

International Network for the Cooperation in Applied Research in Computer Graphics, Multimodal-Multimedia Technologies, and Visual Interactive Digital Media Technologies

Institutional Presentation

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General Information



1. Introduction

- GraphicsMedia.net is an International Network for the Cooperation in Applied Research in Computer Graphics, Multimodal-Multimedia Technologies, and Visual Interactive Digital Media Technologies.
- GraphicsMedia.net was created in December 2010 with headquarters in Kaiserslautern, Germany (in the premises of the German Research Center for Artificial Intelligence, DFKI). It is a non-profit GmbH under German Law with a clear international dimension.





- The **members** of **GraphicsMedia.net** are international institutions with a focus in applied research. Currently, **GraphicsMedia.net** has members in **Germany** (2), **Spain**, **Portugal**, **Italy** and **Panama**. It is **open** to new partners.
- Together, these institutions have more than 670 full time researchers (plus 360 assistants/students) and a budget of 39 MEUR









1. Introduction





1. Motivation / Context

- In many countries, applied research institutions strive to develop Computer Graphics and Multimedia technologies and transfer the latest advances to local companies and institutions.
- To be excellent, **best-in-kind at the local level**, but at the same time **relevant players at international level**, these institutions need a **global view**, a **critical mass**, a **robust collaboration framework**, and a **strong international** presence
- It is of strategic importance to strengthen international common visions and foster synergies in science, technology, knowledge transfer and innovation
 - Beyond the informal ad-hoc relations (e.g. specific projects)
 - Beyond purely scientific networks.
 - With a formal structure that supports long-term strategies
- GraphicsMedia.net is a non-profit international organization that coordinates the activities of research and development, the technology transfer and the exploitation in Computer Graphics, Multimodal-Multimedia Technologies, and Visual Interactive Digital Media Technologies











3. Objectives

- 1. Share a common vision to define applied research strategies and technology transfer models in order to be best in kind locally and a relevant proactive actor globally
- 2. Identify **research and market opportunities and synergies** within the network and outside the network
- 3. Coordinate European and International/multinational projects strategies for the members
- 4. Organize **high level seminars and symposia for strategy definition** in scientific, technological and innovation aspects
- 5. Foster excellence and worldwide presence for the organization (*including lobbying*)
- 6. Maintain the international profile and connection at institutional level for the members
- 7. Reach high scientific visibility and excellence as a network
- 8. Support the continuity of the already existing and the building of new co-operations
- 9. Foster the exchange of researchers and students
- 10. Develop strategies for common definition and use of facilities and laboratories
- 11. Articulate **technology screening and technology valorization** activities, as well as business angels/investors relationships ,etc.
- 12. Benchmark best practices, contrast management models
- 13. Foster innovation and quality management capabilities for the members
- 14. Identify and shape new objectives and strategies for the future











Scientific Excellence

- Reach high scientific visibility
- Excellence and worldwide presence for the organization
- Collaborate with top university and research institute world-wide

Technology Transfer

- Link novel ideas from science with marketable ideas
- Generate a new scientific and technological asset base
- License technical assets to companies, in particular SMEs
- Involve local SME create cluster
- Create high-tech highly innovative spin-offs

"Brain Drain", Personal Development and "Brain Transfer"

- Systematically furthering the skills and qualifications of staff members
- Develop the necessary scientific, technical, professional and personal skills
- "brain transfer" the dissemination of technological know-how through individual persons going into private companies.

Best practices – productivity measures for a centre

Scientific benchmark

- publications in scientific journals
- accepted conference papers
- completed PhDs, Master theses



Economic benchmark

- growth (stability)
- patents or patent applications for the industrial shareholders
- numbers of spin-off companies and products
- numbers of generated jobs
- Iocal industrial settlements

International visibility benchmark

quantity and quality of coverage in the media



4. Business Model

 GraphicsMedia.net has a sustainable financing model (approved by the Board) in which the success in promoting activities for the members is the key business factor. The main income source will be related with international member's R&D projects.



- At the beginning, the activities of GraphicsMedia.net will be performed mainly by the members to bootstrap the initial phases.
- An **external Managing Director** will be appointed in **2013**, after **2 years** of creation, and external consultants can provide some specific services.







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5. Structure

• As non-profit GmbH, GraphicsMedia net has the following structure:



- The President of the General Assembly, and General Manager, is
 Prof. Didier Stricker, Head of the "Augmented Vision" Department of DFKI.
- The President of the Board is

Dr. Jorge Posada, Associate Director of Vicomtech.

• Prof.em. Dr.-Ing. José Luis Encarnação is the president of Advisory Board.

