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# HORIZON 2020

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E-mail: [cordis-helpdesk@publications.europa.eu](mailto:cordis-helpdesk@publications.europa.eu)

Editorial coordination  
Gyn Nilsson

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# Knowledge, funding and progress towards a healthy Europe in 2020

Full credit to the EU for its Nobel Peace Prize nomination marking six decades of promoting peace and reconciliation. But while peace reigns between nations, there is still a war raging in our societies: a battle for Europe's health. Cancer, diabetes, cardiovascular diseases, HIV or Alzheimer's are the enemy of present and future generations. But how can we fight them?

Just like any war, knowledge is key. And it stands to reason why it was chosen as the major theme of the World Cancer Day, under the tagline 'Cancer – Did you know?' In Europe, the Commission pursues a similar objective; with its Public Health Strategy, it aims to spread information. Identifying human health risks, collecting and sharing data, and exchanging best practices pave the way to promising research. Eventually, it will lead to more healthy lifestyles and new treatments.

Money is another of the sinews of war. In the proposal for Horizon 2020, a total of EUR 8.5 billion was set aside to tackle health, demographic and well-being challenges, up from EUR 6.1 billion under FP7. Scientists will be able to pursue their efforts with simpler rules, reducing the time for proposal to grant and more support for market activities.

What about continuity? As we write, about 50 % of health-related FP7 projects are on going, with scientists laying the foundations of future health research. To shed light on their efforts, the focus of this issue of *research\*eu results magazine* is 'From FP7 to Horizon 2020: tackling Europe's health challenges'.

This edition includes no less than three interviews focused on EU-funded health projects: Dr Jürgen Hescheler of Cologne University in Germany tells us how a novel toxicity test platform could replace animal testing and speed up chemicals testing, while Dr Wolfgang Weidenhammer of the Technical University of Munich in Germany sheds light on non-conventional medicine in Europe. Finally, Professor Vlad Ratiuz of the Assistance Publique — Hôpitaux de Paris (APHP) explains how his project could help tackle liver disease in Europe.

The 'biology and medicine' section continues with other examples of ground-breaking research. These 'specials' start on page 7 with 'Rising to the global challenge of food safety', while others can be found in the 'environment and society' and 'IT and telecommunications' sections.

The 'energy and transport' section opens with an article entitled 'Light weight, high-energy batteries for electric cars', on page 16, while the feature article in the 'environment and society' section is 'Microbes join fight against desertification in North Africa' on page 23.

The 'IT and telecommunications' section begins with 'Product engineering ... a complex marriage' on page 31. Finally, the 'industrial technologies' section starts with the inspiring 'Revolutionising industrial safety in Europe', on page 38.

The issue ends, as usual, with a list of events and upcoming conferences.

We look forward to receiving your feedback on this issue and on the research\*eu publications in general. Send questions or suggestions to:

[cordis-helpdesk@publications.europa.eu](mailto:cordis-helpdesk@publications.europa.eu)

*The editorial team*



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## Watch this space!

Coming up in issue 19 of *research\*eu results magazine* — a special dossier on biodiversity.



## BIOLOGY AND MEDICINE



## Interview: Reviewing complementary medicine in Europe

*'Complementary and alternative medicine' (CAM) is an umbrella term for treatment practices mainly used outside conventional medicine. The most prominent CAM disciplines in the EU are herbal medicine, acupuncture, homeopathy and manual therapies (like massage, osteopathy and reflexology), but CAM also includes such practices as anthroposophic medicine and naturopathy. CAM is practised mostly in private practice by medical doctors and practitioners trained in the specific disciplines.*

The Cambrella<sup>1</sup> project has been looking into the current situation of CAM in Europe. As the project concludes at the end of 2012, *research\*eu results magazine* asked Cambrella's coordinator, Dr Wolfgang Weidenhammer of the Kompetenzzentrum für Komplementärmedizin und Naturheilkunde, at the Technische Universität München in Germany, to explain the project's work.

### What first drew you to research in this area?

I have been working in the area of CAM for nearly 20 years. Being educated in psychology, and working in medical psychology for years, I have seen that psychological concepts prove to be useful in various medical fields. Complementary medicine in particular is open to exploring unspecific effects whose modes of action are at least partially explainable by psychological theories.

