

Caphiv

The CapHIV proposal addresses the need to increase the competitiveness of the SME partners by developing a cost-effective method to screen p24 capsid protein for the early diagnosis of HIV infection, a major health and economic threat to the quality of life of European citizens. A group of SMEs, covering the supply chain, have put together this proposal in order to gain the knowledge and resources to realise a CapHIV device exploiting the results of the novel, ultra-sensitive capacitance based sensor technology proposed by providing a fast and reliable early screening method in a cost efficient way.

The consortium guarantees complementary and synergistic business interests, ensuring a rapid and dynamic route of the technology to the market.

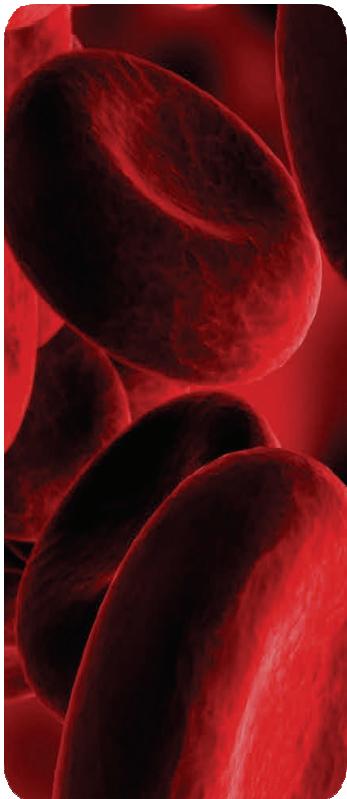


In this issue:

- Introduction
- Project progress
- Conferences
- Conference objectives
- Patents

Partners

| Partner No. | Short name | Legal name | Country |
|-------------|------------|--|---------|
| 1. (RTD) | MFKK | MFKK INVENTION AND RESEARCH CENTER SERVICES COMPANY LTD. | HU |
| 2. (SME) | CAPSENZE | CAPSENZE HANDELSBOLAG | SE |
| 3. (SME) | PHENO | PHENOSYSTEMS SA | CH |
| 4. (SME) | LIO | LIONEX GMBH | DE |
| 5. (SME) | ABBCN | AB BCN S.L. | ES |
| 6. (SME) | FIMA | FIMA SRL | IT |
| 7. (RTD) | LU | LUNDS UNIVERSITET | SE |



Project progress

The project website (www.caphiv.eu) is operated and maintained regularly with news, public and confidential (partner access only) uploads. A questionnaire aimed at clinical laboratories, research facilities etc. was prepared to deal with clinical HIV diagnostics across Europe. The market assessment study is now complete and the answers were collected and processed into a market research analysis. The survey is still available on the project website: <http://www.caphiv.eu/survey>.

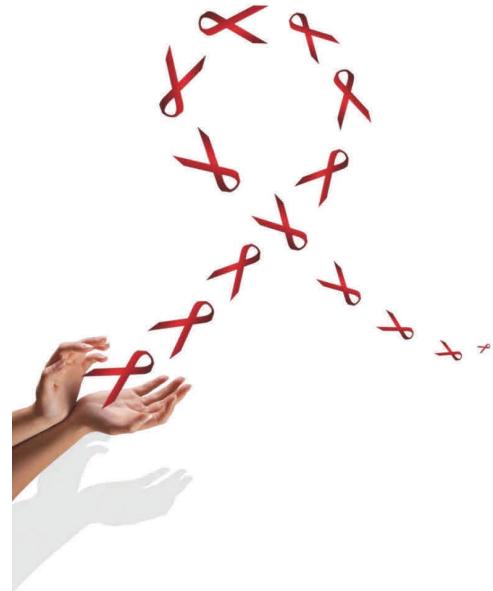
The results of the survey were synthetised in the system specification, along with the European legislation and current methods used for HIV diagnosis. The objectives of the system specifications were to develop a low-cost disposable sensor integrating all required sensing elements, a disposable sensor cartridge and appropriate mechanic, fluidic, and electric interfaces between the cartridge and the supportive device. The main modules planned for the CAPHIV screening device have also been defined together with the software functions and market objectives to develop a device that would reconcile technical-clinical specifications and market needs. A vast amount of information was collected about available HIV antibodies on the market by ABBCN, meanwhile commercial antibody properties were defined, which is most suitable for the capHIV system. The results of this investigation was summarised in Deliverable 2.1. The protocol for the minimization of NSB and the sensor surface stability were adapted and based on the results of Work Package 2, a list of the final selected capture antibody was prepared that can be used in the capHIV device. The selection of antibodies was justified in Deliverable 3.1 by CAPSENZE and ULUND. In the meantime, the device cartridge interfaces were defined according to bio-safety and end-user point of views. This task was followed by the development of the integrated sensor module and the cartridge fluidics so that several type of initial cartridge types were designed and manufactured. Paralell to this work, the docking port of the disposable cartridges was designed and two versions were manufactured by MFKK. The fluidic support system of the cartridge docking port was designed and is manufactured by MFKK. The M9 project meeting was organised by ABBCN in Barcelona, where SME partners accepted the first period RTD work and all of them voted for the continuation of the research work.



