

VPH Concertation Day

Charlemagne building, 170 Rue de la Loi (Wetstraat), BE-1049 Brussels, Belgium
22.10.08

- 8:45 – 9:30** - **Registration**
- Morning session: Rm S4, Durieux (first floor)*
- 9:30 – 9:50 - Welcome from the EC: Past, present and future of VPH in the EC Framework funding programme
- 9:50 – 10:00 - Introduction of Project coordinators by name/project only.
- 10:00 – 10:30 - Introduction from the VPH NoE: Aims and objectives of the project and the VPH concertation effort.
- 10:30 – 10:45** - **Coffee break**
- 10:45 – 12:00 - Presentations on results achieved by selected FP6 projects.
- SEALIFE:** Albert Burger (ab@macs.hw.ac.uk)
INFOBIOMED: Ferran Sanz (fsanz@imim.es)
Violab: Peter Slood (slood@science.uva.nl)
HealthChild: Joerg Freund (joerg.freund@siemens.com)
- 12:00 – 12:15 - Morning summary from VPH NoE: overview of new FP7 projects and links to FP6 work.
- 12:15 – 13:45** - **Lunch (networking - standing buffet)**
- 13:45 – 16:00 - Parallel focussed workshops coordinated and led by VPH NoE representatives.
- Workshop 1:** Clinical and Industrial Applications of VPH (Rm. S4, Durieux)
Workshop 2: A Perspective on Data and the VPH Initiative (Rm. S1 Mansholt)
Workshop 3: Development of a Common EU training framework (Rm. S2 Jenkins)
Projects are encouraged to send at least one representative to each workshop
- 16:00 – 16:30** - **Coffee break**
- Final session: Rm S4, Durieux (first floor)*
- 16:30 – 17:30 - Summary session: 15 minutes per workshop on key challenges for the VPH research community, with concluding statement on VPH concertation from EC.

<http://www.vph-noe.eu>



VPH Concertation Day Workshop 1: Clinical and Industrial Applications of the VPH

What issues, of concern to VPH Initiative projects and researchers, will be covered in workshop 1?

This workshop will address the creation of sustainable collaborations between academia, the biomedical industry, as well as clinicians. In particular the various aspects of securing buy-in and acceptance of developing technologies by the designated user community will be discussed, lead by a panel of experts with backgrounds ranging from bioinformatics to imaging as well as anatomical modelling.

How will this issue be presented in workshop 1? Who will I hear from and what will I learn about the VPH NoE and/or other VPH-I/related projects?

This event will take the form of 4 consecutive sessions that will cover key areas of interest, namely: clinical involvement in and acceptance of the physiome approach in medical practice; computational clinical systems and how to integrate validation and verification at the outset of a project; and VPH and industry - specifically how to forge real and lasting connections between VPH researchers and industry, and the identification of realistic targets in terms of industrial exploitation and time-to-market. Finally, workshop participants will be introduced to the ELIXIR project.

What will I be expected to contribute, on behalf of my VPH Initiative project, to workshop 1?

As part of three main discussion sessions, participants in this workshop are encouraged to share their project's experiences relating to the academia-industry interface, and to highlight both real success stories and recurrent pitfalls. Discussion will be driven by a set of questions posed by each speaker at the end of their presentation. Your responses to these will help to identify tangible steps the VPH NoE could take in supporting and promoting acceptance of emergent computational methods. A key overriding question to answer, as part of this workshop, is what strategy should the VPH NoE adopt to assist you with the wider application and dissemination of your work within clinical/industrial communities?

What do workshop 1 organisers expect to be the outcome of this event?

As a result of this workshop we expect to:

- Highlight the key challenges in industrial and clinical application of developing computational methods,
- Discuss/identify means to promote cultural shifts in clinical practice to integrate further innovative engineering and predictive solutions emerging from the academia, along with cultural shifts in academia to integrate industrial standards in validation and verification,
- Discuss/identify means to encourage pre-competitive collaboration and data sharing between industry and academia: poll for interest in EBI/VPH Industry Programme workshop
- Discuss/identify strategies for streamlining model validation and certification across the VPH Initiative
- Establish industry priorities in the development of medical devices and diagnostic tools.

The workshop organisers would like to identify the appropriate instruments to pursue actions of most interest to delegates (further VPH workshops, industrial/clinical focus groups, joint strategy development etc).

**For more information contact Bernard de Bono
bdb@ebi.ac.uk**



Timetable for Workshop 1

Workshop Introduction, Alex Frangi 5 mins

Concertation activity: identification of key challenges, Alex Frangi 5 mins
The rationale behind this workshop will be explained, including overview of challenges inherent in the creation of sustainable collaborations between academia, the biomedical industry and clinicians.

