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message from the president

First I would like to wish you all a Happy New Year and send my hopes for all success in your proteomic activities in 2010. Secondly, welcome to the second issue of the Bulletin of the European Proteomics Society (EuPA). When we launched the Bulletin in October 2009, we had rather optimistically hoped that the Bulletin could be published on a bimonthly basis. However we soon realised that this schedule was just not possible and we have therefore decided to publish the EuPA Bulletin three times each year – in February, June and October. I hope that this frequency of publication will still be able to keep you abreast of current EuPA activities. Determining our future direction and strategy is of course fundamental to further establishing EuPA as a central representative body for proteomic activity across Europe. Thus, in this issue I would like to summarise some of the discussions and decisions during the recent meeting of the EuPA Executive Committee held in Bodenheim (Germany) on 16/17 December 2009.



The role of our Vice-President, Gyorgy Marko-Varga, is to increase the visibility of EuPA in Europe and beyond, to promote EuPA by interactions with European and world wide acting organisations, and to work with the other EC members to reach current aims and to develop the future strategy of EuPA. At the EC Meeting, Gyorgy outlined his vision and plans for addressing these objectives, including extending EuPA geographically (e.g. to the Baltic and Balkan states), providing seed

funding for networking in new proteomic technologies, intensifying networking within EuPA, promoting educational activities, and initiating public fund raising activities (e.g. EU). Gyorgy is now in the process of establishing a EuPA "think tank" for developing optimal strategies for the development of EuPA.

Education in proteomics is a major EuPA activity, and Garry Corthals outlined the plans of the Education Committee for a range of future courses (liquid chromatography, 2-DE, bioinformatics, mass spectrometry) for 2010 and beyond. Details of these courses will soon be available via the EuPA web site (<http://www.eupa.org/>). The European Summer School in proteomics will again take place in Brixen/Bressanone (South Tyrol, Italy) from 1-7 August 2010, where the emphasis will be on "Proteomics Basics: High-Throughput Data Analysis and Statistics" (<http://www.proteomic-basics.eu/>). The future of the Summer School beyond 2010 is currently uncertain, but it represents an opportunity for EuPA to become more involved in this important educational activity.

Another major EuPA activity is the organisation of conferences and communication activities. Concha Gil, Chair of the Conferences and Communications Committee, reported that the new EuPA journal, *Journal of Proteomics*, is running smoothly. The journal will be published in 12 issues in 2010 and will receive its first impact factor in the mid-2010. An excellent schedule for future EuPA Annual Scientific Congress events is now in place as detailed later in this Bulletin. These include the 4th Annual Congress (Estoril, Portugal, 23-27 October 2010), the 5th Annual Congress which will be held jointly with the 10th HUPO Annual World Congress (Geneva, Switzerland, 4-7 September 2011), and the 6th Annual Congress (Glasgow, Scotland, UK, 3-6 June 2012). We are already planning future EuPA Congress activities and calls for proposals for the 7th Congress (2013) and the 8th Congress (2014, again to be a joint event with HUPO) will be announced soon.

Funding is a critical issue too for the development and expansion of future EuPA activities, and it has been proposed that the Chair of the Funding Committee, Guenter Thesseling, will appoint suitable members to increase the operative power of the Committee. Thierry Rabilloud, Chair of the EuPA/HUPO Relations Committee, reported that HUPO will amend its bylaws in such a way as to allow representatives of regional Proteomics Organisations, including EuPA, to become members of the HUPO Council. This is likely to be implemented in time for the 2011 EuPA/HUPO meeting in Geneva and will ensure that EuPA can play a formal role in the development of proteomic activities worldwide.

