Abstract Submitted for the DAMOP20 Meeting of The American Physical Society

**TOPTICA Photonics Workshop: Catch Me if You Can1001 Ways** to Lock a Laser STEFFEN SCHMIDT-EBERLE, TOPTICA Photonics, Inc — Quantum technologies are among the most exciting and challenging scientific endeavors. Most experiments heavily rely on the possibility to stabilize the absolute and relative phase and frequency of lasers. In this workshop we give an overview of the possible schemes to lock a lasers phase and frequency. Well start with an outline of general principles of phase and frequency stabilization, and then well move on to provide a guide on how to choose the right locking solution for individual applications. Concrete solutions based on TOPTICA products will be presented. And thats not all! Be ready for the world premiere of a new TOPTICA product. Hint: It enables locking like never before.

> Abstract APS APS

Date submitted: 28 May 2020

Electronic form version 1.4