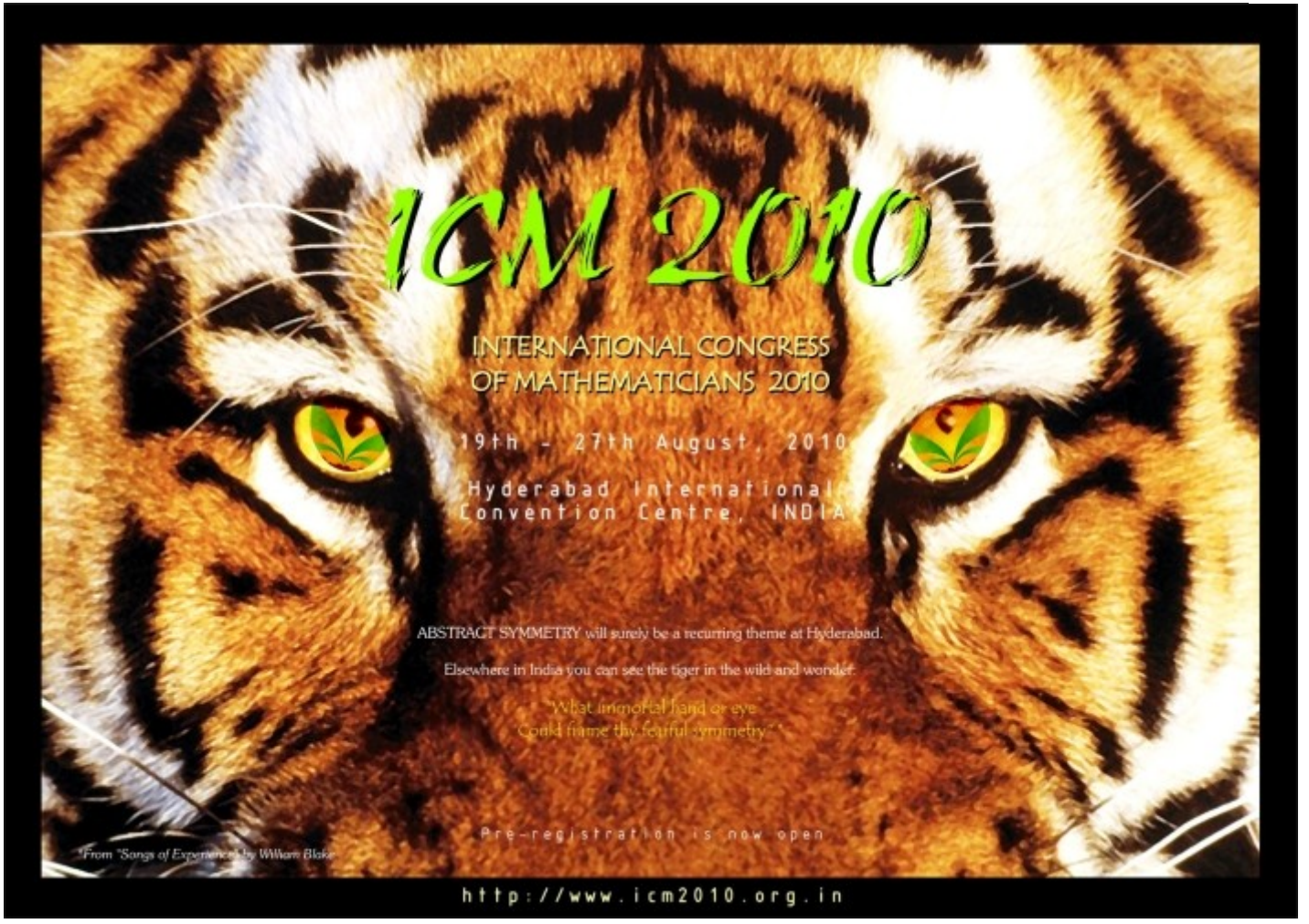
Międzynarodowy Kongres Matematyków



ICM 2010, Hyderabad

Ceremonia otwarcia ICM 2010

Laureaci medali Fielda, medalu Cherna i nagród Nevanlinny oraz Gaussa

M.Groetschel *S.Smirnov* *Ngo Bao Chau* *Prezydent Indii* *D. Spielman* *L. Nirenberg* *M. S.Raghunathan*

E.Lindenstraus *C. Villani* *Y. Meyer* *L. Lovasz*

MEDALIŚCI FIELDSA 2010

Elon Lindenstrauss (Jerozolima)
“For his results on measure rigidity in ergodic theory, and their applications to number theory.”

Ngô Bao Châu (Paris)
“For his proof of the Fundamental Lemma in the theory of automorphic forms through the introduction of new algebro-geometric methods.”

Stanislav Smirnov (Genewa)
“For the proof of conformal invariance of percolation and the planar Ising model in statistical physics.”

Cédric Villani (Paryż)
“For his proofs of nonlinear Landau damping and convergence to equilibrium for the Boltzmann equation.”