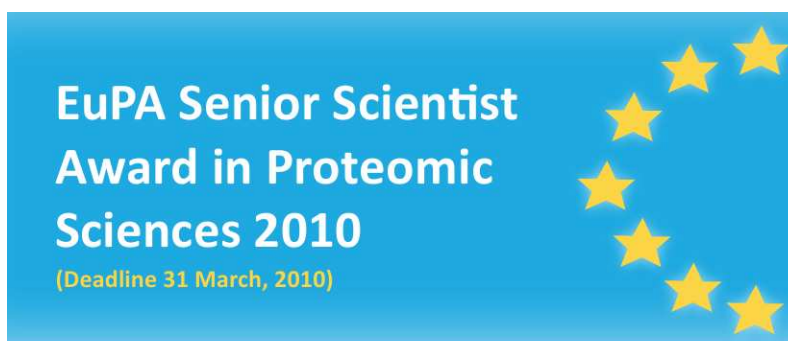
Finally, I am pleased to be able to inform you that agreement has been reached to launch an International Tutorial Programme, this being a cooperation between selected journal publishers in the field of proteomics and HUPO and its affiliated regional and national organisations, including EuPA. The Tutorial Programme is headed by Peter James (University of Lund, Sweden) and its overall level is aimed at Masters/PhD level students with a good basic training in biology, biochemistry and mathematics / statistics. The tutorials, which will be published in the following journals, *Journal of Proteome Research*, *Journal of Proteomics*, *Molecular and Cellular Proteomics*, and *Proteomics*, will consist of a review/teaching article with an accompanying talk slide presentation for classroom teaching. The tutorial program will cover core techniques and basics as an introduction to scientists new to the field. A second series of more advanced topics focussing on the application of proteomics techniques to biological problem solving will be launched at a later date

after the basic series is completed. The entire series of articles and slides will be made freely available for teaching use at the Journals and Organisations home-pages. Further details can be found at the Tutorial Programme web site: <http://www.proteomicstutorials.org/>.

I hope that you will find this second issue of the EuPA Newsletter both interesting and useful in keeping you abreast of the activities of EuPA and its Member National Societies. The Newsletter is available on-line via the EuPA web site (<http://www.eupa.org/>). It is also distributed electronically to all National Societies which are Members of EuPA, for distribution to their individual members and for posting on their own society web sites.

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eupa senior scientist 2010 award in proteomics sciences



The European Proteomics Association (EuPA) **invites nominations** for the EuPA Senior Scientist Award in Proteomics.

- This annual Award is intended to acknowledge achievements in the field of proteomics in Europe.
- The Award will consist of a diploma and an honorarium of 5000 €.
- The winner will be announced at the EuPA meeting, where he/she will give a lecture. The registration fee will be waived.
- A biographical sketch of the winner will be published in the Journal of Proteomics and in other Proteomics Journals and will be posted on the EuPA website.
- Candidates must be a member of a national European proteomics society and nominated by any European proteomics society.
- The EuPA Award Panel will be composed of the EuPA executive committee.
- Nominations for the EuPA Senior Scientist Award in Proteomics should be sent to [Dr Garry Corthals](mailto:garry.corthals@btk.fi) (garry.corthals@btk.fi) by **31 March 2010**.



More information on the website <http://www.eupa.org/>

from the committees ¹ - conference and communication committee

First of all we would like to thank the previous Coordinator of the CCC Committee, Jean-Charles Sanchez and the members of his team for the terrific work realized during the last three years. Between their main achievements are the development of the EuPA web page, the coordination of the Annual EuPA meetings, and the creation of the official Journal of our Society, the Journal of Proteomics. Our main goal is to continue this important work.

The new Committee is currently composed by Concha Gil (Coordinator, Spain), Christine Hoogland (Co-coordinator, Switzerland), Luca Bini (Italy), Juan Calvete (Spain), Jesus Jorrin (Spain), Gyorgy Marko-Varga (Sweden), Deborah Penque (Portugal), and Jean-Charles Sanchez (Switzerland).

The CCC-Committee was established to promote the diffusion and exchange of information among people in Europe interested in Proteomics by any appropriate means (meetings, workshops, discussions, website, news, publication, etc.).

