Monday 3 July 2017

8.30-9 Opening	Welcome & opening session (Room B)
9-10.30 Keynote	Sana Odeh: *Broadening participation in the Arab world* (Room B)
10.30-11 Break & posters (ground floor hall)	Heidi J.C. Ellis and Gregory W. Hislop: *A Course Based on Open Organization Principles* Hylke H. Faber, Jan Salvador van der Ven and Menno D. M. Wierdsma: *Teaching Computational Thinking to 8-Year-Olds through ScratchJr* Susan Rodger, Steve Cooper, Kathy Isbister, Madeleine Schep, Roxann Stalvey and Lance Perez: *K-12 Teachers Experiences with Computing: A Case Study* Jorge Leoncio Guerra and Felix Armando Fermin: *Alignment of Undergraduate Curriculum for Learning IoT in a Computer Science Faculty* Aparna Mahadev and Elena Braynova: *Using Common Problem Sets to increase Student Engagement and Retention in CS2* Janka Majherova and Jana Jackova: *New Trends in Teaching Programming in Secondary Education in Slovakia* Stefan Pasterk and Andreas Bollin: *A Graph-based Approach to Analyze and Compare Computer Science Curricula for Primary and Lower Secondary Education* Violetta Lonati, Dario Malchiodi, Mattia Monga and Anna Morpurgo: *Bebras as a Teaching Resource: Classifying the Tasks Corpus using Computational Thinking Skills* Tauno Palts and Margus Pedaste: *Tasks for Assessing Aspects of Computational Thinking* George Nicou, Panayiotis Andreou and Irene Polycarpou: *CodeAdventure: Learning Introductory Programming* Bruce Scharlau: *Build your Future: Guiding Students to Enhance their Employability* Mohsen Dorodchi and Nasrin Dehbozorgi: *Addressing the Paradox of Fun and Rigor in Learning Programming*

11-12.30 Track 1	**Session 1A: Providing a good start** **Room B; session chair Mohsen Dorodchi** Aidan McGowan, Neil Anderson, John Bush, Philip Hanna and Des Greer: *Learning to Program - Choose your Lecture Seat Carefully!* Roger McDermott, Mark Zarb, Mats Daniels and Ville Isomöttönen: *First Year Computing Students' Perceptions of Authenticity in Assessment* Pasqueline Dantas Scaico, Ruy José Guerra Barretto de Queiroz and José Jorge Lima Dias Junior: *Analyzing How Interest in Learning Programming Changes During a CS0 Course: A Qualitative Study with Brazilian Undergraduates*	**Session 1B: Software engineering and design** **Room C; session chair Stan Kurkovsky** Kevin Buffardi: *Comparing Remote and Co-located Interaction in Free and Open Source Software Engineering Projects* Kevin Buffardi, Colleen Robb and David Rahn: *Learning Agile with Tech Startup Software Engineering Projects* Lynda Thomas, Carol Zander, Chris Loftus and Anna Eckerdal: *Student Software Designs at the Undergraduate Midpoint*	**Session 1C: Working group presentations 1** **Room D; session chairs Judy Sheard, Ari Korhonen** WG1: *Understanding International Benchmarks on Student Engagement – Awareness, Research Alignment and Response from a Computer Science Perspective* WG2: *Game Development for Computer Science Education* WG3: *Integrating International Students into Computer Science Programs: Challenges and Strategies for Success* WG4: *Developing Assessments to Determine Mastery of Programming Fundamentals* WG5: *"I know it when I see it" – Perceptions of Code Quality* WG6: *Developing a Holistic Understanding of Systems and Algorithms through Research Papers*
12.30-2 Lunch (garden)			
2-3.30 Track 2	**Session 2A: CS1** **Room B; session chair Becky Grasser** Robert H. Sloan, Cynthia Taylor and Richard Warner: *Initial Experiences with a CS + Law Introduction to Computer Science (CS 1)*	**Session 2B: Off the beaten path** **Room C; session chair Simon** Anna Vasilchenko, David Philip Green, Haneen Qarabash, Anne Preston, Tom Bartindale and Madeline Balaam: *Media Literacy as a By-*	**Session 2C: Tips, techniques, and courseware** **Room D; session chair Judith Gal-Ezer** Vangel V. Ajanovski: *Curriculum Mapping as a Tool for Improving Students' Satisfaction with the Choice of Courses*

