



## **IFIP TC3 SaITE 2016 final programme**

### **Overview of the programme**

**Registration is open** from 15.00 to 18.00 on Tuesday 5<sup>th</sup> July 2016 in - **Room:** Hall (Building 02; Hall do Auditório Nobre). The overview table following shows times and locations for registration on the other days of the conference.

The table on the following two pages shows times of sessions against every 15 minute time interval during the day

All coffee breaks will be in - **Room:** Hall (Building 02; Hall do Auditório Nobre)

Lunches will be in - **Room:** University Restaurant (Restaurante Universitário de Azurém)

In the tables following, the letters refer to the following room locations:

A – Building 02; Anfiteatro B1.16

B – Building 02; Anfiteatro B1.17

C – Building 11; 1<sup>st</sup> floor; Auditório, Departamento de Sistemas de Informação

D - Building 11; 1<sup>st</sup> floor; Sala de Reuniões 1, Departamento de Sistemas de Informação

Following the programme, you will find details of the social events:

- The Welcome Reception (on page 11).
- The Conference Dinner (on page 12).

	6 <sup>th</sup> July 2016		7 <sup>th</sup> July 2016		8 <sup>th</sup> July 2016	
0800	Registration open		Registration open		Registration open	
0815	Room: Hall (Building 02; Hall do Auditório Nobre)		Room: Hall (Building 02; Hall do Auditório Nobre)		Room: Hall (Building 02; Hall do Auditório Nobre)	
0830						
0845						
0900	Conference opening ceremony				Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i>	
0915	Room: A				Room: A	
0930	Keynote address 1: Onlife Learning and the Changed Roles of the Stakeholders		Keynote address 2: Could Smart Partnerships level the playing field in the arena of change with ICT in education?		Keynote address 4: Addressing European Union's Digital Skills Gap - Mobilizing the Key Stakeholders	
0945	<i>Professor Emeritus António Dias Figueiredo, University of Coimbra, Portugal</i>		<i>Professor Niki Davis, University of Canterbury, New Zealand</i>		<i>Professor Carlos Zorrinho, MEP Portugal</i>	
1000						
1015						
	Room: A		Room: A <sup>1</sup>		Room: A	
1030	Coffee break		Coffee break		Coffee break	
1045						
1100	Paper session: <i>Learning and teacher stakeholders</i>	Paper session: <i>Stakeholders and IT management</i>	Symposium: <i>Stakeholders of Education in ICT4D</i>	Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i>	WCCE 2017 presentation	
1115	Room: A	Room: B	Room: A <sup>2</sup>	Room: B	Room: A	
1130					Conference closing session	
1145					Break	
1200						
1215	Lunch		Lunch		WCCE 2017 IPC meeting (IPC members only)	Social activities
1230					Room: D	
1245						
1300						

<sup>1</sup> Please note that there will be additional attendance in this session by directors of schools of the municipality

<sup>2</sup> Please note that this session is being video-recorded for later use by the chair

