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W. Beiglböck
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Jean Cleymans Hendrik B. Geyer
Frederik G. Scholtz (Eds.)

Hadrons in Dense Matter and Hadrosynthesis

Proceedings of the Eleventh Chris Engelbrecht
Summer School Held in Cape Town, South Africa,
4–13 February 1998



Springer

Editors

Jean Cleymans
Department of Physics
University of Cape Town
7701 ZA Rondebosch, South Africa

Hendrik B. Geyer
Frederik G. Scholtz
Department of Physics
University of Stellenbosch
6400 ZA Stellenbosch, South Africa

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Preface

This volume contains lectures presented at the Eleventh Chris Engelbrecht Summer School held at the University of Cape Town during the first half of February 1998.

The school gave lecturers the opportunity to present their fields of research in great detail with four or five lectures devoted to a single topic.

The topic of the lectures included in this volume is the study of dense hadronic matter in relativistic heavy ion collisions and in astrophysics.

In relativistic heavy ion collisions one can study the properties of highly compressed nuclear matter, test models describing the creation of hadrons, describe the evolution of hot hadronic matter and look for signals for the phase transition from nuclear to quark matter.

The lectures included in this volume provide excellent introductions to the fields of chiral symmetry at finite temperature, the use of light cone variables and the use of statistical methods applied to relativistic heavy ion collisions. The lectures also give a very thorough review of the experimental results at the GSI/SIS accelerator and a detailed presentation of the methods used in astrophysics for the theoretical study of dense stars.

We would like to take this opportunity to thank all the speakers for their efforts and for making the school a most enjoyable experience.

We gratefully acknowledge the financial support of the Foundation for Research Development (FRD, Pretoria) and the University Research Committee of the University of Cape Town.

Cape Town, October 1998

Jean Cleymans

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List of Participants

Becattini, Francesco `becattini@vaxfi.fi.infn.it`
INFN Sezione di Firenze,
Largo Enrico Fermi 2,
I-50125 Florence, Italy

Boonzaaier, L. `eggerts@physics.sun.ac.za`
Department of Physics,
University of Stellenbosch,
Stellenbosch 7600, South Africa

Braun-Munzinger, Peter `P.Braun-Munzinger@gsi.de`
KPI GSI,
Planckstr. 1,
64220 Darmstadt, Germany

Cleymans, Jean `cleymans@physci.uct.ac.za`
Department of Physics,
University of Cape Town,
Rondebosch 7701, South Africa

Dadić, Ivan `dadic@thphys.irb.hr`
Ruder Boskovic Institute,
P.O. Box 1016,
HR-41001 Zagreb, Croatia

De Wet, Antony `jadew@global.co.za`
P.O. Box 514,
Plettenberg Bay 6600, South Africa

Dumitru, Adrian `dumitru@th.physik.uni-frankfurt.de`
Inst. f. Theor. Physik,
JW Goethe University ,
D-60054 Frankfurt, Germany

Elliott, Duncan `elliott@physci.uct.ac.za`
Department of Physics,
University of Cape Town,
Rondebosch 7701, South Africa

- Fetea, Mirella mfetea@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Fetea, Remus fetea@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Geyer, Hendrik Hbg@sun-akad2.sun.ac.za
 Department of Physics,
 University of Stellenbosch,
 Stellenbosch 7600, South Africa
- Goldstein, Kevin keving@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Klevansky, Sandi sandi@frodo.tphys.uni-heidelberg.de
 Inst. f. Th. Physik,
 Ruprecht-Karls-Univ.
 Philosophenweg 16,
 D-69120 Heidelberg, Germany
- Koll, Matthias koll@pythia.itkp.uni-bonn.de
 ITKP Bonn
 Rathausstr. 14,
 D-53111 Bonn, Germany
- Madsen, Jes jesm@dfi.aau.dk
 Inst. of Physics, Astron.
 Århus Univ.,
 Langelandsgade,
 DK-8000 ÅRHUS C, Denmark
- Marais, Mark marais@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Munyaneza, Faustin munya@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Murugan, Jeff murugan@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa

- Oeschler, Helmut oeschler@axp602.gsi.de
 GSI ,
 Technische Hochschule,
 Darmstadt, Germany
- Piròvano, Luca pirovano@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Redlich, Krzysztof redlich@physik.uni-bielefeld.de
 Inst. Fizyki Teoretycznej,
 University of Wrocław,
 Plac Maxa Borny 9,
 50-204 Wrocław, Poland
- Rischke, Dirk drischke@nt1.phys.columbia.edu
 RIKEN-BNL Research Center,
 Brookhaven National Laboratory,
 Upton, NY 11973, USA
- Scholtz, Frikkie fgs@sunvax.sun.ac.za
 Department of Physics,
 University of Stellenbosch,
 Stellenbosch 7600, South Africa
- Schumann, Marc schumann@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa
- Sollfrank, Josef josef.sollfrank@physik.uni-regensburg.de
 Inst. of Theor. Physics,
 University of Regensburg ,
 Postfach 397,
 D-93053 Regensburg, Germany
- Suhonen, Esko esko.suhonen@oulu.fi
 Dept. of Physical Sciences,
 University of Oulu,
 SF-90570 Oulu 57, Finland
- Van Biljon, A.J.
 Department of Physics,
 University of Stellenbosch,
 Stellenbosch 7600, South Africa
- Van Gend, Carel vangend@physci.uct.ac.za
 Department of Physics,
 University of Cape Town,
 Rondebosch 7701, South Africa

Venugopalan, Raju
Niels Bohr Institute ,
University of Copenhagen ,
DK-2100 Copenhagen, Denmark

`venugopa@alf.nbi.dk`

Viollier, Raoul
Department of Physics,
University of Cape Town,
Rondebosch 7701, South Africa

`viollier@physci.uct.ac.za`

Wyngaardt, S.M.
Department of Physics,
University of Stellenbosch,
Stellenbosch 7600, South Africa

`egggers@sunvax.sun.ac.za`