Conferences

ISHEID 2012

- City: Marseille
- Country: France
- Dates: 05/23/2012-05/25/2012
- Event Type: Conference
- Subject: Searching for a care



Despite major advances in the past 25 years, HIV infection remains a global threat with major scientific, societal and human challenges ahead. With an economic crisis able to undermine public investments, access to HIV prevention, HIV treatment and care are in jeopardy.

[http://
www.isheid.com/](http://www.isheid.com/)



The 2012 programme will focus on current 'hot topics' in HIV research: understanding the mechanisms of HIV persistence and maintenance in reservoirs, trying to find a cure..., but also on socioeconomic and policy aspects. Different sessions will tackle 'Human Rights & HIV/AIDS', 'Prevention of HIV Transmission', 'Access to Care'... Ultimately, the meeting will also address recent findings in the fields of viral hepatitis and emerging infectious diseases which need the same kind of global approach.

A variety of session types – from abstract-driven presentations to symposia, workshops and plenary lectures – will meet the needs of various participants. This human scale conference allows to meet international Key Opinion Leaders in a friendly atmosphere, to exchange ideas and to share experience. Consequently, the 2012 ISHEID will offer an exceptional opportunity for professional development and networking.



IUSTI 27th European Congress - STI and HIV: Time for Protection

The conference will attract many health professionals from all over the world to Antalya with the slogan "STI and HIV: Time for protection"

City: Antalya

Country: Turkey

Dates: 09/06/2012 - 09/08/2012

Event Type: Conference

Subject: HIV/AIDS Prevention; Sexually Transmitted Diseases (STDs); STD Prevention



Description: The 27th Conference of the International Union for Sexually Transmitted Infections (IUSTI) will be held on September 6 - 8, 2012 in Antalya, Turkey. The conference will attract many health professionals from all over the world to Antalya with the slogan "STI and HIV: Time for protection". Symposium topics will include: Genital herpes, Syphilis in Europe 2012, Dermatovenerology in the Middle East, Clinical challenges, STIs in MSM, HPV transmission and clearance dynamics, Sex and social behavior, and Hypersexual disorder. Day symposia include lower genital tract infections, and HIV/AIDS.

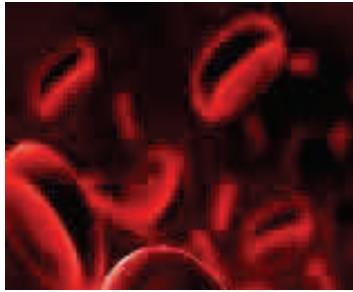
Sponsor: International Union for Sexually Transmitted Infections (IUSTI).

Contact: For more information, contact Deniz Gokengin, E-mail: gkengin@yahoo.com; Tel: +90 542 415 72 49 ; Fax: +90 232 343 71 30; or visit: www.iusti2012turkey.org

Notes: Abstract submission deadline: May 31, 2012. Registration deadline: June 30, 2012.



