

Contents

Regular Papers

The Effect of Distinct Geometric Semantic Crossover Operators in Regression Problems	3
<i>Julio Albinati, Gisele L. Pappa, Fernando E.B. Otero, and Luiz Otávio V.B. Oliveira</i>	
Learning Text Patterns Using Separate-and-Conquer Genetic Programming. . . .	16
<i>Alberto Bartoli, Andrea De Lorenzo, Eric Medvet, and Fabiano Tarlao</i>	
Improving Geometric Semantic Genetic Programming with Safe Tree Initialisation	28
<i>Grant Dick</i>	
On the Generalization Ability of Geometric Semantic Genetic Programming	41
<i>Ivo Gonçalves, Sara Silva, and Carlos M. Fonseca</i>	
Automatic Derivation of Search Objectives for Test-Based Genetic Programming	53
<i>Krzysztof Krawiec and Paweł Liskowski</i>	
Evolutionary Design of Transistor Level Digital Circuits Using Discrete Simulation	66
<i>Vojtech Mrazek and Zdenek Vasicek</i>	
M3GP – Multiclass Classification with GP.	78
<i>Luis Muñoz, Sara Silva, and Leonardo Trujillo</i>	
Evolving Ensembles of Dispatching Rules Using Genetic Programming for Job Shop Scheduling	92
<i>John Park, Su Nguyen, Mengjie Zhang, and Mark Johnston</i>	
Attributed Grammatical Evolution Using Shared Memory Spaces and Dynamically Typed Semantic Function Specification.	105
<i>James Vincent Patten and Conor Ryan</i>	
Indirectly Encoded Fitness Predictors Coevolved with Cartesian Programs . . .	113
<i>Michaela Sikulova, Jiri Hulva, and Lukas Sekanina</i>	
Tapped Delay Lines for GP Streaming Data Classification with Label Budgets	126
<i>Ali Vahdat, Jillian Morgan, Andrew R. McIntyre, Malcolm I. Heywood, and A. Nur Zincir-Heywood</i>	

Cartesian GP in Optimization of Combinational Circuits with Hundreds
of Inputs and Thousands of Gates 139
Zdenek Vasicek

Posters

Genetic Programming for Feature Selection and Question-Answer Ranking
in IBM Watson. 153
Urvesh Bhowan and D.J. McCloskey

Automatic Evolution of Parallel Recursive Programs 167
Gopinath Chennupati, R. Muhammad Atif Azad, and Conor Ryan

Proposal and Preliminary Investigation of a Fitness Function for Partial
Differential Models 179
Igor S. Peretta, Keiji Yamanaka, Paul Bourguine, and Pierre Collet

Evolutionary Methods for the Construction of Cryptographic
Boolean Functions. 192
*Stjepan Picek, Domagoj Jakobovic, Julian F. Miller, Elena Marchiori,
and Lejla Batina*

TEMPLAR – A Framework for Template-Method Hyper-Heuristics 205
Jerry Swan and Nathan Burles

Circuit Approximation Using Single- and Multi-objective Cartesian GP. 217
Zdenek Vasicek and Lukas Sekanina

Author Index 231

Genetic Programming

18th European Conference, EuroGP 2015,

Copenhagen, Denmark, April 8-10, 2015, Proceedings

Machado, P.; Heywood, M.I.; McDermott, J.; Castelli, M.;

García-Sánchez, P.; Burelli, P.; Risi, S.; Sim, K. (Eds.)

2015, XII, 231 p. 56 illus., Softcover

ISBN: 978-3-319-16500-4