This underlying holistic conception clearly includes the perception of the individual's mind. 'Placebo' or 'nocebo' effects are interesting examples of this, which are discussed with regard to CAM with some controversy. Complex interventions are very often used, and these can be addressed methodologically — similar to empirical psychology — by taking into account a multidimensional view of phenomena.

### What was the aim of the project?

We have been working to establish sound knowledge of the core issues and current status of CAM in the EU.

The detailed aims<sup>2</sup> of Cambrella were to: create a knowledge base on patients' demand for CAM and the prevalence of its use in Europe; review the current legal status of CAM in EU countries and associated

states; explore the needs and attitudes of EU citizens with respect to CAM; explore the providers' perspective on CAM treatments in the EU; look at the global dimension of CAM research and development strategies; propose an appropriate strategy to improve understanding of CAM use and its effectiveness; and facilitate and foster the sustainable collaboration and networking of CAM researchers in Europe.

### What was new about the Cambrella project and the way it addressed these issues?

Although some CAM research has been funded by the EU previously, Cambrella is the first project which has been explicitly assigned to CAM, with the European Commission acknowledging the relevance of this field of medicine being investigated on a European level.

Unlike collaborative research projects, since Cambrella is a 'coordination action' like the FP7 project on 'Traditional Chinese medicine' (GP-TCM), the intention is to prepare the ground for future research by describing the current status comprehensively and — taking these findings into account — developing a strategic plan.

### How was it participating in an EU project?

It is highly attractive to widen the regional or national perspective of research topics to the European level — and EU-funded Framework Programme projects enjoy a good reputation in the academic world. It makes a substantial difference whether you just consider scientific work from the international literature or you actually meet and talk and discuss with colleagues from different countries.

This kind of intensive communication is vital, especially in fields which are represented by a smaller

research community — such as the area of complementary medicine. Europe is an ideal geographical frame which, despite a lot of common features, includes country-specific variations that can be very inspiring for finding new and unconventional solutions.

### What are the project's results so far?

We have created a special issue of a peer-reviewed scientific journal — to be presented at our Cambrella final conference<sup>3</sup>. All the articles are publicly accessible, free, on the journal's website.

In terms of findings, we noted that CAM has no clear terminology, with definitions varying from one language and culture to another. There is a clear demand, however, with EU citizens wishing to have access to increased and diverse CAM provision, as well as more support and trustworthy information from medical professionals. But there is a lack of reliable data on the prevalence of CAM — most prevalence studies published so far are too small or not comparable due to different methodology.

We could not identify a common approach in Europe with respect to provision (including training) or regulation of CAM; around half of EU countries have general legislation for CAM, in the form of a specific CAM law or sections on CAM in other health laws, while some countries have regulations on specific CAM treatments.

In general, CAM is a neglected area of research. An EU research strategy for CAM should reflect the needs of the citizens, patients, providers and other CAM stakeholders taking into account the real-world environment of health-care in Europe. We recommend that a centralised and academically



© Cambrella project

Dr Wolfgang Weidenhammer

supported EU CAM centre should make this research strategy operational.

### What are the next steps for the project, or next topics for your research?

One task for the project was the development of a 'roadmap' for future CAM research in Europe. We have identified the research areas which should guide any plan for future research projects.

Having finished the project does not mean that efforts towards a better evidence base on CAM has come to an end. The project has been a first step, with a commitment to continue the work. We would be happy if the Horizon2020 programme provides opportunities for the research projects needed to investigate the potential benefits of CAM for patients in Europe.

- 1 'A pan-European research network for complementary and alternative medicine (CAM)'.
- 2 Weidenhammer W, Lewith G, Falkenberg T, Fønnebo V, Johannessen H, Reiter B, Uehleke B, von Ammon K, Baumhöfener F, Brinkhaus B. 'EU FP7 project "Cambrella" to build European research network for complementary and alternative medicine'. *Forsch Komplementmed* 2011;18:69-76.
- 3 Walach H, Weidenhammer W (eds.). 'Insights into the current situation of CAM in Europe: major findings of the EU project Cambrella'. *Forsch Komplementmed* 2012;19 (S2).

Funded under the FP7 specific programme Cooperation, under the theme 'Health'. For further information see the project website: <http://www.cambrella.eu/>