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COMMUNITY NEWSLETTER



NCCR NEWS W II in D







RPG (UZH) release open source **REMODE**

RPG released an open source implementation of their approach for real-time, monocular, dense depth estimation, called "REMODE". It implements a "REgularized, probabilistic, MOnocular Depth Estimation", as described in the paper. Read more



5th approved Robotics Spin Fund

NCCR Robotics Spin Fund committee has granted the Year 5 Spin Fund to Andrea Maesani for INTENTO. The early-stage start-up is hosted by CNBI (EPFL).



NCCR Robotics Master's Internships

The Education Committee has awarded the Year 6 NCCR Robotics Master's Internships to seven students from around the world, who will be hosted by: TNE (EPFL) ASL (ETH Zurich), BioRob (EPFL), RELab (ETH Zurich), and IDSIA. Read more



KTT Committee

We would like to welcome Nicola Tomatis. CEO of BlueBotics as a member of the NCCR Robotics Technology Transfer Committee.



CONGRATULATIONS

Jun Shintake (LIS, EPFL)

Jun's public PhD thesis defense took place 29th January at EPFL. The title of his thesis was Functional Soft Robotic Actuators Based on Dielectric Elastomers. Jun will continue his research at LIS as a Postdoc.



SensArs Neuroprosthetics

NCCR Robotics Spin-Fund SensArs, was amongst the selected 25 start-up winners of the IMD Award 2015/2016.



Read more

3 NCCR Robotics videos in the AAAI video contest

Thymio, Quadcopter Navigation in the Forest using Deep Neural Networks and Collaborative Navigation Flying and Walking, are all participating in the AAAI video contest. Please "like" your favourite video on YouTube.



In this issue...

Cybathlon Symposium Call RPG (UZH) release open source "REMODE"

5th approved robotics spin fund Meet the NCCR Robotics members of ESL (EPFL)

ROBOTICS WORLD

Top News

NHTSA redefines "driver" of selfdriving car

Robots Podcast #201: The Airbus Shopfloor Challenge, with Curtis Carson

Robotic assistants: Science meets fiction, with Carme Torras

What's new in robotics this week? Chameleon robot blends in with its surroundings

iRobot sells off defense & security division

World events

Schunk Expert Days Service Robotics (24-25 Feb)

HRI (07-10 March)

Lausanne Technologies and Innovation Exhibition (16 March)

European Robotics Forum (21-23 March)

Artificial Intelligence and Autonomous Robotics (23-24 March)

External calls

Abstract Award competition

Airbus Shopfloor Challenge at ICRA

BioRob 2016 (call for papers)

European Venture Programme

FUSION (special sessions & tutorial proposals)

IROS 2016 (full.length papers)

PRIME 2016 (Call for Papers)

Prix Isabelle Musy 2016

Robo Business Europe (Call for Speakers)

Venture leaders in Technology New York For Swiss startups ready to take over the world





Cybathlon Symposium Call for abstracts

Call for abstracts for the Cybathlon Scientific Symposium (Zurich, 6th October, 2 days before the main Cybathlon event). Submission deadline: April 30th 2016. Read more





WE WILL BE AT:

ERF 2016

21-23 March 2016

Ljubljana, Slovenija

Read more





NCCR PRESS COVERAGE

TED Talk

Auke lispeert: A robot that runs and swims like a salamander



More press coverage available through the NCCR Robotics website



NEW VIDEOS

Flyability Gimball flies in crevasse



4 gram robogami that crawls and jumps



Get a Grip with Soft Electronics



ETH Knee Pertubator





GUESS WHO?

Can you guess who this NCCR professor is?

For a long time this professor was not sure what to study (until a few weeks before starting to study to be precise), He was interested in quite a lot of different topics, ranging from biochemistry, to atmospheric physics, to Computer Science. Read more





NEW MEMBERS

Alexander Millane ASL (ETH Zurich)

Alexander recently joined as a PhD student at the Autonomous Systems Laboratory at ETH Zurich. His research interests include collaboration and perception in the context of robotic systems.



Venture leaders in Life Sciences Boston For Swiss startups ready to take over the world

We Robot (poster session)

Workshop for high-tech ideas that think they may want to become start-up companies

External positions

Postdoctoral Researcher in Soft Robotics with Flexible Electronics (Riken / Japan)

Multiple PhD Openings in Robotics (Univ. of Arkansas)

PhD position in whole-body University of Edinburgh's Centre for Robotics

Postdoc Openinings in Soft Manipulation (iit)

Postdoctoral position (Univ. Bristol)

Research Assistant / Associate -Imperial College London

Interesting link

Women considered better coders-but only if they hide their gender

NCCR Robotics Director

Prof. Dario Floreano

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Embedded Systems Lab (ESL, EPFL)

ESL, headed by David Atienza, focuses on the definition of system-level multi-objective design methods, optimisation methodologies and tools for high-performance embedded systems and nanoscale Multi-Processor System-on-Chip (MPSoC) architectures. Read more



Fabio Dell'Agnola (ESL, EPFL)

Fabio is a PhD student at ESL (EPFL), and performs research on wearable embedded systems.



Srinivasan Murali (ESL, EPFL)

Srinivasan is a co-founder of SmartCardia, an EPFL spin-off, and a collaborator with ESL (EPFL).



SELECTED NCCR PUBLICATIONS *

- L. Marchal-Crespo, D. Novak, R. Zimmerman, O. Lambercy, R. Gassert and R. Riener, "Detecting motion intention in stroke survivors using autonomic nervous system responses", in *Rehabilitation Robotics (ICORR)*, 2015 IEEE International Conference on, pp.1003-1007, 11-14 Aug, 2015
- P. Moseley, J. M. Florez, H. A. Sonar, G. Agarwal and W. Curtin *et al.*, "Modeling, Design, and Development of Soft Pneumatic Actuators with Finite Element Method", *Advanced Engineering Materials*, 2015.
- J. Shintake; S. Rosset; B. Schubert; D. Floreano and H. Shea, "Versatile soft grippers with intrinsic electroadhesion based on multifunctional polymer actuators" Advanced Materials, vol. 28, no. 2, pp. 231-238, 2016.
- H. A. Sonar and J. Paik. "Soft Pneumatic Actuator Skin with Piezoelectric Sensors for Vibrotactile Feedback", *Frontiers in Robotics and AI*, 2016.

*Selected publications include publications which have been made known to the editor. All members are kindly encouraged to inform the management team of new pulbications.

NCCR Robotics

The Swiss National Center of Competence in Robotics (NCCR Robotics) is a federally funded programme bringing together robotics laboratories from EPFL, ETH Zurich, University of Zurich and University of Lugano to work on wearable, rescue and educational robots.