Track 2 continued	Timothy Urness: *A Hybrid Open/Closed Lab for CS 1* Orna Muller, Ayelet Butman and Moshe Butman: *Opening a (Sliding) Window to Advanced Topics*	*product of Collaborative Video Production by CS Students* Stan Kurkovsky and Chad Williams: *Raspberry Pi as a Platform for Internet of Things Projects: Experiences and Lessons* Paul Dickson, Jeremy Block, Gina Echevarria and Kristina Keenan: *An Experience-based Comparison of Unity and Unreal for a Stand-alone 3D Game Development Course*	Elizabeth Vidal, Marco Aedo and Eveling Castro: *When the Robot meets the Turtle: a Gentle Introduction to Algorithms and Functions* Philip Bille and Inge Li Gørtz: *Immersive Algorithms: Better Visualization with Less Information* Arnold Rosenbloom, Sadia Sharmin and Andrew Wang: *GIT: Pedagogy, Use and Administration in Undergraduate CS* Thomas Way, Mary-Angela Papalaskari, Lillian Cassel, Paula Matuszek, Carol Weiss and Yamini Praveena Tella: *Machine Learning Modules for All Disciplines* Arnold Rosenbloom and Larry Zhang: *A 12 Week Full Stack Web Course in 2017* Daniel Krutz and Samuel Malachowsky: *PLASMA: Practical LAbs in Security for Mobile Applications* Michael Black: *TetrisOS and BreakoutOS: Assembly Language Projects for Computer Organization* Heidi J.C. Ellis, Gregory W. Hislop and Darci Burdge: *Courseware: HFOSS Project Evaluation*
3.30-4 Break & posters (ground floor hall)	Same posters as in morning session		
4-5.30 Track 3	**Session 3A: Educational Tools: Programming Support** **Room B; session chair Susan Rodger** Sagar Parihar, Ziyaan Dadachanji, Praveen Kumar Singh, Rajdeep Das, Amey Karkare and Arnab Bhattacharya: *Automatic Grading and Feedback using Program Repair for Introductory Programming Courses* Rebecca Smith, Terry Tang, Joe Warren and Scott Rixner: *An Automated System for Interactively Learning Software Testing* Ayaan Kazerouni, Stephen Edwards, Simin T. Hall and Clifford Shaffer: *DevEventTracker: Tracking Development Events to Assess Incremental Development and Procrastination*	**Session 3B: Code Maturity** **Room C; session chair Guido Rößling** Hieke Keuning, Bastiaan Heeren and Johan Jeuring: *Code Quality Issues in Student Programs* Yvonne Sedelmaier and Dieter Landes: *Experiences in Teaching and Learning Requirements Engineering on a Sound Didactical Basis* Erkki Kaila, Rolf Lindén, Erno Lokkila and Mikko-Jussi Laakso: *About Programming Maturity in Finnish High Schools: A Comparison Between High School and University Students' Programming Skills*	**Session 3C: Selecting / Training the Teaching Staff** **Room D; session chair Amber Settle** Dan Leyzberg, Jérémie Lumbroso and Christopher Moretti: *Nailing the TA Interview: Using Rubrics for Hiring Teaching Assistants* Francisco J. Estrada and Anya Tafliovich: *Bridging the Gap Between Desired and Actual Qualifications of Teaching Assistants: An Experience Report* Jennifer Rosato, Chery Lucarelli, Cassandra Beckworth and Ralph Morelli: *A Comparison of Online and Hybrid Professional Development for CS Principles Teachers*

