

Towards quantum Borsuk–Ulam and Brouwer fixed point theorems

Ludwik Dabrowski

SISSA (International School for Advanced Studies)
Via Bonomea, 265, Trieste
Italy
dabrow@sissa.it

I'll present various results and conjectures on a generalization to the noncommutative setup of the Brouwer fixed-point theorem from the Borsuk–Ulam theorem perspective. Two conjectures on a wide generalization of the latter hold in a special case of the quantum group $SU_q(2)$, due to non-trivializability of the quantum principal instanton bundle.