Project Title: Neighborhood Risk and Resilience for Asian American, Native Hawaiian, and Pacific Islander Respiratory Health Disparities **Principal Investigator:** Brittany Morey

Asthma varies greatly among Asian Americans (AAs), Native Hawaiians, and other Pacific Islanders (NHPIs), with some groups experiencing high rates of asthma and poor asthma outcomes. However, little is known about what is contributing to these disparities in respiratory health. It is likely that neighborhood environments may play a role. Air pollution in neighborhoods can trigger asthma attacks. The social environment can also affect people's vulnerability to asthma. Neighborhoods with higher poverty and higher residential segregation may be at even greater risk. This study will first describe the different neighborhood characteristics for AA and NHPI subpopulations that may contribute to asthma. Secondly, this study will examine whether these neighborhood social and environmental characteristics are associated with asthma. To do this, we will combine multiple sources of data, including demographic data from the U.S. Census and American Community Survey, and air pollution data from the Environmental Protection Agency's Air Quality System. We will also include asthma data from the California Health Interview Survey. Understanding how neighborhood social and environmental factors contribute to asthma disparities among AAs and NHPIs will help to inform programs and policies aimed at addressing asthma in these communities. If we intervene at the neighborhood-level, we may be able to impact more change on the populations at risk, preventing more people from having poor asthma outcomes. This pilot project will also result in a dataset appropriate for studying neighborhood social and environmental risk factors for AAs and NHPIs in California. This dataset can be used for future studies examining the links between neighborhoods and health disparities for these underrepresented racial/ethnic minority groups.