	6 <sup>th</sup> July 2016		7 <sup>th</sup> July 2016		8 <sup>th</sup> July 2016		
1315	Paper session: <i>Stakeholders and computer studies</i> <b>Room: A</b>	Symposium: <i>The making of a science teacher</i> <b>Room: B<sup>3</sup></b>	Keynote address 3: The Role of EMIS in Strengthening Education Systems <i>Dr Husein Abdul-Hamid, World Bank</i> <b>Room: A<sup>4</sup></b>		WCCE 2017 IPC meeting (IPC members only) <b>Room: D</b>	Social activities	
1330							
1345							
1400							
1415							
1430	Coffee break		Coffee break		Break		
1445	Coffee break		Coffee break		TC3 AGM meeting (TC3 members) <b>Room: C</b>		
1500	Paper session: <i>Vocational and professional concerns</i> <b>Room: A</b>		Paper session: <i>Stakeholders and pedagogies</i> <b>Room: B<sup>5</sup></b>	Symposium: <i>Stakeholders of Education in ICT4D</i> <b>Room: A<sup>6,7</sup></b>			Symposium: <i>Smart Partnerships in Education: What are they and what do they look like?</i> <b>Room: B</b>
1515	Break		Break				
1530	Symposium: <i>The role of educators in preparing ICT professionals</i> <b>Room: A</b>		System Presentations <b>Room: B</b>	Paper session: <i>Stakeholders and learning</i> <b>Room: A</b>			Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i> <b>Room: B</b>
1545	Break		Break				
1600	WG3.1 and WG3.4 AGM meetings <b>Room: C and D</b>		Break				
1615	Break		WG3.3 and WG3.7 AGM meetings <b>Room: C and D</b>				
1630	Break		Break				
1645	Break		Break				
1700	Symposium: <i>The role of educators in preparing ICT professionals</i> <b>Room: A</b>		System Presentations <b>Room: B</b>	Paper session: <i>Stakeholders and learning</i> <b>Room: A</b>	Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i> <b>Room: B</b>		
1715	WG3.1 and WG3.4 AGM meetings <b>Room: C and D</b>		Break				
1730	Break		WG3.3 and WG3.7 AGM meetings <b>Room: C and D</b>				
1745	Break		Break				
1800	WG3.1 and WG3.4 AGM meetings <b>Room: C and D</b>		Break				
1815	Break		WG3.3 and WG3.7 AGM meetings <b>Room: C and D</b>				
1830	Break		Break				
1845	Break		Break				
1900	Break		Break				
1915	Break		Break				
1930	Reception		Dinner		Close of meeting		

<sup>3</sup> Please note that in this session two papers will be presented by Skype and video link

<sup>4</sup> Please note that there will be additional attendance in this session by directors of schools of the municipality

<sup>5</sup> Please note that in this session one paper will be presented by Skype and video link

<sup>6</sup> Please note that this session is being video-recorded for later use by the chair

<sup>7</sup> Please note that in this session one paper will be presented by Skype and video link

## The programme for each day

The tables on the following three pages show the start times for each session, and the chairs of each session

	<b>5<sup>th</sup> July 2016</b>	
<b>1500</b>	Registration open	
	<b>6<sup>th</sup> July 2016</b>	
<b>0800</b>	Registration open	
<b>0900</b>	Conference opening ceremony: <i>TC3 chair – Sindre Røsvik, IPC chairs – Don Passey and Cathy Lewin, LOC chair – João Carvalho, Vice-Mayor of the City of Guimarães (Vice-Presidente da Câmara)- Dr. Amadeu Portilha, Vice-Dean of the Engineering School – Professor António Correia, Vice-Dean of the Education Institute – Professor Alexandra Gomes, Representative for the Rector of the University of Minho – TBC</i>	
<b>0930</b>	Keynote address 1: Onlife Learning and the Changed Roles of the Stakeholders <i>Professor Emeritus António Dias Figueiredo, University of Coimbra, Portugal</i> <b>Chair: Ana Amélia Carvalho</b>	
<b>1030</b>	Coffee break	
<b>1100</b>	Paper session: <i>Learning and teacher stakeholders</i> <b>Chair: Torsten Brinda</b>	Paper session: <i>Stakeholders and IT management</i> <b>Chair: Javier Osorio</b>
<b>1215</b>	Lunch	
<b>1315</b>	Paper session: <i>Stakeholders and computer studies</i> <b>Chair: Eric Sanchez</b>	Symposium: <i>The making of a science teacher</i> <b>Chair: Don Passey<sup>8</sup></b>
<b>1445</b>	Coffee break	
<b>1515</b>	Paper session: <i>Vocational and professional concerns</i> <b>Chair: Peter Micheuz</b>	Paper session: <i>Stakeholders and pedagogies</i> <b>Chair: Cathy Lewin<sup>9</sup></b>
<b>1645</b>	Break	
<b>1700</b>	Symposium: <i>The role of educators in preparing ICT professionals</i> <b>Chair: Moira de Roche</b>	System Presentations <b>Chair: Maciej Syslo</b>
<b>1745</b>	Break	
<b>1800</b>	WG3.1 and WG3.4 AGM meetings	
<b>1900</b>	Reception	

<sup>8</sup> Please note that in this session two papers will be presented by Skype and video link

<sup>9</sup> Please note that in this session one paper will be presented by Skype and video link