The major missions of the EuPA Conference & Communication Committee (CCC) are:

- Coordination between EuPA General Council and Proteomics national societies for EuPA congress organization
- Coordination of EuPA workshops
- Coordination of EuPA Web site development and maintenance
- Coordination of EuPA communication projects including flashes, Newsletters and Journal.

EuPA Conferences

Our Committee has prepared a document about "Endorsement of a Conference as a Annual EuPA meeting". Several comments from EuPA members have been received and we are preparing a revised version of the text (to be published in the next EuPA bulletin). Next EuPA conferences will take place as following: 2010 in Estoril (Portugal), 2011 in Geneva (Switzerland), 2012 in Glasgow (Scotland), see details in page "next EuPA events". The call for the 7th EuPA Conference in 2013 will be released next month setting the deadline for applications by the end of July. In 2014, the 8th EuPA Conference will be again a joint EuPA/HUPO meeting, more information will follow in due time.

EuPA Website

We would like to remind people that all the tools are available to include any information in the EuPA website in a convenient way. This means that through simple web forms, any scientist can submit its own advertisement like job offer, meeting, workshops, and course. In addition, our Committee is prepared to assist in the setup of a National Proteomics Society webpage. Finally, we think that the diffusion of the Educational Activities is very important and we are going to work very close to the Education Committee to achieve this.

EuPA Newsletter

The first issue of the EuPA bulletin released in October 2009, was highly appreciated

¹ Issue 1 from October 2009 included a report of the Education and EuPA-HUPO Committees, please report to this issue for further details.

and very well accepted. Many thanks to Jesús Jorin and Christine Hoogland for their tremendous work. We encourage people to send information regularly for inclusion in the bulletin. We hope that this newsletter will be useful to EuPA members.

Journal of Proteomics

We would like to thank Juan Calvete for his important work. The Journal is having a good acceptance within the Proteomics Community. For this year, 12 issues are in preparation together with some special editions.

Concha Gil

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eupa members activities

- **swiss proteomics society (SPS)**

The Swiss Proteomics Society (SPS, <http://www.swissproteomicsociety.org/>) was among the first European not-for-profit associations to be created to promote research and education in the field of proteomics. Since 2001, the SPS organizes a bi-annual scientific congress in one of the main cities of Switzerland gathering more than 200 national and international participants. In the intervals, odd years, the SPS assembles the proteomics community around different activities such as the Training Initiative where Swiss laboratories graciously open their doors to share their expertise in different proteomics areas. Many other small but priceless activities are carried out by the SPS. The SPS gives financial help to Swiss PhD students to attend international congresses and to foreign students to attend the SPS scientific meetings. The active and lively SPS website publishes job and training offers, CV for those prospecting jobs, list of courses, and much more. Finally, the SPS' Digest has become an essential and precious aid to the scientific community. Every month, more than 600 scientists receive for free an email-alert containing a summary of articles from more than 100 journals organised into meaningful categories. All these tiny and giant activities are possible thanks to the time and efforts of the members of the SPS executive committee and few volunteers.

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- **spanish proteomics society (SEProt)**

The Spanish Proteomics Society (SEProt; <http://www.cbm.uam.es/seprot/>) was firstly conceived in the superb environment provided by the pioneer Proteomics Workshop hosted by the University of Cordoba in 2003. A year later, in April 2004, the Society was formally founded in Valencia. The primary objective of SEProt is to contribute to the development of Proteomics in Spain according to a

multidisciplinary and international conception. With this idea, our Society has developed different projects trying to integrate interests of all sectors in proteomics: technological, scientific and educational, in close collaboration with other societies and proteomics organisations. Since 2005 three SEProt meetings have been celebrated, two of them conjointly with the EuPA (Valencia 2007) and Latinamerican HUPO (Pamplona 2009; the presentations are available at <http://www.pharmaimage.tv/categoria/biotecnologia>) respectively. In addition to the biennale meetings our junior researchers organize the workshop for young proteomists every two years, alternating with the SEProt meeting. The second edition will take place in Córdoba 11-12 February next year (<http://www.jjip.fundecor.es/>). One of the priorities of SEProt is the dissemination of proteomics knowledge through the promotion and active participation in national and international educational courses as well as facilitating the mobility of scientists, making special emphasis in ensuring the access of junior investigators to these activities with our fellowship program.

