

STUDY GROUP SESSION

Cardiac MR

Day: Monday, 24 April 2017

Time: 13:45 - 15:45

Room: Rm 317AB

Study Group Chair, Matthias Stuber, Ph.D.; Vice-Chair, Tim Leiner, M.D., Ph.D.; Secretary, Michael Salerno, M.D., Ph.D.; Past-Chair, Victor A. Ferrari, M.D.;

Committee: Trainee Representative: Christopher Nguyen, Ph.D.; SMRT Representative: Cindy R. Comeau, B.S.R.T.

2017-18 Incoming Committee : Secretary, Sonia Nielles-Vallespin, Ph.D.; Trainee Representative, Giulia Ginami, Ph.D.;
SMRT Representative, Rhonda F. Walcarius, B.Sc.,MRT(R)(MR)

13:45	Introduction - Welcome & Business Meeting	Matthias Stuber, Ph.D. University Hospital Lausanne, Switzerland
Machine Learning in Cardiac MR		
13:50	How Can ML help to Address Unmet Needs in CMR?	Shreyas S. Vasanawala, M.D., Ph.D. Stanford University, USA
14:05	ML Applied to CMR Data Acquisition & Image Reconstruction	Florian Knoll, Ph.D. New York University School of Medicine, USA
14:20	ML Applied to Cine Imaging & Analysis	Sebastian Kozerke, Ph.D. University & ETH Zürich, Switzerland
14:35	Q & A	Cardiac MR Committee
Best Trainee Abstracts from ISMRM 2017 on Machine Learning & Cardiovascular Imaging		
14:50	<i>A Bayesian Approach to Enable Single Breath-Hold 4D Flow MRI</i>	Adam V. Rich, B.Sc. The Ohio State University, USA
15:00	<i>Dynamic Cardiac MR Image Reconstruction Models using Machine Learning on Large Training Data Sets</i>	Johannes F. Schmidt, Ph.D. University & ETH Zürich, Switzerland
15:10	<i>Automated Reference-Free Assessment of MR image Quality Using an Active Learning Approach: Comparison of Support Vector Machine versus Deep Neural Network Classification</i>	Sergios Gatidis, M.D. University of Tübingen, Germany
15:20	<i>Three-Dimensional Holographic Visualization of High-Resolution Myocardial Scar on HoloLens</i>	Jihye Jang, M.Sc. Beth Israel Deaconess Medical Center, USA
15:30	<i>Improved Multi-Echo Water-Fat Separation Using Deep Learning</i>	Enhao Gong, M.Sc. Stanford University, USA
15:40	Discussion & Introduction of New Cardiac MR SG Committee	Cardiac MR Committee
15:45	Adjournment	