

# Scientific Program

## Monday, August 18th

### Opening Ceremony

Monday - August 18th - from 08h30 to 09h00 - Room A

### Plenary

**Plenary Lecture I** Chair: Siddharth Shanker Saxena

Monday - August 18th - from 09h00 to 10h00 - Room A

#### 09h00 Mon-am1-PL1 - HEAVY FERMION STATE AND QUANTUM CRITICALITY

Onuki Yoshichika

Mon-am1-PL1 - HEAVY FERMION SYSTEMS: A TEST FOR LOW TEMPERATURE PHYSICS

Jacques Flouquet

Mon-am1-PL1 - NEW CORRELATED ELECTRON PHYSICS FROM NEW MATERIALS

M. Brian Maple

### Parallel

**Parallel Session I** Chair: Bernard Coqblin

Monday - August 18th - from 10h30 to 12h00 - Room A

#### 10h30 Mon-am2-AI1 - CROSSOVER FROM NON-FERMI LIQUID TO FERMI LIQUID BEHAVIOR CLOSE TO A QUANTUM CRITICAL POINT

Pedro Schlottmann

#### 11h00 Mon-am2-AI2 - SUPERCONDUCTING AND FERMI SURFACE PROPERTIES IN CEIRSI3 AND CECOGE3 WITHOUT INVERSION SYMMETRY

Rikio Settai

#### 11h30 Mon-am2-AO1 - MAGNETIC-FIELD INDUCED QUANTUM CRITICAL POINTS OF VALENCE TRANSITION IN CE- AND YB-BASED HEAVY FERMIONS

Shinji Watanabe, Atsushi Tsuruta, Kazumasa Miyake, Jacques Flouquet

#### 11h45 Mon-am2-AO2 - MAGNETIC PROPERTIES OF RPD5AL2 (R = Y, CE, PR, ND, SM, GD)

Raquel Almeida Ribeiro, Takahiro Onimaru, Yukihiro F Inoue, Marcos Abreu Avila, Keisuke Shigetoh, Toshiro Takabatake

### Parallel

**Parallel Session II** Chair: Marcelo Rozemberg

Monday - August 18th - from 10h30 to 12h00 - Room B

#### 10h30 Mon-am2-BI1 - GENUINE PHASE DIAGRAM OF HIGH-TC SUPERCONDUCTORS: SITE-SELECTIVE CU-NMR STUDIES ON FIVE-LAYERED CUPRATES

Hidekazu Mukuda

#### 11h00 Mon-am2-BI2 - SUPERCONDUCTING D-WAVE STRIPES IN CUPRATES: BOND ORDER COEXISTING WITH NODAL QUASIPARTICLES

Matthias Vojta

#### 11h30 Mo-am2-BO1 - MAGNETIC PROPERTIES OF THE T-J MODEL AT LOW DOPING

Juergen Falb, Marcello Barbosa da Silva Neto, Alejandro Muramatsu

#### 11h45 Mon-am2-BO2 - S-WAVE SUPERCONDUCTIVITY PHASE DIAGRAM IN THE INHOMOGENEOUS TWO-DIMENSIONAL ATTRACTIVE HUBBARD MODEL

K.aran Aryanpour, Thereza Paiva, Warren E Pickett, Richard T. Scalettar

# Poster

**Poster Session I** Chairs: Evandro de Mello and Enzo Granato

Monday - August 18th - from 13h30 to 15h30 - Room C

002 - **DISORDER INDUCED METAL-INSULATOR TRANSITION IN CA DOPED EUB6**

Vladimir V. Glushkov, Mikhail A. Anisimov, Alexey V. Bogach, Sergey V. Demishev, Nikolay A. Samarin, Alexey V. Kuzhetsov, Anna V. Levchenko, Nataliya Yu. Shitsevalova, Karol Flachbart, Nikolay E. Sluchanko

003 - **QUANTUM CRITICALITY IN CEMIN5-BASED SYSTEMS (M=CO, RH) STUDIED BY LOW-TEMPERATURE THERMAL EXPANSION**

Jan Guido Donath, Frank Steglich, Eric D. Bauer, John L. Sarrao, Philipp Gegenwart

004 - **NON-FERMI LIQUID BEHAVIOR AND MAGNETIC PROPERTIES IN FERROMAGNETIC CEPT1-XRHX**

Ikuto Kawasaki, Daichi Nishikawa, Hiroyuki Hidaka, Tatsuya Yanagisawa, Makoto Yokoyama, Kenichi Tenya, Hiroshi Amitsuka

005 - **QUANTUM SPHERICAL SPIN GLASS. RECENT DEVELOPMENTS.**

Alba Theumann, Pedro Castro Menezes

006 - **QUANTUM SPHERICAL SPIN GLASS WITH LONG-RANGE DISORDER**

Pedro Castro Menezes Xavier de Mello e Silva, Alba Graciela Rivas de Theumann

007 - **LOW ENERGY SPIN DYNAMICS OF THE STOICHIOMETRIC NON-FERMI-LIQUID COMPOUND CERHBI**

Devashi T Adroja, K.A. McEwen, A.P. Murani, A.D. Hillier, J.-G. Park, K. Shigetoh, T. Takabatake

008 - **TRANSPORT PROPERTIES OF ITINERANT-ELECTRON WEAK FERROMAGNET LAF4AS12**

Sho Tatsuoka, Kenya Tanaka, Takashi Saito, Takahiro Namiki, Keitaro Kuwahara, Yuji Aoki, Hideyuki Sato

009 - **SPIN-SIZE DISORDER MODEL FOR GRANULAR SUPERCONDUCTORS WITH CHARGING EFFECTS**

Enzo Granato, Giancarlo Jug

010 - **PRESSURE INDUCED SUPERCONDUCTOR QUANTUM CRITICAL POINT**

Igor Tavares Padilha, Mucio Amado Continentino

011 - **BULK AND LOCAL MAGNETIZATION OF RB12 (R – HO, ER, TM).**

Alexey V. Bogach, Sergey Demishev, Vladimir Glushkov, Anna Levchenko, Natalia Shitsevalova, Karol Flachbart, Nikolay Sluchanko

012 - **WITNESSING ENTANGLEMENT IN QUANTUM SPIN CHAINS**

Tatiana Gabriela Rappoport, Luis Ghivelder, João Carlos Fernandes, Renato Bastos Guimarães, Mucio Amado Continentino

013 - **CORRELATION INDUCED SPIN-CHARGE COUPLING IN A BAND FERROMAGNET: MAGNON DAMPING AND ANOMALOUS SOFTENING**

Sudhakar Pandey and Avinash Singh

014 - **NESTED CLUSTER ALGORITHM FOR FRUSTRATED QUANTUM ANTIFERROMAGNETS**

Matthias Nyfeler

015 - **UNDERSTANDING THE INVERSE MAGNETOCALORIC EFFECT THROUGH A SIMPLE THEORETICAL MODEL**

Pedro Jorge von Ranke, Bruno P. Alho, Eduardo P. Nobrega, Nilson A. de Oliveira

016 - **FIELD INDUCED ORDER IN MAGNETIC SYSTEMS: MARGINAL CASE**

D.Reyes, M. A. Continentino

017 - **MAGNETOCALORIC AND BAROCALORIC EFFECTS IN DOPED CORRELATED ELECTRON SYSTEMS.**

Luciano Gomes de Medeiros Junior, Nilson Antunes de Oliveira, Amós Troper

018 - **FIELD INDUCED PHASE TRANSITIONS IN NDRHIN5 AND ND2RHIN8 ANTIFERROMAGNETIC COMPOUNDS**

J. G. S. Duque, R. Lora Serrano, D. J. Garcia, L. Bufaiçal, L. M. Ferreira, P. G. Pagliuso, E. Miranda

019 - **REPLICA SYMMETRY BREAKING IN A FERMIONIC CLUSTER SPIN GLASS MODEL IN A TRANSVERSE FIELD**

Fabio Mallmann Zimmer, Sergio Garcia Magalhaes

020 - THEORY OF TERAHERTZ ABSORPTION SPECTRA IN CYCLOIDAL SPIN MAGNETS

Shin Miyahara, Nobuo Furukawa

021 - SPIN DYNAMICS EVOLUTION IN THE PHASE DIAGRAM OF CE(AG,NI)SB<sub>2</sub> SYSTEM

Bogdan Popescu, M. Manolachi, A. Birsan, A.C. Galca, Andrei Galatanu, R.T.Kahn, E. Bauer

022 - SPIN-GLASS BEHAVIOR OF RNI<sub>1</sub>-XCUXAL COMPOUNDS

Jirí Prchal, Pavel Javorský, Eva Šantavá

023 - GROUND STATE AND THERMODYNAMIC PROPERTIES OF MAGNETIC PHOSPHATES

Eglânio José Pessoa da Silva Jr., Rene Rodrigues Montenegro Filho, Maurício Domingues Coutinho Filho

024 - ROLE OF BACKFLOW CORRELATIONS FOR THE NON-MAGNETIC PHASE IN THE FRUSTRATED HUBBARD MODEL

Luca Fausto Tocchio, Federico Becca, Alberto Parola, Sandro Sorella

025 - DOPING EFFECTS ON THE MAGNETIC PROPERTIES OF NDRHIN<sub>5</sub> INTERMETALLIC ANTIFERROMAGNET

Raimundo Lora Serrano, Daniel Julio Garcia, Eduardo Miranda, Cris Adriano, José Gerivaldo dos Santos Duque, Pascoal José Giglio Pagliuso

