

## PREFACE

It was 70 years ago, in 1933, when the synergy between scientific discovery and technological advances enabled Karl Jansky to open a new window on the Universe, thus marking the birth of radio astronomy. Since then, radio astronomy has made huge progress, resulting in the improvement of sensitivity over the last decades by many orders of magnitude and approaching micro-arcsecond angular resolution. It has become one of the major tools for studying the Universe. Radio galaxies with their enormously energetic clouds of relativistic electrons and cosmic jets that extend up to millions of light years into space, a broad variety of atoms and molecules, beginning from neutral hydrogen to complex organic conglomerates, cosmic microwave masers, the cosmic microwave background radiation, quasars, pulsars, gravitational lenses and extra-solar planetary systems were all discovered in radio domain. Radio telescopes have also been used to measure the relativistic bending of electromagnetic waves which pass near the limb of the Sun, to establish the existence of gravitational radiation, to measure continental drift, and most recently to measure the finite speed of gravity waves. The progress of radio astronomy is driven by the needs of fundamental science and is based on the state-of-the-art developments in technology.

Advances of modern radio astronomy were in the focus of the symposium "Radio Astronomy at 70: from Karl Jansky to microjansky", which was held under the auspices of the annual Joint European National Astronomical Meeting (JENAM) in Budapest, Hungary, 2003 August 27–30.

This issue of *Baltic Astronomy* contains a slice of the presentations given at the symposium. They cover a range of scientific topics in extragalactic and galactic radio astronomy studies as well as recent developments in the radio astronomy technique.

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