Session 1

Clinical involvement in and acceptance of the Physiome approach, Serge Van Sint Jan
This session will address the challenge of promoting cultural shifts in clinical practice to integrate further innovative medical engineering, diagnostic and predictive solutions emerging from VPH research. 10 mins

Follow up break-out discussion around 5 key questions 15 mins/5 mins report back

Session 2

Computational clinical systems, integrating validation and verification from day one, Steven Manos 10 mins
This session will involve discussion around how VPH researchers can implement validation strategies from the onset of a project to help the process of clinical validation and verification, and how to establish accepted standards within academic research settings.

Follow up break out discussion around 5 key questions 15 mins/5 mins report back

Session 3

VPH and Industry, Alejandro Frangi 10 mins
This session will address questions including: how to forge connections between VPH researchers and industry? What are realistic targets in terms of industrial exploitation and time-to-market?

Follow up break out discussion around 5 key questions 15 mins/5 mins report back

Session 4

The ELIXIR project, Dominic Clark 10 mins
This talk will provide an introduction to the ELIXIR project, the aim of which is to construct and operate a sustainable infrastructure for biological information in Europe to support life science research and its translation to medicine and the environment, the bio-industries and society.

Questions ----- 5 mins

Summary and next steps discussion, Alex Frangi 15 mins
The workshop discussions will be summarised and participants will be able to contribute to the potential next steps in approaching the challenge of the creation of sustainable collaborations between academia, the biomedical industry and clinicians.

Chair: tbc
Rapporteur: tbc



VPH Concertation Day Workshop 2: A Perspective on Data and the VPH Initiative

What issue(s), of concern to VPH Initiative projects and researchers, will be covered in workshop 2?

This workshop will provide an interactive forum for attendees to discuss aspects of data and its management within the VPH. The workshop will consider types of data, ethical and other challenges and potential methods that may facilitate future interoperability. We will seek ways to tackle these challenges collectively across the VPH community.

How will this issue be presented in workshop 2? Who will I hear from and what will I learn about the VPH NoE and/or other VPH-I/related projects?

This workshop will commence with short presentations describing the VPH NoE's aims and objectives for the VPH ToolKit, the rationale behind this workshop (based on the online concertation event) and an update on the NoE's requirements and technology assessment exercise (RTAE) summarising identified challenges, and the technical requirements and capabilities of the surveyed VPH FP6 and FP7 projects. The workshop will use this as a springboard to seek input relating to particular aspects of the data challenge (ontologies, ethics, etc.) and consider possible solutions in the form of markup languages and virtualisation that might support the VPH ToolKit endeavours. This will include aspects of community support, such as complementary technologies, required key services and training needs.

What will I be expected to contribute, on behalf of my VPH Initiative project, to workshop 2?

We would expect participants to reaffirm and expand upon our interpretation of the data and implementation concerns expressed by responses to the RTAE questionnaires. This is an opportunity for participants to contribute ideas, strategies, and technologies that can help to solve data challenges associated with the VPH.

What do workshop 2 organisers expect to be the outcome of this event?

As a result of this workshop we expect to:

- Highlight the breadth and depth of the data-related challenges in VPH
- Confirm the key objectives and initial directions for the NoE data strategy development subgroup of the NoE ToolKit development team
- Highlight the potential benefits of markup languages and ontologies to realise these objectives.

We also wish to confirm what will be required by the community to utilise these methods.

The workshop organisers would like to identify the appropriate instruments to pursue actions of most interest to delegates (further VPH workshops, data focus groups, joint strategy development etc).

**For more information contact Sharon Lloyd/John Fenner
Sharon.Lloyd@comlab.ox.ac.uk/ j.w.fenner@sheffield.ac.uk**



Timetable for Workshop 2

Introductions

VPH Toolkit introduction, Sharon Lloyd 5 mins
An overview will be presented showing the key aims and objectives of the ToolKit workpackage in the VPH Network of Excellence project.

Why Data? Sharon Lloyd 5 mins
The rationale behind this workshop will be explained, including the feedback from the online concertation activity and the identification of the key challenges for implementation of a ToolKit.

What has the Requirements and Technology Assessment exercise taught us so far? Sharon Lloyd 5 mins
A summary of the initial results will be presented, focusing on the identified needs and capabilities from FP6 and FP7 VPH projects for implementing mechanisms for data use and management.

