## Contents

Preface	vii
On the Radon and Riesz transforms in real hyperbolic spaces CARLOS A. BERENSTEIN AND ENRICO CASADIO TARABUSI	1
Holmgren's uniqueness theorem and support theorems for real analytic Radon transforms JAN BOMAN	23
On the Petty-Schneider theorem G. D. CHAKERIAN AND E. LUTWAK	31
Nonlinear Fourier transform LEON EHRENPREIS	39
On the infinitesimal rigidity of the complex quadrics HUBERT GOLDSCHMIDT	49
Microlocal analysis of the two-plane transform ALLAN GREENLEAF AND GUNTHER UHLMANN	65
Aspects of flat Radon transforms ERIC L. GRINBERG	73
On positivity problems for the Radon transform and some related transforms PETER KUCHMENT	87
Cohomology relative to the germ of an exact form ABDELHAMID MEZIANI	97
Generalized convex bodies and generalized envelopes VLADIMIR OLIKER	105
A note on flat Radon transforms ERIC TODD QUINTO	115
Self-similarity on nilpotent Lie groups ROBERT S. STRICHARTZ	123
A kinematic formula and analogues of Hadwiger's theorem in space JIAZU ZHOU	159