

# Steven James

## WORK EXPERIENCE

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| 2017 – Present | <b>University of the Witwatersrand, Johannesburg</b><br><i>Associate Lecturer</i><br>COMS1018A: Introduction to Algorithms & Programming   |
| 2017           | <b>University of the Witwatersrand, Johannesburg</b><br><i>Sessional Lecturer</i><br>COMS1018: Introduction to Algorithms & Programming  |
| 2015 – 2016    | <b>Touchsides, Johannesburg</b><br><i>Android Developer</i><br>Responsible for delivering Android applications related to the insurance industry, and integrating said applications into the existing backend and proprietary hardware systems.  |
| 2014 – 2017    | <b>Associated Computer Solutions, Johannesburg</b><br><i>Developer</i><br>Part of a small R&D team responsible for rewriting components of an ERP suite, including replacing the existing Telnet connection to the server with SSL, as well as providing a mechanism for session recovery should the connection be lost. Also responsible for rewriting the entire front-end in JavaFX to be used on multiple platforms. |
| 2012 – 2014    | <b>University of the Witwatersrand, Johannesburg</b><br><i>Tutor</i><br>Responsible for setting and conducting tutorials and lab sessions, as well as marking test scripts.  |

## EDUCATION

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| 2017 – Present | PhD in COMPUTER SCIENCE, <b>University of the Witwatersrand, Johannesburg</b><br>Research topic: “Learning Portable Symbolic Representations”   |
| 2014 – 2016    | MSc in COMPUTER SCIENCE, <b>University of the Witwatersrand, Johannesburg</b> ( <i>with distinction</i> )<br>Thesis: “The Effect of Simulation Bias on Action Selection in Monte Carlo Tree Search” |
| 2013           | BSc (Hons) in COMPUTER SCIENCE, <b>University of the Witwatersrand, Johannesburg</b> ( <i>with distinction</i> )<br>Thesis: “Augmenting Chess Evaluation Functions with Neural Networks”            |
| 2010 – 2012    | BSc in COMPUTER SCIENCE and COMPUTATIONAL & APPLIED MATHEMATICS, <b>University of the Witwatersrand, Johannesburg</b> ( <i>with distinction</i> )   |
| 2005 – 2009    | IEB National Senior Certificate, <b>King David High School Linksfield, Johannesburg</b><br>Dux scholar, 9 distinctions, IEB top 50 ranking  |

## PUBLICATIONS

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- July 2018 | **Learning to Plan with Portable Symbols,**  
S. James, B. Rosman & G. Konidaris  
*ICML/IJCAI/AAMAS 2018 Workshop on Planning and Learning*  
Stockholm, Sweden
- July 2018 | **Learning Portable Symbolic Representations,**  
S. James  
*2018 IJCAI Doctoral Consortium (extended abstract)*  
Stockholm, Sweden
- February 2017 | **An Analysis of Monte Carlo Tree Search,**  
S. James, G. Konidaris & B. Rosman  
*Proceedings of the Thirty-First AAAI Conference on Artificial Intelligence*  
San Francisco, USA
- July 2016 | **An Investigation into the Effectiveness of Heavy Rollouts in UCT,**  
S. James, B. Rosman & G. Konidaris  
*General Intelligence in Game-Playing Agents (GIGA'16) Workshop at IJCAI*  
New York, USA
- March 2016 | **The Effect of Simulation Bias on Action Selection in Monte Carlo Tree Search,**  
S. James  
*MSc Thesis*  
University of the Witwatersrand, Johannesburg

## PRESENTATIONS

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- July 2018 | **Learning to Plan with Portable Symbols,**  
*Presented at the ICML/IJCAI/AAMAS 2018 Workshop on Planning and Learning*  
Stockholm, Sweden
- February 2017 | **An Analysis of Monte Carlo Tree Search,**  
*Presented at the Thirty-First AAAI Conference on Artificial Intelligence*  
San Francisco, USA
- July 2016 | **An Investigation into the Effectiveness of Heavy Rollouts in UCT,**  
*Presented at the General Intelligence in Game-Playing Agents (GIGA'16) Workshop at IJCAI*  
New York, USA

## ACADEMIC SERVICE AND MEMBERSHIP

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- Reviewing | ICML (2018), IJCAI (2017, 2018), ICLR (2018), AISTATS (2018), NIPS (2017), AAMAS (2017), ICDL (2018)
- Membership | Association for the Advancement of Artificial Intelligence (AAAI) since 2017.

## AWARDS AND SCHOLARSHIPS

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2018	<b>Google Africa PhD Fellowship</b> Domain: Machine Learning
2017	<b>PV Tobias Educational Bursary</b> Awarded to academically excellent candidates
2013	<b>Chancellor's Gold Medal</b> Most distinguished graduate of the year <b>Samuel Goodman Memorial Medal</b> Most distinguished Honours graduate in the Faculty of Science <b>Liberty Life Gold Medal</b> Outstanding performance in Computer Science Honours <b>PG Honours Merit Award</b> Awarded to students with an excellent academic record
2012	<b>Liberty Life Gold Medal</b> Outstanding performance in Computer Science III <b>Computer Science School Prize</b> Highest mark in Computer Science III <b>University Council Merit Scholarship</b> Awarded to continuing students for outstanding examination results
2011	<b>Liberty Life Silver Medal</b> Outstanding performance in Computer Science II <b>Computer Science School Prize</b> Highest mark in Computer Science II <b>Computational &amp; Applied Mathematics School Prize</b> Outstanding achievement in Computational & Applied Mathematics II <b>University Council Merit Scholarship</b> Awarded to continuing students for outstanding examination results
2010	<b>Liberty Life Bronze Medal</b> Outstanding performance in Computer Science I <b>Computer Science School Prize</b> Highest mark in Computer Science I <b>University Entrance Scholarship</b> Awarded to students on the basis of outstanding matriculation results