16th Panhellenic Conference on Mathematical Analysis

UNIVERSITY OF THE AEGEAN, DEPARTMENT OF MATHEMATICS

16th

Panhellenic Conference on Mathematical Analysis

25–27 May 2018

Karlovassi · Samos

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ΕΚΔΟΣΕΙΣ ΚΛΕΙΔΑΡΙΘΜΟΣ

Program

Friday 25 May 2018

10:00 *Reception*

10:30–11:20 **Gilles Pisier**
Sidon sets in uniformly bounded orthonormal systems 11

Coffee break

11:40–12:10 **Giorgos Chasapis**
Threshold phenomena for high-dimensional random polytopes 12

12:15–12:45 **Konstantinos Tsaprounis**
Long reals: on generalizing the construction of the real numbers 12

12:50–13:20 **Nicolas Hadjisavvas**
Transformation of quasiconvex functions to eliminate local minima 13

13:25–13:55 **Panayotis Smyrnelis**
Phase transition models occuring in the Physics of liquid crystals 13

Lunch break

16:30–17:20 **Stamatis Koumandos**
On generalized Stieltjes functions 14

Coffee break

17:40–18:10 **Athanasios Lyberopoulos**
Quasilinear elliptic equations with lack of compactness 15

18:15–18:45 **Christos Sourdis**
On the converse problem for the two-component Gross-Pitaevskii system with a large coupling parameter 16

18:50–19:20 **Evangelia Antonopoulou**
Finite element approximation of stationary electro-rheological fluids 17

19:25–19:55 **Nikos Labropoulos**
Analytical approach of the symmetry: sharp supercritical Hardy-Sobolev inequalities and applications 18

20:30 *Cocktail Reception at the University Library*

Saturday 26 May 2018

10:00–10:50 **Demetrios Christodoulou**
The analysis of the development of shocks in compressible fluids 19

11:00–11:50 **Demetrios Christodoulou**
The analysis of the development of shocks in compressible fluids (part II) 19

Coffee break

12:10–12:40 **Ioannis Giannoulis**
Rigorous justification for modulated water waves of finite depth 20

12:45–13:15 **Christos Schinas**
On the stability of some systems of exponential difference equations 20

13:20–13:50 **Garyfalos Papaschinopoulos**
On the stability of a 3×3 system of difference equations using centre manifold theory 21

Lunch break

16:30–17:20 **Michel Marias**
Analysis on locally symmetric spaces . . 22

Coffee break

17:40–18:10 **Maria Kourou**
Monotonicity theorems for convex conformal mappings 22

18:15–18:45 **Anestis Fotiadis**
Estimates of the derivatives of the heat kernel 23

18:50–19:20 **Christina Karafyllia**
Harmonic measure, hyperbolic distance and their connection on simply connected domains. 23

19:25–19:55 **Ioannis Stavroulakis**
Oscillations of delay and difference equations with several deviating arguments . 24

21:00 *Conference Dinner at the restaurant "Dionysos"*

Sunday 27 May 2018

Coffee 10:00–10:30

10:30–11:20 **Pandelis Dodos**
An inverse theorem for stochastic processes indexed by the discrete hypercube 26

11:30–12:00 **Dimitrios Chatzakos**
The Prime Geodesic Theorem in the 3-dimensional hyperbolic space 27

12:05–12:35 **Andreas Koutsogiannis**
Ergodic averages with independent real polynomial iterates 27

12:40–13:10 **Aristides Katavolos**
Ideals of $L^1(G)$ and harmonic operators on $L^2(G)$ 28