Tuesday 4 July 2017

9-10.30 Track 4	**Session 4A: Exams and Exam Preparation** **Room B; session chair Lillian (Boots) Cassel** Paul Denny, Ewan Tempero, Dawn Garbett and Andrew Petersen: *Examining a Student-generated Question Activity using Random Topic Assignment* Yingjun Cao and Leo Porter: *Impact of Performance Level and Group Composition on Student Learning during Collaborative Exams* Anthony Estey and Yvonne Coady: *Study Habits, Exam Performance, and Confidence: How do Workflow Practices and Self-Efficacy Ratings Align?*	**Session 4B: K-12 Computing Education** **Room C; session chair Tony Clear** Veronica Cateté and Tiffany Barnes: *Application of the Delphi Method in Computer Science Principles Rubric Creation* Ronald I. Greenberg: *Educational Magic Tricks Based on Error-detection Schemes* Hannah Dee, Xefi Cufi, Alfredo Milani, Marius Marian, Valentina Poggioni, Olivier Aubreton, Anna Roura Rabionet and Tomi Rowlands: *Playfully Coding: Embedding Computer Science Outreach in Schools*	**Session 4C: Educational Tools** **Room D; session chair Irene Polycarpou** Phitchaya Mangpo Phothilimthana and Sumukh Sridhara: *High-coverage Hint Generation for Massive Courses* Stephen Edwards and Krishnan Murali: *CodeWorkout: Short Programming Exercises with Built-in Data Collection* Man Wang, Jean Mayo, Ching-Kuang Shene, Steve Carr and Chaoli Wang: *UNIXvisual: A Visualization Tool for Teaching UNIX Permissions*
10.30-11 Break & posters (ground floor hall)	Nadimpalli Mahadev: *Building a Secure Hacking Lab in a Small University* James Walker, Jean Mayo, Ching-Kuang Shene and Steve Carr: *Visualization for Secure Coding in C* Bastian Küppers and Ulrik Schroeder: *E-assessment and Bring Your Own Device* Antti Knutas, Jouni Ikonen, Laura Anna Ripamonti, Dario Maggiorini and Jari Porras: *Discovering Indicators of Commitment in Computer-supported Collaborative Student Teams* Kai Qian, Hossain Shahriar, Fan Wu, Lixin Tao and Prabir Bhattacharya: *Labware for Secure Mobile Software Development (SMSD) Education* Joshua License: *TestSQL: Learn SQL the Interactive Way* Herman Koppelman: *Yellow and Red Cards to Deal with Hitchhiking in Groups* Malcolm Hutchison: *Self-assess Competency as Yes/No – A Preliminary Study* Francesca Arcelli Fontana and Claudia Raibulet: *Students' Feedback in Using GitHub in a Project Development for a Software Engineering Course* Alexandra Badets, Becky Grasser and Stefan Peltier: *Cross Cultural Project Based Learning & Soft Skills Practice* Milton Luoma, Jigang Liu and Kai Qian: *Designing an Undergraduate Minor Program in E-discovery* Lillian Cassel, Don Goelman, Michael Posner, Darina Dicheva and Christo Dichev: *Data Science For All: A Tale of Two Cities*		
11-12.30 Track 5	**Session 5A: CS Learning** **Room B; session chair Stephen Edwards** Daniel La Vista, Nickolas Falkner and Claudia Szabo: *Understanding the Effects of Intervention on Computer Science Student Behaviour in On-line Forums* Shifa-E-Zehra Haidry, Katrina Falkner and Claudia Szabo: *Identifying Domain-specific Cognitive Strategies for Software Engineering* Isabelle Blasquez and Hervé Leblanc: *Specification by Example for Educational Purposes*	**Session 5B: K-12 Computing Education II** **Room C; session chair Michal Armoni** Anna Lamprou, Alexander Repenning and Nora Anna Escherle: *The Solothurn Project – Bringing Computer Science Education to Primary Schools in Switzerland* Isabella Corradini, Michael Lodi and Enrico Nardelli: *Computational Thinking in Italian Schools: Quantitative Data and Teachers' Sentiment Analysis after Two Years of Programma il Futuro Project* Samah Al Sabbagh, Huda Gedawy, Hanan Alshikhabobakr and Saquib Razak: *Computing Curriculum in Middle Schools – An Experience Report*	**Session 5C: Panel** **Room D; session chair Panayiotis Andreou** Francesco Maiorana, Miles Berry, Mark Nelson, Chery Lucarelli, M. Phillipps, S. Mishra and A. Benassi: *International Perspectives on CS Teacher Formation and Professional Development*

