

Preface

This volume of Advanced Studies in Pure Mathematics comprises the proceedings of a conference on hyperplane arrangements held at Tokyo Metropolitan University, July 13-18, 1998, as a Regional Workshop (RW) of the Mathematical Society of Japan. This "Workshop on Mathematics Related with Arrangements of Hyperplanes" celebrated the sixtieth birthday of Peter Orlik, and featured daily lectures by Professor Orlik on "Arrangements and Hypergeometric Integrals." These were followed by invited lectures, twenty-two in all, from an impressive group of mathematicians ranging across a wide range of topics from singularity theory, topology, combinatorics, and geometry, all related to hyperplane arrangements. Sixteen of these speakers have articles in these proceedings. The full schedule of talks from the workshop appear on succeeding pages.

Professor Orlik's lecture notes will be published as MSJ Memoirs under the title *Arrangements and Hypergeometric Integrals*, co-authored by Peter Orlik and Hiroaki Terao.

There were eighty participants in the conference in total among whom twenty-five were overseas participants: USA (12), France (9), Korea (1), Mexico (1), Romania (1), and Russia (1).

The idea of organizing a meeting in honor of the sixtieth birthday of Peter Orlik first arose in conversations between Richard Randell and Michael Falk, two of his former students, in early 1995. These two served as the program committee for the meeting. This idea, together with the idea of having a Franco-Japanese seminar on singularity theory in Sapporo, was discussed and supported in an informal gathering, in Kyoto in 1996, of Jean-Paul Brasselet, Mutsuo Oka, Kyoji Saito, Tatsuo Suwa and Hiroaki Terao. Mutsuo Oka and Hiroaki Terao, as the organizers of the former conference (the "*Orlikfest*"), arranged for the meeting to be held at TMU, and obtained financial support from MSJ.

Peter Orlik's work with Louis Solomon, building on work of V.I. Arnol'd and E. Brieskorn, really gave birth to the topological study of general complex hyperplane arrangements in the late 1970's and early 1980's. In the intervening years he has done much to nurture the development of the subject, with fundamental contributions to the ever-broadening research in the area, and with his two books, *Introduction to Arrangements* and *Arrangements of Hyperplanes*, with H. Terao, which are the first books to be published in this area. Orlik has also done much to encourage younger researchers in the field, including the two editors. The Tokyo conference, taking place ten years after the first conference