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6. Membership

- Independent Applied R&D Institutes (public/private), non-for profit, interested and aligned with the mission and vision of the Network
- **R&D Units of multinational companies** interested and aligned with the mission and the vision of the Network
- Multinational hi-tech technology transfer companies, interested and aligned with the mission and the vision of the Network













7. Activity Plan 2011 (I)

Activity						
OBJECTIVE 1. Share a common vision to define applied research strategies and technology transfer models in order to be best in kind locally and a relevant proactive actor globally						
OBJECTIVE 2. Identify research and market opportunities and synergies within the network and outside the network						
Internal Analysis of partners focus technology lines and strengths						
Define set of technologies that could be shared among partners						
Personal contacts coordination. Fostering of personal links between Research Unit heads between the partners.						
Establishment of some common development platforms and models to make it happen						
OBJECTIVE 3. Coordinate European and International/multinational projects strategies for the members						
Coordination of the policy definition for EU and international projects strategy of the GraphicsMedia.net members. Positioning in new mechanisms (EIT, Future Internet PPP, etc.)						
Active support in defining and presenting international project proposals. "Success Story" Projects.						
National and International – non EU- Projects- for Members: Identification, Acquisition, Writing, lobby, coordination, exploitation, dissemination, etc.						
OBJECTIVE 4. Organize high level seminars and symposia for strategy definition in scientific, technological and innovation aspects						
Strategy Workshop: 1 day meeting with directors + department heads						
Scientific-Technology roadmap 2011-2014: Preparation of "Technology Prospective" report for the members						
OBJECTIVE 5. Foster excellence and worldwide presence for the organization (including lobbying)						
Public Relationships & Marketing plan						
Impulse connectivity and visibility at international level. Access to international key players, influence at financing institutions (lobby) –e.g. EU-						











7. Activity Plan 2011 (II)

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OBJECTIVE 6. Maintain the international profile and connection at									
institutional level for the members									
OBJECTIVE 7. Reach high scientific visibility and excellence as a network	L								
Scientific event (workshop, conference) organized									
"Selected Readings of International Applied Research in Media & Graphics" Volume 1									
OBJECTIVE 8. Support the continuity of the already existing cooperations, as well as the building of new cooperations									
Consolidation of membership: explore set of possible new members									
OBJECTIVE 9. Foster the exchange of researchers and students									
Policy development and mechanisms for exchange or researchers & students, common MSc. /PhD, etc.									
OBJECTIVE 10. Develop strategies for common definition and use of facilities and laboratories									
OBJECTIVE 11. Articulate technology screening and technology valorization activities, as well as business angels/investors relationships, etc									
Technology screening workshop, detection of market opportunities									
Policy for Subcontracting issues between members & partnerships, technologies transfer deals in Projects.									
OBJECTIVE 12. Benchmark best practices, contrast management models									
Workshop for Innovation, Quality and Management issues									
OBJECTIVE 13. Foster innovation and quality management capabilities for the members									
OBJECTIVE 14. Identify and shape new objectives and strategies for the future									







HPI





8. Indicators (I)

Indicators	
Number of GraphicsMedia.net proposals presented (number of proposals) Note: "GraphicsMedia.net proposal" is a proposal with strong impulse from GraphicsMedia.net, including members as beneficiaries, which is presented to an external financing party (e.g. EU, NATO, industrial client,)	10-12
Total volume requested (grant or subcontract for the whole project duration) (EUR) Total volume requested for members in GraphicsMedia.net proposals presented in that year	6.000 - 7.200 KEUR
Total volume acquired (grant or subcontract for the whole project duration) (EUR) Total volume acquired for members in GraphicsMedia.net proposals presented in previous year	Assuming 1/7: 850- 1000 KEUR
2-days strategy workshop (number per year) Strategy workshops with the participation of the BoD representatives as well as senior researchers/area coordinators, where overall strategy, common technology lines, strategic roadmaps, potential proposals, exchange issues, etc. are discussed	1
Common Ph.D. researcher activities (number of Ph.D. candidates involved) A common Ph.D. research activity can be: (i) a research stay of the Ph.D. student in another member, (ii) a joint tutoring of a Ph.D. candidate, (iii) a joint research line of two or more Ph.D. candidates on an agreed topic.	2
Exchange of other researchers (not pursuing Ph.D.), and students of MSc. or Bach. (number of people exchanged) Stay of a researcher who is not pursuing Ph.D., or a student doing M.Sc., or final year project in another member	1-2

