

# 10<sup>th</sup> ICFA SCHOOL ON INSTRUMENTATION IN ELEMENTARY PARTICLE PHYSICS



The school is aimed primarily at young pos docs, with participation of graduate students and promising undergraduate students. Applications are invited from all parts of the world, specially from institutes in Brazil and from other countries in Latin America. Some fellowships are available, please inquire.

**ITACURUÇÁ, RIO DE JANEIRO - BRAZIL**

**8-20, DECEMBER 2003**



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**HOST INSTITUTES** • Centro Brasileiro de Pesquisas Físicas (CBPF) • Universidade Federal do Rio de Janeiro (UFRJ)

for application and information

<http://www.cbpf.br/icfa2003/>

Deadline for applications : 26th September 2003

## LABORATORY COURSES

- Pixel and strip readout techniques (G. Cardoso, S. Kwan • Fermilab, M. Sheaff • Wisconsin U., S. Vergara • FCFM/BUAP)
- Wire chamber and front-end electronics (E. Polycarpo • CBPF)
- Digital signal processing (J.M. Seixas • UFRJ)
- Silicon detectors (B. Alpat, P. Giubellino • INFN, A. Macpherson, S. Roe, A. Rudge • CERN)
- Cosmic ray showers detection (T. Dova • La Plata)
- Image acquisition with gas detectors (A. Barbosa • CBPF)
- Bio-impedance tomography (M. Nogueira • UFRJ)
- Scintillating gas detectors (A. Polycarpo • LIP)
- Drift chambers (A.H. Walenta • U. Siegen)
- Ring imaging Cerenkov detectors (P. Krizan • Stefan Inst.)

## LECTURE COURSES

- General introduction to detectors (K. Grupen • U. Siegen)
- General introduction to electronics and signal processing for HEP (H. Spieler • LBL)
- Silicon detectors (to be confirmed)
- Experimental challenges and techniques for LHC detectors (to be confirmed)
- Calorimeters (R. Wigmans • Texas Tech.)
- Detectors for non-accelerator Physics (to be confirmed)
- Accelerators: present and future (to be confirmed)
- Data acquisition and triggering (to be confirmed)

## REVIEW TALKS

- The Auger project (L. Villasenor • UMSNH)
- Neutrino Physics (to be confirmed)
- B-factories and B-physics (P. Sheldon • Vanderbilt U.)
- Higgs and beyond (to be confirmed)
- Heavy Ion Experiments (RHIC and LHC) (to be confirmed)
- The GRID (A. Santoro • UERJ)
- Synchrotron light sources and applications (to be confirmed)
- Detectors for medical Physics (to be confirmed)
- Physics and detectors at future  $e^+e^-$  colliders (to be confirmed)
- CDF and D0 Experiments (to be confirmed)
- Detectors for synchrotron experiments (to be confirmed)

## EVENING LECTURES (TO BE CONFIRMED)

- J. Cronin (Chicago U.)
- M. Spiro (IN2P3)

Sponsorship requested to