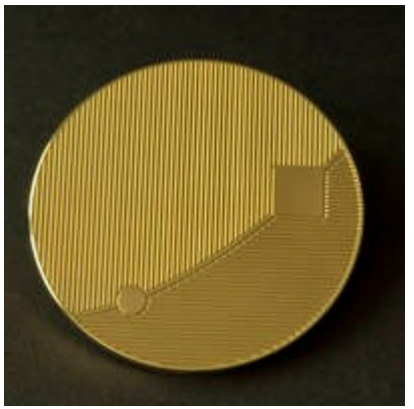
The 2010 Rolf Nevanlinna Prize

Daniel Spielman (Yale University)

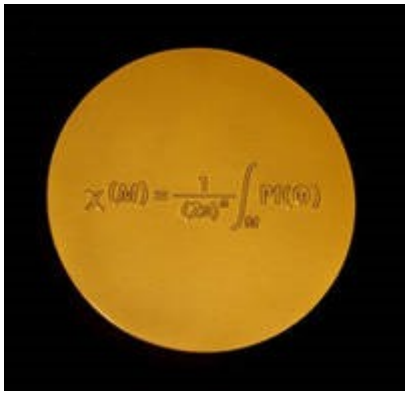
"for smoothed analysis of Linear Programming, algorithms for graph-based codes and applications of graph theory for Numerical Computing."

The 2010 Gauss Prize

Yves Meyer (ÉNSde Cachan)



"for fundamental contributions to number theory, operator theory and harmonic analysis, and his pivotal role in the development of wavelets and multiresolution analysis".



<u>The 2010 Chern Medal Award</u>

Louis Nirenberg (Courant Institute NYU)

"for his role in the formulation of the modern theory of non-linear elliptic partial differential equations and for mentoring numerous students and post-docs in this area".

This prize is jointly awarded by IMU and the Chern Medal Foundation (CMF). CMF funds the Chern Medal Award. The Medalist receives a cash prize of US$ 250,000. In addition, each Medalist may nominate one or more organizations to receive funding totaling US$ 250,000, for the support of research, education, or other outreach programs in the field of mathematics.

Some Trends in Modern Mathematics and the Fields Medal

Michael Monastyrsky
Institute for Theoretical and Experimental Physics, Moscow
“The Legacy of John Charles Fields," Toronto, June 7-9, 2000.

Mathematics is a single subject, a fact that is not always obvious when you study the daily reality of research. (...) This realization is one by-product resulting from analysis of the works of Fields medalists. Although honours went to authors of the greatest achievments obtained in the years immediately preceding each congress and sometimes in areas of mathematics widely separated from one another, truly wonderful connections between them were discovered with the passage of time. For that reason **an ϵ- grid over the works of the Field medalists covers a signicant portion of the achievements of modern mathematics.**

Program Committee ICM 2010

Hendrik W. Lenstra (chair), Universiteit Leiden, Netherlands

assistant to the chair: Jeanine Daems, Universiteit Leiden, Netherlands

Louis H. Y. Chen, National University of Singapore, Singapore

Dusa McDuff, Barnard College, Columbia University, New York, U. S. A.

Etienne Ghys, CNRS – ´Ecole Normale Sup´erieure de Lyon, France

Ta-Tsien Li, Fudan University, Shanghai, China

Jose Antonio de la Pena, Universidad Nacional Aut´onoma de M´exico,

Alfio Quarteroni, EPFde Lausanne, Switzerland, and Politecnico di Milano,

S. Ramanan, Chennai Mathematical Institute, India

Terence Tao, University of California, Los Angeles, U. S. A.

Eva Tardos, Cornell University, Ithaca, U. S. A.

Anatoly Vershik, St. Petersburg branch of Steklov Mathematical Institute,

IMU/PC-OC-Guidelines

"Every ICM should reflect the current activity of mathematics in the world, present the best work being carried out in all mathematical subfields and different regions of the world, and thus, point to the future of mathematics. The invited speakers at an ICM should be mathematicians of the highest quality who are able to present current research to a broad mathematical audience."

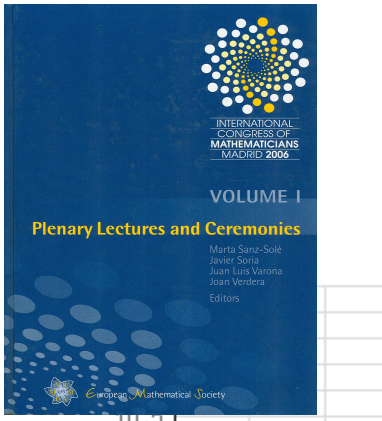
Thematic Sections at ICM2010

(Topology related talks)

