



V-MUST DEVELOPMENT CAMP: CALL FOR MOBILITY (C4)

Fraunhofer IGD, Darmstadt (Germany)
Title: Augmented Reality and On line Virtual Museums

1. Name of the hosting institution	Fraunhofer IGD
2. Brief description of the unit hosting the internship	<p>Department for Virtual and Augmented Reality</p> <p>The Fraunhofer IGD, created in 1992, which today has a total of 13 research and development departments at four locations: Darmstadt, Rostock, Graz (in the "Visual Computing" business unit of Fraunhofer Austria) and Singapore. We collaborate closely with the Technical University of Darmstadt, Rostock University, Technical University of Graz and the Nanyang Technological University (NTU) in Singapore. Our research focus is Visual Computing, i.e. image- and model-based information technology. It includes Computer Graphics, Computer Vision, as well as Virtual and Augmented Reality. We develop prototypes and complete solutions based on customer-specific requirements. Our research and development projects are directly applicable to current problems in the economy.</p>
3. Max number of internships/year	2
4. Areas of host institution's expertise for internship proposals	<ul style="list-style-type: none">• Virtual Reality• Augmented Reality• X3DOM• WebGL• X3D• Rendering• Tracking• Interactive Computer Graphics.
5. Project description <i>Brief description of any specific programme of work that the host wishes the intern to carry out (optional)</i>	<ul style="list-style-type: none">• Contributing to Mobile Augmented Reality demonstrators consistent with the objectives of V-Must - Or• Developing X3DOM services for the WP4 platform
6. Benefit to host <i>Areas in which the host wishes to develop expertise through collaboration with an intern (optional)</i>	
7. Internship profile <i>Please indicate the "essential" and "preferred" skills and/or qualifications that applicants should have</i>	<ul style="list-style-type: none">• Computer Graphics (CG I, CG II equivalent)• profound knowledge in C++• Ideally, WebGL or OpenGL, X3D
8. Preferred period <i>Please give the earliest possible start date, and the latest possible end date for</i>	June - September (2012; 2013; 2014)

<i>hosting interns</i>	
9. Min/max duration (usually between 12 and 24 weeks)	12 – 20 weeks
10. Accommodation support (where applicable)	None, although general advice may be available upon request.
11. Facilities and Supervision <i>Please describe the workspace, equipment, training, supervision hours per week etc. that the host will provide</i>	PC Workstations, development environments VisualStudio.net, several desktop publishing tools (Adobe products), access to own toolboxes and libs, script-writing and editing for VR applications. Training will be provided on several aspects of X3D, its scripting mechanism, and required internal CV libs. There will be no training on C++ or programming.
12. Contact Details of Supervisor. a. Name: b. Address: c. E-mail: d. Telephone:	Holger Graf & N.N. Fraunhoferstrasse 5 holger.graf@igd.fraunhofer.de +49 6151 155 471