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”Managing Redundancies in Proof Search”

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Naučni radovi:

Radovi u međunarodnim časopisima:

1. Lutovac N D., **Lutovac A T.**: ”Towards an advanced computer interlocking system”, FACTA UNIVERSITATIS (NIS), Series: Electronics and Energetics, Vol. 11, No.1 1998, pp. 25-49. (M52)
2. Harland J., **Lutovac T.**, Winikoff M.: ”Goal-Directed Proof Search in Multiple-Conclusioned Intuitionistic Logic”, Proceedings of the First International Conference on Computational Logic, published as *Lecture Notes in Artificial Intelligence* 1861, John Lloyd at all. (Eds.), Springer-Verlag, London, 2000, pp. 254-268. (IF 0.402)
3. **Tatjana Lutovac** and James Harland, *Issues in the Analysis of Proof-Search Strategies in Sequential Presentations of Logics*, Proceedings of the IJCAR’04 Workshop on Strategies in Automated Deduction, Electronic Notes in Theoretical Computer Science Volume 125(2), 2005, pp. 115-147
4. **Tatjana Lutovac** and James Harland, *A Redundancy Analysis of Sequent Proofs*. Proceedings of the International Conference on Automated Reasoning with Analytic Tableaux and Related Methods (TABLEAUX 2005), Germany 2005, published as *Lecture Notes in Artificial Intelligence* 3702, Bernhard Beckert editor, Springer-Verlag, 2005, pp. 76-90. (IF 0.402)
5. **Tatjana Lutovac** and James Harland, *Detecting Loops During Proof Search in Propositional Affine Logic*, Journal of Logic and Computation, Volume 16, Number 1, 2006, pp. 61-133. (ISSN 0955-792X, IF 0.586)
6. **Lutovac T.**: ”Specifying sequent Calculi Rules for Managing Some Redundancies in Proof Search”, The IPSI BgD Transactions on Advanced Research, 2007, Volume 3, Number 1, pp. 15-20.

Radovi u zbornicima međunarodnih konferencija:

1. **Lutovac T.**, Harland J.: "Contributions to Strategies and Heuristics for Automated Theorem Proving in Mathematics", Proceedings of the Twentieth Australasian Computer Science Conference, Sydney, Australia, 1997, pp.46-55.
2. **Lutovac T.**, Harland J.: "Strategies for Logic Programming Languages", Proceedings of CADE-14 Workshop on Strategies in Automated Deduction, 14th International Conference on Automated Deduction CADE-14, Bernhard Gramlich and Hélène Kirchner eds. Townsville, Australia, 1997, pp.27-36.
4. Harland J., **Lutovac T.**, Winikoff M.: "On Goal-Directed Proofs in Multiple-Conclusioned Intuitionistic Logic", Proceedings of the Australasian workshop on Computational Logic, Canberra, 2000, pp. 135-144.
5. **Lutovac T.**, Harland J.: "Issues in the Analysis of Proof-search Strategies in Sequential Presentations of Logics", Proceedings of the IJCAR'04 Workshop on Strategies in Automated Deduction, Cork, 2004, pp. 106-118.
6. **Lutovac T.**, Harland J.: "Detecting Loops During Proof Search in Propositional Affine Logic", Proceedings of the LICS'04 Workshop on Logics for Resources, Processes and Programs, Turku, Finland, 2004, pp. 133-145.

Radovi u zbornicima domaćih konferencija:

1. **Madžarević T.**, Cvetković D.: " Neke dopune strategije vođenja dokaza u dokazivač u teorema Ekspertnog sistema GRAPH", Zbornik radova SYM-OP-IS 93, 1993, pp.31-34.
2. **Lutovac T.:** "Towards an Automated Analyzer for Proof Search Strategies", Proceedings of 1st RMIT Computer Science Conference, Melbourne, Australia, December, 1995.
3. Lutovac N D., **Lutovac A T.:** "Hardware of an advanced computer interlocking system", Proceedings of JUZEL - The 3rd International Scientific Conference of Railway Experts, Nis, Yugoslavia, 1996, pp. 91 - 95.
4. **Lutovac T.:** "Contributions to Automating Proof Transformations", Proceedings of 2nd RMIT Computer Science Conference, Melbourne, Australia, 1996, pp. 83-93.
5. **Lutovac T.**, Harland J.: "Automated Analysis for Logic Programming Proof Systems", RMIT Technical Report 97-30, 1997.