Proteomica, the proteomics journal edited mainly in Spanish is, perhaps, one of our most beloved initiatives. Far from trying to compete in the already inflationist market of proteomics journals, Proteomica aims at being consolidated as a natural vehicle for the transference of proteomics information between Spanish-speaking proteomics communities. This project may consolidate new bridges to shorten the distance separating the Latin-American and European proteomic sides of the Atlantic Ocean. In accordance with this feeling, an idea that has been under discussion in the last couple of years and will be materialized likely the next year, is the edition of a proteomics monography in Spanish, providing monitors with the historical, technical and conceptual basis of this young science.

The number of members of the SEProt has been growing during these years to reach the current figure of 209, which represents about a 10% of the biochemistry community in Spain. Our Society is greatly honored for having John Fenn, Michael Karas, Franz Hillenkamp and Peter Roepstorff, as Honorary Members. It is a privilege having among us the scientists who not only witnessed but also made possible with their seminal works, the transition from protein chemistry to proteomics and the development of its applications in biology and biomedicine.

Juan J. Calvete & Fernando J. Corrales

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Foundation of the SEProt (Valencia, 2004)



The new Executive Committee, elected during the II Proteomics Meeting (Pamplona, February 2009)

By definition, COST is an intergovernmental framework for European Cooperation in Science and Technology, allowing the coordination of nationally-funded research on a European level. COST contributes to reducing the fragmentation in European research investments and opening the European Research Area to cooperation worldwide.

Rather than funding research itself, COST brings together research teams in different countries working on specific topics, supporting networking, conferences, short-term scientific exchanges and publications.

In the case of this action, the main objective is improvement and exchange of scientific knowledge and technology in plant proteomics through the creation of a network between European proteomic scientists. The action officially starts with the first MC meeting (in March 2007) and will end on 27/03/2011.

In total, 25 countries have signed the Memorandum of Understanding: Austria, Belgium, Bulgaria, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Ireland, Italy, Lithuania, Luxembourg, Netherlands, Norway, Poland, Portugal, Serbia, Slovakia, Slovenia, Spain, Sweden, Switzerland and United Kingdom.

Within this frame, meetings or workshops are regularly organized to gather the group on two main ideas: the techniques for plant proteomics and the applications of proteomics to plant field. Another important taskforce is the use of the Short-Term Scientific Mission (or STSM) that are used to 'exchange' young scientists between laboratories, either to provide them with an access to a technique they don't possess in their own lab/university or to teach them new techniques. These exchanges are based on collaborations between different countries.

Training schools are also organized for specific subjects (e.g. Blue-Native PAGE, DIGE, Mass Spectrometry) by laboratories of the network.

