Imperial College London



TUM-Imperial Global Fellows Programme: Cities of the Future

In July 2017 the first **TUM-Imperial Global Accelerator Programme: Cities of the Future** will be hosted by TUM in Burghausen, Germany.

The research environment is increasingly competitive and requires both excellence in research and developed professional skills. 50 PhD researchers from Imperial, TUM and GlobalTech partner institutions will come together for this one week programme to develop their research and professional skills.

Course Description

Over half the world's population now live in cities, and this is estimated to increase to 66% by 2050¹. Imagining cities of the future involves considering a wide range of issues and concepts from resource allocation to the integration of migrants, from promoting healthy living to providing healthcare, from ultra-connected homes and businesses to integrated driverless transport. Furthermore, the impact of technologies, climate change and global events on urban living, infrastructure, landscape planning and socio-economic interactions offers exciting possibilities and tremendous challenges for the next generation of global researchers.

The future is urban and this exciting programme will bring together participants from TUM, Imperial College and other Global Tech Alliance universities to develop their skills in interdisciplinary collaborative research. Applying knowledge and skills to suggest how cities can develop to improve quality of life for the urban populations of the future. Doctoral candidates from any discipline are invited to take part and to share their varied expertise during the programme.

The programme will highlight some areas of research that is happening now and ask participants to develop their collaborative research skills by working together to consider the challenges and opportunities of the **Cities of the Future**.

Researchers will be challenged to assess their research skills and develop their interdisciplinary awareness, examining opportunities to collaborate and develop research.

Topics to be explored include:

- Creativity and development of collaborative research
- Effective team working and dealing with change
- Communication with impact: reaching different audiences
- Networks and networking
- Research structure and taking research forward
- Exploring current research into Cities of the Future
- Generating a new interdisciplinary collaborative research proposal

A draft programme is attached as **Appendix 1**.

¹ https://esa.un.org/unpd/wup/Publications/Files/WUP2014-Highlights.pdf

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APPENDIX 1: Draft schedule for Global Fellows Programme: Cities of the Future 2017-18*

Welcome and Introductions 17.07.2017

_	TIME	ACTIVITY	CONTENT
	12:00-13:00	Welcome Lunch	
	13.00-14.00	Welcome from TUM and Imperial,	Prof Liqiu Meng, Chair of Cartography, TUM
		Programme Welcome	Prof Maggie Dallman, VP Academic Partnerships, ICL
X			Dr Janet De Wilde, Programme Director, ICL
THE CONTEXT	14.00-15.00	Introduction Keynote	Prof Liqiu Meng (Chair of Cartography, TUM)
Ó			"Dynamic Development of Cities Across Centuries"
S	15.00-16.00	Teams Introductions	
置	16.00-18.00	Challenges and Opportunities in	Dr Chris Mazur, ICL, Infrastructure/Utilities
		Cities (4x (20+10 min) presentations	Prof Maggie Dallman, ICL, Social Challenges
Ž		+ Q&A)	Prof Björn Schuller, ICL, Complex & Intelligent Systems
E			& Smart Integration
SETTING			Prof Thomas Auer, TUM, Climate Responsive Design
S	18.00-19.00	Free time	
	19.00-20.00	Dinner	
	20.00-21.00	Poster Fair and Share	Informal Networking

Inspiring and Empowering 18.07.2017

	TIME	ACTIVITY	CONTENT
INSPRIING AND EMPOPERING TEAMS	08.45-09.00	Morning Welcome	
	09.00-09.45	Team Challenge 1	
	09.45-10.30	Team Challenge 2	
	10.30-11.15	Team Challenge 3	
	11.15-11.30	Break	
	11.30-12:15	Team Challenge 6	
	12.15-13.00	Team Challenge 5	
	13.00-14.00	Lunch	
	14.00-15.00	Team Debrief	
	15.00-16.00	Industry Slot	
	16.00-17.30	Creativity Challenge	Team competition to prepare for collaboration
	17.30-19.00	Free time	
	19.00-22.00	Reception Dinner	Welcome from the Lord Mayor of the City of Burghausen, Hans Steindl

Excursion to Munich 19.07.2017





International, Interdisciplinary Project Development 20.07.2017

	TIME	ACTIVITY	CONTENT
PROJECT DAY	08.45-09.00	All Meet	
	09.00-10.30	Accelerator Project Collaboration 1	Academic Support
	10.30-11.00	Break	
	11.00-12.30	Accelerator Project Collaboration 2	Academic Support
	12.30-13.30	Lunch	
	13.30-14.30	Challenges and Opportunities in	TUM tbc
		Cities II (2x 20min-10min,	Tobias Eder, TUM/ENIANO Gmbh, Energy Efficient
		presentation + Q&A)	Smart Cities
	14.30-16.00	Elevator Pitch	All groups do a short pitch of their collaborative research
			idea to the whole group and a jury.
	16.00-16.30	Break	
	16.30-18.00	Accelerator Project Collaboration 3	Academic Support
	18.00-21.00	Networking Barbecue	With academics

Final Presentations 21.07.2017

	TIME	ACTIVITY	CONTENT
PRESENTATION AND PRIZE DAY	08.45-09.00	All Meet	
	09.00-10.30	Accelerator Project Collaboration	Final prep time
	10.30-11.00	Break	
	11.00-12.00	Accelerator Project Heats	All teams present
	12.00-12.30	Accelerator Project Final	Two Finalists Present
	12.30-13.30	Lunch and Photos	
	13.30-14.30	Plenary: Successful	Speaker tbc (Imperial)
		Collaborations	
	14.30-15.30	Team Finales	
	15.30-16.00	Farewell by TUM	Dr. Michael Klimke, TUM
	16.00-18.00	Travel to Munich	



Call for Applications:

TUM-Imperial Global Fellows Programme: Cities of the Future

From 17-21 July 2017 the first TUM-Imperial Global Fellows Programme: Cities of the Future will be hosted by TUM in Burghausen, Germany. 50 doctoral researchers from TUM, Imperial College London and GlobalTech Alliance universities will come together for this one week summer school to develop their research and professional skills under the academic theme "Cities of the Future".

Course Description:

Over half the world's population now live in cities, and this is estimated to increase to 66% by 2050. Imagining cities of the future involves considering a wide range of issues and concepts from resource allocation to the integration of migrants, from promoting healthy living to providing healthcare, from ultraconnected homes and businesses to integrated driverless transport. Furthermore, the impact of technologies, climate change and global events on urban living, infrastructure, landscape planning and socio-economic interactions offers exciting possibilities and tremendous challenges for the next generation of global researchers.

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- Effective team work
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- · Generating a new interdisciplinary collaborative research proposal

Application:

Application is **open to doctoral candidates from all disciplines and departments**. An in-depth background knowledge in the area is not required. However, applicants should have a keen interest in Cities of the Future and be willing to engage with topics and concerns in this area.

Please visit the <u>TUM Graduate School Website</u> for more information about this one week summer school as well as application details. Application is open until **2 April 2017**.

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