026 - HOPFIELD FERMIONIC ISING SPIN GLASS MODEL WITH A FIRST-ORDER QUANTUM TRANSITION IN A TRANSVERSE MAGNETIC FIELD

Sergio Garcia Magalhães, Carlos Alberto Vaz de Moraes Junior, Eleonir J. Calegari

027 - MAGNETIC PROPERTIES OF THE INTERMETALLIC COMPOUND CE<sub>5</sub>GE<sub>4</sub>

Satish Kumar Malik, Rogério Lucio de Almeida, Silvio Quezado, A. V. Morozkin, R. Nirmala

028 - SPIN-GLASS BEHAVIOR OF THE TERNARY INTERMETALLICS PR<sub>2</sub>AGIN<sub>3</sub> WITH DISORDERED CAIN<sub>2</sub>-TYPE STRUCTURE

D. X. Li, S. Nimori, T. Yamamura, K. Yubuta, X. Zhao

029 - GIANT ANISOTROPIC MAGNETOCALORIC EFFECT DUE TO SPIN REORIENTATION: A PROMISING ALTERNATIVE FOR MAGNETIC REFRIGERATION

Pedro Jorge von Ranke, Nilson Antunes de Oliveira, Edison Jesus Ramirez Plaza, Vinicius da Silva Ramos de Sousa, Bruno de Pinho Alho, Alexandre Magnus Gomes Carvalho, Sergio Gama, Mario de Souza Reis

031 - VARIATIONAL APPROACH TO THE DOPED SHASTRY-SUTHERLAND MODEL FOR THE DESCRIPTION OF SRCU<sub>(2-X)</sub>MG<sub>X</sub>(BO<sub>3</sub>)<sub>2</sub> SYSTEM

Samir El Shawish, Janez Bonca

032 - MAGNETOCALORIC EFFECT IN THE FERROMAGNETIC KONDO LATTICE MODEL

Francisco Alfaro, Ben Hur Bernhard

033 - MAGNETIC PROPERTIES OF CUCR<sub>2</sub>O<sub>4</sub> OXIDE

Marco Aurelio Buzinaro, Nelson Orlando Moreno, Jose Gerivaldo Duque, Pascoal Giglio Pagliuso

034 - ORDERED STATE IN (FE,CO)SB<sub>2</sub> PROBED BY MSR AND MOESSBAUER SPECTROSCOPY

Jeremy P. Carlo, T. Goko, Yasutomo J. Uemura, G. J. MacDougall, T. J. Williams, Graeme M. Luke, Dalber Sanchez-Candela, Elisa Baggio-Saitovitch, R. Hu, C. Petrovic

036 - ANTIFERROMAGNETIC SPIN FLUCTUATIONS INDUCED PAIRING IN LAYERED ORGANIC SUPERCONDUCTORS

Ali Benali

037 - SPIN FRUSTRATION AND BANDWIDTH CONTROL IN THE DOPED ORGANIC CONDUCTOR

Yosuke Kurosaki, Akira Furuta, Hiroshi Taniguchi, Kazuya Miyagawa, Kazushi Kanoda

038 - ELECTRON-HOLE INTERACTION DRIVEN BCS-LIKE PHASE TRANSITION IN TISE<sub>2</sub>

Claude Monney, Hervé Cercellier, Hans Beck, Philipp Aebi

039 - STUDY OF THE MAGNETIC AND CALORIMETRIC PROPERTIES OF (U<sub>1-X</sub>TX)CU<sub>5</sub>AL (T=LA AND Y)

Luzeli Moreira da Silva, Flávio Guimarães Gandra, Adenilson Oliveira dos Santos, Lisandro Pavie Cardoso

040 - UNIVERSAL PROPERTIES OF THE FERROMAGNET CEPD<sub>(1-X)</sub>RH<sub>X</sub> IN THE VICINITY OF QUANTUM CRITICAL POINT

Konstantin Gennadievich Popov, Vasily Robertovich Shaginyan

041 - NON FERMIL LIQUID AND ZEROS OF GREEN FUNCTION IN THE 2D HUBBARD MODEL

Shiro Sakai, Yukitoshi Motome, Masatoshi Imada

042 - QUADRUPOLE EFFECT OF NON-KRAMERS DOUBLET IN PRMG3

Kouji Araki, Takuma Yoshikawa, Mitsuhiro Akatsu, Isao Ishii, Yuichi Nemoto, Terutaka Goto, Hiroyuki Suzuki, Hiroshi Tanida, Shigeru Takagi

043 - THE STUDY OF ALPHA- AND BETA-CEIR2SI2 SINGLE CRYSTAL.

Matúš Mihalik, Martin Diviš, Vladimír Sechovský

044 - VARIATIONAL CLUSTER APPROACH TO THE ELECTRON CORRELATIONS IN HALF-METALS

Hannes Allmaier, Liviu Chioncel, Enrico Arrigoni, Alexander Lichtenstein, Mikhail Katsnelson

045 - MAGNETIC AND ORBITAL PROPERTIES OF THE TWO-BAND HUBBARD MODEL WITH DIFFERENT BANDWIDTHS

Yohta Koyama, Akihisa Koga, Norio Kawakami, Philipp Werner

046 - KONDO EFFECT AND SPIN GLASS BEHAVIOR IN SILVER FILMS CONTAINING NANOMETER SIZE CLUSTERS OF IRON

W. T. Herrera, Y. T. Xing, E. M. Baggio-Saitovitch, F. J. Litterst, H. Micklitz

047 - ELASTIC PROPERTIES OF TBRU4P12 UNDER PRESSURE

Yoshiki Nakanishi, Takuya Fujino, Kankichi Ito, Masahito Yoshizawa, Kazuyuki Matsuhira, Chihiro Sekine, Ichimin Shirovani

048 - PHASE SEGREGATION IN LA1.3SR1.7MN2O7 LAYERED MANGANITE UNDER HYDROSTATIC PRESSURE

M. Kumaresa Vanji, Magda B. Fontes

049 - ROOM TEMPERATURE FERROMAGNETISM IN MN DOPED DILUTE ZNO SEMICONDUCTOR; AN ELECTRONIC STRUCTURE STUDY

Rishi Kumar Singhal, M. Dhawan, S.K. Gaur, S.N. Dolia, U.P. Deshpande, T. Shripathi, Y.T. Xing, Elisa Saitovitch

050 - RATTLING AND SUPERCONDUCTIVITY IN (PR1-XLAX)OS4SB12

Yuichi Nemoto

051 - DIRECT DETERMINATION OF THE CRYSTAL FIELD PARAMETERS OF SKUTTERUDITE COMPOUNDS BY ELECTRON SPIN RESONANCE.

Daniel Julio Garcia, Fernando Assis Garcia, José Gerivaldo Duque, Pascoal Giglio Pagliuso, Carlos Rettori, Pedro Schlottmann, Milton Torikachvili, Saul Oseroff

052 - THE ROLE OF CATIONIC DISORDER ON THE MAGNETIC PROPERTIES OF DOUBLE PEROVSKITES (CA, SR)2-XLAXFEIRO6

Leandro Felix de Sousa Bufaical, Leticie Mendonça Ferreira, Raimundo Lora-Serrano, Josè Gerivaldo dos Santos Duque, Eduardo Granado, Pascoal José Giglio Pagliuso

053 - CHARGE ORDERING IN GDBACO2O5 PROBED BY RESONANT X-RAY DIFFRACTION.

valerio scagnoli, Urs Staub, Miryam García-Fernández, C. Mazzoli, Y. Huang

054 - MAGNETIC STRUCTURE OF HO2COGA8 DETERMINED BY X-RAY RESONANT MAGNETIC SCATTERING

Carlos Giles, Cris Adriano, Leticia Nunes Coelho, Guilherme Abreu Faria, Pascoal Giglio Pagliuso

055 - NAGAOKA'S PHASE AT FINITE DENSITY OF HOLES AND SPIN EFFECTIVE ACTIONS

Fabio Luis Braqhín

056 - MAGNETIC BEHAVIOR OF SINGLE-CRYSTALLINE RPD3S4 (R = HO AND ER)

Eiichi Matsuoka, Daichi Usui, Shintaro Nakamura, Tsutomu Nojima, Hideya Onodera

057 - ELECTRON SPIN RESONANCE (ESR) OF EU<sup>2+</sup> IN TYPE-I CLATHRATE EU8GA16GE30

Lino Holanda, José Vargas, Carlos Rettori, Pascoal Pagliuso, Marcos Avila, T. Takabatake

058 - NEUTRON POWDER DIFFRACTION OF TB0.94GD0.06B2C2

Yuta Sasaki, Eiichi Matsuoka, Kenji Ohoyama, Hideya Onodera

059 - THERMOELECTRIC EFFECTS IN QUANTUM DOTS

Makoto Yoshida, Luiz Nunes de Oliveira

060 - EXACT RESULTS FOR SYSTEMS OF ELECTRONS IN THE FRACTIONAL QUANTUM HALL REGIME

Orion Ciftja

061 - QUASIBOUND STATES IN QUANTUM POINT CONTACTS

Tomaž Rejec

062 - SUPERFLUIDITY AND MAGNETISM IN TWO-DIMENSIONAL FERMIONIC OPTICAL LATTICE SYSTEMS

Yusuke Fujihara, Akihisa Koga, Norio Kawakami

063 - QUANTITATIVE DETERMINATION OF THE HUBBARD MODEL PHASE DIAGRAM FROM OPTICAL LATTICE EXPERIMENTS BY TWO-PARAMETER SCALING

Vivaldo Leiria Campo Junior, Klaus Capelle, Jorge Quintanilla, Chris Hooley

064 - ENTANGLEMENT AND THE GROUND STATE OF FERMIONS TRAPPED IN OPTICAL LATTICES

Jereson Silva Valencia, Roberto Franco, Marcos Sergio Figueira

065 - A THEORETICAL STUDY OF THE CLUSTER GLASS-KONDO-MAGNETIC DISORDERED ALLOYS

Fabio Mallmann Zimmer, Sergio Garcia Magalhaes, Bernard Coqblin

066 - NON-FERMI LIQUID BEHAVIOR IN CE2PDIN8

Dariusz Kaczorowski, B. Belan, L. Sojka, Ya. Kalychak

067 - MAGNETIC ANISOTROPY OF UFE6AL6

Alexander Andreev

068 - MAGNETIC ANISOTROPY IN AFM AND SDW PHASES OF CEB6.

