Second Annual Meeting of the Bulgarian Section of SIAM

The Bulgarian Section of SIAM (BGSIAM) was founded on January 18, 2007 and the accepted Rules of Procedure were officially approved by the SIAM Board of Trustees on July 15, 2007. The activities of BGSIAM follow the general objectives of SIAM, as established in its Certificate of Incorporation.

Realizing the importance of interdisciplinary collaboration and the role that applied mathematics plays in advancing science and technology in industry, we solicit the support of SIAM as the major international organization for Industrial and Applied Mathematics in order to promote the application of mathematics to science, engineering and technology in Republic of Bulgaria.

The 2nd Annual Meeting of BGSIAM (BGSIAM'07) was hosted by the Institute of Mathematics and Informatics, Bulgarian Academy of Sciences, Sofia. It took part on December 20 and 21, 2007. The conference support provided by SIAM is very highly appreciated.

During BGSIAM'07 conference a wide range of problems concerning recent achievements in the field of industrial and applied mathematics were presented and discussed. The meeting provided a forum for exchange of ideas between scientists, who develop and study mathematical methods and algorithms, and researchers, who apply them for solving real life problems.

More than 50 participants from four universities, two institutes of the Bulgarian Academy of Sciences and also from outside the traditional academic departments took part in BGSIAM'07. They represent most of the strongest Bulgarian research groups in the field of industrial and applied mathematics. The involvement of younger researchers was especially encouraged and we are glad to report that 7 from the presented 23 talks were given by Ph.D. students.

LIST OF INVITED LECTURES:

- OLEG ILIEV
  ITWM - Fraunhofer Institute for Industrial Mathematics, Kaiserslautern, Germany
  MODELLING AND SIMULATION OF MULTISCALE PROBLEMS IN INDUSTRIAL FILTRATION PROCESSES

- VLADIMIR VELIOV
  Institute for Econometrics, Operations Research and Systems Theory, Vienna University of Technology, Austria
  ON THE NUMERICAL INTEGRATION OF SYSTEMS WITH DETERMINISTIC UNCERTAINTIES

- VLADIMIR GEORGIEV
  University of Pisa, Italy
  STABILITY OF SOLITARY WAVES FOR HARTREE TYPE EQUATIONS

- STEFAN DODUNEKOV
  Institute of Mathematics and Informatics, Bulgarian Academy of Sciences,
  Bulgaria
  MATHEMATICS IN DATA PROTECTION

LIST OF SPECIAL SESSIONS:

- Numerical Methods and Algorithms

- Control Systems and Applications

- Neural Networks

- Industrial Mathematics

The conference proceedings contains the Rules of Procedure for BGSIAM (Part A), the scientific program of BGSIAM'08 (Part B), extended abstracts of the conference talks (Part C), and the list of participants (Part D).

Svetozar Margenov
Chair of BGSIAM Section

Stefka Dimova
Vice-Chair of BGSIAM Section

Angela Slavova
Secretary of BGSIAM Section

Sofia, January 2008