12.30-1.30 Track 6	**Session 6A: Academic Integrity** **Room B; session chair Henry Walker** Arto Hellas, Juho Leinonen and Petri Ihantola: *Plagiarism in Take-home Exams: Help-seeking, Collaboration, and Systematic Cheating* Judy Sheard, Simon, Matthew Butler, Katrina Falkner, Michael Morgan and Amali Weerasinghe: *Strategies for Maintaining Academic Integrity in First-year Computing Courses*	**Session 6B: Working Group Presentations** **Room C; session chairs Ari Korhonen, Judy Sheard** WG7: *Understanding the Effects of Lecturer Intervention on Computer Science Student Behaviour* WG8: *The Internet of Things in CS Education: Current Challenges and Future Potential* WG9: *Searching for Early Developmental Activities Leading to Computational Thinking Skills*	**Session 6C: Panel** **Room D; session chair Jacqui Whalley** Irene Polycarpou, Panayiotis Andreou, Cary Laxer, Stanislav Kurkovsky: *Academic-Industry Collaborations*
1.30-2 Lunch	Collection of lunch packages		
2-?	Excursions		
8-11	Conference dinner *Cantina Bentivoglio* Via Mascarella, 4/B Bologna GPS 44.498143, 11.349134 http://www.cantinabentivoglio.it/ita/home.php		

Wednesday 5 July 2017

9-10.30 Keynote	Stefano Zacchiroli: *Software Heritage: scholarly and educational synergies with preserving our software commons* (Room B)
10.30-11 Break & posters (ground floor hall)	Same posters as on Tuesday morning

11-12.30 Track 7	**Session 7A: Gender & Diversity in Computing** **Room B; session chair Deepak Kumar** Allison Scott, Alexis Martin, Frieda McAlear and Sonia Koshy: *Broadening Participation in Computing: Examining Experiences of Girls of Color* Alison Hunter and Raewyn Boersen: *Out from the Shadows: Encouraging Girls in New Zealand into IT Careers* Keith Quille, Natalie Culligan and Susan Bergin: *Insights on Gender Differences in CS1: A Multi-institutional, Multi-variate Study*	**Session 7B: Enhancing CS Instruction** **Room C; session chair Janet E Carter** Martin Kropp, Marla Landolt and Sonja Hof: *Use of Gamification to Teach Agile Values and Collaboration* Francisco J. Estrada: *Practical Robotics in Computer Science using the Lego NXT, an Experience Report* Darragh O'Brien: *Teaching Operating Systems Concepts with SystemTap*	**Session 7C: Feedback** **Room D; session chair Paul Denny** Michael James Scott and Gheorghita Ghinea: *On the Impact of Lecture Recording Reduction: Evidence from a Randomised Trial* Claudia Szabo and Nickolas Falkner: *Silence, Words, or Grades: The Effects of Lecturer Feedback in Multi-revision Assignments* Chris Martin, Janet Hughes and John Richards: *Learning Dimensions: Lessons from Field Studies*
12.30-2 Lunch			
2-3.30 Track 8	**Session 8A: Programming** **Room B; session chair Roger McDermott** Cruz Izu, Cheryl Pope and Amali Weerasinghe: *On the Ability to Reason about Program Behaviour: A Think-aloud Study* Daniel Toll and Anna Wingkvist: *How Tool Support and Peer Scoring Improved our Students' Attitudes toward Peer Reviews* Kyle Dewey, Phillip Conrad, Michelle Craig and Elena Morozova: *Evaluating Test Suite Effectiveness and Assessing Student Code via Constraint Logic Programming*	**Session 8B: Non-Majors** **Room C; session chair Herman Koppelman** Keith O'Hara, Kathleen Burke, Diana Ruggiero and Sven Anderson: *Linking Language & Thinking with Code: Computing within a Writing-Intensive Introduction to the Liberal Arts* Sebastian Dziallas, Sally Fincher, Colin Johnson and Ian Utting: *A First Look at the Year in Computing* Jennifer Campbell, Michelle Craig and Marcus Law: *Computing for Medicine: An Experience Report*	**Session 8C: Gamification** **Room D; session chair Larry Merkle** Rémy Siegfried, Severin Klinger, Markus Gross, Robert W. Sumner, Francesco Mondada and Stéphane Magnenat: *Improved Mobile Robot Programming Performance through Real-time Program Assessment* Brian Harrington and Ayaan Chaudhry: *TrAcademic: Improving Participation and Engagement in CS1/CS2 with Gamified Practicals* Lassi Haaranen: *Programming as a Performance – Live-streaming and its Implications for Computer Science Education*
3.30-4.30	Closing session (Room B)		