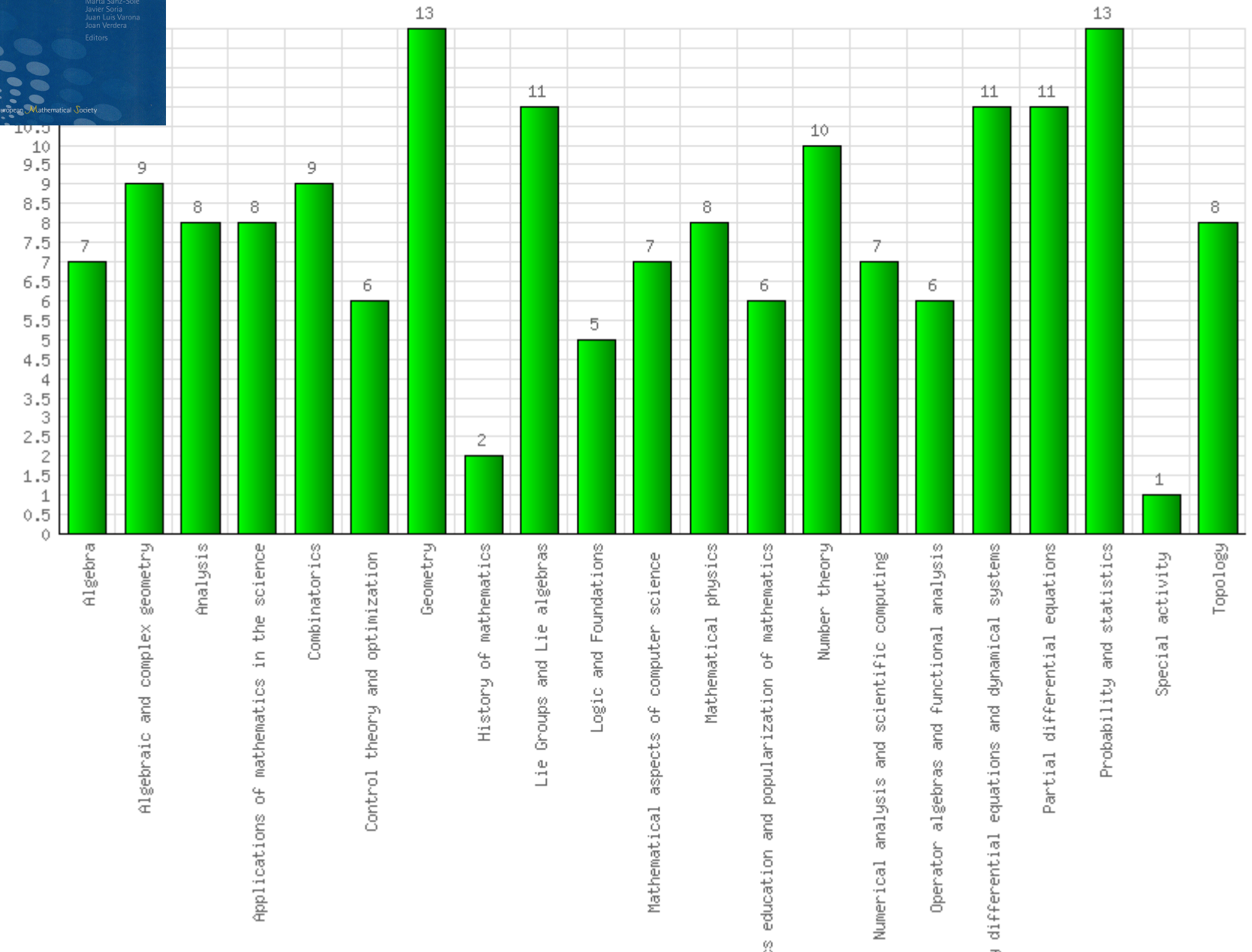
01. Logic and Foundations (LF)
02. Algebra (A)
03. Number Theory (NT)
04. Algebraic and Complex Geometry (ACG)
05. Geometry (G)
06. Topology (T)
07. Lie Groups and Lie Algebras (LGLA)
08. Analysis (A)
09. Operator Algebras and Functional Analysis (OAFA)
10. Ordinary Differential Equations and Dynamical Systems (ODEDS)
11. Partial Differential Equations (PDE)
12. Mathematical Physics (MP)
13. Probability and Statistics (PS)
14. Combinatorics (C)
15. Mathematical Aspects of Computer Science (MACS)
16. Numerical Analysis and Scientific Computing (NASC)
17. Control Theory and Optimization (CTO)
18. Applications of Mathematics in the Sciences (AMS)
19. Mathematics Education and Popularization of Mathematics (MEPM)
20. History of Mathematics (HM)

IMU Sections

1. Logic and foundations (P 1/S 3)
2. Algebra (P 1/S 6)
3. Number Theory (P1/S10)
4. Algebraic and complex geometry (P 2/S 12)
5. Geometry (P 2/S 12)
6. Topology (P 0/S 12)
7. Lie theory and generalizations (P 0/S 9)
8. Analysis (P 1/S 7)
9. Functional analysis and applications (P 0/S 6)
10. Dynamical systems and ordinary differential equations (P 2/S 10)
11. Partial differential equations (P 2 /S 9)
12. Mathematical physics (P 1/S 7)
13. Probability and Statistics (P 2 /S 11)
14. Combinatorics (P 0/S 9)
15. Mathematical aspects of computer science (P 2/S 6)
16. Numerical analysis and scientific computing (P 0/S 6)
17. Control theory and optimization (P 0/S 6)
18. Mathematics in science and technology (P 0/S 8)
19. Mathematics education and popularization of mathematics (P 1/S 1)
20. History of Mathematics (P 1/S 2)



Liczba wykładów w sekcjach – Madryt 2006



WYKŁADY PLENARNE

Hugh Woodin University of California, Berkeley, USA
Strong axioms of infinity and the search for V (1)

