



# NEWS

**Welcome! This is the first edition of the FRONTIERS NEWS, an essential newsletter! In this issue you will find information about recent and upcoming events, the state of the art of our work packages (WP's), other news and recent publications. If you have any suggestions or questions, please let us know and get in touch with Monique Snippers ([m.a.b.snippers@tnw.utwente.nl](mailto:m.a.b.snippers@tnw.utwente.nl)).**

## News from the work packages:

### VIRTUAL LAB

The virtual equipment lab of FRONTIERS is established. The equipment database and web-based service form are accessible online through the FRONTIERS intranet. The monitoring report tool is available. The expertise database is ready as well. Until now IMEC also has the impression that the agreement for sharing equipment is appreciated.

The specific passwords you need for changing or adding information in the equipment database will be distributed to the WP1 Task Force members. Each organization is responsible for the content of his equipment that it brings in within FRONTIERS.

It is now up to the scientists to make something from WP1 since the tools

are available now. If you wish to share equipment with another FRONTIERS partner please read the guidelines first, they can be downloaded through the FRONTIERS intranet.

Succes with the exchange!

For questions/comments concerning equipment sharing, please contact:

Ingrid Reynaert

([Ingrid.reynaert@imec.be](mailto:Ingrid.reynaert@imec.be)) or Carmen

Bartica ([barticca@imec.be](mailto:barticca@imec.be)).

### FRAMEWORK PROGRAM 7

On April 6th the European Commission has adopted the proposal for the upcoming framework program 7 (FP7), starting in 2007. New in this program will be the support for investigator-driven research and the creation of a



**WHERE LIFE SCIENCES & NANOTECHNOLOGY MEET**

European Research Council. As with FP6, a considerable amount of funding will go towards collaborative research. The FRONTIERS structure is providing researchers with a network to initiate new collaborations, which will be helpful for the application process of FP7. Now is the time to take action on those collaborative projects you always wanted to work on! Take advantage of the FRONTIERS program through the virtual lab, the forum and travel funding to obtain those important preliminary results! First calls for proposals can be expected late 2006 or early 2007.

You can find more information on the EU web sites <http://cordis.europa.eu/fp7/> and [http://ec.europa.eu/research/future/index\\_en.cfm](http://ec.europa.eu/research/future/index_en.cfm).

## RESEARCH

As some of you have already heard, I have replaced Jan-Willem Weener as leader of WP2, research. Jan-Willem will keep his other tasks, including general and financial coordination. Since I am also situated at Twente university (biophysical engineering group), the transition should be a very smooth one.



FRONTIERS seems to be moving forward steadily at the moment. Several joint applications for funding have been approved and new collaborations are continuously being set up. Still, I would like to try and push this a little further by initiating more projects and finding more directions for developing collaborations.

The **virtual lab** and the **forum** on the FRONTIERS website might prove instrumental for these tasks. I would like to invite you all to start discussions on the forum on topics that seem interesting collaboration projects for you. Hopefully this forum will stimulate contacts between participants during the periods between research meetings.

If you have any questions, suggestions or comments, please do not hesitate to contact me at [R.J.Vermeij@tnw.utwente.nl](mailto:R.J.Vermeij@tnw.utwente.nl) or +31.53.489.3163.

## EDUCATION: JOINT CURRICULUM

There is now a first version of the joint curriculum. It is realized by employing the existing syllabus at the FRONTIERS partner universities and making selected courses accessible for FRONTIERS students. The joint curriculum in its present form enables students in nano- and life sciences to complement their master level education at their home university with a temporary visit for course work or project work at a partner university.

Students can now apply for the FRONTIERS master thesis project: [www.frontiers-eu.org](http://www.frontiers-eu.org) or [www.mc2.chalmers.se/mc2/frontiers/cur/](http://www.mc2.chalmers.se/mc2/frontiers/cur/).

In short there are project suggestions from the partner universities. The student needs to have an examiner at his/her home university for conducting the project as a visitor at a partner university.

Next to this, there is a first set of guidelines for financial contribution and rules of participation. FRONTIERS can reimburse student traveling costs and extra costs in conjunction with visiting a partner university for taking on FRONTIERS labeled courses and/or master thesis project work. FRONTIERS can also reimburse extra costs at the university in conjunction with hosting a FRONTIERS thesis project. The guidelines are to evolve to higher specificity.

For further questions you can get in touch with Per Lundgren ([per.lundgren@mc2.chalmers.se](mailto:per.lundgren@mc2.chalmers.se)).

## SCIENCE-TO-INDUSTRY

The first FRONTIERS industrial seminar will take place in Göteborg, Sweden, August 24-25. The event will be part of the "Biointerfaces quo vadis". The FRONTIERS network will be present with its own booth, a special posters session

and 3 conference speakers. In order to attract more industrial companies the working group on master classes prepared the so called appetizer “Think small, look deeper” about the advantages and the potential of nanotechnology. Copies have already been distributed amongst the FRONTIERS partners, the document is also available through the FRONTIERS website.