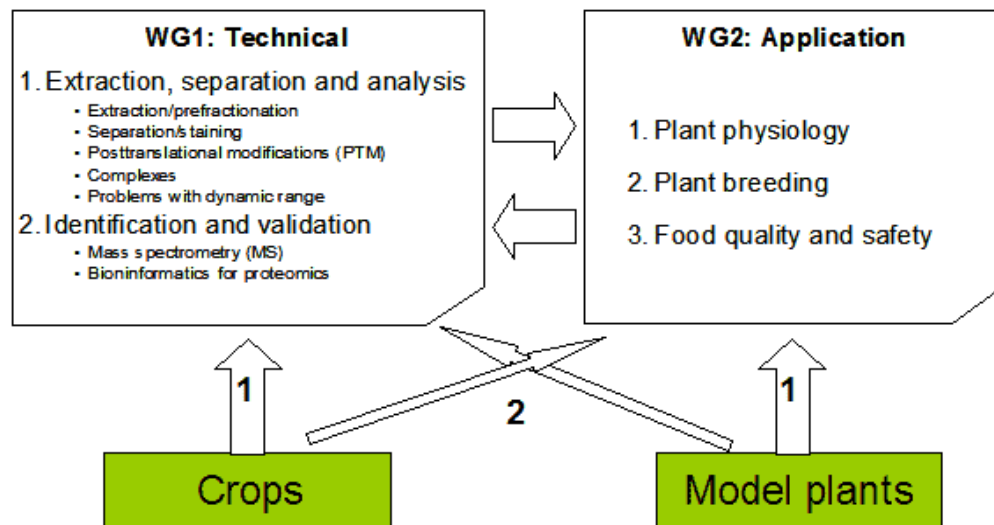
Within the action itself, two working groups (WGs) have been identified: a first WG will deal with the technical aspects inherent to plant proteomics. From the start, a large diversity of crops (not only the well known model plants such as Arabidopsis, Medicago or Populus) will be involved since for most such plant models many efficient techniques have already been developed. For more sophisticated techniques model plants will still be used. The second WG will focus more on the implementations. The latter includes proteomic tools in fundamental plant biology (e.g. tolerance to environmental changes), as well as in agronomy (e.g. characterizing and exploiting genetic diversity of crops or forestry species).

In the WG1, 2 main axes of research can be defined:

- Extraction, separation and analysis
- Identification and validation

Objectives of WG1

- Develop efficient extraction protocols for a wide variety of plant species/tissues with special emphasis on membranes, hydrophobic proteins and subcellular compartments,
- Evaluate the advantages of the different staining methods and propose standardized methods,



- Develop user-friendly methods for a rapid characterisation of PTMs and quantification of the different isoforms in the same sample and in different samples,
- Develop and improve protocols that can determine interactions between proteins or the structure of protein complexes,
- Improve the dynamic range to detect less abundant proteins,
- List and evaluate the existing tools for bioinformatics,
- Recommend a set of evaluated software or/and propose new developments when no satisfying solutions were found,
- Develop tools for the database-independent identification of proteins from MS data, and de novo sequencing.
- Compare different methods of MS-based protein quantification (e.g. ICAT, SILAC, iTRAQ, AQUA, direct methods of quantification without the aid of stable isotopes) and define their different domains of application,
- Define the best strategy for protein identification in species whose genomes were not extensively sequenced.

In the WG2, one can distinguish applications in the following fields:

- Plant physiology
- Plant breeding
- Food quality and safety

Objectives of the WG2

- Communicate and disseminate knowledge of proteomics applications in diverse fields of plant research,
- Integrate of knowledge at several levels from physiology, biochemistry, genomics, microbiology, breeding, growing and (industrial) processing,
- From black numbers to green practice: bidirectional communication of plant proteomists with commercial partners, like breeders, growers, food processors, etc. Identifying needs and opportunities for future collaborations (this may be organised in dedicated workshops),
- Investigate possibilities for standardisation and linking of multiple datasets generated within the community (as far as publicly available) enabling meta-level data mining and data integration.

If you find yourself interested by taking part to this action, please contact either

your national coordinator or the action chair. More information about our activities, meetings, STSM, training schools, WG and so on can be found on our website: <http://www.costfa0603.org/>

Jenny Renaut

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Participants at the II Meeting (Cordoba, Spain, February 2008)



Significant growth of proteomics in central and eastern Europe - 3rd central and eastern european proteomic conference report

The popularity of proteomics for the study of biological systems relates not only to promising developments for the identification of potential new drugs targets for the treatment of various diseases but also to the understanding of the structure and function of each protein and the complexities of protein-protein interactions. Such studies are critical for developing novel tools using specific protein biomarkers to help diagnose and monitor a plethora of diseases which currently plague mankind.