R. Parimala Emory University, USA
Arithmetic of linear algebraic groups over two-dimensional fields (2)

A. N. Parshin Steklov Mathematical Institute, Russia
Representations of higher adelic groups and arithmetics (3)

*** Claire Voisin Institut de Mathématiques de Jussieu, France ***
On the cohomology of algebraic varieties (4)

Ngo Bao Chau Institute for Advanced Studies, Princeton, USA
Endoscopy of automorphic forms (4)

* Richard Schoen Stanford University, USA *
Riemannian manifolds of positive curvature (5)

Peter Jones Yale University, USA
Eigenfunctions and coordinate systems on manifolds (5)

WYKŁADY PLENARNE cd

Thomas J. R. Hughes University of Texas, Austin, USA
Isogeometric analysis (8)

Artur Avila IMPA, Rio de Janeiro, Brazil
Dynamics of renormalization operators (10)

* Hillel Furstenberg Hebrew University of Jerusalem, Israel *
Ergodic structures and non-conventional ergodic theorems (10)

Carlos Kenig University of Chicago, USA
The global behaviour of solutions to critical nonlinear dispersive equations (11)

Jean-Michel Coron Université Pierre et Marie Curie, France
On the controllability of nonlinear partial differential equations (11)

Nicolai Reshetikhin University of California, Berkeley, USA
Mathematics of quantum field theory (12)

WYKŁADY PLENARNE cd

David Aldous University of California, Berkeley,
Exchangeability and continuum limits of discrete random structures (13)

Shige Peng Shandong University, P. R. of China
Backward stochastic differential equations, nonlinear expectations and their applications (13)

Irit Dinur Weizmann Institute of Science, Israel
Probabilistically checkable proofs and codes (15)

Stanley Osher University of California, Los Angeles, USA
New algorithms in image science (15)

Kim Plofker Union College, USA
Indian rules, Yavana rules: foreign identity and the transmission of mathematics (19/20)

R. Balasubramanian Institute of Mathematical Sciences, India
Highly composite (19/20)

Polscy matematycy, mówcy na ICM 1990 - 2010

2010 Hyderabad

Tadeusz Januszkiewicz (USA/PL) Geometry

2006 Madrid

Henryk Iwaniec (USA) Plenary
Tomasz Łuczak (UAM) Combinatorics
Agata Smoktunowicz (IM PAN/GB) Algebra
Stanisław Szarek (USA) Functional Analysis
Jarosław Włodarczyk (USA) Algebraic and Complex Geometry

2002 Beijing

Rafał Latała (UW) Operator Algebras & Functional Analysis
Maciej P.Wojtkowski (USA/PL) Mathematical Physics

1998 Berlin

Krystyna Kuperberg (USA) ODE & Dynamical System
Ludomir Newelski (UWr) Logic
Grzegorz Świątek (USA/PL) ODE & Dynamical System
Nicole Tomczak-Jaegermann (Canada) Analysis