Nickolay Sluchanko, Alexei Bogach, Sergey Demishev, Vladimir Glushkov, Anna Levchenko, Natalia Shitsevalova, Karol Flachbart

069 - THERMAL AND ELECTRONIC TRANSPORT IN CERU2AL10 : EVIDENCE FOR A METAL-INSULATOR TRANSITION

André Michael Strydom

070 - PULSED MAGNETIC FIELD STUDY OF THE SPIN GAP IN SMB6

Karol Flachbart, Marek Bartkowiak, Sergey Demishev, Slavomir Gabani, Vladimir Glushkov, Thomas Herrmannsdorfer, Viktor Moshchalkov, Natasha Shitsevalova, Nickolay Sluchanko

071 - CRYSTAL GROWTH AND ANISOTROPIC MAGNETIC PROPERTIES OF RAG2GE2 (R = PR, ND AND SM) SINGLE CRYSTALS

Devang A Joshi, R. Nagalakshmi, R. Kulkarni, Sudesh Kumar Dhar, Arumugam Thamizhavel

072 - INTERMEDIATE VALENCE TO KONDO LATTICE BEHAVIOUR IN CE(PT1;VXIRX)2SI2 (0,,TX,,T1)

Moise Bertin Tchoula Tchokonte, Paul de Villier du Plessis, Dariusz Kaczorowski

074 - UNRAVELLING THE MAGNETIC STRUCTURE OF CECU2(SI0.55GE0.45)2 BY USING THE COMPLEMENTARITY OF NEUTRON AND X-RAY SCATTERING

Enrico Faulhaber, Oliver Stockert, Astrid Schneidewind, Carsten Detlefs, Beatrice Grenier, Peter Link, Michael Deppe, Christoph Geibel, Frank Steglich, Michael Loewenhaupt

075 - ELECTRON SPIN RESONANCE OF GD3+ IN THE ANTIFERROMAGNETIC HEAVY FERMION CEIN3 AND ITS REFERENCE COMPOUND LAIN3

Eduardo Matzenbacher Bittar, José Gerivaldo dos Santos Duque, Carlos Rettori, Pascoal José Giglio Pagliuso

076 - COEXISTENCE OF MAGNETISM AND SUPERCONDUCTIVITY IN GE DOPED CECU2SI2 ?

H. S. Jeevan, J. Arndt, T. Nakanishi, O. Stockert, M. Deppe, T. Cichorek, P. Gegenwart, F. Steglich, C. Geibel

077 - TRANSPORT PROPERTIES OF PRT4SB12 (T=FE, OS) SINGLE CRYSTAL WITH HIGH PR-SITE FILLING FRACTION GROWN UNDER HIGH-PRESSURE

Kenya Tanaka, Takahiro Namiki, Takashi Saito, Sho Tatsuoka, Atsushi Imamura, Keitaro Kuwahara, Yuji Aoki, Hideyuki Sato

078 - PRESSURE EFFECT ON VALENCE FLUCTUATION AND MAGNETIC ORDERING IN YBPD

Akihiro Mitsuda, Kenji Yamada, Masaki Sugishima, Hirofumi Wada

080 - SPECIFIC HEAT OF EUIN2P2 AT HIGH MAGNETIC FIELDS

Hiroyuki Hidaka, Yoichi Ikeda, Ikuto Kawasaki, Tatsuya Yanagisawa, Hiroshi Amitsuka

**081 - HEAVY ELECTRONS: DIFFERENT TYPES OF QUANTUM CRITICAL POINTS**

**Frank Steglich**

**082 - STUDY OF TRANSPORT PROPERTIES ON (TMTTF)<sub>2</sub>PF<sub>6</sub> UNDER MULTI - EXTREME CONDITIONS**

**Mika Kano, Toshikazu Nakamura, Hatsumi Mori, Yoshiya Uwatoko, Stan Tozer**

**Parallel**

**Parallel Session III** Chair: Luiz Nunes Oliveira

Monday - August 18th - from 15h30 to 16h30 - Room A

**15h30**

Mon-pm1-AI1 - **MAGNETIC INTERACTIONS IN A SINGLE-BAND MODEL FOR THE CUPRATES AND RUTHENATES**

**Philippe Monthoux**

**16h00** Mon-pm1-AI2 - **MAGNETISM AND SUPERCONDUCTIVITY IN CECOINS**

**M. Nicklas, C. F. Miclea, O. Stockert, Tuson Park, K. Habicht, J. L. Sarrao, J. D. Thompson, Z. Fisk, F. Steglich**

**16h30** Mon-pm1-AO1 - **SUPERCONDUCTING PROPERTIES OF PRESSURE-INDUCED SUPERCONDUCTOR CEPD<sub>5</sub>AL<sub>2</sub>**

**Fuminori HONDA, Marie-Aude Measson, Yasunori Nakano, Etsuji Yamamoto, Yoshinori Haga, Tetsuya Takeuchi, Katsuya Shimizu, Rikio Settai, Yoshichika Onuki**

**Parallel**

**Parallel Session IV** Chair: Toshiro Takabatake

Monday - August 18th - from 15h30 to 16h30 - Room B

**15h30** Mon-pm1-BI1 - **SUPERCONDUCTIVITY AND NON-FERMI-LIQUID BEHAVIOR IN BETA-YBALB<sub>4</sub>**

**Satoru Nakatsuji**

**16h00** Mon-pm1-BI2 - **QUANTUM CRITICALITY IN MAGNETIC AND FERROELECTRIC SYSTEMS**

**S.E. Rowley, L.J. Spalek, M.P.M. Dean, R.P. Smith, G.G. Lonzarich, J.F. Scott, Siddharth S. Saxena**

**16h30** Mon-pm1-BO1 - **AN X-RAY RESONANT SCATTERING STUDY OF MULTIFERROIC TBMNO<sub>3</sub>**

**Helen Walker, Thomas Forrest, Federica Fabrizi, Desmond McMorrow, Thomas Beale, Stuart Bland, Peter Hatton, Stuart Wilkins, Luigi Paolasini, Danny Mannix**

**Parallel**

**Parallel Session V** Chair: Amos Troper

Monday - August 18th - from 17h15 to 18h45 - Room A

**17h15** Mon-pm2-AI1 - **FIELD DEPENDENT AND BOTTLENECK-LIKE BEHAVIOR OF THE ESR SPECTRA IN THE NFL PHASE OF**

**José Gerivaldo Duque, Eduardo Bittar, C. Adriano, Saul Oseroff, R. Lora Serrano, Pascoal Pagliuso, Pedro Schottmann, C Rettori, Cedimir Petrovic, Zach Fisk**

**17h45** Mon-pm2-AI2 - **ELECTRON SPIN RESONANCE IN KONDO-LATTICE COMPOUNDS**

**J. Sichelschmidt, B.I. Kochelaev, D. Zakharov, I. Fazlishanov, J. Wykhoff, A. Skvortsova, S. Belov, S. Kutusov, H.-A. Krug von Nidda, C. Krellner**

**18h15** Mon-pm2-AO1 - **MAGNETISATION OF FERROMAGNETIC PR<sub>5</sub>SI<sub>3</sub> UNDER HYDROSTATIC PRESSURE**

**Stefan Lehl, Christian Pfeleiderer, Dmitri Souptel, Guenter Behr**

**18h30** Mon-pm2-AO2 - **PRESSURE EVOLUTION OF THE MAGNETIC PHASE DIAGRAM OF THE FERROMAGNETIC KONDO LATTICE COMPOUND CERUPO**

**Monica Macovei, Michael Nicklas, Cornelius Krellner, Christoph Geibel, Frank Steglich**

**Parallel**

**Parallel Session VI** Chair: Enrique Anda

Monday - August 18th - from 17h15 to 18h45 - Room B

**17h15 Mon-pm2-BI1 - NEWS ON GRAPHENE**

Antonio H. Castro Neto

**17h45**

**Mon-pm2-BI2 - SUPERCONDUCTING PROXIMITY EFFECT AND METAL-INSULATOR TRANSITION IN GRAPHITE**

Yakov Kopelevich, Diego F. Gutierrez

**18h15 Mon-pm2-BO1 - MORPHOLOGY CONTROLS OF RELAXATION BEHAVIOR AND CHARGE TRANSPORT IN ORGANIC SEMICONDUCTORS**

Verner Kristian Thorsmølle, Richard Douglas Averitt, Jure Demsar, Darryl L. Smith, Sergei Tretiak, Richard L. Martin, Xiaoliu Chi, Arthur Penn Ramirez, Antoinette Jean Taylor

**18h30 Mon-pm2-BO2 - ORBITAL STRUCTURES IN THE BILAYER MANGANITES PETER**

Peter D. Hatton, T. A. W. Beale, S. R. Bland, R. D. Johnson, D. Prabhakaran, A. T. Boothroyd

