





Euro-CASE Annual Conference 2016 | ATV's Technology Day



BIG DATA - SMARTER PRODUCTS, BETTER SOCIETIES

Introduction

On behalf of the organisers, we are pleased to welcome you to the conference "Big Data – Smarter Products, Better Societies".

We congregate to discuss and share knowledge about the newest trends in technology development; the conference will provide a great opportunity to get updated and to extend your professional network.

The event is the result of close cooperation between the European Council of Academies of Applied Sciences, Technologies and Engineering (Euro-CASE), the Danish Academy of Technical Sciences (ATV), and the Technical University of Denmark (DTU). By combining our forces, we have put together a compelling programme with international speakers. The conference merges two well-known and successful events, *ATV's Technology Day* and the Euro-CASE Annual Conference.

The conference programme features high-level key note speakers from industry and academia as well as the official launch of ATV's Science and Engineering Project. During the day, you will also have the opportunity to get into more depth with a technology theme by participating in one of three parallel sessions:

- Industrial Internet of Things
- · Smarter Societies
- Big Data Changing Health Care

Promoting **Science and Engineering** as a concept is a common goal for the organisers and we are looking forward to supporting these aspirations through today's conference, focusing on the digital transition and the importance of Big Data.

Last but not least, we would like to warmly thank the sponsors who have provided the financial basis for the event: Styrelsen for Forskning og Innovation (the Danish Agency for Science, Technology and Innovation), Novo Nordisk, DTU, and Siemensfonden.



Reinhard Hüttl President, Euro-CASE President, acatech



Anders Bjarklev President, DTU



Carsten Orth Gaarn-Larsen President, ATV CEO, CLEAN



ATV's Technology Day 2016 - Programme



Moderator: Martin P. Bendsøe

Professor, dr.techn, Dr.h.c., Senior Vice President and Dean, DTU

9.00 am Registration and coffee/tea

MORNING SESSION

10.00 am Welcome by

Henrik Wegener

Executive Vice President, Chief Academic Officer and Provost, DTU

Reinhard Hüttl

Prof. Dr. h.c., President of Euro-CASE and President of acatech

Carsten Orth Gaarn-Larsen

President of ATV – the Danish Academy of Technical Sciences, CEO, CLEAN – Innovation Green Solutions

10.30 am Key Note Speech: Computing Dissemination and Concentration as Drivers for the Next Digital Transformation



Gérard Roucairol

Chairman of TERATEC – the European Pole of Competence in High Performance Digital Simulation and Computing

Gérard Roucairol's teaching and research career, between 1969 and 1982, led him to become a full Professor at the Universities Paris VI, Paris XI and Ecole Normale Supérieure.

Between 1984 and 2008, he was Vice President for Research and then CTO of the BULL Group. He was also a member of its Executive Committee. Since 2005 until 2008, Gérard Roucairol was Vice Chairman of the EUREKA Strategic Initiative for Software Development in Europe (ITEA). Elected to the National Academy of Technologies of France in 2005, he became its President for a two-year period 2013-2014.

Since 2009, he is the Chairman of TERATEC. This Foundation is the European Pole of Competence in high performance digital simulation and computing.

11.15 am Scientific Advising in the EU and European Cooperation about Innovation DEBATE



Facilitator: Lia Leffland

Managing Director, ATV

Political decision-making and many scientific research projects have moved from the national to the European level. SAM, EIT and Academia Europaea provide excellent, independent platforms to meet this challenge with a European approach.

But how do we make sure that decision-makers will actually listen to the scientific community? How can we make the best offer of knowledge, facts, and recommendations in a complex and ever-changing world? We have invited three of the most influential persons in this area to discuss the topic.

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Programme



Henrik Wegener

Executive Vice President, Chief Academic Officer and Provost – the Technical University of Denmark; Chairman of the High Level Group of Scientific Advisors of the EC Scientific Advice Mechanism



Peter Olesen

Professor, Chairman of the Governing Board of the European Institute of Innovation and Technology (EIT)



Sierd Cloetingh

Professor, Dept. of Earth Sciences, Utrecht University, President of Academia Europaea

12.00 pm **LUNCH**

1.00 pm

Key Note Speech: Big Data, Behavioral Change and Internet Of Things Architecture



Yves Caseau

Head of Digital Agency of the AXA Group, Fellow of NATF

Yves Caseau's responsibility is the development of digital innovative applications throughout AXA's entities. He is also in charge of IT digital orchestration and reports both to the Group CMO and the Group CIO. Last, he coordinates the digital transformation of AXA and fosters innovation throughout the Group. Yves Caseau has been Bouygues Telecom's Executive Vice-President in charge of Technology, Services and Innovation from 2007 until 2013.

He was Bouygues Telecom's CIO from 2001 until 2006. He has taught the "Information Systems Theory and Practice" lecture at Ecole Polytechnique for three years and is a frequent speaker on information systems architecture.

Yves Caseau is a member of the National Academy of Technologies, where he was appointed as the president of the ICT commission, and the author of books about information systems, lean management and enterprise organization.

