

September 6th, 2018

Recommendation letter for Fedor Ivachev

Dear Sirs,

It's my pleasure to recommend Fedor Ivachev as a good worker. Fedor successfully participated in an internship program at Samsung R&D Institute (SRR) this summer.

During the internship, Fedor worked on the task of calibrating RGB cameras, calibrating the time-of-flight depth sensor. He deeply enough understood classical methods for calibrating pinhole cameras. He implemented a depth sensor calibration method that takes into account only distance distortions, without taking into account object color-based distortions and distortions related to the different distances from optical center on depth frame.

Fedor helped us a lot in the gathering dataset of face movements during speech. He undertook the development of the design of facial markers and motions capturing setup including hardware and face makeup. Fedor also developed an algorithms for detecting different facial markers in a video stream. Within a short period of the internship, about ten possible layouts and designs of markers were tested, around 10 hours of video were captured in different configurations. In this work, Fedor showed himself to be an enterprising and hard-working person and brought many benefits to the project.

During the internship, Fedor got acquainted with the OptiTrack 3D tracking system. He made a demonstration of the possibilities of this system to capture the movements of the human skeleton, a hand, in a short time having understood the software of the system.

In general, Fedor left a good impression of himself, he brought a lot of benefits during 2 months of internship. I wish him every success and professional development.

Project Leader at Bio Recognition Lab,
Biometric AI Team,
Samsung R&D Institute Russia

 / I. Glazistov /