1990 Kyoto

Stanisław L. Woronowicz (UW) Mathematical Physics

STATYSTYKA MÓWCÓW SEKCYJNYCH WG KRAJU I PŁCI

PLENARY

USA	12
France	2.5
Israel	2
China	1
India	1
Russia	1
Brazil	0.5

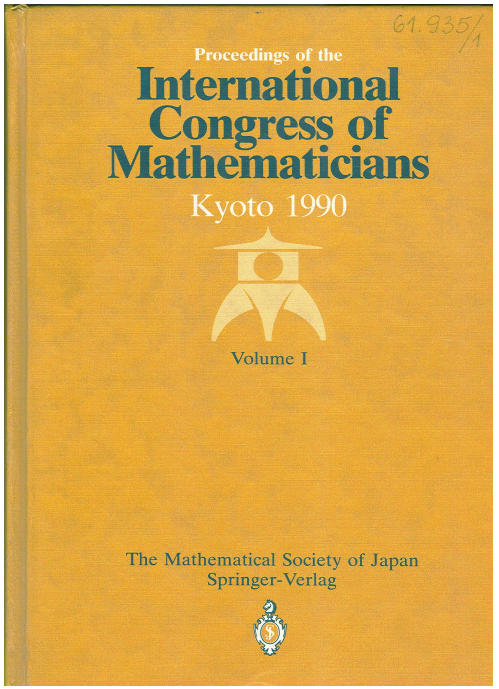
Total plenary: 20

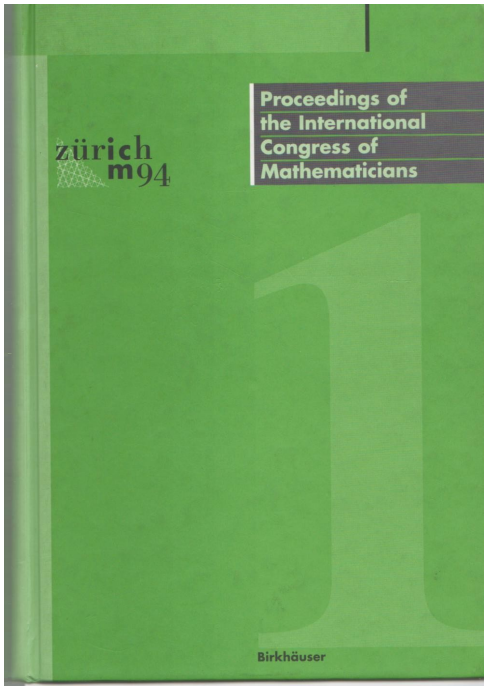
4 female + 16 male

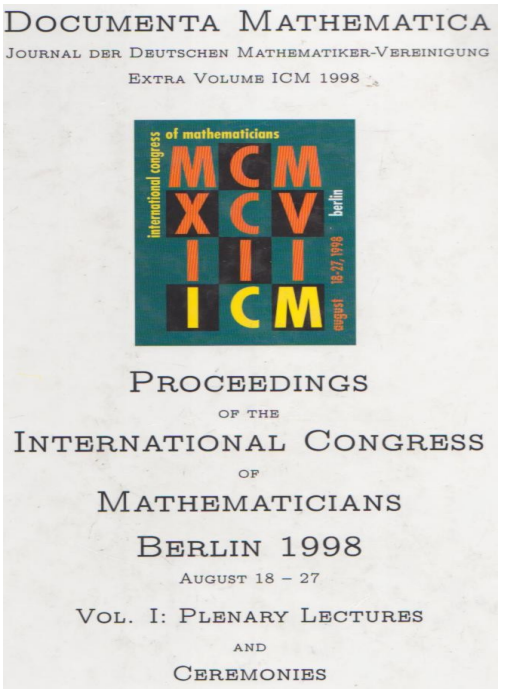
SECTIONAL

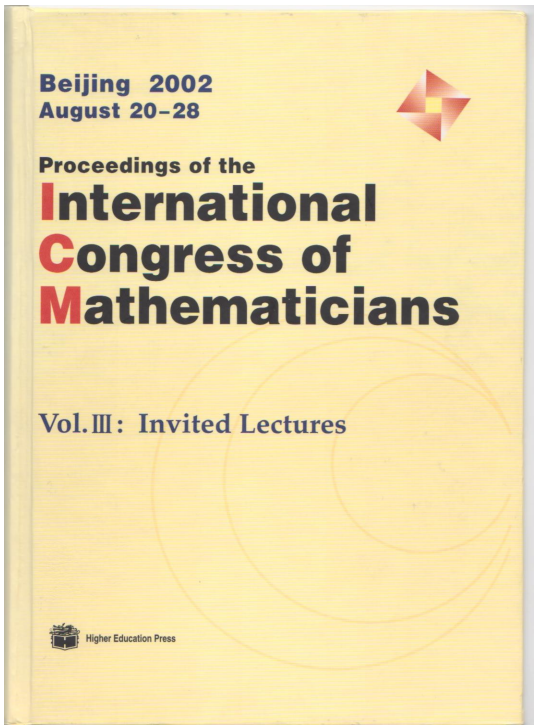
USA	57
France	19
Germany	15
UK	12
Israel	6.5
Canada	6
India	6
China	5
Japan	5
Russia	4
Switzerland	4
Belgium	3
Denmark	3
Australia	2
Finland	2
Italy	2
Netherlands	2
New Zealand	2
Austria	1.5
Hong Kong	1.5
Brazil	1
Chile	1
Czech Rep	1
Hungary	1
Korea	1
Mexico	1
Singapore	1
South Africa	1
Spain	1
Sweden	1
Uganda	1
Uruguay	1
Poland	0.5

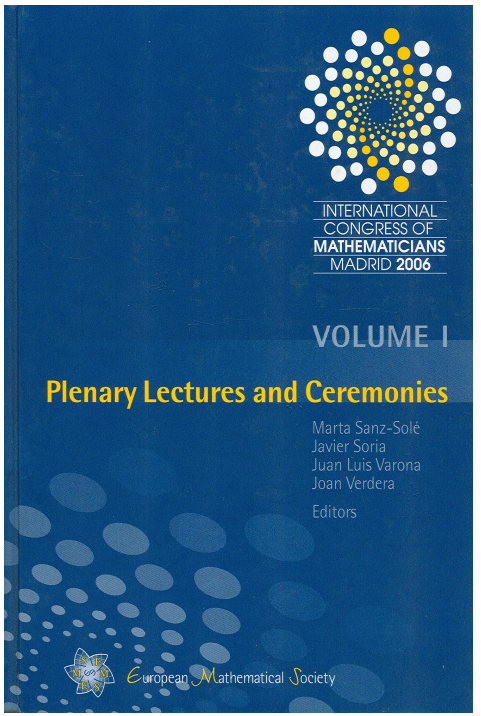
total sectional: 171
female: 23.5
male: 147.5

