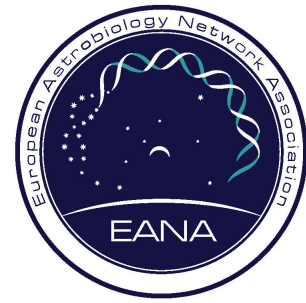


EANA2017

Programme



Sunday 13th.08.2017

- 9.00 - 22.00 AbGradE- symposium
- 13.00 – 18.00 EANA board meeting
- 14.00 – 17.00 Registration in Ambulatorium
- 19.00 - 21.00 Public lecture (in Danish, in Auditorium F)

Monday 14th.08.2017

Exoplanets and solar system bodies

- 8.00 - 9.00 Registration in Ambulatorium
- 9.00 - 9.20 Welcome by Dean of Faculty of Science and Technology Niels Christian Nielsen
- 9.20 - 10.00 Keynote - H. Kjeldsen: *Fantastic exoplanets and how to find them*
- 10.00 - 10.30 Coffee break (registration in Ambulatorium)
- Session chair** **Carolina von Essen**
- 10.30 - 10.50 L. Noack: *Volcanism and outgassing of stagnant-lid planets: Implications for the habitable zone*
- 10.50 - 11.10 K.G. Kislyakova: *Induction heating of planetary interiors*
- 11.10 - 11.30 N. Georgakarakos: *Are giant planets good neighbours for habitable worlds?*
- 11.30 - 11.50 P. E. Laine: *White Dwarfs and Icy Worlds - Evolving Habitability*
- 11.50 - 12.10 M. Ishizuka: *IRD - InfraRed Doppler instrument for the Subaru telescope*

12.10-13.40	Lunch break (registration)
Session chair	Elias Chatzitheodoridis
13.40 - 14.00	G. Cataldi: <i>Searching for biosignatures in exoplanetary impact ejecta</i>
14.00 - 14.20	E. Szuszkiewicz: <i>Second-order mean-motion resonances in a system of two low-mass planets</i>
14.20 - 14.40	T. Šantl-Temkiv: <i>Biological ice nucleation in clouds as a novel atmospheric biosignature</i>
14.40 - 15.00	C. von Essen: <i>Current challenges to find life in other planets</i>
15.00 - 15.20	Coffee break
15.20 - 15.40	C. Gros: <i>Are most habitable planets oxygen worlds? The prospects for indigenous and terrestrial life around M dwarfs</i>
15.40 - 16.00	Ł. Kaczmarek: <i>Can tardigrades theoretically survive on Mars or on some of the recently discovered exoplanets?</i>
16.00-17.00	Poster viewing
18.00 - 19.00	Ice breaker (Town Hall) Official welcome by 1st Deputy Mayor Anne Nygaard

Tuesday
15th.08.2017

**Exoplanets and
solar system
bodies**

9.00 - 9.10	Announcements
Session chair	Petra Rettberg
9.10 - 9.30	K.M. Kinch: <i>Geologic reconnaissance for sample collection on Mars using the Mastcam-Z on NASA's 2020 Mars rover mission</i>
9.30 - 9.50	M. B. Madsen: <i>VISIR References for SuperCam Calibration Target for NASAs Mars 2020 Rover</i>

9.50 - 10.20	Coffee break
10.20 - 10.40	T. P. Kee: <i>Towards a Generalized Theory of Living</i>
10.40 - 11.00	D. Nna-Mvondo: <i>Investigating on the formation processes, optical properties and chemistry of Titan's stratospheric ice cloud.</i>
11.00 - 11.20	A. Azua-Bustos: <i>Have we found evidence of life on Mars using fractal complexity analyses?</i>
11.20 - 11.40	R. V. Nielsen: <i>Accumulation of dust particles in a high efficiency particulate air (HEPA) filter under simulated Martian conditions</i>
11.40 - 12.00	J. Jehlicka: <i>Evaluating mineralogy and microbial colonizations of rocks using miniature Raman spectroscopy: training for Martian missions</i>
12.00-13.30	Lunch Break
Experiments	
Session chair	Tina S. Temkiv
13.30 - 13.50	C.S. Cockell: <i>Mars Analogues for space exploration – A summary of results</i>
13.50 - 14.10	K. Beblo-Vranesevic: <i>Survival of MASE strains under different aspects of simulated Martian conditions</i>
14.10 - 14.30	P. Rettberg: <i>MEXEM – Mars Exposed Extremophile Mixture – a space experiment to investigate the capability of anaerobic organisms to survive on Mars</i>
14.30 - 14.50	P. Schwendner: <i>Metabolic response of Yersinia intermedia MASE-LG1 to osmotic stress</i>
14.50 - 15.20	Coffee break
15.20 - 15.40	J. Heinz: <i>Enhanced Microbial Survival in Brines at Subzero Temperatures</i>
15.40 - 16.00	D. Maus: <i>Brines formed by Deliquescence as a Habitat for Methanogenic Archaea</i>

