Список литературы

- [Araujo et al.(2003)Araujo, Mesquita, and Pedroza] S. G. Araujo, A. Mesquita, and A. C. P. Pedroza, "Using genetic programming and high level synthesis to design optimized datapath," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 434–445. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Aunet and Hartmann(2003)] S. Aunet and M. Hartmann, "Real-time reconfigurable linear threshold elements and some applications to neural hardware," in *Evolvable Systems: From Biology to Hardware*, Fifth International Conference, ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 365–376. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Azhar and Dimond(2003)] M. A. H. B. Azhar and K. R. Dimond, "Hardware implementation of a genetic controller and effects of training on evolution," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 344–354. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Van Belle et al.(2003)Van Belle, Mens, and D'Hondt] W. Van Belle, T. Mens, and T. D'Hondt, "Using genetic programming to generate protocol adaptors for interprocess communication," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 422–433. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Bentley(2003)] P. J. Bentley, "Evolving fractal proteins," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 81–92. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Blynel(2003)] J. Blynel, "Evolving reinforcement learning-like abilities for robots," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 320–331. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Canham and Tyrrell(2003)] R. Canham and A. M. Tyrrell, "A learning, multi-layered, hardware artificial immune system implemented upon an embryonic array," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 174–185. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn= 3-540-00730-X
- [Coello et al.(2003)Coello, Luna, and Aguirre] C. A. C. Coello, E. H. Luna, and A. H. Aguirre, "Use of particle swarm optimization to design combinational logic circuits," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 398–409. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Corno et al.(2003)Corno, Cumani, and Squillero] F. Corno, F. Cumani, and G. Squillero, "Exploiting auto-adaptive μ-GP for highly effective test programs generation," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 262–273. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn= 3-540-00730-X

- [Downing(2003)] K. L. Downing, "Developmental models for emergent computation," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 105–116. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Eriksson et al.(2003)Eriksson, Torres, Mitchell, Tucker, Lindsay, Halliday, Rosenberg, Moreno, and Villa] J. Eriksson, O. Torres, A. Mitchell, G. Tucker, K. Lindsay, D. Halliday, J. Rosenberg, J.-M. Moreno, and A. E. P. Villa, "Spiking neural networks for reconfigurable POEtic tissue," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 165–173. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Estrada(2003)] G. G. Estrada, "A note on designing logical circuits using SAT," in Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 410–421. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl? isbn=3-540-00730-X
- [de Degaris et al.(2003)de Degaris, Gaur, and Sriram] H. de Degaris, A. Gaur, and R. Sriram, "Quantum versus evolutionary systems. total versus sampled search," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 457–466. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Garvie and Thompson(2003)] M. Garvie and A. Thompson, "Evolution of self-diagnosing hardware," in Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 238–248. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Goldsmith(2003)] R. Goldsmith, "Real world hardware evolution: A mobile platform for sensor evolution," in Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 355–364. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Greensted and Tyrrell(2003)] A. J. Greensted and A. M. Tyrrell, "Fault tolerance via endocrinologic based communication for multiprocessor systems," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 24–34. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [van de Haar and Hoekstra(2003)] R. van de Haar and J. Hoekstra, "Simulation of a neural node using SET technology," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 377–386. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Aguirre et al.(2003)Aguirre, Equihua, and Coello Coello] A. H. Aguirre, E. C. G. Equihua, and C. A. Coello Coello, "Synthesis of boolean functions using information theory," in Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 218–227. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Kumar and Bentley(2003)] S. Kumar and P. J. Bentley, "Biologically inspired evolutionary development," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference*,

- ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 57–68. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Li and Lim(2003)] J. H. Li and M. H. Lim, "Evolvable fuzzy system for ATM cell scheduling," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 208–217. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Lohn et al.(2003)Lohn, Larchev, and DeMara] J. Lohn, G. Larchev, and R. DeMara, "A genetic representation for evolutionary fault recovery in Virtex FPGAs," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 47–56. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Lund et al.(2003)Lund, Larsen, and Østergaard] H. H. Lund, R. L. Larsen, and E. H. Østergaard, "Distributed control in self-reconfigurable robots," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 296–307. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Miller and Thomson(2003)] J. F. Miller and P. Thomson, "A developmental method for growing graphs and circuits," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 93–104. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Ortega-Sanchez et al.(2003)Ortega-Sanchez, Torres-Jimenez, and Morales-Cruz] C. Ortega-Sanchez, J. Torres-Jimenez, and J. Morales-Cruz, "Routing of embryonic arrays using genetic algorithms," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 249–261. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Østergaard and Lund(2003)] E. H. Østergaard and H. H. Lund, "Co-evolving complex robot behavior," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 308–319. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [van Remortel et al.(2003)van Remortel, Ceuppens, Defaweux, Lenaerts, and Manderick] P. van Remortel, J. Ceuppens, A. Defaweux, T. Lenaerts, and B. Manderick, "Developmental effects on tuneable fitness landscapes," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 117–128. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Roggen et al.(2003)Roggen, Floreano, and Mattiussi] D. Roggen, D. Floreano, and C. Mattiussi, "A morphogenetic evolutionary system: Phylogenesis of the POEtic circuit," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 153–164. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Schmitz et al.(2003)Schmitz, Hohmann, Meier, Schemmel, and Schurmann] T. Schmitz, S. Hohmann, K. Meier, J. Schemmel, and F. Schurmann, "Speeding up hardware evolution: A coprocessor for evolutionary algorithms," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow,

- and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 274–285. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Schnier and Yao(2003)] T. Schnier and X. Yao, "Using negative correlation to evolve fault-tolerant circuits," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 35–46. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Sekanina(2003)] L. Sekanina, "Virtual reconfigurable circuits for real-world applications of evolvable hardware," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 186–197. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Smith et al.(2003)Smith, Crouch, and Tyrrell] S. L. Smith, D. P. Crouch, and A. M. Tyrrell, "Evolving image processing operations for an evolvable hardware environment," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 332–343. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Tanaka et al.(2003)Tanaka, Kameda, Yamamoto, and Ohuchi] F. Tanaka, A. Kameda, M. Yamamoto, and A. Ohuchi, "The effect of the bulge loop upon the hybridization process in DNA computing," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 446–456. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Tempesti et al.(2003)Tempesti, Roggen, Sanchez, Thoma, Canham, and Tyrrell] G. Tempesti, D. Roggen, E. Sanchez, Y. Thoma, R. Canham, and A. M. Tyrrell, "Ontogenetic development and fault tolerance in the POEtic tissue," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 141–152. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Teuscher and Capcarrere(2003)] C. Teuscher and M. S. Capcarrere, "On fireflies, cellular systems, and evolware," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 1–12. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Torresen(2003)] J. Torresen, "Evolving multiplier circuits by training set and training vector partitioning," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 228–237. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Tufte and Haddow(2003)] G. Tufte and P. C. Haddow, "Building knowledge into developmental rules for circuit design," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 69–80. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Tyrrell et al.(2003)Tyrrell, Sanchez, Floreano, Tempesti, Mange, Moreno, Rosenberg, and Villa]
 A. M. Tyrrell, E. Sanchez, D. Floreano, G. Tempesti, D. Mange, J.-M. Moreno, J. Rosenberg, and A. E. P. Villa, "POEtic tissue: An integrated architecture for bio-inspired hardware," in Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 129–140. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X

- [Venkateswaran and Chandramouli(2003)] N. Venkateswaran and C. Chandramouli, "General purpose processor architecture for modeling stochastic biological neuronal assemblies," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 387–397. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Yasunaga et al.(2003)Yasunaga, Yoshihara, and Kim] M. Yasunaga, I. Yoshihara, and J. H. Kim, "Gene finding using evolvable reasoning hardware," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 198–207. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Zebulum et al.(2003)Zebulum, Stoica, Keymeulen, Ferguson, Duong, Guo, and Vorperian] R. S. Zebulum, A. Stoica, D. Keymeulen, M. I. Ferguson, V. Duong, X. Guo, and V. Vorperian, "Automatic evolution of signal separators using reconfigurable hardware," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 286–295. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X
- [Zinchenko et al.(2003)Zinchenko, Muhlenbein, Kureichik, and Mahnig] L. Zinchenko, H. Muhlenbein, V. Kureichik, and T. Mahnig, "A comparison of different circuit representations for evolutionary analog circuit design," in *Evolvable Systems: From Biology to Hardware, Fifth International Conference, ICES 2003*, ser. LNCS, A. M. Tyrrell, P. C. Haddow, and J. Torresen, Eds., vol. 2606. Trondheim, Norway: Springer-Verlag, 17-20 Mar. 2003, pp. 13–23. [Online]. Available: http://www.springer.de/cgi-bin/search_book.pl?isbn=3-540-00730-X