6. Lutovac N D., **Lutovac A T.**: "Software of an advanced computer interlocking system", Proceedings of JUZEL - The 4th International Scientific Conference of Railway Experts, Vrnjačka Banja, Yugoslavia, 2 - 4 Oct. 1997, pp.74 - 79.
7. **Lutovac T.**: "Some Contributions to compact Representation of Sequent Proofs", XXXVIII Symp. on Operational Research SYMOPIS 2011, Zlatibor, 2011, pp. 72-75.

Saopštenja na Konferencijama:

1. **Lutovac T.**, Harland J.: "Contributions to Automating Design of Logic Programming Languages", Konferencija u čast 65 godina života prof. S. Prešića, Matematički Fakultet, Univerzitet u Beogradu, Septembar 1998.
2. **Lutovac T.**, Harland J.: "Redundancy analysis of sequent proofs in linear logic programming", presented at the XVI Conference on Applied Mathematics PRIM 2004, Budva, June, 2004.
3. **Lutovac T.**, Harland J.: "Goal-directed Proof Construction for Multiple-conclusioned Intuitionistic Logic", XI Kongres Matematičara Srbije i Crne Gore, Petrovac, 28.septembar -3 Oktobar, 2004.
4. **Lutovac T.**, Harland J.: " An Algebraic Approach to Redundancy Analysis of Sequent Proofs", International conference MAGT 2006 Conference, September 1-4, 2006. Belgrade.
5. **Lutovac T.:** "A Loop Detection Mechanism for Propositional Affine Logic", 12. srpski matematički kongres, Novi Sad, 2008.
6. **Lutovac T.:** "Some Contributions to Automated Reasoning About Permutations in Sequent Calculi Proof Search", XVIII Conference on Applied Mathematics, PRIM 2009, Subotica 2009.
7. **Lutovac T.:** "Some Contributions to Automating Manipulations with Sequent Calculi Proof Trees", International conference Combinatorics 2010, Verbania, Italy.
8. **Lutovac T.:**"Some Contributions to Compact Representation of Sequent Proofs", XXXVIII Symp. on Operational Research SYMOPIS 2011, Zlatibor, 2011.

Stručni radovi:

1. Cvetković D., **Lutovac T.:** "A Review of Publications of the Faculty of Electrical Engineering, Series: Mathematics and Physics (1956-1982)", Univ. Beograd, Publikacije Elektrotehničkog Fakulteta, Serija: Matematika, 9 (1998), pp. 3-6.

Udžbenici:

1. P.Vasić, B.Iričanin, M.Jovanović, **T.Madžarević**, B.Mihailović, Z.Radosavljević, S.Simić, D.Cvetković : "Zbirka zadataka iz matematike 1, Algebra (prvi deo)", Elektrotehnički fakultet, Beograd (izdanja: 1993, 1994, 1998, 2000, 2004.)

2. P.Vasić , B.Iričanin, M.Jovanović , B. Malešević, **T.Madžarević** , B.Mihailović, Z.Radosavljević, S.Simić, D.Cvetković : "Zbirka zadataka iz matematike 1, Algebra (drugi deo)", Elektrotehnički fakultet, Beograd (izdanja: 1994, 1995, 2001, 2004.)

Projekti:

2006 - 2010 učesnik na projektu Ministarstva za nauku br. 144013 *Reprezentacije logičkih struktura i njihova primena u kompjuterskim naukama.*

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