The 3rd Central and Eastern European Proteomics Conference (CEEPC) was held in Budapest, Hungary, from the 6th to 9th October 2009. The meeting was the third in a series of proteomic conferences to be held in this region of Europe with the key aim of strengthening links with scientists from Central, Eastern Europe as well as International groups world-wide and to discuss and debate all aspects of proteomics. It was attended by more than 150 delegates and many proteomic topics including biomarkers discovery, post-translation modifications, clinical proteomics as well as new proteomic technologies which may facilitate future progress were discussed over the three days. The Conference commenced with presentation by Helmut E. Meyer (Ruhr-University of Bochum, Germany) with a lecture on 'High performance proteomics – a successful way to biomarkers' which discussed how high performance proteomics can lead to reliable results in discovering new biomarker candidates for liver cirrhosis. Stephen R. Pennington (UCD Conway Institute, Ireland) also focused on biomarker discovery and

developments in psoriatic arthritis and prostate cancer, emphasising the potential of multiplexed quantitative protein measurements using multiple reaction monitoring. Silvia Surinova (ETH Zurich, Switzerland), delivered an excellent talk on detection of potential colorectal cancer markers in patients' plasma using an interesting but complex strategy for such marker detection. Roman A. Zubarev (Karolinska Institute, Sweden) discussed the developments in Pathway Search Engine for expression proteomics and its applications in tissue samples. This was followed by Agata Malinowska (IBB PAS, Warsaw, Poland) who presented high-throughput LC-MS approach for analyses of synaptosomes from mouse models of Alzheimer's disease. John Amster (University of Georgia, USA) followed up with a very interesting talk on the development of new tools for proteomic analysis of prokaryotes but based more on accurate mass measurement. Irena Selicharova (AS CR Prague, Czech Republic), alluded to difficulties involved in a search for changes in proteomes of breast epithelial cells of women inheriting germline mutation in BRCA1 compared to breast tissue of women without this mutation. This study was aimed at discovering possible pre-neoplastic changes in protein levels that may related to predisposition to breast cancer in women.

The second day started with talk from Helena Skalnikova (AS CR, Libechov, Czech Republic) who introduced an exciting piece of work on neural stem cells and related cell based therapy in spinal cord injury. The signaling protein and phosphoprotein changes from motor neurons and sensor neurons were identified at different time intervals after injury. Tamas Janaky (University of Szeged, Hungary) presented an interesting talk on chemical frames as references for protein quantification in proteomics. His results based on distinction of chemical and physical properties of the proteins were correlated to quantification of proteins. William J. Griffith's (Swansea University, UK) presentation entitled 'Brain Proteomics' discussed a large study with interdisciplinary approaches in studying expression of enzymes involved in cholesterol metabolism. Jozsef Tozser (University of Debrecen, Hungary) presented a fascinating talk on proteome analysis of human tears. Tozser presented human tears as an unusual and difficult but non-invasive starting material from patients with diabetic retinopathy, for the progression of the disease by looking at tear proteins at specific time points. Rudolf Oehler (Medical University of Vienna, Austria) discussed the identification of antibodies against non-HLA antigens in chronic kidney rejection and demonstrated that anti-non-HLA antibodies are directed against a small number of specific protein isoforms. Daniela Schmid (Max Planck Institute, Jena, Germany) focused on characterisation of sex-related proteins in *S. lomentaria*, a species of Brown Algae. Among many fascinating talks on the last day of the meeting was a presentation from Guenter Allmaier (Vienna University of Technology, Austria), who presented the peptidome and proteome analysis of snake venoms. The importance of understanding these biological fluids is essential as there are possible applications of these compounds in pharmaceuticals, development of alexipharmic agents and / or in evolution of allergenicity. Karel Bezouska (AS CR Prague, Czech Republic) delivered an entertaining talk on the identification of surface oligosaccharide profiles responsible for sensitivity of tumor cells for natural killing as well as for the ability of tumors to eliminate the killer lymphocytes – better elaborated as 'how to kill the killer'.

