

## TABLE OF CONTENTS

### VOLUME CXLVIII

#### PART 1

SÉBASTIEN FERENCZI AND PASCAL HUBERT — Rigidity of generalized Veech 1969/ Sataev 1975 extensions of rotations	1
EMANUEL CARNEIRO, CRISTIAN GONZÁLEZ-RIQUELME AND JOSÉ MADRID — Sunrise strategy for the continuity of maximal operators	37
GABRIEL ARAÚJO, IGOR A. FERRA AND LUIS F. RAGOINETTE — Global solvability and propagation of regularity of sums of squares on compact manifolds	85
TONI IKONEN AND MATTHEW ROMNEY — Quasiconformal geometry and removable sets for conformal mappings	119
STEFAN STEINERBERGER — On the logarithmic energy of points on $\mathbb{S}^2$	187
VITALY BERGELSON, TOMASZ DOWNAROWICZ AND JOSEPH VANDEHEY — Deterministic functions on amenable semigroups and a generalization of the Kamae–Weiss theorem on normality preservation	213
ANTONIO AZZOLLINI — Finite energy standing waves for the Klein–Gordon–Maxwell system: the limit case	287
YUNFENG SHI — Spectral theory of the multi-frequency quasi-periodic operator with a Gevrey type perturbation	305
KENNETH FALCONER, VJEKOSLAV KOVAČ AND ALEXIA YAVICOLI — The density of sets containing large similar copies of finite sets	339
MARCEL HANSMANN AND DAVID KREJČIŘÍK — The abstract Birman–Schwinger principle and spectral stability	361

## PART 2

SHILPAK BANERJEE AND PHILIPP KUNDE — Real-analytic realization of Uniform Circular Systems and some applications	399
FIROJ SK — Remarks on the Fractional Moser–Trudinger Inequality	447
SHAOMING GUO AND CHANGKEUN OH — Fourier restriction estimates for surfaces of co-dimension two in $\mathbb{R}^5$	471
SERGEY A. DENISOV — Spatial asymptotics of Green’s function and applications	501
YEOR HAFOUTA — A local limit theorem for a number of multiple recurrences generated by some mixing processes with applications to Young towers	523
JIAHAO QIU AND JIANJIE ZHAO — Top-nilpotent enveloping semigroups and pro-nilsystems	595
JUN CAO AND ALEXANDER GRIGOR’YAN — Heat kernels and Besov spaces on metric measure spaces	637
SIMÃO CORREIA, FILIPE OLIVEIRA AND JORGE D. SILVA — Mass-transfer instability of ground-states for Hamiltonian Schrödinger systems	681
VILMOS TOTIK — Reflections on a theorem of V. Andrievskii	711
NIKOLAI EDEKO AND HENRIK KREIDLER — Uniform enveloping semi-groupoids for groupoid actions	739