Interactive sessions 60 mins

- **Focus Session 1** - data types [John Fenner]
This interactive session will enable participants to contribute to an analysis of the breadth of the data problem.
- **Focus Session 2** – ontologies [Bernard de Bono]
This session will explain the concepts behind ontologies and the drive towards a human anatomy ontology
- **Focus Session 3** - data and ethics [Keith McCormack]
Participants will contribute to an analysis of the ethics complexities for the use of clinical data, and discuss ways forward.

Focused presentations

The data challenge and virtualisation, John Fenner 20 mins
This session will enable the concept of virtualisation of data to be discussed and for participants to comment on the virtualisation approaches and potential impacts.

The data challenge and markup languages, Jonathan Cooper 20 mins
The concepts of markup languages and XML will be presented in a non technical way to open a discussion on the potential benefits of such an approach and the support, training and services which would be required to benefit from such approaches.

Summary and next steps discussion, Sharon Lloyd/John Fenner 20 mins
The workshop discussions will be summarised and a participants will be able to contribute to the potential next steps in approaching the data challenge for the Network of Excellence and the VPH community.

Chair: tbc
Rapporteur: tbc

VPH Concertation Day Workshop 3: Development of a Common EU training framework

What issue(s), of concern to VPH Initiative projects and researchers, will be covered in workshop 3?

The broad aim of this workshop is to address two key issues for the VPH Initiative. Firstly, we will consider VPH training needs. This will include; current and future profiles of scientists working in the field, education and training needs and accreditation of education/training, etc. Specific examples of areas to cover are:

- Identification of areas where there are skills shortages or areas which are poorly addressed by existing postgraduate training.
- The conflicting demands of multidisciplinary training and how to approach the different challenges faced by students with life science and physical science backgrounds.
- How to develop a system of quality assurance for VPH courses and issues of accreditation/professional qualifications.

Secondly, we will consider issues of dissemination and networking by referring to the relevant implementation aspects of the VPH Initiative and how best to emphasise its usefulness within various sectors.

How will this issue be presented in workshop 3? Who will I hear from and what will I learn about the VPH NoE and/or other VPH-I/related projects?

This workshop will involve three brief presentations on the above issues from VPH NoE representatives, after which we will subdivide the group into smaller discussion groups.

We expect to have the opportunity to explore the points of view of other VPH related projects on these issues according to their individual experience and their appreciation of future needs.

What will I be expected to contribute, on behalf of my VPH Initiative project, to workshop 3?

The various members participating have a concrete experience based on their practice that can be shared. Some of us may refer more to the general education aspects while others have a expertise that allows them to evaluate what future needs may be in the various domains involved. More specifically, issues you may be able to contribute to include:

- An overview of any training issues which have been encountered during your project
- Feedback on employment prospects for junior researchers trained in the course of the project
- Identification of future training needs
- Training opportunities which could be shared with other VPH projects

What do workshop 3 organisers expect to be the outcome of this event?

As a result of this workshop we expect to have:

- A clear identification of the spectrum of training requirements for current VPH projects
- A steer on whether accreditation/professional qualifications are perceived as valuable and whether they should be pursued in the short, medium or long-term if at all.

The workshop organisers would like to identify the appropriate instruments to pursue actions of most interest to delegates (further VPH workshops, training/dissemination focus groups, joint strategy development etc).

For more information contact Carlos Martin
Carlos.Martin@upf.edu



Timetable for Workshop 3

Introductions

Introduction to Workshop VPH Training, Dissemination and Networking, Bart Bijmens

10 mins

Focused presentations 35 mins

- **What is the ideal profile of a person that I want in my lab?** [Peter Kohl]
- **Potential training paths: Is accreditation important? Is there a role for a VPH ‘professional qualification’?** [Pat Lawford]
- **The VPH Initiative: from concept to reality** [Philippe Rohou]

Discussion session 50 minutes

For this section workshop participants will be divided into small groups, according to the previous topics. Discussions will be lead by an NoE representative and centre around a set of questions, per topic.

- **What training/background do you need?** Lead by Bart Bijmens
- **VPH related post graduated training and how to organize it in the EU.** Lead by Margarita Zachariou
- **How do we spread the word on VPH?** Lead by Tara Chapman/Philippe Rohou

Feedback and conclusion

30 mins

Feedback from discussion groups on each thematic area will be presented by discussions leaders (10 mins each)

Summary and next steps discussion, Bart Bijmens

10 mins

The 2 hour workshop discussions will be summarised and a participants will be able to contribute to the potential next steps in developing a common EU VPH training framework

Chair: tbc

Rapporteur: tbc