Medimate (Mesa+) is developing a microchip capillary electrophoresis system for the point of care market. This organisation is currently in the spin off process and thereby is supported by our network. Furthermore in order to improve the micro chip Medimate started a collaboration with the Forschungszentrum Karlsruhe.

We are working on the roadmap “Nanotechnology and Life Sciences” and looking for support from our FRONTIERS scientists as the roadmap includes scientific aspects, too.

Currently we are addressing three topics:

- Drug delivery
- Molecular Imaging
- Biochips, Biosensors and Diagnostic techniques.

More topics will follow later.

For suggestions, please get in touch with Holger Winter (hw@centech.de).

## FRONTIERS BOOTH

The FRONTIERS Booth will become available towards the end of July. It has 5 removable prints containing general information on FRONTIERS. The total size is 2.50m wide x 2.23m high. It will be released at the ICN&T conference, July 30- Aug. 4 in Basel (CH), visit the exhibition room and have a look at it!

For more information or if you want to use the booth, get in touch with Monique Snippers (m.a.b.snippers@tnw.utwente.nl or +31.53.489.4504).

## EQUALITY AND DIVERSITY SURVEY

In August 2005, the FRONTIERS Gender Awareness Group carried out the ‘Equality and Diversity Survey’ among all staff members of the FRONTIERS Network of Excellence Program. Overall, the data presents a picture of a relatively content working force, with the majority of respondents in this sample reporting high levels of satisfaction with their employment conditions and career development.

However, the findings did reveal significant sites of gender disadvantage in the workplace and highlighted several areas which require closer attention. In particular, the transparency and effective communication of policies (e.g. regarding recruitment and promotion) to female staff emerged as an area of critical concern. Furthermore, because of the importance of personal networks in both facilitating and constraining career development, ensuring appropriate and effective mentoring for female staff arose as an important consideration. Mentoring was seen to favor males, due to the prevalence of informal male networking and the predominance of men within senior positions.

A further area of concern regards the opportunities women were given to assume leadership positions and to increase their visibility within the workplace, as currently it was found that there are marked gender differences with regards to the allocation of positions of responsibility and authority within the workplace.

The survey also reveals that a number of the problems regarding career development appear to be exacerbated for employees working on temporary or fixed-term contracts, the majority of whom were women. In particular, contract working was associated with low levels of institutional support (e.g. lack of adequate maternity leave and career guidance), lack of opportunities for participation in the workplace and difficulties of combining work with family commitments.

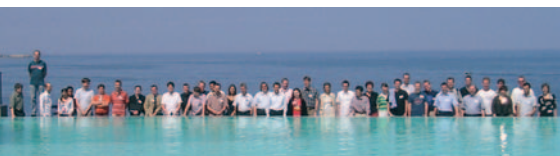
## Events

### FRONTIERS RESEARCH MEETING

From May 15-17, 2006, FRONTIERS organized a fruitful research meeting. 50 Participants within the network traveled to Sicily to discuss and present their research.

The program included many exciting topics such as: nanopores, nanostructured surfaces, nano-tools, materials for tissue engineering and drug delivery. Discussions resulted in numerous exciting new research collaborations.

For presentations, abstracts of keynote lectures and poster abstracts, you can visit: [www.frontiers-eu.org](http://www.frontiers-eu.org)



### "Understanding processes at the molecular level" Lenzerheide (Switzerland), March 19-23, 2006

This year's workshop in Lenzerheide was focused on exchange of FRONTIERS research activities in the field of biochemistry/nano-science at the molecular level comprising topics like:

- Nanosystems, nanomechanics & nano-optics
- Bio-nano sensors
- Single atom and single molecule manipulation
- Nanobiology, nanomedicine
- Bio-molecular interactions and self-assembly
- Imaging of biomolecules, membranes and cells
- Biological motors

All participants tremendously enjoyed the workshop. In the final discussion it was emphasized that the broad range of topics was highly appreciated by the participants. The presence of members of many partners was very stimulating for discussions on joint research topics.

Beginning of 2007 we will again organize a FRONTIERS workshop in the Swiss alps.

More information about the workshop can be found on: <http://monet.physik.unibas.ch/nose/FrontiersWorkshop>



## Future events

### ICN & T 2006

July 30- Aug. 4, 2006, Basel (Switzerland).

Contact person: Christoph Gerber & Hans Peter Lang > [www.icnt2006.ch](http://www.icnt2006.ch)

### BOARD MEETING

4 August 2006, Basel (CH) during ICN&T

### BIOINTERFACES QUO VADIS

August 24-25, 2006, Göteborg (Sweden).

Organization by CeNTech & Chalmers > [www.biointerfaces.se](http://www.biointerfaces.se)

### NANOTEC FORUM 2006

October 4-6, 2006,

Stockholm (Sweden). Contact person:

Staffan Sjödin > [www.nanotecforum.se](http://www.nanotecforum.se)

### ASSESSMENT MEETING

October 23-24, 2006 in Sicily

### ANNUAL MEETING

October 24-26, 2006 in Sicily

For more information: [www.frontiers-eu.org](http://www.frontiers-eu.org)

## COLOFON:

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