

VANYA YANEVA

Informatics Forum 4.23, 10 Crichton Street, EH8 9AB, Edinburgh, UK
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EDUCATION

University of Edinburgh

- **PhD, CDT in Pervasive Parallelism** Sept 2015 - Nov 2019 (expected)
Research topic: *Compiler-Assisted Parallel Testing on Heterogeneous Architectures*.
Earned an **MSc by Research (with distinction)** in August 2016.
Supervised an intern in May-July 2018.
- **MSc, High Performance Computing (with distinction)** Sept 2012 - Aug 2013
Master's project: *Visual Parallel Programming*.
- **BSc, Computer Science and Mathematics (2:1)** Sept 2008 - May 2012
Undergraduate Exchange at the University of Chicago Sept 2010 - June 2011

PUBLICATIONS

- Accelerated Finite State Machine Test Execution Using GPUs** December 2018
Vanya Yaneva, Arnav Kapoor, Ajitha Rajan and Christophe Dubach *APSEC'18, Nara, Japan*
- Assessing the Effect of Data Transformations on Test Suite Compilation** October 2018
Panagiotis Stratis, Vanya Yaneva, Ajitha Rajan *ESEM'18, Oulu, Finland*
- Compiler-Assisted Test Acceleration Using GPUs** June 2018
Vanya Yaneva *ICSE'18, ACM Student Research Competition, Gothenburg, Sweden*
- Compiler-Assisted Test Acceleration on GPUs for Embedded Software** July 2017
Vanya Yaneva, Ajitha Rajan and Christophe Dubach *ISSTA'17, Santa Barbara, CA*
- ParTeCL: Parallel Testing Using OpenCL** July 2017
Vanya Yaneva, Ajitha Rajan and Christophe Dubach *ISSTA'17, Santa Barbara, CA*

ACADEMIC ACTIVITIES

Talks & Posters

- **Accelerated Finite State Machine Test Execution Using GPUs** (talk)
University of Sheffield (2019)
- **Compiler-Assisted Test Acceleration on GPUs for Embedded Software** (talk)
University of Edinburgh (2018, 2017), Codeplay Software, Edinburgh (2017)
- **Accelerated Test Execution Using GPUs** (talk)
University of Edinburgh (2016), MathWorks, Cambridge (2016)

Teaching

- Tutor, **Software Testing (UG3)** Spring 2016 - 2019
- Teaching Assistant, **MSc in High Performance Computing** Autumn/Spring 2015 - 2019
- Demonstrator, **Computer Programming Skills and Concepts** Autumn 2018

Conference participation

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| · PC Member, ECOOP'19 Artifacts | May 2019 |
| · Student Volunteer, APSEC'18 | December 2018 |
| · PC Member, ECOOP/ISSTA'18 Doctoral Symposium | May 2018 |

WORK EXPERIENCE

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| Codeplay Software Ltd. | May 2017 - Aug 2017 |
| <i>C++ Intern</i> | <i>Edinburgh, UK</i> |

- Implemented features for the ComputeCpp runtime and SDK, using C++14. ComputeCpp is Codeplay's implementation of SYCL - an open standard for developing applications on heterogeneous architectures using C++.
- Developed Python and Jenkins scripts to automate performance benchmarking.

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| Excelian Ltd. | Oct 2013 - Aug 2015 |
| <i>Technology Consultant</i> | <i>London, UK</i> |

- Implemented features for an in-house trading application at UniCredit Bank, using C#, WPF, MVVM, including incorporating large existing codebases and legacy code.
- Performed numerous process management tasks, including administrating releases, tracking features and bugs and managing user accounts.
- Supervised one junior developer.

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| Ateeda Ltd. | Aug 2012 - Aug 2013 |
| <i>Software Developer</i> | <i>Edinburgh, UK</i> |

- Successfully ported a GUI intensive application from C# to Java and was responsible for the maintenance and extension of the produced application.
- Investigated particular sources of error in the CORDIC algorithm and produced a paper presenting my findings and making recommendations for techniques to reduce the impact of the errors.

AWARDS

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| The Claire Jones Prize , <i>School of Informatics, University of Edinburgh</i> | Nov 2016 |
| Awarded to the best performing female MSc student. | |

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| ICE Award , <i>Excelian Ltd.</i> | June 2014 |
| Excelian's monthly employee award, received for outstanding feedback from UniCredit Bank. | |

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| Student Employee of the Year 2013 Off Campus Category | June 2013 |
| <i>National Association for Student Employment Services</i> | |
| Institutional Level Award - University of Edinburgh | |

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| High Performance Computing Scholarship | May 2012 |
| <i>School of Physics & Astronomy, University of Edinburgh</i> | |

TECHNICAL SKILLS

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| Parallel Programming | C, OpenCL, OpenMP, MPI |
| Other Programming | C++, R, Python, C#, WPF, MVVM |
| Tools | Git, Clang LibTooling, L ^A T _E X |