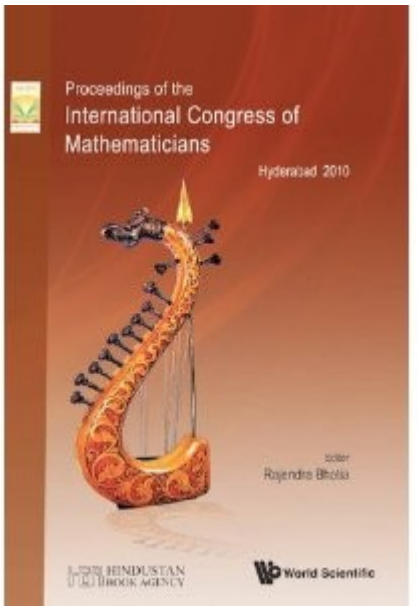










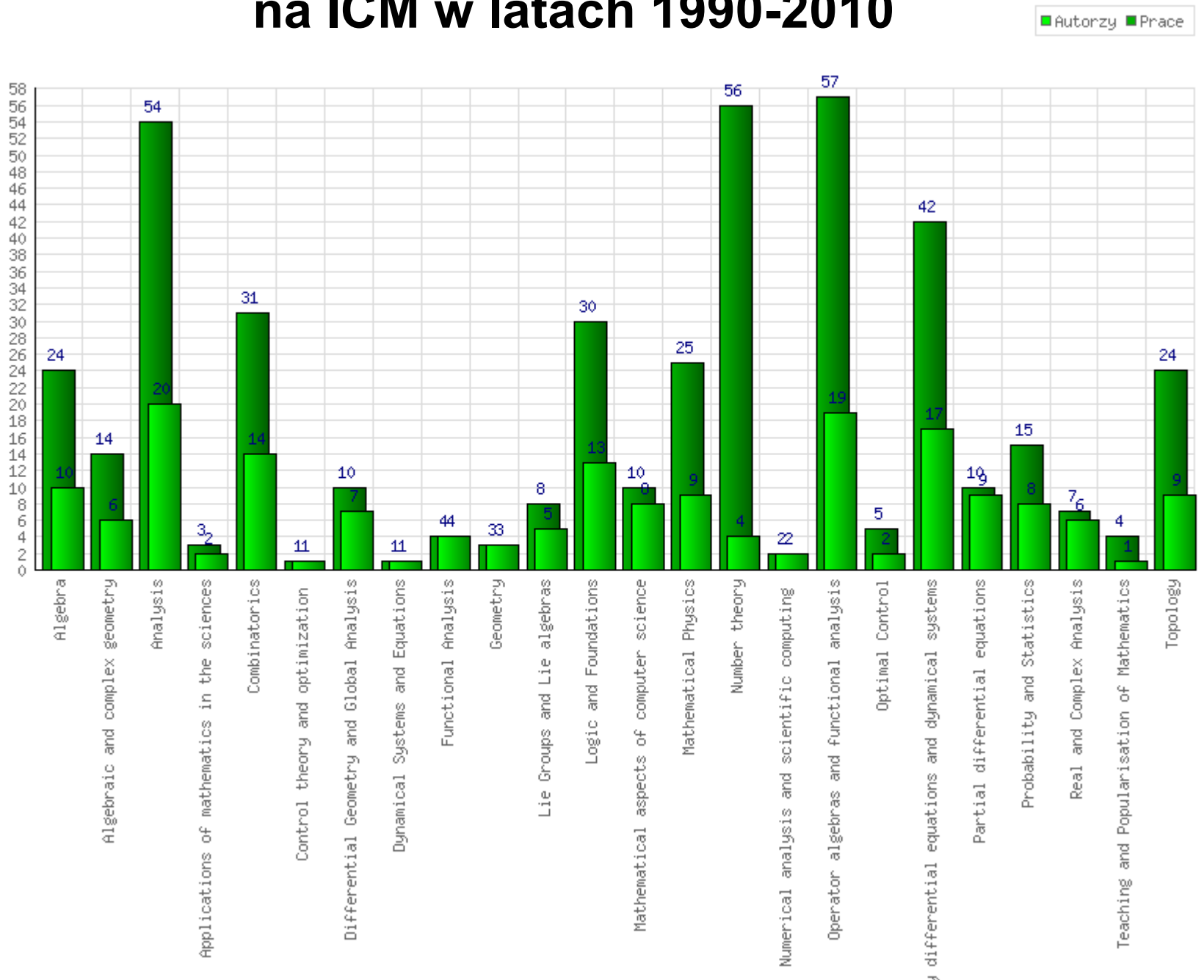


http://www.mathunion.org/

Liczba cytowań PL-autorów oraz liczba *cytowanych PL-autorów* na ICM w latach 1990-2010