## Tuesday, August 19th

### Plenary

**Plenary Lecture II** Chair: Eduardo C Marin

Tuesday - August 19th - from 09h00 to 10h00 - Room A

**09h00 Tue-am1-PL1 - PAIRING ABOVE TC IN THE HIGH TEMPERATURE SUPERCONDUCTORS**

Juan Carlos Campuzano

**09h30 Tue-am1-PL2 - EMERGENT BEHAVIOR IN HEAVY ELECTRON MATERIALS**

David Pines

### Parallel

**Parallel Session VII** Chair: Nilson Antunes

Tuesday - August 19th - from 10h30 to 12h00 - Room A

**10h30**

**Tue-am2-AI1 - WHERE DO THE CARRIERS REALLY LIE – MULTIPLE FERMI SURFACE POCKETS AND UNDERLYING MODULATED MAGNETIC ORDER IN THE UNDERDOPED HIGH TC SUPERCONDUCTOR YBA<sub>2</sub>CU<sub>3</sub>O<sub>6.51</sub>**

Suchitra E. Sebastian, Neil Harrison, Eric Palm, Timothy Murphy, Charles Mielke, Ruixing Liang, Douglas Bonn, Walter Hardy, Gilbert Lonzarich

**11h00 Tue-am2-AI2 - SIGNATURES OF CRITICAL CHARGE AND SPIN FLUCTUATIONS IN THE OPTICAL AND RAMAN SPECTRA OF CUPRATES**

Marco Grilli, Sergio Caprara, Carlo Di Castro, Tilman Enss

**11h30 Tue-am2-AO1 - THE FERMI SURFACE OF UNDERDOPED HIGH TC SUPERCONDUCTORS**

Neil Harrison

**11h45 Tue-am2-AO2 - <sup>27</sup>AL NMR STUDIES OF NPPD5AL2**

Hiroyuki Chudo

### Parallel

**Parallel Session VIII** Chair: Stefan Süllow

Tuesday - August 19th - from 10h30 to 12h00 - Room B

**10h30 Tue-am2-BI1 - TUNING THE GROUND-STATE IN THE DOPED CECOIN<sub>5</sub> COMPOUND**

Ricardo R. Urbano, Nicholas J. Curro, Vladimir A. Sidorov, Joe D. Thompson, Long D. Pham, Zach Fisk

**11h00 Tue-am2-BI2 - POINT CONTACT ANDREEV REFLECTION SPECTROSCOPY OF THE PURE AND DOPED FAMILY OF THE 115-HEAVY-FERMIONS: CEMIN<sub>5</sub> (M=CO,RH,IR)**

Laura H. Greene

**11h30 Tue-am2-BO1 - THE CHEMICAL-PRESSURE DEPENDENCE OF THE ENERGY SCALES IN YBRH<sub>2</sub>SI<sub>2</sub>**

*Sven Friedemann, Tanja Westerkamp, Manuel Brando, Niels Oeschler, Philipp Gegenwart, Cornelius Krellner, Christoph Geibel, Frank Steglich*

11h45 Tue-am2-BO2 - DISPERSION OF KONDO RESONANCE PEAKS IN CECOG1.2SI0.8: CE 4D-4F RESONANT ANGLE-RESOLVED PHOTOEMISSION

*H. J. Im, T. Ito, H.-D. Kim, S. Kimura, K. E. Lee, J. B. Hong, Y. S. Kwon, A. Yasui, H. Yamagami*

## Poster

**Poster Session II** Chairs: José Roberto Iglesias and José Cândido Xavier

Tuesday - August 19th - from 13h30 to 15h30 - Room C

001 - THEORETICAL INVESTIGATION OF DYNAMIC SPIN SUSCEPTIBILITY OF UNDERDOPED CUPRATE SUPERCONDUCTORS

*Partha Goswami*

002 - INFLUENCE OF THE PELLETIZING PRESSURE ON THE SUPERCONDUCTING PROPERTIES OF SUB-MICROMETRIC YBCO

*Cesar Vanderlei Deimling, Maycon Motta, Paulo Noronha Lisboa Filho, Wilson Aires Ortiz*

003 - THICKNESS-DEPENDENT OF THE CRITICAL CURRENT DENSITY OF A FLAT TYPE-II SUPERCONDUCTING STRIP IN A PERPENDICULAR MAGNETIC FIELD

*Ali A. Babaei-Brojeny*

004 - SCALING BEYOND 3D-XY IN THE FLUCTUATION CONDUCTIVITY OF YBA<sub>2</sub>CU<sub>3</sub>O<sub>7</sub>

*Valdemar Neves Viera, Jacob Schaf, Paulo Pureur*

005 - INTERGRANULAR CRITICAL CURRENT DENSITY STUDIES ON SUPERCONDUCTING YBCO SPECIMENS

*Maycon Motta, César Vanderlei Deimling, Wilson Aires Ortiz, Paulo Noronha Lisboa-Filho*

006 - SPECTRAL FUNCTIONS AND FERMI SURFACE PROPERTIES OF A D--P HUBBARD MODEL

*E. J. Calegari, S. G. Magalhaes, A. A. Gomes*

007 - THE LARGE INVERSE MAGNETOCALORIC EFFECT OF MGB<sub>2</sub>

*Isaias Gonzaga de Oliveira*

008 - NMR EVIDENCE OF A MAGNETIC QUANTUM PHASE TRANSITION IN APICAL-F FOUR-LAYERED CUPRATES BA<sub>2</sub>CA<sub>3</sub>CU<sub>4</sub>O<sub>8</sub>(O<sub>1</sub>-YFY)<sub>2</sub>

*Sunao Shimizu, Hidekazu Mukuda, Tomonori Sakaguchi, Yoshio Kitaoka, Akira Iyo, Yasuharu Kodama, Parasharam Shirage*

009 - ANOMALOUS TRANSPORT PROPERTIES IN OVERDOPED HIGH-TC SUPERCONDUCTOR

*Jose Augusto Galvis Echeverry, Hector Castro Serrato*

010 - STUDY OF THE PSEUDOGAP THE HIGH-TC SYSTEM YBCO-CA

*EDWIN HERRERA VASCO*

011 - MICROSCOPIC THEORY OF HIGH T<sub>c</sub> SUPERCONDUCTIVITY: B) APPLICATION TO ARPES

*Steffen Sykora, Klaus W. Becker*

012 - QUANTIZED MASSIVE GAUGE FIELDS AND QUASIPARTICLE MASS ENHANCEMENT IN ELECTRON-DOPED CUPRATES

*Ikuzo Kanazawa*

013 - MICROSCOPIC THEORY OF HIGH T<sub>c</sub> SUPERCONDUCTIVITY: A) THEORETICAL APPROACH

*Klaus W. Becker, Steffen Sykora*

014 - W/T SCALING OF MAGNETIC FLUCTUATIONS IN DOPED ANTIFERROMAGNETS

*Igor Sega, Peter Prelov'ek*

015 - VORTEX NOISE AND VORTEX LATTICE TRANSITIONS IN YBCO

*Paula Giraldo, Hector Castro*

016 - SUPERCONDUCTIVITY IN A STRONGLY TWO-DIMENSIONAL HUBBARD MODEL

*Edson Santos Caixeiro, Amos Troper*

017 - FLUCTUATION CONDUCTIVITY ALONG THE C-AXIS AND PARALLEL TO THE AB-PLANES IN MELT-TEXTURED YBACUO SAMPLES DOPED WITH Y<sub>2</sub>11 PHASE

*Fábio Teixeira Dias, Valdemar das Neves Vieira, Paulo Pureur, Pedro Rodrigues Jr., Xavier Obradors*



018 - EFFECTS OF DIVALENT IMPURITIES DOPING ON THE MAGNETO-CONDUCTIVITY OF THE YBA(2)CU(3)O(7) SINGLE CRYSTALS.

*Valdemar das Neves Vieira, Fábio Teixeira Dias, Paulo Pureur Neto, Jacob Schaf*

019 - EXACT GROUND STATES FOR AN EXTENDED T-J MODEL INCLUDING INTERSITE REPULSION

*Luis Gustavo Sarasua*

021 - MAGNETIC PROPERTIES OF IRON-ARSENIDE SUPERCONDUCTORS

*Elena Bascones, Maria Jose Calderon, Belen Valenzuela, Rafael Roldan, Alberto Cortijo*

022 - LA2-XSRXCUO4 SUPERCONDUCTING SAMPLES PREPARED BY THE WET-CHEMICAL METHOD.

