

Abstract Submitted
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Verification of Quantum Processes in a Functional Based Programming Language¹ ANTHONY HOOVER, Lebanon Valley College — As the complexity and scope of prospective quantum programs increases, it becomes more and more important that program developers have a method of testing whether the code that they are developing is working in the way intended. It has been determined that an effective method of procedure verification for quantum processes involves exhaustively generating input states for the procedure and comparing the output states to what we would expect. In this project, Haskell code has been developed that utilizes these methods and exhaustively verifies a program's reliability with little effort required by the user.

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