PREFACE

IAU 175 is a Symposium on extragalactic radio sources held in Bologna, October 10–14, 1995 to celebrate the 100th anniversary of Marconi's successful experiment on radio broadcasting. This is most appropriate, not only because Bologna is Marconi's home town, but because radio astronomy is a science made possible by the technical innovation resulting from the commercial exploitation of radio communications.

Of all the areas of astronomy influenced by radio astronomy surely the most far–reaching has been the discovery of radio galaxies by John Bolton and his colleagues nearly 50 years ago. In these 50 years much has been learned, about both the radio galaxies and the Universe they probe, but many questions remain unanswered and many more have been raised since the last meeting on extragalactic radio sources held in Albuquerque more than a decade ago. Bologna, with its rich tradition of scientific discussion and hospitality, and with a long background in radio astronomy provided the perfect environment for this Symposium on radio sources.

There were 249 active participants from 24 different countries at the Symposium. 18% were women and they contributed a similar fraction of the talks. While this is a little better than the average for IAU membership if you look at the distribution over countries you will see that Italy alone provided almost half of the female astronomers present! Furthermore the Bologna women included the co-chair and 100% of the LOC!

The main objective of this Symposium was to update our knowledge of the physics and statistical properties of extragalactic radio sources since the Albuquerque Symposium.

This past decade has seen major advances in resolution, sensitivity and imaging techniques. High quality images are now being routinely produced with resolution down to better than a milliarcsecond.

While radio astronomy was the unifying theme of this Symposium, cross fertilization was achieved by inviting experts from a range of other fields to review results from studies at γ, X–ray, Optical and IR wavelengths. There was no emphasis on AGN's or starburts galaxies at this meeting because these objects have been covered in many other meetings. Likewise the discussions on unification were treated in less detail here than at other

AGN meetings. We also emphasized the powerful radio galaxies and did not cover radio emission from normal galaxies like our own.

Part of the session on theoretical modeling was held as a parallel session. Although this provided participants more opportunities to present results, the concept of parallel sessions in a Symposium on one topic of astronomy was not well accepted by the participants.

A special panel style session was held to discuss the new big surveys of radio sources. A noteworthy outcome was the strong group endorsement of an open policy for the dissemination of information from the surveys.

There are some small changes in the organization of the proceedings compared to the presentations in the meeting which have been made to give a more coherent structure and to incorporate the posters in the appropriate places. This may result in an occasional non-sequiter in the discussion but the proceedings are now more coherently organized from small to large size, from low to high power and from low to high frequency.

I would like to thank Lucia Padrielli and her LOC team who have had to sacrifice their active participation in the scientific discussions in order to provide the organizational effort needed to run the meeting so smoothly. This is always a difficult undertaking and in this occasion especially so as they had to deal with the first use of a brand new lecture theater. Also thanks to the many postdocs and students who manned the microphones, distributed questionnaires and performed all the other miscellaneous duties required to make a large meeting run smoothly.

Finally many thanks to the SOC members who each took responsibility for a segment of the program, and especially to my co-chair Carla Fanti for taking on much more than an equal share in the scientific organization of this meeting.

The editors of these Proceedings warmly thank Tasso Tzioumis for his help in deciphering the (sometimes illegible) handwriting of the about 150 questions and corresponding answers and for carefully checking them after they were typed.

Ron Ekers