Patent Watch

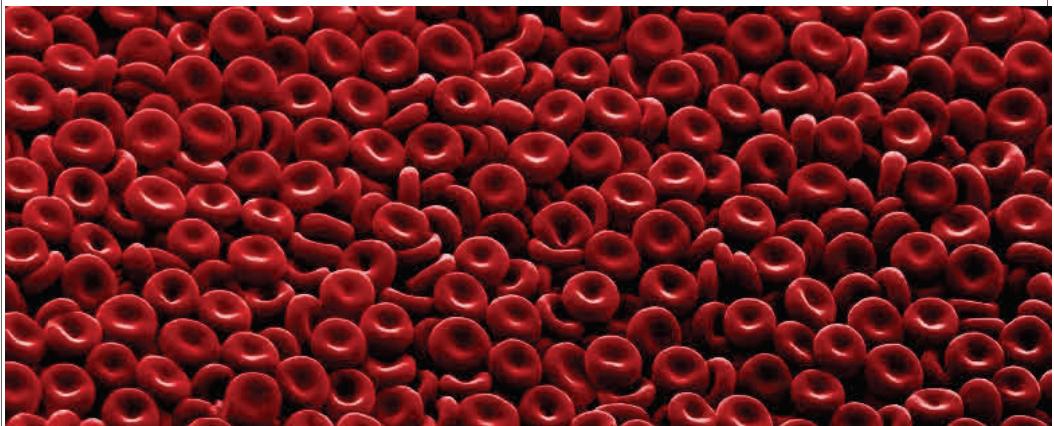


Molecular assay for diagnosis of HIV tropism AU2009335688 (A1)2011.07.07.

The invention is directed to compositions, methods and kits for HIV subtypes in a test sample, wherein target sequence are amplified. The amplified target sequences are then analyzed by any number of mass spectrometric techniques, which data are queried against a database of base composition signatures of HIV subtypes.

Human immunodeficiency virus (HIV)-neutralizing antibodies WO2012030904 (A2) — 2012-03-08

The invention provides a method for obtaining a broadly neutralizing antibody (bNab), including screening memory B cell cultures from a donor PBMC sample for neutralization activity against a plurality of HIV-1 species, cloning a memory B cell that exhibits broad neutralization activity; and rescuing a monoclonal antibody from that memory B cell culture. The resultant monoclonal antibodies may be characterized by their ability to selectively bind epitopes from the Env proteins in native or monomeric form, as well as to inhibit infection of HIV-1 species from a plurality of clades. Compositions containing human monoclonal anti-HIV antibodies used for prophylaxis, diagnosis and treatment of HIV infection are provided. Methods for generating such antibodies by immunization using epitopes from conserved regions within the variable loops of gpl20 are provided.; Immunogens for generating anti-HIVI bNAbs are also provided. Furthermore, methods for vaccination using suitable epitopes are provided.





Patent Watch

Primer composition for identifying HIV (human immunodeficiency virus) in assistance mode and application thereof

CN102250890 (A) — 2011-11-23



The invention discloses a primer composition for identifying HIV (human immunodeficiency virus) in assistance mode and application thereof. The primer composition provided by the invention is composed of a DNA represented by a sequence 1 in a sequence table, a DNA represented by a sequence 2 in the sequence table, a DNA represented by a sequence 3 in the sequence table, and a DNA represented by a sequence 4 in the sequence table; the primer composition can be used for (a) identifying the human immunodeficiency virus (HIV) in assistance mode, or (b) identifying the HIV-infected patient in assistance mode. The primer composition has important application value in identification of HIV and diagnosis of HIV-infected patients in assistance mode, and has great influence on social health.



Human immunodeficiency virus (HIV) -neutralizing antibodies

AU2010226668 (A1) — 2011-10-06

The invention provides a method for obtaining a broadly neutralizing antibody (bNab), including screening memory B cell cultures from a donor PBMC sample for neutralization activity against a plurality of HIV-I species, cloning a memory B cell that exhibits broad neutralization activity; and rescuing a monoclonal antibody from that memory B cell culture. The resultant monoclonal antibodies are characterized by their ability to selectively bind epitopes from the Env proteins in native or monomeric form, as well as to inhibit infection of HIV-I species from a plurality of clades. Compositions containing human monoclonal anti-HIV antibodies used for prophylaxis, diagnosis and treatment of HIV infection are provided. Methods for generating such antibodies by immunization using epitopes from conserved regions within the variable loops of gpl20 are provided. Immunogens for generating anti-HIV 1 bNAbs are also provided. Furthermore, methods for vaccination using suitable epitopes are provided.