		1990	*1990*	1994	*1994*	1998	*1998*	2002	*2002*	2006	*2006*	2010	*2010*
1	Logic and Foundations	0	*0*	0	*0*	18	*5*	3	*3*	4	*2*	5	*5*
2	Algebra	1	*1*	0	*0*	4	*2*	4	*1*	15	*6*	0	*0*
3	Number theory	5	*1*	12	*2*	13	*2*	1	*1*	21	*2*	4	*1*
4	Algebraic &complex g	0	*0*	0	*0*	0	*0*	4	*3*	8	*3*	2	*1*
5	Geometry&Glob. Anal.	1	*1*	0	*0*	3	*3*	7	*4*	1	*1*	1	*1*
6	Topology	0	*0*	3	*3*	10	*2*	0	*0*	1	*1*	10	*6*
7	Lie Groups and Lie a	1	*1*	0	*0*	0	*0*	0	*0*	7	*4*	0	*0*
8	Analysis	3	*3*	1	*1*	41	*13*	3	*2*	8	*7*	5	*3*
9	Functional analysis	7	*3*	14	*7*	3	*3*	5	*4*	28	*9*	4	*4*
10	ODE & dynamical sy	6	*3*	3	*2*	22	*9*	1	*1*	10	*8*	1	*1*
11	Partial differential equ	2	*2*	2	*1*	3	*3*	0	*0*	2	*2*	1	*1*
12	Mathematical Physics	6	*2*	5	*3*	3	*3*	6	*1*	3	*2*	2	*1*
13	Probability and Statis	1	*1*	2	*1*	5	*2*	4	*2*	3	*2*	0	*0*
14	Combinatorics	2	*2*	6	*5*	4	*3*	2	*2*	14	*4*	3	*2*
15	Mathematical aspects	0	*0*	0	*0*	0	*0*	0	*0*	10	*8*	0	*0*
16	Num. analysis & com	0	*0*	0	*0*	0	*0*	0	*0*	2	*2*	0	*0*
17	Control theory and op	0	*0*	0	*0*	0	*0*	0	*0*	1	*1*	5	*2*
19	Teaching and Popula	0	*0*	0	*0*	4	*1*	0	*0*	0	*0*	0	*0*
18	Math in sciences&tec	0	*0*	3	*2*	0	*0*	0	*0*	0	*0*	0	*0*
20	History of mathematics	0	*0*	0	*0*	0	*0*	0	*0*	0	*0*	0	*0*
	CYTOWANIA/AUTO	**35**	***20***	**51**	***27***	**133**	***51***	**40**	***24***	**138**	***64***	43	*28*
	LICZBA PL-MÓWCÓW		***1***		***0***		***4***		***2***		***5***		*1*

Skumulowana liczba *cytowanych PL-autorów* oraz liczba cytowań PL-autorów na ICM w latach 1990-2010

