

Abstract Submitted
for the MAR09 Meeting of
The American Physical Society

Lasing in Superconducting Qubits ALYSSA WILSON, ROBERTO RAMOS, Drexel University — Qubits are superconducting circuits that have exhibit many interesting quantum properties similar to those displayed by atoms. One such behavior is lasing, as manifested in a resonator coupled to a qubit. I will review experiments in which lasing was exhibited in charge qubits and three-Josephson-junction flux qubits. I will also examine the similarities between these systems and compare these to properties of the Josephson phase qubit. In this presentation, I will discuss the feasibility of demonstrating this phenomenon in the phase qubit.

Alyssa Wilson
Drexel University

Date submitted: 21 Nov 2008

Electronic form version 1.4