

Minutes of Meeting

Subject 7th meeting for the establishment of the OpenDRIVE standard
Date February 1st, 2011
Time 16:30 – 19:30
Location Imagina Conference, Monaco

Foreword:

This OpenDRIVE meeting was the first one to be held outside Germany and outside the context of a core-team member's company. By packing it into the frame of the well-established Imagina conference and exhibition, it was accessible to a broad public of simulation professionals.

Attendance of the meeting was slightly higher than expected. A total of approximately 20 persons participated in the event.

With several participants attending an OpenDRIVE meeting for the first time, the meeting's initial focus was more on general questions, the introduction of OpenDRIVE to new prospective users, current applications and the overall roadmap. Later-on, some details and technical issues were discussed.

The following members of the core-team were attending the meeting:

company	name
BMW Group Research and Technology	Martin Strobl
Daimler AG	Hans Grezlikowski
Deutsches Zentrum für Luft- und Raumfahrt e.V.	Andreas Richter Vitalij Guraj
VIRES Simulationstechnologie GmbH	Marius Dupuis
VTI	Mats Lidström

Topics

no	subject	description	further action
1	Introduction	<ul style="list-style-type: none"> • Introduction of OpenDRIVE with a brief history and an overview of basic principles and administration issues • The presentation can be downloaded from the OpenDRIVE server (http://www.opendrive.org/download.htm) 	
2	User Reports	<ul style="list-style-type: none"> • User Report by BMW Group Research and Technology <ul style="list-style-type: none"> ◦ Subject: Experiences from a Database Exchange based on OpenDRIVE • User Report by VTI <ul style="list-style-type: none"> ◦ Simulation and OpenDRIVE at VTI ◦ OpenDRIVE in a Swedish road construction program (Stockholm road tunnel) ◦ Conclusion: "OpenDRIVE has become widely used, and accepted as common standard, by several institutions in Sweden" • User Report by DLR: <ul style="list-style-type: none"> ◦ SimWorld^{URBAN} - realistic 3d urban environment modelling for simulators with geo-referenced data • User Report by TrianGraphics <ul style="list-style-type: none"> ◦ OpenDRIVE in TrianBuilder 	
3	Partner Project	<ul style="list-style-type: none"> • Brief introduction of OpenCRG (the microscopic "brother" of OpenDRIVE, see also http://www.opencrg.org). Due to time constraints, this topic was kept very short. 	
4	Standardization	<ul style="list-style-type: none"> • OpenDRIVE is an established de facto standard • formalization of the standard and incorporation of competing formats might be options for the mid-term future 	investigation of (EU) projects for the introduction of a formal standard; meanwhile (i.e. on March 21, 2011) feedback has been provided by DLR and Renault on this issue and

no	subject	description	further action
			further action is foreseen for April / May 2011
5	OpenDRIVE 1.4	<ul style="list-style-type: none"> in order to make OpenDRIVE files more compliant with navigation data, support for native GPS co-ordinates should be improved (either by describing projection algorithms or by allowing GPS co-ordinates directly) intersection design: vehicles might not be able to follow paths within junctions directly (e.g. long truck on sharp turns); they should be provided with other means to navigate through intersections the format should allow for templates to be used on any level of hierarchy in order to simplify the editing of a data file and to enhance readability parking areas: rules / signals should be defined for the more detailed description of parking areas (parking lots) 	VIRES: provide a draft of changes to the format (note: it will be available to the core-team in April 2011).
6	Style Guide	<ul style="list-style-type: none"> this has been a topic for the past years many users have gained experience meanwhile and time has come to really provide a guideline for new users so that databases are not only technically compliant with the format but are also usable by a broad range of users 	VIRES, with support from BMW and DLR, will draft a style guide document and hand it over to the core-team for further discussion (the draft will be available by end of March 2011)
7	Software	<ul style="list-style-type: none"> OpenDRIVE needs to provide more free and – preferably – open source software further examples are needed test tools are required 	<p>VIRES will make "OpenDRIVE Manager light" available for free also for commercial applications</p> <p>Everybody is kindly asked for contributions</p>
8	Next Meetings	<ul style="list-style-type: none"> VTI offer to host the event at one of their sites in Sweden 	organize ;-)