

# MATHFUZZLOG MEETING 2010

## THE PRESENT AND THE RECENT PAST

- 93 members, from 21 countries.
- Its own web domain: [www.mathfuzzlog.org](http://www.mathfuzzlog.org).

## Special issues in journals

- Special issue of *Journal of Logic and Computation*. It will contain 8 papers and it has been edited by Petr Cintula, George Metcalfe and Carles Noguera.
- Special issue of *Logic Journal of the IGPL*. It will contain 6 papers based on results presented at the conference “Logic, Algebra and Truth Degrees 2008”, and it has been edited by Roberto Cignoli, Francesc Esteva, Franco Montagna and Hiroakira Ono.
- Special issue of *Studia Logica* 94(2), 2010, entitled “Algebra and Probability in Many-Valued Reasoning”, edited by Ioana Leustean and Vincenzo Marra.

- Special issue of *Journal of Multiple-Valued Logic and Soft Computing* 16(3-5), 2010, entitled “Multiple-Valued Logic and its algebra”, edited by Anatolij Dvurecenskij, George Georgescu, Afrodita Iorgulescu, and Sergiu Rudeanu.
- Special issue of *Studia Logica*, entitled “Recent Developments related to Residuated Lattices and Substructural Logics”, edited by Nikolaos Galatos, Peter Jipsen, Tomasz Kowalski, Hiroakira Ono.  
**Open call! Submit!**

## Conferences and workshops

- Algebra and Probability in Many-Valued Logics, International Workshop on Logical and Algebraic aspects of Many-Valued Reasoning. Held at Technische Universität Darmstadt, Darmstadt, Germany, 7 - 9 May 2009. It was organized by Ioana Leustean and Vincenzo Marra.
- Non-Classical Mathematics 2009, Hejnice monastery, Hejnice, Czech Republic, 18 - 22 June 2009. It was organized by Petr Cintula and Libor Běhounek.
- Logical Models of Reasoning with Vague Information. Čejkovice, Czech Republic, 14 - 17 September 2009. It was organized by Petr Cintula, Chris Fermüller, Lluís Godo and Petr Hájek.

- The Beauty of Logic II: Meeting in the honor of Petr Hjek in the occasion of his 70th birthday. Prague, Czech Republic, 6 - 8 February 2010. It was organized by Petr Cintula and Zuzana Haniková.
- 31st Linz Seminar on Fuzzy Set Theory: Linz, Austria, 9 - 13 February 2010. Topic: Lattice-Based Logic and its Applications. Organized by Petr Cintula, Larry Stout and Peter Klement.
- ManyVal 2010: International workshop on the logical and algebraic aspects of many-valued reasoning. This year the topic was "Beyond algebraic semantics: bridging intended and formal interpretations of many-valued logics". Universit degli Studi dell'Insubria, Varese, Italy, 3 - 5 May 2010. Organized by Stefano Aguzzoli, Brunella Gerla and Vincenzo Marra.

- ISMVL 2010: 40th IEEE International Symposium on Multiple-Valued Logic. Barcelona, Catalonia, Spain, 26 - 28 May 2010. Organized by Francesc Esteva, Joan Gispert and Felip Manyà.
- ASubL4: Algebra and Substructural Logics is a workshop on algebraic structures related to substructural logic. JAIST, Ishikawa, Japan, 8 - 10 June 2010. Organized by Hiroakira Ono, Constantine Tsinakis and Norbert Preining.
- Logic, Algebra and Truth Degrees 2010, Prague, 7 - 11 September 2010. Organized by Petr Cintula, Petr Hájek and colleagues.

## Sessions in conferences

- 10th European Conference on Symbolic and Quantitative Approaches to Reasoning with Uncertainty ECSQARU 2009, Verona, Italy, 1 - 3 July 2009. (Session organized by Stefano Aguzzoli, Brunella Gerla, Lluís Godo, Vincenzo Marra and Franco Montagna).
- Joint conference of the International Fuzzy Systems Association IFSA and the European Society for Fuzzy Logic and Technology EUSFLAT, Lisbon, Portugal, 20 - 24 July 2009. (Session organized by Petr Cintula and Carles Noguera).
- FSTA 2010: Tenth International Conference on Fuzzy Set Theory and Applications. Liptovsk Jn, Slovakia, 1 - 5 February 2010. (Session organized by Libor Běhounek).

- UNILOG 2010: Universal Logic 2010: Towards a general theory of logics, 3rd World Congress and School on Universal Logic. Lisbon, Portugal, 18 - 25 April 2010. (Special session on Non-Classical Mathematics organized by Libor Běhounek and Petr Cintula).
- IPMU 2010: 13th International Conference on Information Processing and Management of Uncertainty in Knowledge-Based Systems. Conference Center Westfalenhallen, Dortmund, Germany, 28 June - 2 July 2010. (Session organized by Tommaso Flaminio, Lluís Godo and Enrico Marchioni).
- MFCS & CSL 2010: Joint conference 35th International Symposiums on Mathematical Foundations of Computer Science and 19th EACSL Annual Conferences on Computer Science Logic. Brno, Czech Republic, 21 - 29 August 2010. (Satellite workshop on Mathematical Foundations of Fuzzy Logics organized by Matthias Baaz, Libor Běhounek, Agata Ciabattoni, Petr Cintula and Norbert Preining).

## THE FUTURE

The handbook of Mathematical Fuzzy Logic. College Publications.  
Edited by Petr Cintula, Petr Hájek and Carles Noguera

1. An introduction to Mathematical Fuzzy Logic (Běhounek, Cintula, Hájek)
2. An abstract framework for fuzzy logics (Cintula, Noguera)
3. Algebraic Semantics of fuzzy logics (Horčík, Noguera)
4. Proof Theory of fuzzy logics (Metcalf)
5. Łukasiewicz logic and MV-algebras (Di Nola, Leustean)

6. Gödel logics (Baaz, Preining)
7. BL Logic and BL-algebras (Busaniche, Montagna)
8. Fuzzy logics with enriched language (Esteva, Godo, Marchioni)
9. Free algebras and functional representation in fuzzy logics (Aguzzoli, Bova, Gerla)
10. Computational complexity of fuzzy logics (Haniková)
11. Arithmetical complexity of first-order logics (Hájek, Montagna, Noguera)

# LATD 2012 IN JAPAN!

Organized by Hiroakira Ono,  
Kazushige Terui and Norbert  
Preining.