₽₽ German Research Center for Artificial Centro de Computação Gráfica Intelligence GmbH





visual interaction

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8. Indicators (II)

GraphicsMedia.net Joint Research Publications (number)	
Joint research publications between 2 or more members. Note that, although this can happen	
mostly in common projects, this is possible also in other cases, where only a common research	1–4
interest exists.	
GraphicsMedia.net supported Scientific workshop/conferences (number)	
Scientific workshops and conferences, organized by one or more partner (GraphicsMedia.net	
active support in organization issues). It is expected that in this events papers from several	0-1
members are presented.	
Common GraphicsMedia.net SDK developments (number of SDK active that year)	
A GraphicsMedia.net SDK is a software platform used for applied R&D in which at least 2	
members work at the software development level, with a continuous and strategic horizon. The	0-1
SDK can belong to a single member with special use arrangement for other development	
members, or have a shared ownership.	
GraphicsMedia.net mediated technology transfer (EUR)	
Success of GraphicsMedia.net in mediation of technology transfer in that year (EUR). This could	
happen if GraphicsMedia.net (i) actively helps one or more members to sell a joint mature	0.1 MEUR
technology in the market, (ii) helps to put the technology of one member in the local context of	0.1 MLOK
another member, (iii) helps to get external resources and means to productize a technology	
belonging to one or more members.	
Senior researcher hours (>3 years exp.) dedicated per partner (hours)	
Minimum dedication per partner of senior researchers to GraphicsMedia.net proposals in that	250
year, these hours should be mainly for proposal support.	
Junior researcher hours and administrative staff hours per partner (hours)	
Minimum dedication per partner of junior researchers and administrative staff to	200
GraphicsMedia.net activities (in general, not activities (in general, not activities (in general, not activities (in general, not activities)) (in general, not activities) (in general, not activitities) (in general, not activities) (in general, not	
Computação Gráfica GraphiTech Institut Aveca Institut	



9. Profile of the Members









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Vicomtech

- **105 Researchers**
- San Sebastian, Spain
- http://www.vicomtech.org
- Research areas
 - Digital TV & Multimedia **Services**
 - eHealth & Biomedical Aplications
 - eTourism & Cultural Heritage
 - 3D Animation & Interactive Virtual Environments
 - ITS & Engineering
 - Human Speech & Language **Technologies**

















technologies







DFKI – German Center of Artificial Intelligence

- 423 Researchers
- Kaiserslautern Saarbrücken – Berlin Germany
- <u>http://av.dfki.de</u>
- Research areas
 - Augmented Vision
 - Intelligent User Interfaces
 - Agents and Simulated Reality
 - Knowledge Management
 - Language Technology
 - Robotics Innovation Center
 - Safe and Secure Cognitive Syst.
 - Innovative Retail Laboratory
 - Institute for Information Systems
 - Innovative Factory Systems





















Centro de Computação Gráfica

Centro de

Computação Gráfica

- 48 Researchers
- Guimaraes, Portugal
- <u>http://www.ccg.pt</u>
- Research areas
 - Computer Vision
 - Creative Media
 - Engineering Process Maturity and Quality
 - Laboratory of Perception and Visualization
 - Urban and Mobile Computing
 - Usability Research and Services
 - Virtual Characters and Actors











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Graphitech

- 18 Researchers
- Trento, Italy



GraphiTech

- <u>http://www.graphitech.it</u>
- Research areas
 - 3D Geovisualisation, Geovisual Analytics and LBS
 - Computer Graphics
 - Cultural Heritage
 - Digital Educational Games
 - HCI and Advanced Multimodal Interfaces
 - Industrial Applications
 - Shape semantics and descriptors















Hasso-Plattner-Institut

HPI

Hasso

Plattne

- Postdam, Germany
- http://www.hpi.uni-potsdam.de/
- Research areas
 - Computer Graphics Systems
 - Human Computer Interaction
 - Enterprise Platform and Integration Concepts
 - Internet Technologies and Systems
 - Operating Systems and Middleware
 - Business Process Technology
 - Software Architecture
 - Information Systems
 - System Engineering and Modeling
 - School of Design Thinking











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MIVTech

- 25 Staff •
- Panama City, • Panama
- http://www.mivtech.com •
- Application areas
 - Corporate TV
 - Multimedia Graphic Design
 - Information Security
 - Audience Measurement























China partner

 Currently, advanced conversations with a reference Chinese partner are taking place. In the next few months they could be full members of GraphicsMedia.net















Contact

Thank you! **Muito Obrigado!** ¡Muchas Gracias! **Eskerrik asko! Vielen Dank! Grazie Mille!**