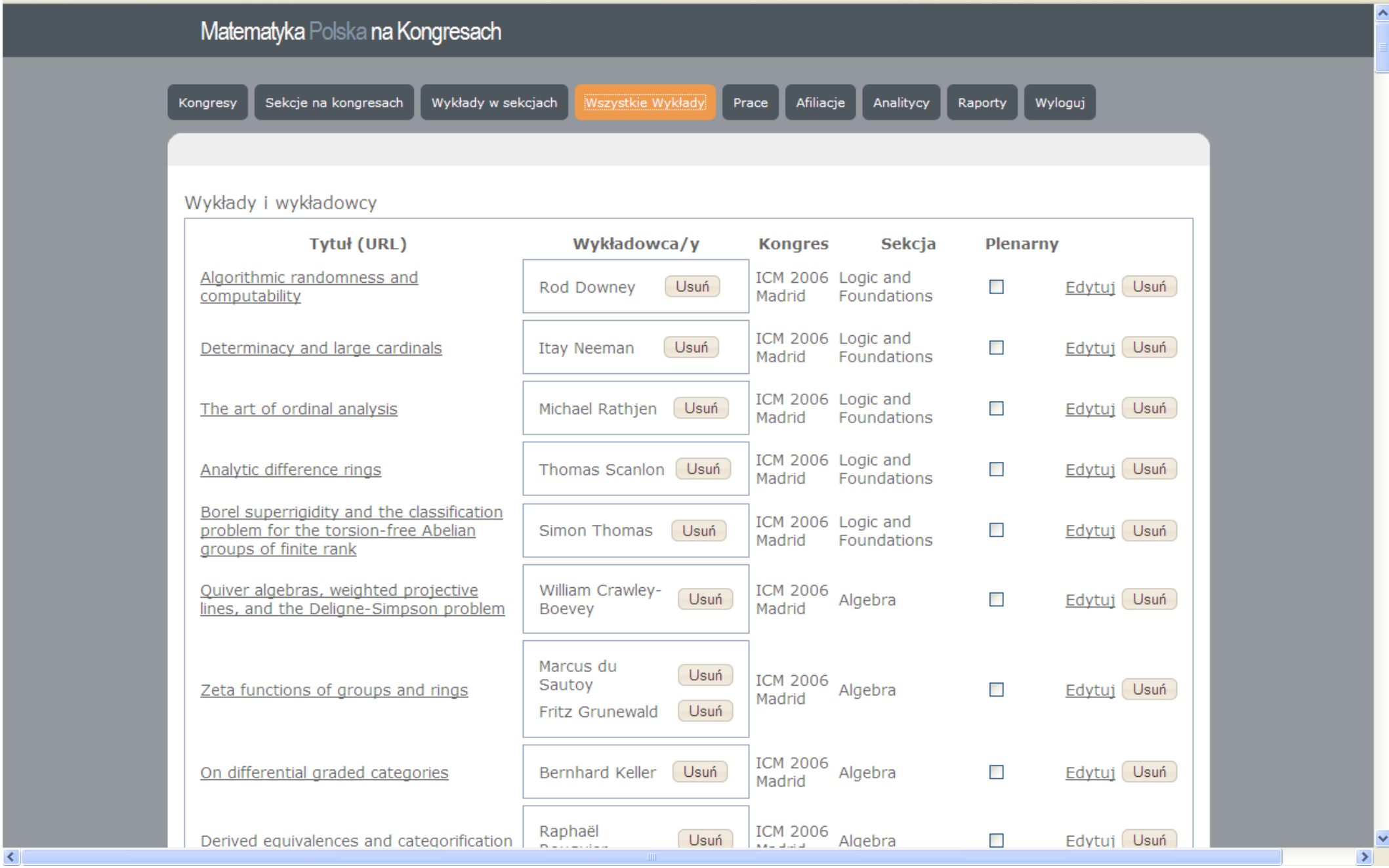


Matematyka Polska na Kongresach

Kongresy | Sekcje na kongresach | Wykłady w sekcjach | Wszystkie Wykłady | Prace | Afiliacje | Analitycy | Raporty | Wyloguj

Sekcje

Skrót	Nazwa	Kongresy	
LF	Logic and Foundations **(5)**	ICM 1990 Kyoto ICM 1994 Zurich ICM 1998 Berlin ICM 2002 Bejing ICM 2006 Madrid ICM 2010 Hyderabad	Wykłady
A	Algebra **(7)**	ICM 1990 Kyoto ICM 1994 Zurich ICM 1998 Berlin ICM 2002 Bejing ICM 2006 Madrid ICM 2010 Hyderabad	Wykłady
NT	Number theory **(10)**	ICM 1990 Kyoto ICM 1994 Zurich ICM 1998 Berlin ICM 2002 Bejing ICM 2006 Madrid ICM 2010 Hyderabad	Wykłady
		ICM 1990 Kyoto ICM 1994 Zurich	



Matematyka Polska na Kongresach

Kongresy | Sekcje na kongresach | Wykłady w sekcjach | Wszystkie Wykłady | Prace | Afiliacje | Analitycy | Raporty | Wyloguj

Wykłady i wykładowcy

Tytuł (URL)	Wykładowca/y	Kongres	Sekcja	Plenarny	
Algorithmic randomness and computability	Rod Downey Usuń	ICM 2006 Madrid	Logic and Foundations	☐	Edytuj Usuń
Determinacy and large cardinals	Itay Neeman Usuń	ICM 2006 Madrid	Logic and Foundations	☐	Edytuj Usuń
The art of ordinal analysis	Michael Rathjen Usuń	ICM 2006 Madrid	Logic and Foundations	☐	Edytuj Usuń
Analytic difference rings	Thomas Scanlon Usuń	ICM 2006 Madrid	Logic and Foundations	☐	Edytuj Usuń
Borel superrigidity and the classification problem for the torsion-free Abelian groups of finite rank	Simon Thomas Usuń	ICM 2006 Madrid	Logic and Foundations	☐	Edytuj Usuń
Quiver algebras, weighted projective lines, and the Deligne-Simpson problem	William Crawley-Boevey Usuń	ICM 2006 Madrid	Algebra	☐	Edytuj Usuń
Zeta functions of groups and rings	Marcus du Sautoy Usuń Fritz Grunewald Usuń	ICM 2006 Madrid	Algebra	☐	Edytuj Usuń
On differential graded categories	Bernhard Keller Usuń	ICM 2006 Madrid	Algebra	☐	Edytuj Usuń
Derived equivalences and categorification	Raphaël Usuń	ICM 2006	Algebra	☐	Edytuj Usuń

Matematyka Polska na Kongresach

Kongresy | Sekcje na kongresach | Wykłady w sekcjach | Wszystkie Wykłady | Prace | Afiliacje | Analitycy | Raporty | Wyloguj

Wykład: "Some results in noncommutative ring theory "

Kongres: ICM Madrid 2006

Sekcja: Algebra

Wykładowca/y:

Agata Smoktunowicz Usuń

Cytowania

Edmund Puczyłowski
Some results and questions on nil rings.
Brak 1999
Usuń

Jan Krempa
Logical connections between some open problems concerning nil rings
Fundamenta Mathematicae 1972
Usuń

Edmund Puczyłowski
On rings which are sums of two subrings
Arkiv f�r matematik 1989
Usuń

Dodaj cytowanie

Wybierz pracę

Dodaj cytowanie

Dodaj prace

Polskie wyniki

W roku 2014 - Seul
Theme of SEOUL ICM 2014
"Dreams and Hopes for Late Starters"

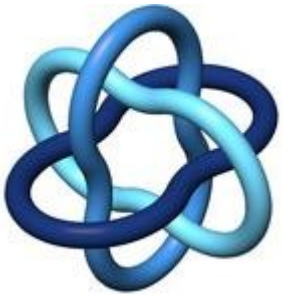
SEOUL ICM 2014

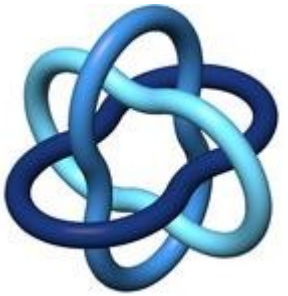
International Congress of Mathematicians

Seoul, Korea

August 13 - 21, 2014

http://www.icm2014.org





Dziękuję za uwagę