	<b>7<sup>th</sup> July 2016</b>	
<b>0800</b>	Registration open	
<b>0930</b>	Keynote address 2: Could Smart Partnerships level the playing field in the arena of change with ICT in education? <i>Professor Niki Davis, University of Canterbury, New Zealand</i> <b>Chair: Cathy Lewin<sup>10</sup></b>	
<b>1030</b>	Coffee break	
<b>1100</b>	Symposium: <i>Stakeholders of Education in ICT4D</i> <b>Chair: Mikko Ruohonen<sup>11</sup></b>	Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i> <b>Chair: Mary Webb</b>
<b>1215</b>	Lunch	
<b>1315</b>	Keynote address 3: The Role of EMIS in Strengthening Education Systems <i>Dr Husein Abdul-Hamid, World Bank</i> <b>Chair: Don Passey<sup>12</sup></b>	
<b>1445</b>	Coffee break	
<b>1515</b>	Symposium: <i>Stakeholders of Education in ICT4D</i> <b>Chair: Mikko Ruohonen<sup>1314</sup></b>	Symposium: <i>Smart Partnerships in Education: What are they and what do they look like?</i> <b>Chair: Cathy Lewin</b>
<b>1645</b>	Break	
<b>1700</b>	Paper session: <i>Stakeholders and learning</i> <b>Chair: Zdena Lustigova</b>	Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i> <b>Chair: Mary Webb</b>
<b>1800</b>	Break	
<b>1815</b>	WG3.3 and WG3.7 AGM meetings	
<b>1915</b>	Break	
<b>1930</b>	Dinner	

<sup>10</sup> Please note that there will be additional attendance in this session by directors of schools of the municipality

<sup>11</sup> Please note that this session is being video-recorded for later use by the chair

<sup>12</sup> Please note that there will be additional attendance in this session by directors of schools of the municipality

<sup>13</sup> Please note that this session is being video-recorded for later use by the chair

<sup>14</sup> Please note that in this session one paper will be presented by Skype and video link

	<b>8<sup>th</sup> July 2016</b>	
<b>0800</b>	Registration open	
<b>0900</b>	Symposium: <i>Roles of CS/ Informatics in the curriculum – why, what, how?</i> <b>Chair: Mary Webb</b>	
<b>0930</b>	Keynote address 4: Addressing European Union’s Digital Skills Gap - Mobilizing the Key Stakeholders <i>Professor Carlos Zorrinho, MEP Portugal</i> <b>Chair: Sindre Røsvik</b>	
<b>1030</b>	Coffee break	
<b>1100</b>	WCCE 2017 presentation <b>Chair: Don Passey</b>	
<b>1115</b>	Conference closing session <i>IPC chairs – Cathy Lewin and Don Passey, Lead editor – Torsten Brinda, LOC chair – João Carvalho, TC3 chair – Sindre Røsvik</i>	
<b>1145</b>	Break	
<b>1215</b>	WCCE 2017 IPC meeting	Social activities
<b>1415</b>	Break	
<b>1445</b>	TC3 AGM meeting	
<b>1930</b>	Close of meeting	

### Paper, symposium and system presentation sessions

The tables on the following pages give details of each paper, symposium and system presentation session

Please note that:

- Each **full paper** is allowed **20 minutes** – 15 minutes presentation and 5 minutes discussion
- Each **short paper** is allowed **10 minutes** – 5 minutes presentation and 5 minutes discussion
- **Symposium sessions** are organised by the chair, but for programme purposes each **paper** is allowed **20 minutes** – 15 minutes presentation and 5 minutes discussion
- Each **system presentation** is allowed **15 minutes** – 10 minutes presentation and 5 minutes discussion

#### **Paper session: *Learning and teacher stakeholders* (11.00, 6<sup>th</sup> July, Room A, Chair – Torsten Brinda)**

003	Introducing blended learning MOOC: A study of one bMOOC in Norwegian teacher education	Inger Langseth, Halvdan Haugsbakken	Full paper	20
006	cMOOC: how to assist teachers in integrating motivational aspects in pedagogical scenarios?	Aicha Bakki, Chihab Cherkaoui, Lahcen Oubahssi, Sebastien George	Full paper	20
020	Characterizing the Players Strategies and their Evolution: A Case Study Based on Learning Analytics	Eric Sanchez, Nadine Mandran, Valérie Emin, Valérie Fontanieu, Caroline Emin	Full paper	20