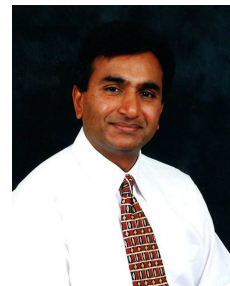
The Conference concluded with a closing lecture from Ron M.A. Heeren (FOM-Institute for Atomic and Molecular Physics, Amsterdam, Netherlands) who presented developments in imaging mass spectrometry. The conference was a great success and already interest has turned to the 4th CEEP Conference which

will take place in Vienna, Austria in the beginning of September 2010. It is envisaged that more participants from Central and Eastern Europe as well as other countries will attend to share their findings in Proteomics.



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Institute of Animal Physiology and Genetics
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Suresh Jivan Gadher

Millipore Bioscience, St. Charles, Missouri,
USA

breaking news

Online videos on Phosphoproteomics

The International Symposium on Phosphoproteomics and Cell Signalling, held in Madrid in March 2009, and organized by the Ramon Areces Foundation, has now a new web page with videos of the conferences. More details at: <http://proteopathogen.dacya.ucm.es/areces>

SPS' Digest - Issue 65, 31-Dec-2009

The 65th Issue of SPS' Digest has been released by the Swiss Proteomics Society. It contains the SPS selection of proteomics articles gathered from the scientific literature during the month, currently 722 articles in 311 journals. More details at: <http://www.swissproteomicsociety.org/digest/2009/issue65.html>

upcoming events

Perspectives in Clinical Proteomics 2010

2 day conference sponsored by Wellcome Trust & EBI www.wellcome.ac.uk/conferences

Training workshop: 17-18 March, 2010 - Conference: 18-19 March, 2010
https://registration.hinxton.wellcome.ac.uk/display_info.asp?id=123



Deutsche Gesellschaft für
Proteomforschung e.V.

May 26th -28th, 2010 - Hannover, Germany
Workshop "Membrane proteomics by Blue-native
PAGE"

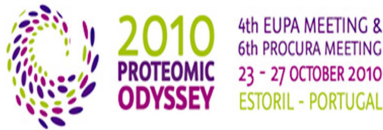
<http://www.gartenbau.uni-hannover.de/pflanzenproteomik.html?&L=1>

7th Joint **BSPP/EBI** Proteomics Meeting
Proteomics: From Qualitative to Quantitative
13- 15 July 2010
Wellcome Trust Conference Centre, Hinxton, **Cambridge, UK** EMBL-EBI

More information at: <http://www.bspp.org/>



September 6-8, 2010 – Marseille, France
27th congress meeting of the French Proteomics Society
<http://map.univmed.fr/sfeap2010/>



October 23-27, 2010 – Estoril, Portugal
4th EuPA Annual Scientific Meeting – 6th PROCURA meeting
<http://eupa2010.fc.ul.pt/>

next eupa events

September 3-7, 2011 – Geneva, Switzerland
10th HUPO World Congress – 5th EuPA Annual Scientific Meeting – 8th SPS scientific meeting
<http://www.hupo2011.com/>



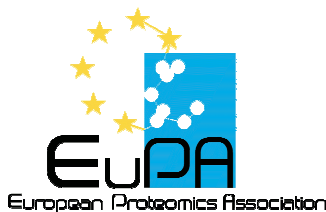
June 3-6, 2012 – Glasgow, Scotland
6th EuPA Annual Scientific Meeting – 9th Annual BSPR meeting
<http://www.bspr.org/>



about this bulletin

This bulletin is the official newsletter of the European Proteomics Association. It is a quarterly (February, May, August, November) online publication edited by the EuPA Conference and Communication Committee. Through short articles it aims at being the vehicle for the dissemination of the EuPA and the different Proteomics National Society activities and initiatives, its committees, and representatives. It also expects to be a forum for discussion and ideas exchange on all areas of proteomics. It may contain information on "who is who in proteomics" (research groups, scientists), books, papers, databases, and announcements of meetings, courses, thesis and job offers.

You are more than welcome to contribute to this bulletin content, please send your contribution by **May 15th** to be included in the next issue.



<http://www.eupa.org/>

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