

# EuroGP programme (draft at 22 Feb)

## Wednesday 30 March 2016

### 11:10-13:00 Session 1 (Chair: )

Full presentations: *Models of Evolution*

*Genetic Programming based Hyper-heuristics for Dynamic Job Shop Scheduling: Cooperative Coevolutionary Approaches*

John Park, Yi Mei, Su Nguyen, Gang Chen, Mengjie Zhang

*A Genetic Programming Approach for the Traffic Signal Control Problem with Epigenetic Modifications*

Esteban Ricalde, Wolfgang Banzhaf

*Plastic Fitness Predictors Coevolved with Cartesian Programs*

Michal Wiglasz, Michaela Drahosova

Short presentations: *Applications*

*Search-Based SQL Injection Attacks Testing using Genetic Programming*

Benjamin Aziz, Mohamed Bader, Cerana Hippolyte

*Towards Automated Strategies in Satisfiability Modulo Theory*

Nicolás Gálvez Ramírez, Youssef Hamadi, Eric Monfroy, Frédéric Saubion

*Patterns for Constructing Mutation Operators: Limiting the Search Space in a Software Engineering Application*

Thomas Kühne, Heiko Hamann, Svetlana Arifulina, Gregor Engels

*Iterative Cartesian Genetic Programming: Creating general algorithms for solving Travelling Salesman Problems*

Patricia Ryser-Welch, Julian F. Miller, Jerry Swan, Martin A. Trefzer

### 14:00-15:50 Session 2 (Chair: )

Full presentations: *Classification*

*One-class Classification for Anomaly Detection with Kernel Density Estimation and Genetic Programming*

Van Loi Cao, Miguel Nicolau, James McDermott

*On the Impact of Class Imbalance in GP Streaming Classification with Label Budgets*

Sara Khanchi, Malcolm Iain Heywood, Nur Zincir-Heywood

*Genetic Programming for Region Detection, Feature Extraction, Feature Construction and Classification in Image Data*

Andrew Lensen, Harith Al-Sahaf, Mengjie Zhang, Bing Xue

*A Genetic Programming-based Imputation Method for Classification with Missing Data*

Cao Truong Tran, Mengjie Zhang, Peter Andreae

Short presentations: *Foundations*

*Modelling Evolvability in Genetic Programming*

Benjamin Fowler, Wolfgang Banzhaf

*Grammar Design for Derivation Tree Based Genetic Programming Systems*

Stefan Forstenlechner, Miguel Nicolau, David Fagan, Michael O'Neill

*Geometric Semantic Genetic Programming is Overkill*

Tomasz P. Pawlak

*Semantic Geometric Initialization*

Tomasz P. Pawlak, Krzysztof Krawiec

**17:00-18:50 Session 3 : *Best Papers* (Chair: )**

*Evolutionary Approximation of Edge Detection Circuits*

Petr Dvoracek, Lukas Sekanina

*Surrogate Fitness via Factorization of Interaction Matrix*

Paweł Liskowski, Krzysztof Krawiec

*Scheduling in Heterogeneous Networks using Grammar-based Genetic Programming*

David Lynch, Michael Fenton, Stepan Kucera, Holger Claussen, Michael O'Neill

*On the Analysis of Simple Genetic Programming for Evolving Boolean Functions*

Andrea Mambrini, Pietro S. Oliveto