometers west of the city enter.