*JORGE LUIS GONZALEZ ALFONSO, Andre Loose, Ada López, Elisa Maria Baggio-Saitovitch, Hortencio A. Borges*

023 - MAGNETIC AND TRANSPORT PROPERTIES OF LA3.5RU4O13 COMPOUND

*J. A. H. Coaquira, R. L. de Almeida, A. W. Carbonari, G. A. Cabrera-Pasca, L. B. Carvalho, S. Quezado, S.K.Malik*

024 - SUPERCONDUCTING THEORY OF CUPRATES BASED ON PHASE SEPARATION

*Evandro Vidor Lins de Mello, Raphael B. Kasal, Carlos Augusto Cardoso Passos, Otton T.S. Filho*

025 - AN ANALYTICAL EXPRESSION FOR MAGNETIC FIELD DEPENDENCE OF THE TRANSPORT CRITICAL CURRENT DENSITY IN GRANULAR SUPERCONDUCTORS

*CARLOS AUGUSTO CARDOSO PASSOS, M. T. D. Orlando, G. Keller, J. L. Passamai Jr, J. A. Ferreira, Evandro Vidor L. de Mello*

027 - MAGNETO-TRANSPORT AND OPTICAL PROPERTIES OF CEAL2 THIN FILMS

*M. Manolachi, B.Popescu, A.C. Galca, M. Valeanu, Andrei Galatanu*

028 - NEW SPIN FUNCTIONALS FOR HEISENBERG SPIN-1/2 CHAINS WITH BONDE DEFECTS OR EXCHANGE ANISOTROPY

*Valter Luiz Líbero, Poliana Heiffig Penteado, Fabiano Caetano de Souza, Guilherme Nery Prata*

029 - THERMOELECTRIC EFFECTS IN A SINGLE-WALL ZIGZAG CARBON NANOTUBE WITH A SIDE COUPLED STRONGLY CORRELATED QUANTUM DOT

*Roberto Franco Peñaloza, Jereson Silva Valencia, Marcos Sergio Figueira Da Silva*

030 - SPIN EXCITATIONS IN CU L3 AND OK RIXS ON SPIN LADDER COMPOUND SR14CU24O41

*Justina Schlappa, Thorsten Schmitt, Vita Ilakovac, Vladimir N. Strocov, Francois Vernay, Beni Thielemann, Henrik M. Ronnow, Bernard Delley, Joel Mesot, Luc Patthey*

031 - ELECTRONIC CORRELATIONS IN TWO-DIMENSIONAL HUBBARD SUPERLATTICES

*Rubem Mondaini, Thereza Cristina Lacerda Paiva*

032 - THE (1+1)-DIMENSIONAL SINE-GORDON MODEL IN THE PRESENCE OF A 1/R INTERACTION

*Mariana Malard, David Schmeltzer, Anatoly Kuklov*

033 - INFLUENCE OF MG-DEFICIENCY ON THE VORTEX MATTER PROPERTIES OF MGB2

*Ana Augusta Mendonça de Oliveira, Peter A. Sharma, N. Hur, Sang-Wook Cheong, Wilson Aires Ortiz*

034 - DURATION DEPENDENCES OF ELECTRIC AND CRYSTAL STRUCTURES OF BILAYER HYDRATED NAXCOO2·YH2O

*Hiroto Ohta, C. Michioka, Y. Itoh, K. Yoshimura*

035 - 109AG- AND 14N-NMR STUDIES ON SILVER-OXIDE CLATHRATE AG6O8AGNO3

*Fumiya Kanetake, Hirofumi Naruwa, Hidekazu Mukuda, Yoshio Kitaoka, Kenji Kawashima, Masaru Ishii, Jun Akimitsu*

036 - INTRINSIC BULK VORTEX DYNAMICS REVEALED BY TIME RESOLVED SMALL ANGLE NEUTRON SCATTERING.

*Sebastian Mühlbauer, Peter Böni, Christian Pfeleiderer, Albrecht Wiedenmann, Edward Forgan*

038 - ULTRASONIC INVESTIGATION OF OFF-CENTER RATTLING IN PR0.55ND0.45OS4SB12

*Tatsuya YANAGISAWA, Taichi MAYAMA, Hiroyuki HIDAOKA, Hiroshi AMITSUKA, Akio YAMAGUCHI, Yuichi NEMOTO, Terutaka GOTO, Naoya TAKEDA, Pei-Chun Ho, M. Brian Maple*

039 - COMMENSURATE SPIN DENSITY WAVE IN NDOFEAS THAT IS ABSENT IN NDO<sub>0.88</sub>Fe<sub>0.12</sub>FeAS SUPERCONDUCTOR: A MÖSSBAUER STUDY

*D.R. Sánchez, M. Alzamora, N.L. Wang, E. Baggio Saitovitch*

040 - MAGNETISM AND SUPERCONDUCTIVITY IN UCOGE STUDIED BY RESISTIVITY, SPECIFIC HEAT, AC SUSCEPTIBILITY AND MAGNETIZATION MEASUREMENTS

*Jiri Pospisil, Jana Poltnerova Vejpravova, Vladimir Sechovsky*

041 - A MICROSCOPIC MODEL FOR COEXISTENCE OF MAGNETISM AND SUPERCONDUCTIVITY

*Pedro Rodrigues Bertussi, André Luiz Malvezzi, Thereza Cristina de Lacerda Paiva, Raimundo Rocha dos Santos*

042 - FIRST-ORDER TRANSITION SWITCH-OFF OF SUPERCONDUCTIVITY IN UGe<sub>2</sub>

*N. Kabeya, R. Iijima, E. Osaki, S. Ban, K. Imura, K. Deguchi, N. Aso, Y. Honma, Y. Shiokawa, N. K. Sato*

043 - ON THE CROSSOVER TO FERMI LIQUID IN HIGH TEMPERATURE SUPERCONDUCTORS

*Hector Castro*

044 - SPONTANEOUS VORTEX PHASE TRANSITION IN SUPERCONDUCTOR-FERROMAGNETIC NANO-COMPOSITES

*Yutao Xing, Hans Micklitz, Tatiana G. Rappoport, Elisa Baggio-Saitovitch*

045 - THEORETICAL INVESTIGATIONS OF LAOFePN (PN=P, AS AND SB)

*Chunsheng Liu, Xianlong Wang, Zhi Zeng, L.J. Zou, H. Q. Lin*

046 - IDENTIFYING THE GAP IN FeAS BASED SUPERCONDUCTORS THROUGH ANGLE RESOLVED SPECIFIC HEAT OSCILLATIONS

*Gregory R Boyd, S. Graser, Chao Cao, Hai-Ping Cheng, P.J. Hirschfeld, D.J. Scalapino*

047 - MAGNETIC PHASE DIAGRAM OF THE HUBBARD MODEL WITH NEXT-NEAREST NEIGHBOR HOPPING

*Robert Peters, Thomas Pruschke*

048 - EVOLUTION OF THE SPECTRAL WEIGHT IN THE MOTT-HUBBARD SERIES: SrVO<sub>3</sub> – CaVO<sub>3</sub> – LaVO<sub>3</sub> – YVO<sub>3</sub>

*Rodrigo José Ochekoski Mossaneck, Miguel Abbate*

049 - QUANTUM MONTE CARLO SIMULATIONS IN CONTINUOUS TIME: AN APPLICATION TO THE HUBBARD MODEL

*Sebastian Fuchs, Emanuel Gull, Matthias Troyer, Thomas Pruschke*

050 - SECOND QUANTIZED REPRESENTATION OF OBSERVABLES FOR ORTHOFERMIONS

*Ram Kishore, Ashok Kumar Mishra*

051 - ELECTRONIC GRIFFITHS PHASE AND MOTT-ANDERSON TRANSITION IN DISORDERED CORRELATED SYSTEMS

*Maria Carolina de Oliveira Aquiar, Vladimir Dobrosavljevic*

052 - DISTINCT SOLUTIONS OF THE INFINITE U HUBBARD MODEL THROUGH NESTED BETHE ANSATZ AND GUTZWILLER PROJECTION OPERATOR APPROACH

*Ashok Kumar Mishra, R. Kishore*

053 - METAL-INSULATOR TRANSITION IN Ca<sub>1-x</sub>NaxFeO<sub>3</sub> WITH POST-PEROVSKITE STRUCTURE

*Kenya Ohgushi, Hirotada Gotou, Takehiko Yagi, Yoko Kiuchi, Fumiko Sakai, Yutaka Ueda*

054 - CHANGES IN THE ELECTRONIC STRUCTURE OF CaVO<sub>3</sub> AND YVO<sub>3</sub> ACROSS THE METAL-INSULATOR TRANSITION

*Rodrigo José Ochekoski Mossaneck, Miguel Abbate*

056 - CROSS EFFECT OF COULOMB CORRELATION AND HYBRIDIZATION IN THE OCCURRENCE OF FERROMAGNETISM IN TWO BAND TRANSITION METALS C. M. CHAVES (1), A. TROPER (1,2) .

*Carlos Mauricio Chaves, A. Troper*

057 - IMPEDANCE SPECTROSCOPY OF VO<sub>2</sub> THIN FILMS AT INSULATOR TO METAL TRANSITION

*João Tiburcio Dias de Oliveira, Claudiosir Roque dos Santos, Matheus Gamino Gomes, Kelly Daiane Sossmeier, Marcos Carara, Luiz Fernando Schelp*

058 - ELASTIC AND INELASTIC RESONANT SCATTERING FROM A ONE DIMENSIONAL CUPRATE

Lewis Andrew Wray, Yuqi Xia, Dong Qian, D. Hsieh, K. Ishii, Hiroshi Eisaki, Zahid Hasan

059 - OBSERVATION OF A NOVEL ORBITAL SELECTIVE MOTT TRANSITION IN CA<sub>1.8</sub>SR<sub>0.2</sub>RUO<sub>4</sub>

Madhab Neupane, P. Richard, Z.-Pan, Y. Xu, R. Jim, D. Mandrus, X. Dai, Z. Fang, Z. Wang, H. Ding

060 - GROUND-STATE DEGENERACY AND LOW-TEMPERATURE THERMODYNAMICS OF HIGHLY FRUSTRATED HUBBARD CHAINS

Andreas Honecker, Oleg Derzhko, Johannes Richter

061 - FALICOV KIMBALL MODEL WITH ASYMMETRIC CONDUCTION BAND

Cíntia Aguiar, Valter L. Líbero

062 - THE IMPURITY ANDERSON MODEL WITH FINITE COULOMB CORRELATION: THE ATOMIC MODEL

Thiago Lobo Fonseca, Marcos Sérgio Figueira da Silva, Mario Foglio

063 - SIMULATION OF MAGNETIC AND THERMAL PROPERTIES OF THIN FILMS OF LA<sub>1-X</sub>CA<sub>X</sub>MNO<sub>3</sub> (X=1/3 AND X=2/3)