#### **Paper session: *Stakeholders and IT management* (11.00, 6<sup>th</sup> July, Room B, Chair – Javier Osorio)**

013	Fathers and male guardians are important stakeholders in children's education: Do Lego activities hold a key to involving them more?	Don Passey, Gavin Hawkins, Darren Clift	Full paper	20
009	IT in Educational Management: Can it Support Solution of e-Cheating Problem?	Robert Gajewski	Full paper	20
022	Business Process Management (BPM) and E-Government at the University of XXX (UXXX)	Jorge Rodriguez-Diaz, Pablo Hernandez-Bolaños	Short paper	10
008	Key Elements for Gardening Innovation in Educational IT-Projects	Anton Knierzinger, Astrid Leeb	Short paper	10

**Paper session: Stakeholders and computer studies (13.15, 6<sup>th</sup> July, Room A, Chair – Eric Sanchez)**

002	Students' Involvement in Computer Science and their Computer and Information Literacy – Results from ICILS 2013 in an International Comparison	Julia Gerick, Kerstin Drossel, Birgit Eickelmann	Full paper	20
025	Modelling Competency in the Field of OOP: From Investigating Computer Science Curricula to Developing Test Items	Matthias Kramer, David Tobinski, Torsten Brinda	Full paper	20
012	Measuring an impact of block-based language in introductory programming	Yoshiaki Matsuzawa, Yoshiki Tanaka, Sanshiro Sakai	Full paper	20
028	Implementing computer science curriculum in primary schools: preliminary report	Maciej Syslo	Full paper	20

**Symposium: The making of a science teacher (13.15, 6<sup>th</sup> July, Room B, Chair – Don Passey)**

034	The making of a science teacher	Christine Redman <sup>15</sup> , Seamus Delaney, Joanne Blannin <sup>16</sup> , Janet Price	Symposium	90
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**Paper session: Vocational and professional concerns (15.15, 6<sup>th</sup> July, Room A, Chair – Peter Micheuz)**

021	Vingt ans après: Analysis of WG3.7's published work on information technology in educational management (1994-2014)	Javier Osorio	Full paper	20
017	Vocational and Education Training in Portugal: Pupils' ICT Competences at School and Working Contexts	Teresa Cardoso, Antonieta Rocha	Full paper	20
031	Smart Partnerships in Education: an illustration from Ireland	Margaret Leahy	Full paper	20
030	Alternative ways of involving stakeholders: The rise of entrepreneurship in higher education and the case of a learning enterprise	Ana Paula Correia	Short paper	10

<sup>15</sup> Please note that this paper will be presented by Skype and video link

<sup>16</sup> Please note that this paper will be presented by Skype and video link



**Paper session: Stakeholders and pedagogies (15.15, 6<sup>th</sup> July, Room B, Chair – Cathy Lewin)**

015	Opportunities for enhancing science learning by enabling natural manipulation in a 3D virtual environment	Mary Webb, Megan Tracey, Harwin William, Ozan Tokatli, Faustina Hwang, Kathryn Macaulay, Ros Johnson	Full paper	20
016	Introducing collaborative practices to undergraduate studies	Jaana Holvikivi, Minna Lakkala, Hanni Muukkonen	Full paper	20
010	Detecting behavioural patterns of gifted students in online learning environment: Data mining approach	Zdena Lustigova	Short paper	10
033	Accounting for Teachers Use and Non-Use of Web 2.0 in the Upper Primary School Classroom	Joanne Blannin <sup>17</sup>	Short paper	10

**Symposium: The role of educators in preparing ICT professionals (17.00, 6<sup>th</sup> July, Room A, Chair – Moira de Roche)**

039	The role of educators in preparing ICT professionals	Moira de Roche	Symposium	50
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**System Presentations (17.00, 6<sup>th</sup> July, Room B, Chair – Maciej Syslo)**

035	Detailed Analysis of "Mixed Language Coding" with Java and Block in Introductory Programming Education	Yoshiki Tanaka, Yoshiaki Matsuzawa, Sanshiro Sakai	System presentation	15
036	CRiPS.js: JS Library for Creative Introductory Programming Development Environment on the Web	Toshiki Takeuchi, Yoshiaki Matsuzawa, Sanshiro Sakai	System presentation	15

