# 52<sup>th</sup> Meeting of the Italian Astronomical Society

Teramo, May 04-08, 2008

## **Scientific Organizing Committee**

E. Antonucci (INAF-OA Torino)

R. Buonanno (Presidente SAIt, Università di Roma Tor Vergata)

L. Colangeli (INAF-OA Napoli)

S. Cristiani (INAF-OA Trieste)

A. Fontana (INAF-OA Roma)

M. Lattanzi (INAF-OA Torino) E. Pian (INAF-OA Trieste)

O. Straniero (Chair, INAF-OA Teramo)

E. Brocato (INAF-OA Teramo)

M. Busso (Università di Perugia)

A. Coradini (INAF-IASF Roma) F. Ferraro (Università di Bologna)

F. Fusi Pecci (INAF-OA Bologna)

F. Leone (INAF-OA Catania)

M.S. Randich (INAF-OA Arcetri)

#### **Local Organizing Committee**

E. Brocato (Chair, INAF-OA Teramo)

E. Carinelli (Secretary, INAF-OA Teramo)

G. Di Rico (INAF-OA Teramo)

E. Gaspari (Secretary, INAF-OA Teramo)

L. Piersanti (INAF-OA Teramo)

M. Quintini (INAF-OA Teramo)

M. Cantiello (INAF-OA Teramo)

S. Cristallo (INAF-OA Teramo)

M. Dolci (INAF-OA Teramo)

L. Pacinelli (INAF-OA Teramo)

A. Pietrinferni (INAF-OA Teramo)

G. Raimondo (INAF-OA Teramo)

#### **Organizing Institute**

INAF - Osservatorio Astronomico di Teramo

#### **Institutional Sponsorship**

Istituto Nazionale di Astrofisica Consorzio Area di Ricerca in Astrogeofisica Città di Teramo Provincia di Teramo Biblioteca Provinciale di Teramo "M. Delfico"

#### **Local Support**

Computronic Service (Teramo)

Menchini Ufficio S.r.l. (S.Egidio alla Vibrata - Teramo)

Pinocchio Cartoleria e Didattica (Teramo)

Aziende Vitivinicole: F.lli Barba, Marramiero, Mazzarosa

Dolciaria Mincarelli; Gastronomia Tarquini

#### Acknowledgments

Istituto Alberghiero "L. Di Poppa" - Teramo Istituto Statale d'Arte "F. A. Grue" - Castelli (Te) Liceo Scientifico "A. Einstein" - Teramo

### **FOREWORD**

The 52<sup>th</sup> Meeting of the Società Astronomica Italiana was held in Teramo (Italy) on May 04-08, 2008. It provided a unique opportunity to group the Italian community of observers and theoretical astrophysicists, who reviewed fresh results on the leading topics of Italian Research in Astrophysics. During the five days of the meeting, the 130 participants joined discussions on the 9 themes identified by the INAF long-term plan, which range from the structure of the early Universe to the formation of planets passing through the study of the evolution of galaxies and stars: 1) geometry and fundamental nature of the Universe; 2) the formation and the evolution of the structure of the Universe; 3) the History of the Galaxy and of nearby galaxies; 4) the birth of stars in the nearby and in the far Universe; 5) the life-cycle of stars; 6) Solar, interplanetary and magnetospheric physics; 7) the solar system; 8) the search for extraterrestrial planets and life; 9) the violent Universe. The leading Italian position in the realization of big technological projects (TNG, LBT, VST, SRT,...) has been largely underlined, such as the involvement in other International projects, some of them already operative (VLT, GLAST, Auger, Chandra, Spitzer, CMB, Planck, Integral, DAWN,...) and some still in their developing phase (ALMA, GAIA, Solar Orbiter, Adaheli,...). The large number of invited speakers (beside whom there's a consistent percentage of young researchers) derives from the purpose of giving the opportunity to the majority of research groups (both from a scientific and a geographic point of view) to highlight their most recent and interesting results on the quoted research guidelines, with preference to the ones whose contribution has been already stated from the international community. Astronomers and researchers demonstrated that, even with the current poorness of funds devoted to the Italian Astronomical Research, the Italian leadership in the International Astronomical context is unquestioned, according with the International Advisory Board Committees, who rated the Italian scientific production in Astrophysics among the five top-positions in the world.

We would like to thank all of the conference participants, for contributing to an exciting and interactive meeting, and in particular speakers and poster presenters, for having shared with us their excellent research results. Moreover, we thank the Società Astronomica Italiana for the collaboration and for having chosen Teramo as holding site of the 2008 annual meeting. Finally, we would like to warmly thank all our sponsors and to acknowledge the untired and precious effort of the local organizing committee.

M. Cantiello, S. Cristallo, G. Di Rico, A. Pietrinferni, G. Raimondo

Cover Picture: Prospect of the Observatory of Teramo and a drawing of the Pleiads by Galileo. Graphic Design: Lucio Primo Pacinelli