Elisabeth Restrepo Parra, Jesus Fabian Jurado, Johans Restrepo Cárdenas

064 - THE SCHRIEFFER-WOLF TRANSFORMATION FOR THE UNDERSCREENED KONDO LATTICE

Christopher Thomas, Acirete S. da R. Simões, C. Lacroix, J.R. Iglesias, B. Coqblin

065 - INTRIGUING PHYSICAL PROPERTIES OF THE AS-BASED FILLED SKUTTERUDITES

Tomasz Cichorek, Ryszard Wawryk, Zygmunt Henkie, Ryan E. Baumbach, Brian M. Maple

066 - ANTIFERROMAGNETIC STRUCTURE OF UPD<sub>2</sub>SB

Matthias Bleckmann, Alexandra Buchsteiner, Norbert Stüßner, Krzysztof Gofryk, Dariusz Kaczorowski, S. Süllow

067 - LOW TEMPERATURE MAGNETISM IN CD-DOPED CE<sub>2</sub>RHIN<sub>8</sub> HEAVY FERMION ANTIFERROMAGNET

Cris Adriano, Leticie Mendonça-Ferreira, Carlos Giles, Pascoal Giglio Pagliuso, François de Bergevin, Claudio Mazzoli, Zachary Fisk

068 - MAGNETIC PROPERTIES OF (CE<sub>1-X</sub>LA<sub>X</sub>)PDIN<sub>2</sub>

Luzeli Moreira da Silva, Adenilson Oliveira dos Santos, Lisandro Pavie Cardoso, Flávio César Guimarães Gandra, Maurício Antonio Custódio de Melo, Antonio Medina Neto

069 - PRESSURE INDUCED VALENCE TRANSITIONS IN THE ANDERSON LATTICE MODEL

Ben Hur Bernhard, Bernard Coqblin

070 - ANTIFERROMAGNETIC STRUCTURE IN UNIAL AT LOW TEMPERATURES

Karel Prokes, Ekkes Bruck, Vladimir Sechovsky

071 - MAGNETIC AND TRANSPORT PROPERTIES OF DYCOGA<sub>5</sub>

Nelson Orlando Moreno, Joe D. Thompson, John L. Sarrao

072 - A FIELD DEPENDENT RENORMALIZED PARAMETER ANALYSIS OF STRONGLY CORRELATED ELECTRONS IN MAGNETIC FIELD

A.C. Hewson, J. Bauer

073 - THERMODYNAMIC AND TRANSPORT PROPERTIES OF VALENCE-FLUCTUATING PHASE OF SMS

Keiichiro Imura

074 - MAGNETIC PROPERTIES OF A KONDO INSULATOR WITH ELECTRON-PHONON INTERACTION

Reza Nourafkan, Nasser Nafari

075 - PERIODIC ANDERSON MODEL WITH A NARROW BAND OF NEARLY LOCALIZED ELECTRONS: X-BOSON TREATMENT

Marcos Sergio Figueira

076 - CRYSTAL ELECTRIC FIELD EXCITATIONS IN FERROMAGNETIC CETX COMPOUNDS

Buyisiwe M. Mhlunqu, D.T. Adroja, A.M. Strydom, S. Paschen

077 - THE GROUND STATE G-VALUE OF ER<sup>3+</sup> IN THE UNFILLED SKUTTERUDITES COSB<sub>3</sub> REVEALS THE EXISTENCE OF A SECOND 6TH ORDER TERM IN THE CUBIC CRYSTAL FIELD HAMILTONIAN.

Jose Marcelo Vargas, Fernando Garcia, Daniel Garcia, C. B. Oseroff, B. Sales, Carlos Rettori

**078 - RELEVANCE OF MULTIBAND EFFECTS FOR ELECTRON SPIN RESONANCE IN THE DENSE YB-BASED KONDO SYSTEMS**

Vladimir Ivanshin

**079 - NEW FERROMAGNETIC COMPOUNDS U<sub>6</sub>FE<sub>8</sub>-XGE<sub>6</sub> AND U<sub>3</sub>FE<sub>4</sub>GE<sub>4</sub>**

David Berthebaud, Olivier Tougait, Michel Potel, Antonio P. Gonçalves, Elsa B. Lopes, Henri Noël

**080 - KONDO INSULATING STATE IN CENI<sub>{1-X}</sub>RH<sub>{X}</sub>SN AS A FUNCTION OF CARRIER NUMBER**

Andrzej Slebarski

**081 - ASYMMETRICALLY DOPED 1-DIMENSIONAL POLYMERS**

Heron Caldas

**082 - SPIN AND CHARGE FLUCTUATIONS IN EUTIO<sub>3</sub>: A CASE FOR MULTIFERROIC QUANTUM CRITICALITY**

Leszek J Spalek, S.E. Rowley, M. Shimuta, T. Katsufuji, C. Panagopoulos, S.S. Saxena

**Parallel**

**Parallel Session IX** Chair: Carlos Mauricio Chaves

Tuesday - August 19th - from 15h30 to 16h30 - Room A

**15h30 Tue-pm1-AI1 - SPONTANEOUS CURRENTS AND POLARIZATION IN MOTT INSULATORS: ARE ELECTRONS REALLY LOCALIZED?**

Lev Bulaevskii, Christian Batista, Maxim Mostovoy, Daniel Khomskii

**16h00 Tue-pm1-AI2 - VANISHING FERROMAGNETISM AND SHARP VALENCE-CROSSOVER IN CEPD<sub>1</sub>-XRHX UNDER HIGH-PRESSURE**

Pablo Pedrazzini, Didier Jaccard, Micha Deppe, Christoph Geibel, Julian Sereni

**16h30 Tue-pm2-AO1 - FIELD SUPPRESSION OF THE MODULATED PHASE OF CE<sub>2</sub>PD<sub>2</sub>SN**

Mariano Gómez Berisso, Julián Gustavo Sereni, Amar Braghta, Bernard Chevalier, Guy Schmerber, Jean Paul Kappler

**Parallel**

**Parallel Session X** Chair: Sergio Magalhães

Tuesday - August 19th - from 15h30 to 16h30 - Room B

**15h30 Tue-pm1-BI1 - FULDE-FERREL-LARKIN-OVCHINNIKOV STATE IN THE ORGANIC SUPERCONDUCTOR Ê-(BEDT-TTF)<sub>2</sub>CU(NCS)<sub>2</sub>**

Albin Demuer, Rolf Lortz, Yuxing Wang, Ilya Sheikin, Beate Bergk, Jochen Wosnitza, Y. Nakazawa

**16h00 Tue-pm1-BI2 - LA- AND AS-NMR STUDIES ON LAFeAs(O<sub>1-X</sub>Fx)**

Kenji Ishida

**16h30 Tue-pm1-BO1 - POINT-CONTACT ANDREEV REFLECTION SPECTROSCOPY OF THE SUPERCONDUCTING ORDER PARAMETER IN THE 55 K NDFeAs(O<sub>0.9</sub>F<sub>0.1</sub>) SUPERCONDUCTOR**

Peter Samuely, Pavol Szabo, Zuzana Pribulova, M.L. Tillman, Sergey L. Bud'ko, Paul C. Canfield

**Parallel**

**Parallel Session XI** Chair: Shan-Wen Tsai

Tuesday - August 19th - from 17h15 to 18h45 - Room A

**17h15 Tue-pm2-AI1 - BISMUTH BEYOND THE QUANTUM LIMIT**

Kamran Behnia, Benoit FauquÃ©, Aritra Banerjee, Luis Balicas, Ilya Sheikin, Yakov Kopelevich

**17h45 Tue-pm2-AI2 - A FUNCTIONAL RENORMALIZATION GROUP APPROACH TO NON-EQUILIBRIUM PROPERTIES OF MESOSCOPIC INTERACTING QUANTUM SYSTEMS**

Thomas Pruschke, Andreas Dirks, Riccardo Gezzi

**18h15 Tue-pm2-AO1 - MAGNETIC ORDERING IN EUNIO<sub>3</sub> AND YNIO<sub>3</sub> STUDIED BY MUON SPIN ROTATION**

Fred Jochen Litterst, Moshe Dubman, Hans Henning Klauss, Dirk Menzel, Mohsen Abd-Elmeguid, Hans Micklitz, Alexander Cayturo, Elisa Baggio-Saitovitch, Jose Antonio Alonso, Hubertus Luetkens

**18h30 Tue-pm2-AO2 - HALL EFFECT AND MAGNETORESISTANCE IN MNSI**  
*Andreas Neubauer, Christian Pfeleiderer, Philipp Niklowitz, Peter Böni*

#### Parallel

**Parallel Session XII** Chair: Jozef Spalek

Tuesday - August 19th - from 17h15 to 18h45 - Room B

**17h15 Tue-pm2-BI1 - COMPETITION BETWEEN SUPERCONDUCTIVITY AND SPIN-DENSITY-WAVE INSTABILITY IN RE(O1-XFX)FEAS (RE=LA, CE, ND,<sub>i</sub>-RARE EARTH ELEMENT)**

*J. Dong, H. J. Zhang, G. Xu, Z. Li, G. Li, G. F. Chen, X. Dai, J. L. Luo, Z. Fang, N. L. Wang*