**Symposium: Stakeholders of Education in ICT4D: STI (Science, Technology and Innovation) for the SDGs (Sustainable Development Goals) (11.00, 7<sup>th</sup> July, Room A, Chair – Mikko Ruohonen)<sup>18</sup>**

029	Learning Computing as a Step toward Social Inclusion	Toshinori Saito	Full paper	20
023	Digital Pedagogy for Enhanced Social Qualities, Collaborative Processes and Quality of Learning	Nicholas Mavengere, Mikko Ruohonen	Full paper	20

**Symposium: Roles of CS/ Informatics in the curriculum – why, what, how? (11.00, 7<sup>th</sup> July, Room B, Chair – Mary Webb)**

038	Roles of CS/ Informatics in the curriculum – why, what, how?	Mary Webb, Charoula Angeli-Valanides, Yousra Chtouki, Maciej Syslo, Matija Lokar, Peter Micheuz	Symposium	70
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<sup>17</sup> Please note that this paper will be presented by Skype and video link

<sup>18</sup> Please note that this session is being video-recorded for later use by the chair

**Symposium: Stakeholders of Education in ICT4D: STI (Science, Technology and Innovation) for the SDGs (Sustainable Development Goals) (15.15, 7<sup>th</sup> July, Room A, Chair – Mikko Ruohonen)<sup>19</sup>**

027	ICT as a catalyst to enhance teaching and learning in a resource constrained setting: A case of Malawi	Richard Pankomera <sup>20</sup>	Full paper	20
019	The Project Case: A West African Digital University	Adewunmi Obafemi Ogunbase, Roope Raisamo	Short paper	10
026	Exploring the Information and ICT Skills of Health Professionals in Low and Middle Income Countries (LMIC)	Annariina Koivu, Mikko Ruohonen, Nicholas Mavengere	Full paper	20

**Symposium: Smart Partnerships in Education: What are they and what do they look like? (15.15, 7<sup>th</sup> July, Room B, Chair – Cathy Lewin)**

040	Smart Partnerships in Education: What are they and what do they look like?	Margaret Leahy, Amina Charania, Niki Davis, Cathy Lewin, Ana Paula Correia, Yohei Kato	Symposium	90
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**Paper session: Stakeholders and learning (17.00, 7<sup>th</sup> July, Room A, Chair - Zdena Lustigova)**

032	Using images as a stimulus to explore the identity of student teachers in computing	Eleanor Overland	Full paper	20
014	Datafication in education: a multi-level challenge for IT in educational management	Andreas Breiter	Full paper	20
024	Curriculum Issues, Competence Models and Informatics Education in Austrian Secondary Schools: Challenges now and ahead	Peter Micheuz	Full paper	20

**Symposium: Roles of CS/ Informatics in the curriculum – why, what, how? (17.00, 7<sup>th</sup> July, Room B, Chair – Mary Webb)**

038	Roles of CS/ Informatics in the curriculum – why, what, how?	Mary Webb, Charoula Angeli-Valanides, Yousra Chtouki, Maciej Syslo, Matija Lokar, Peter Micheuz	Symposium	60
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**Symposium: Roles of CS/ Informatics in the curriculum – why, what, how? (09.00, 8<sup>th</sup> July, Room A, Chair – Mary Webb)**

038	Roles of CS/ Informatics in the curriculum – why, what, how?	Mary Webb, Charoula Angeli-Valanides, Yousra Chtouki, Maciej Syslo, Matija Lokar, Peter Micheuz	Symposium	30
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## Conference Dinner

Thursday July 7<sup>th</sup>, at 19.30, in Pousada Santa Marinha da Costa, Guimarães  
(Largo Domingos Leite de Castro, Lugar da Costa, 4810-011 Guimarães)

This event is open only to conference delegates and accompanying persons that have registered for the dinner (please bring the invitation you received in your registration pack).

Bus transportation will be provided to and from Pousada Santa Marinha da Costa. Departure times and location will be provided during the conference.  
Dress code: smart casual