16.00-16.20	E. N. Bak: <i>Effects of wind driven saltation on the survival of bacteria on Mars</i>
16.20 - 16.40	M. Malki: <i>Comparative resistance of subsurface Tessarococcus isolates from the Iberian Pyrite Belt to simulated Martian conditions</i>
Session chair	Ole Knudsen
16.40 - 17.30	Poster Session: <i>Flash presentations</i> (1min)
17.30 - 20.30	Poster session with local beers

**Wednesday
16th.08.2017**

**Space Factor
Contest**

9.15 - 9.25	Space factor contest: Introduction by Lena Noack
9.25 - 9.40	J. Livingston: <i>200 Candidates and Validated Planets from Year Two of K2</i>
9.40 - 9.55	C. Verseux: <i>Cyanobacteria as a substrate for heterotrophs – Implications for biological life-support systems on Mars</i>
9.55 - 10.10	Uyama Taichi: <i>Search for Exoplanet around Young Stellar Objects</i>
10.10 - 10.25	D. Boy: <i>Abundance of radiation-resistant bacteria along an aridity gradient in the Atacama Desert – Are radiation- and desiccation resistance connected from the habitat perspective?</i>
10.25 - 10.55	Coffee Break
10.55 - 11.10	A. V. Dass: <i>Hydrogels</i>
11.10 - 11.25	A. B. Price: <i>Autotrophy and biomineralisation of nitrate-dependent iron oxidisers on Mars-relevant mineral substrate</i>
11.25 - 11.40	P. Nauny: <i>Dry riverbed in the Atacama desert: a depth profile analysis for biosignatures</i>

11.40 - 11.55 F. Niloofar: *Survival of halophilic archaeon Halovarius luteus gen. nov., sp. nov., to desiccation, simulated Martian UV radiation and vacuum in comparison to Bacillus atrophaeus*

11.55 - 12.00 Closing “Space Factor contest” by Lena Noack

12.00 - 13.30 Lunch break

Experiments

Session chair **Ebbe N. Bak**

13.30 - 13.50 R. de la Torre Noetzel: *Survival of lichens on the ISS-II: ultrastructural and morphological changes of Circinaria gyrosa after space and Mars-like conditions*

13.50 - 14.10 A. Papadopoulos: *Tolerance of lichen-associated bacteria to astrobiological relevant conditions*

14.10 - 14.30 D. Billi: *Endurance of desert-cyanobacteria biofilms to space and simulated Mars conditions during the EXPOSE-R2 space mission*

14.30 - 14.50 B. J. A Mooij: *Time-resolved Raman spectroscopy for the detection of biomarkers in layered samples*

14.50 - 15.10 S. Bagh: *Systems biology unfolds novel cellular, metabolic and disease signatures and networks in microbes and human cells in microgravity*

15.10 - 15.30 Coffee Break

Session chair **Daniela Billi**

15.30 - 15.50 Yuko Kawaguchi: *500 μm cell-aggregate of Deinococcus spp. was sufficient to survive after one-year exposure on ISS orbit in Tanpopo mission*

15.50 - 16.10 R. L. Mancinelli: *Using a spinning satellite to determine the effect of gravity on ecosystem N-cycling*

16.10 - 16.30 S. Ohno: *The Biopause Project: Balloon Experiments for Sampling Stratospheric Bioaerosol*

16.30 - 16.50 S. Onofri: *The BIOMEX space experiment: biosignatures detected after ground-based Science Verification Tests (SVT) in space and simulated Mars conditions*

- 16.50 - 17.10 M. Baqué: *Preservation of carotenoids in cyanobacteria and green algae after space exposure: a potential biosignature detectable by Raman instruments on Mars*
- 18.00 - 19.15 Visit to the Aarhus Museum of Fine Arts (AROS)
- 19.30 - 22.00 Conference Dinner at 'Godsbanen'

Thursday
17th.08.2017

**Prebiotic
Chemistry
and
Organics**

Session chair **Nils Holm**

- 9.15 - 9.25 Announcements
- 9.25 - 9.45 M. Polgári: *Microbial mediation of minerals –terrestrial or parent body processes?*
- 9.45 - 10.05 H. L. Pleyer: *A Novel Wet–Dry Apparatus for Simulating Prebiotic Hydration–Dehydration Cycles under Strictly Anaerobic Atmospheres*
- 10.05 - 10.40 Coffee Break
- 10.40 - 11.00 K. Kobayashi: *"Is the Strecker Synthesis a Major Formation Pathway of Amino Acids in Space?"*
- 11.00 - 11.20 W. Erdmann: *Influence of hypmagnetic conditions on Earths organisms in the context of different variants of panspermia theory*
- 11.20 - 11.40 S. Jheeta: *Space Travel: Challenges Ahead*
- 11.40 - 13.00 Closing: Space Factor and Poster awards/Presentation of EANA 2018/Lunch Box