**17h45 Tue-pm2-BI2 - HYDROSTATIC PRESSURE STUDY OF THE STRUCTURAL PHASE TRANSITIONS AND SUPERCONDUCTIVITY IN SINGLE CRYSTALS OF (BA1-XKX)FE2AS2 (X = 0 AND 0.45) AND CAFE2AS2.**

*Milton S. Torikachvili, Sergey L. Budko, Ni Ni, Paul C. Canfield*

**18h15**

**Tue-pm2-BO1 - ELECTRONIC CORRELATIONS IN SINGLE CRYSTALS OF THE IRON Pnictides CEFEPNO (PN = P, AS)**

*Cornelius Krellner, Anton Jesche, Christoph Geibel*

**18h30 Tue-pm2-BO2 - INTERPLAY BETWEEN MAGNETISM AND SUPERCONDUCTIVITY IN FEAS-BASED SUPERCONDUCTORS**

*Vladislav Kataev, Hans-Joachim Grafe, Günther Behr, Christian Hess, Rüdiger Klingeler, Stefan-Ludwig Drechsler, Hans-Hennig Klauss, Hubertus Luetkens, Jochen Litterst, Bernd Büchner*

## Wednesday, August 20th

#### Plenary

**Plenary Lecture III** Chair: Laura Greene

Wednesday - August 20th - from 09h30 to 10h00 - Room A

**09h30 Wed-am1-PL1 - HEAVY FERMION SUPERCONDUCTIVITY OF ACTINIDE COMPOUNDS**

*Dai Aoki, Y. Haga, T.D.Matsuda, N. Tateiwa, S. Ikeda, Y.Homma, H. Sakai, Y. Shiokawa, E. Yamamoto, A. Nakamura*

#### Parallel

**Parallel Session XIII** Chair: Vladislav E. Kataev

Wednesday - August 20th - from 10h30 to 12h00 - Room A

**10h30 Wed-am2-AI1 - SUPERCONDUCTIVITY WITHOUT PHONONS IN PUCOGA5?**

*Nicola Magnani, Giovanni A. Ummarino, Eric Colineau, Jean-Christophe Griveau, Jean Rebizant, Franck Wastin, Roberto G. M. Caciuffo*

**11h00 Wed-am2-AI2 - SUPERCONDUCTIVITY IN THE NEWEST GENERATION OF HEAVY ELECTRON SUPERCONDUCTORS: PUCOGA5 AND NPAL2PD5**

*Piers Coleman, Rebecca Flint, Maxim Dzero*

**11h30 Wed-am2-AO1 - NON-FERMI LIQUID BEHAVIOR IN THE PERIODIC ANDERSON MODEL**

*Adriano Amaricci, Giovanni Sordi, Marcelo Javier Rozenberg*

**11h45 Wed-am2-AO2 - CRITICAL KONDO DESTRUCTION AND THE VIOLATION OF THE QUANTUM-TO-CLASSICAL MAPPING OF QUANTUM CRITICALITY**

*Stefan Kirchner, Qimiao Si*

#### Parallel

**Parallel Session XIV** Chair: Carolina Aguiar

Wednesday - August 20th - from 10h30 to 12h00 - Room B

- 10h30** Wed-am2-BI1 - **ELECTRONIC GRIFFITHS PHASE NEAR A DISORDERED 2D MOTT TRANSITION**  
*Eric C. Andrade, Eduardo Miranda, Vladimir Dobrosavljevic*
- 11h00** Wed-am2-BI2 - **BAND STRUCTURE OF STRONGLY CORRELATED MATERIALS FROM THE DYNAMICAL MEAN FIELD PERSPECTIVE**  
*Kristjan Haule*
- 11h30** Wed-am2-BO1 - **VERWEY TRANSITION IN MAGNETITE AT HIGH PRESSURE: A NEW QUANTUM CRITICAL POINT AT THE ONSET OF METALLIZATION**  
*Jozef Spalek, Andrzej Kozłowski, Zbigniew Tarnawski, Zbigniew Kakol, Y Fukami, Fumihisa Ono, Ryszard Zach, Leszek Spalek, Jurgen Honig*
- 11h45** Wed-am2-BO2 - **ROBUST THREE-DIMENTIONAL NONMETALLIC STATE IN FECRAS**  
*Wenlong Wu, Alix McCollam, Patrick Rourke, DG Rancourt, Ian Swaison, Stephen Julian*

## Thursday, August 21th

### Plenary

**Plenary Lecture IV** Chair: Suchitra Sebastian

Thursday - August 21th - from 09h00 to 10h00 - Room A

- 09h00** Thu-am1-PL1 - **MAGNETISM AND SUPERFLUID-DENSITY OF FEAS AND CUPRATE SUPERCONDUCTORS: ENERGY-SCALE PHENOMENOLOGY AND A POSSIBLE PAIRING MECHANISM**  
*Yasutomo Uemura, Jeremy Carlo, Tatsuo Goko, Graeme Luke, Pengcheng Dai, Nic Shannon, Setsuko Tajima, Shigeki Miyasaka, Nan-Lin Wang, Greg MacDougall*
- 09h30** Thu-am1-APL2 - **QUANTUM CRITICALITY OF CECU6-XAUX \***  
*Hilbert v. Lohneysen*

### Parallel

**Parallel Session XV** Chair: Neil Harrison

Thursday - August 21th - from 10h30 to 12h00 - Room A

- 10h30** Thu-am2-AI1 - **MAGNETISM IN THE PSEUDO-GAP AND OVERDOPED STATES OF LA<sub>2</sub>-XSRXCUO<sub>4</sub>**  
*Graeme M Luke, G.J. MacDougall, A.A. Aczel, J.P. Carlo, T. Ito, J. Rodriguez, P.L. Russo, A.T. Savici, Y.J. Uemura, S. Wakimoto*
- 11h00** Thu-am2-AI2 - **CRYSTAL-LATTICE RESPONSE TO ANTIFERROMAGNETIC AND HIDDEN ORDER IN URU<sub>2</sub>SI<sub>2</sub>**  
*Philipp G. Niklowitz, Christian Pfleiderer, Thomas Keller, John A. Mydosh*
- 11h30** Thu-am2-AO1 - **PHASE TRANSITIONS IN QUANTUM CRITICAL CE<sub>3</sub>PD<sub>20</sub>SI<sub>6</sub>**  
*Silke Bühler-Paschen, J. Custers, S. Laumann, M. Müller, A. Prokofiev, A. M. Strydom*
- 11h45**  
 Thu-am2-AO2 - **STABLE MEAN FIELD SOLUTION OF A SHORT-RANGE INTERACTING SO(3) QUANTUM SPIN-GLASS**  
*Eduardo Cantera Marino, Carlos Magno Silva da Conceição*

### Parallel

**Parallel Session XVI** Chair: Fred Jochen Litterst

Thursday - August 21th - from 10h30 to 12h00 - Room B

- 10h30** Thu-am2-BI1 - **COMPLEX MIXED STATE OF PAULI LIMITED SUPERCONDUCTOR CECOIN<sub>5</sub>**  
*X. Gratens, L. Mendonça Ferreira, Y. Kopelevich, N. F. Oliveira Jr., P. G. Pagliuso, R. Movshovich, R. R. Urbano, J. L. Sarrao, J. D. Thompson*
- 11h00** Thu-am2-BI2 - **SUPERCONDUCTING VORTICES IN CECOIN<sub>5</sub>: BEYOND THE ABRIKOSOV-GINZBURG-LANDAU PARADIGM?**

*Andrea D. Bianchi, Michel Kenzelmann, Lisa DeBeer-Schmidt, Jon S. White, Edward M. Forgan, Joel Mesot, Roman Movshovich, Eric D. Bauer, Cedomir Petrovic, Morten R. Eskildsen*

**11h30 Thu-am2-BO1 - ANOMALOUS BEHAVIOR BELOW THE SUPERCONDUCTING TRANSITION OF NONCENTROSYMMETRIC CePt<sub>3</sub>Si: MAGNETIC PENETRATION DEPTH AND STOICHIOMETRIC STUDIES**  
*Ismardo Bonalde, Werner Brämer-Escamilla, Rebeca Ribeiro, Carlos Rojas, Ernst Bauer, Yoshinori Haga, Takashi Yasuda, Yoshichika Onuki*

**11h45 Thu-am2-BO2 - THE STATIC AND DYNAMIC MAGNETIC PROPERTIES OF PUCOGAS AND NPCOGAS INVESTIGATED BY NEUTRON SCATTERING EXPERIMENTS**  
*Arno Hiess, Anne Stunault, Nicola Magnani, Eric Colineau, Jean Rebizant, Franck Wastin, Roberto Caciuffo, Gerry H. Lander*

## Parallel

**Parallel Session XVII** Chair: Valter Luiz Libero

Thursday - August 21th - from 13h30 to 15h15 - Room A

**13h30 Thu-pm1-AI1 - GEOMETRICAL FRUSTRATION IN CORRELATED METALLIC SYSTEMS**  
*Claudine Lacroix*

**14h00 Thu-pm1-AO1 - RARE EARTH SPIN ORDERING IN THE MULTIFERROIC TBMN<sub>2</sub>O<sub>5</sub>**  
*Roger Douglas Johnson, Stewart Rodney Bland, Claudio Mazzoli, Thomas Anthony William Beale, Chao-Hung Du, Carsten Detlefs, Stuart Brian Wilkins, Peter David Hatton*

