Solution to the King's Problem in Prime Power Dimensions

P. K. Aravind

Physics Department, Worcester Polytechnic Institute, Worcester, MA 01609, U.S.A.

Reprint requests to Prof. P. K. A.; E-mail: paravind@wpi.edu

Z. Naturforsch. **58a**, 85 – 92 (2003); received November 5, 2002

It is shown how to ascertain the values of a complete set of mutually complementary observables of a prime power degree of freedom by generalizing the solution in prime dimensions given by Englert

a prime power degree of freedom by generalizing the solution in prime dimensions given by Englert and Aharonov [Phys. Lett. A284, 1-5 (2001)].

Key words: Mutually Unbiased Bases; King's Problem; Quantum State Estimation.