MIDDAY SESSION - PARALLEL SESSIONS

1.40 pm Technological and Business Perspectives

INDUSTRIAL INTERNET OF THINGS

(Meeting Room 1, first floor) Moderator: Tom Togsverd Consultant, ATV

Setting the scene: Kaj Grønbæk Professor, Aarhus University

Business Cases:

SMART PUMPS AND NEW SERVICES

Carsten Skovmose Kallesøe

Chief Engineer, Grundfos Holding A/S, and Industry Professor, Aalborg University

FROM BIG FARM MANAGEMENT DATA TO NEW CUSTOMER SERVICES Jesper Mogensen

Group R&D Manager, SKOV A/S

Programme

CLOUD SERVICES FOR SMART METERING

Bo Eskerod Madsen

CEO, ReMoni

Panel debate

SMARTER SOCIETIES

(Meeting Room S09, ground floor)

Moderator and setting the scene: Kim Guldstrand Larsen

Professor, Aalborg University, and Director DiCyPS

Cases:

QUANTIFYING TRAFFIC USING LARGE SETS OF GPS DATA

Kristian Torp

Associate Professor, Aalborg University

LIGHTING UP THE FUTURE OF SMART CITIES – INTELLIGENT LIGHTING SYSTEMS – SMART URBAN SERVICES

Kim Brostrøm

Head of DOLL Living Lab, and CTO, Gate 21

INTELLIGENT AND INTEGRATED ENERGY SYSTEMS AND CITIES

Alfred Heller

Associate Professor, DTU

Panel debate

BIG DATA CHANGING HEALTH CARE

(Meeting Room S01, ground floor)

Moderator and setting the scene: Søren Riis

Senior Director, Technology Development, Oticon Medical

LINKING TWO TEMPORAL BIG DATA DOMAINS:

THE CLINICAL AND THE OMICS WORLDS

Søren Brunak

Professor, Research Director, Novo Nordisk Foundation Center for Protein Research

THE NEXT HEALTHCARE REVOLUTION COMES FROM DATA

Anders Quitzau

Innovation Executive, IBM (Watson)

QUALITY ASSURANCE IN HEALTH CARE BASED ON BIG DATA

Peter Nordqvist

Managing Director, PhD, Forskningsinstitutet Hörselbron AB

STRIKING THE BALANCE BETWEEN DATA PRIVACY AND DATA USE

Kerina Jones

Associate Professor, Swansea University

RISK AND REWARD – WHY BIG DATA NEEDN'T BE A BIG PROBLEM FOR PRIVACY Nathan Lea

Senior Research Associate, the UCL Institute of Health Informatics (IHI)

Panel debate

Programme

AFTERNOON SESSION

4.10 pm Lessons from the Parallel Sessions

Tom Togsverd, Consultant, ATV

Kim Guldstrand Larsen, Professor, Aalborg University

Rasmus Larsen, Professor, Head of Department, DTU Compute

4.30 pm Launch of ATV's Science and Engineering Project



Chairman of the Board of Governors, DTU; Chairman of ATV's Science and Engineering Committee; Consultant, Novozymes

A passion and vision for chemistry and biotechnology led Per Falholt to Novo A/S, where he started his career as a research chemist. He subsequently held several managerial positions developing products for the detergent industry and rose to Director for Application Technology in the company's new enzyme development division in 1995.

In 2000, Per Falholt merged the Research and Development division into the newly formed Enzyme Business R&D. Following Novozymes' demerger from Novo Nordisk in 2000, he has helped Novozymes develop a unique industrial biotechnology platform which delivers solutions to meet customer needs and support growth. Per Falholt held the position as CSO for R&D at Novozymes until 2016 and is now Consultant at the company.

Key Note Speech: ICT Frontline Technologies -4.45 pm Opportunities for Research and Development in Europe



Walter Haas

CTO, Huawei Germany

With a background from 25 years in the telecommunications industry, Walter Haas is today CTO of Huawei Germany. He has previously held managerial positions in Research and Development, Business Development, and Product Management for various companies.

In 1999, he managed his first project with Huawei in Germany and other European countries. He joined the company in 2004 and became CTO in 2006. He is responsible for the technologies in all Huawei products.

5.30 pm Closure

Reinhard Hüttl

President of Euro-CASE and President of acatech

5.40 pm-6.30 pm

Networking

ATV Partners

Akademikerne Arla Foods amba Carlsberg A/S

CBS - Copenhagen Business School

Coloplast A/S COWI A/S Danfoss A/S Danish Crown A/S

Danish Power Systems

Dansk Metal

DELTA

DONG Energy A/S

DTU - Danmarks Tekniske Universitet

Exigon A/S EY P/S

Ferring Pharmaceuticals A/S

FORCE Technology

FRI, Foreningen af Rådgivende Ingeniører

GlaxoSmithKline A/S Grundfos Holding A/S

GTS - Godkendt Teknologisk Service

H. Lundbeck A/S Haldor Topsøe A/S Hempel Fonden HMN Naturgas I/S

IDA, Ingeniørforeningen i Danmark

Industriens Fond

Innovationsfonden Knud Højgaards Fond

KU - Københavns Universitet

Landbrug & Fødevarer Maersk Drilling A/S MAN Diesel & Turbo MT Højgaard A/S

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Patent- og Varemærkestyrelsen

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PwC

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SDU - Syddansk Universitet

Siemens A/S

Statens Serum Institut SUND & BÆLT Holding A/S

Teknologisk Institut Vestas Wind Systems

Widex A/S

AAU - Aalborg Universitet

AU - Aarhus Universitet











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The organisers wish to thank the sponsors who provide the financial support for the conference:



Ministry of Higher Education and Science

Danish Agency for Science, Technology and Innovation





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VENUE

DTU – Technical University of Denmark Glassalen, Anker Engelundsvej 1 DK-2800 Kgs. Lyngby, Denmark

DATE

Monday 14 November 2016

ΑΤV

DANISH ACADEMY OF TECHNICAL SCIENCES PHONE +45 45 88 13 11 ATVMAIL@ATV.DK WWW.ATV.DK