**14h15 Thu-pm1-AO2 - SLOW SPIN DYNAMICS IN FERROMAGNETIC PYROCHLORE OXIDES**  
*Jason Stewart Gardner, Georg Ehlers*

**14h30 Thu-pm1-AO3 - GROUND STATE AND SPIN EXCITATIONS IN THE 1D DISTORTED DIAMOND CHAIN AZURITE, CU<sub>3</sub>(CO<sub>3</sub>)<sub>2</sub>(OH)<sub>2</sub>**  
*Kirrily Rule, Clare Gibson, Jens-Uwe Hoffmann, Anja Wolter, Stefan Suellow, Vadim Sikolenko, Alan Tennant, Bernd Wolf, Michael Lang, Juergen Schreuer*

**14h45 Thu-pm1-AO4 - INTERPLAY BETWEEN ANTIFERROMAGNETIC ORDERING AND METAL-INSULATOR TRANSITION IN THE NEARLY GEOMETRICALLY FRUSTRATED S=1/2 BAVS<sub>3</sub> SYSTEM**

*Andrea Gauzzi, Gwenaelle Rouse, Gilles Andre, Fabia Gozzo, Bernd Schmitt, Andrea Prodi, Francesca Licci*

## Parallel

**Parallel Session XVIII** Chair: Julian G. Sereni

Thursday - August 21th - from 13h30 to 15h15 - Room B

**13h30 Thu-pm1-BI1 - COEXISTENCE OF FERROMAGNETISM AND SUPERCONDUCTIVITY IN UCOGE**  
*Anne de Visser, Nguyen Thanh Huy, Fendy de Nijs, Alessia Gasparini, Ying Kai Huang*

**14h00 Thu-pm1-BI2 - ANGLE RESOLVED PHOTOEMISSION STUDY ON HEAVY FERMIONS**  
*Shin-ichi Fujimori*

**14h30 Thu-pm1-BO1 - FERROMAGNETIC ORDERING AND FERMI SURFACES IN HEAVY FERMIONS**  
*Seiji James Yamamoto, Qimiao Si*

**14h45 Thu-pm1-BO2 - WEAK FERROMAGNETISM IN CE- AND YB-BASED TERNARY COMPOUNDS**  
*Toshiro Takabatake, Keisuke Shigetoh, Hirokazu Kubo, Kazunori Umeo, Takahiro Onimaru, Yuji Muro*

## Parallel

**Parallel Session XIX** Chair: Peter D. Hatton

Thursday - August 21th - from 15h30 to 16h45 - Room A

**15h30 Thu-pm2-AI1 - LOCAL MOMENT, ITINERANCY AND DEVIATION FROM FERMI LIQUID BEHAVIOR IN NAXCOO<sub>2</sub>**  
*Luis Balicas*

**16h00 Thu-pm2-AI2 - ITINERANT MULTIPOLAR ORDERING IN THE VICINITY OF A QCP IN SKUTTERUDITE CeOS<sub>4</sub>Sb<sub>12</sub>**  
*Yuji Aoki, Shizuka Toda, Atsushi Imamura, Daisuke Kikuchi, Keitaro Kuwahara, Hideyuki Sato*

**16h30 Thu-pm2-AO1 - YBNIAL2: A NEW YB-BASED ANTIFERROMAGNET WITH A FIELD-INDUCED FERROMAGNETIC ORDER**

*Daniel Rojas Pupo, Jesús Rodríguez Fernández, Jose Ignacio Espeso Martínez, Jose Carlos Gómez-Sal*

#### Parallel

**Parallel Session XX** Chair: Alejandro Muramatsu

Thursday - August 21th - from 15h30 to 16h45 - Room B

**15h30 Thu-pm2-BI1 - EXCITING A D-DENSITY WAVE IN AN OPTICAL LATTICE**

*Cristiane Morais Smith, Lih-King Lim, Andreas Hemmerich*

**16h00 Thu-pm2-BO1 - REALIZING LUTTINGER LIQUIDS IN TRAPPED ULTRACOLD ATOMIC FERMI GASES USING 2D OPTICAL LATTICES**

*C. J. Bolech, Paata Kakashvili, S. G. Bhongale, Han Pu*

**16h15 Thu-pm2-BO2 - DMFT-NRG FOR THE BCS-BEC CROSSOVER IN THE ATTRACTIVE HUBBARD MODEL**

*Johannes Bauer, Alex C. Hewson, Nicolas Dupuis*

**16h30 Thu-pm2-BO3 - CORRELATED PHASES OF FERMI-FERMI MIXTURES OF COLD ATOMS**

*Shan-Wen Tsai, Tun Wang*

#### Parallel

**Parallel Session XXI** Chair: Wilson A. Ortiz

Thursday - August 21th - from 17h15 to 18h45 - Room A

**17h15 Thu-pm3-AI1 - SPIN ICE BEHAVIOR IN GEOMETRICALLY FRUSTRATED MAGNETS**

*Rafael Sa de Freitas, Peter Schiffer, Robert J. Cava, Roderich Moessner, Chris Leighton, Ruifang Wang, Xianglin Ke, Garret C. Lau*

**17h45**

**Thu-pm3-AI2 - EXOTIC PHASES FLOURISH IN FRUSTRATED QUANTUM MAGNETS AT HIGH MAGNETIC FIELDS**

*Marcelo Jaime*

**18h15 Thu-pm3-AI3 - EFFECT OF CHARGE-SPIN SEPARATION ON THE CONDUCTANCE THROUGH INTERACTING AHARONOV-BOHM RINGS**

*Karen Hallberg, Jose J. Rincón, Armando A. Aligia*

#### Parallel

**Parallel Session XXII** Chair: Marcos Sérgio Figueira

Thursday - August 21th - from 17h15 to 18h45 - Room B

**17h15 Thu-pm3-BI1 - EXOTIC PHONON DYNAMICS IN THERMOELECTRIC CLATHRATE COMPOUNDS WITH OFF-CENTER RATTLING IONS**

*Marcos A. Avila, Kouichirou Suekuni, Kazunori Umeo, Toshiro Takabatake*

**17h45 Thu-pm3-BI2 - SPIN DYNAMICS IN SUPERCONDUCTING CECU<sub>2</sub>SI<sub>2</sub>**

*Oliver Stockert*

**18h15 Thu-pm3-BO1 - CONDUCTIVITY OF ELECTRONIC MESOPHASES**

*Rafael M. Fernandes, Joerg Schmalian, Harry Westfahl Jr.*

**18h30 Thu-pm3-BO2 - KONDO INSULATING STATE IN CENI<sub>{1-X}RH<sub>{X}SN</sub> AS A FUNCTION OF CARRIER NUMBER</sub>**

*Andrzej Słebarski*

## Friday, August 22th

#### Plenary

**Plenary Lecture V** Chair: Carlos Rettori



Friday - August 22th - from 09h00 to 10h00 - Room A

**09h00 Fri-am1-PL1 - LOCAL QUANTUM CRITICALITY IN CUPRATES AND IN HEAVY FERMIONS**

Chandra Varma

**09h30 Fri-am1-PL2 - MAGNETISM IN THE SUPERCONDUCTING STATE OF STRONGLY CORRELATED SYSTEMS**

Joe D. Thompson, Tuson Park

## Parallel

**Parallel Session XXIII** Chair: Raquel Ribeiro

Friday - August 22th - from 10h30 to 12h00 - Room A

**10h30**

**Fri-am2-AI1 - KONDO EFFECT IN TRANSPORT THROUGH AHARONOV-BOHM-CASHER INTERFEROMETERS**

A. M. Lobos, A. A. Aligia

**11h00 Fri-am2-AO2 - RMXS STUDY OF THE FRUSTRATED ANTIFERROMAGNET CA<sub>3</sub>CO<sub>2</sub>O<sub>6</sub>**

Claudio Mazzoli, Stefano Agrestini, Alessandro Bombardi, Martin Lees

**11h15 Fri-am2-AO3 - TRANSPORT PROPERTIES OF HIGHLY CORRELATED ELECTRON IN NANOSCOPIC SYSTEMS**

Enrique Anda, Guillermo Chiappe, Carlos Busser, Maria Augusta Davidovich, George Martins, Fabian Heidrich-Meisner, Elbio Dagotto

**11h30 Fri-am2-AO4 - UNIVERSALITY AND THE THERMAL DEPENDENCE OF THE CONDUCTANCE OF NANODEVICES**

Antonio Carlos Seridonio, Makoto Yoshida, Luiz Nunes de Oliveira

## Parallel

**Parallel Session XXIV** Chair: Seiji J. Yamamoto

Friday - August 22th - from 10h30 to 12h00 - Room B

**10h30 Fri-am2-BI1 - ELECTRONIC TUNING OF THE PRESSURE-INDUCED SUPERCONDUCTING PHASE IN CERHINS.**

Leticie Mendonça-Ferreira, Tuson Park, Vladimir A. Sidorov, M. Nicklas, Eduardo Matzenbacher Bittar, Raimundo Lora-Serrano, Scheilla M. Ramos, John L. Sarrao, Joe D. Thompson, Pascoal Giglio Pagliuso

**11h00 Fri-am2-BI2 - THE THEORY OF MARGINAL FERM LIQUIDS - AN EXACT DERIVATION BASED ON DIRAC'S FIRST CLASS CONSTRAINTS METHOD**

David Schmeltzer

**11h15 Fri-am2-BO1 - A THEORETICAL STUDY OF THE UNDERSCREENED ANDERSON LATTICE : APPLICATION TO URANIUM COMPOUNDS.**

B. Coqblin, J.R. Iglesias, N. B. Perkins, Acirete S. da R. Simoes, Christopher Thomas

**11h30 Fri-am2-BO2 - D-WAVE SUPERCONDUCTIVITY IN THE KONDO-HEISENBERG LATTICE MODEL**

Jose Candido Xavier, Elbio Dagotto