

# Investing in Chronic Disease Prevention in Hawai'i

**KEY TAKEAWAY:** As Hawai'i emerges from the worst of the pandemic, sustained funding for evidence-based programs supporting pandemic response efforts and chronic disease prevention can help to improve health, address disparities, and reduce costs.



**Preventing chronic diseases can help to combat COVID-19.** Research has shown that reducing chronic diseases could prevent more than half of COVID-19-related hospitalizations.<sup>1</sup>



**Chronic disease prevention programs can reduce health disparities and improve health across the lifespan.** Sustained support for chronic disease programs can address health disparities seen across racial/ethnic groups that begin in childhood and grow worse over time.<sup>2</sup>



**Investing in chronic disease programs can reduce state health spending.** Emergency department visits and hospitalizations for chronic diseases cost Hawai'i well over 65 million dollars annually.<sup>2-5</sup> These events could be prevented with proven public health interventions such as chronic disease prevention programs.

**BACKGROUND: COVID-19 has shifted public health priorities in a way that hasn't been seen before.** Across Hawai'i and the world, governments, health care providers, and their many partners have re-directed time, labor, and resources to fight this novel disease. The pandemic has been devastating for many and sustained investments in response efforts remains essential. However, this cannot come at the expense of funding for other critical health programs, including those that promote health and prevent chronic disease.

**Chronic diseases including heart disease and cancer took four times as many lives as COVID-19 in 2020.**<sup>6</sup> Despite the devastating impact of COVID-19, chronic diseases remained the top causes of illness and death among adults in the United States in 2020. Chronic diseases are not contagious, last for over one year, and limit the activities of daily living.<sup>7</sup>

There is a clear relationship between COVID-19 and chronic diseases. Among the nearly 1 million COVID-19 hospitalizations among adults in the United States last year, the vast majority were related to underlying chronic conditions such as obesity, hypertension, diabetes, and heart failure. **Over 60% of COVID-19 hospitalizations may have been prevented by reducing chronic diseases.**<sup>1</sup>

## FAST FACTS: CHRONIC DISEASES



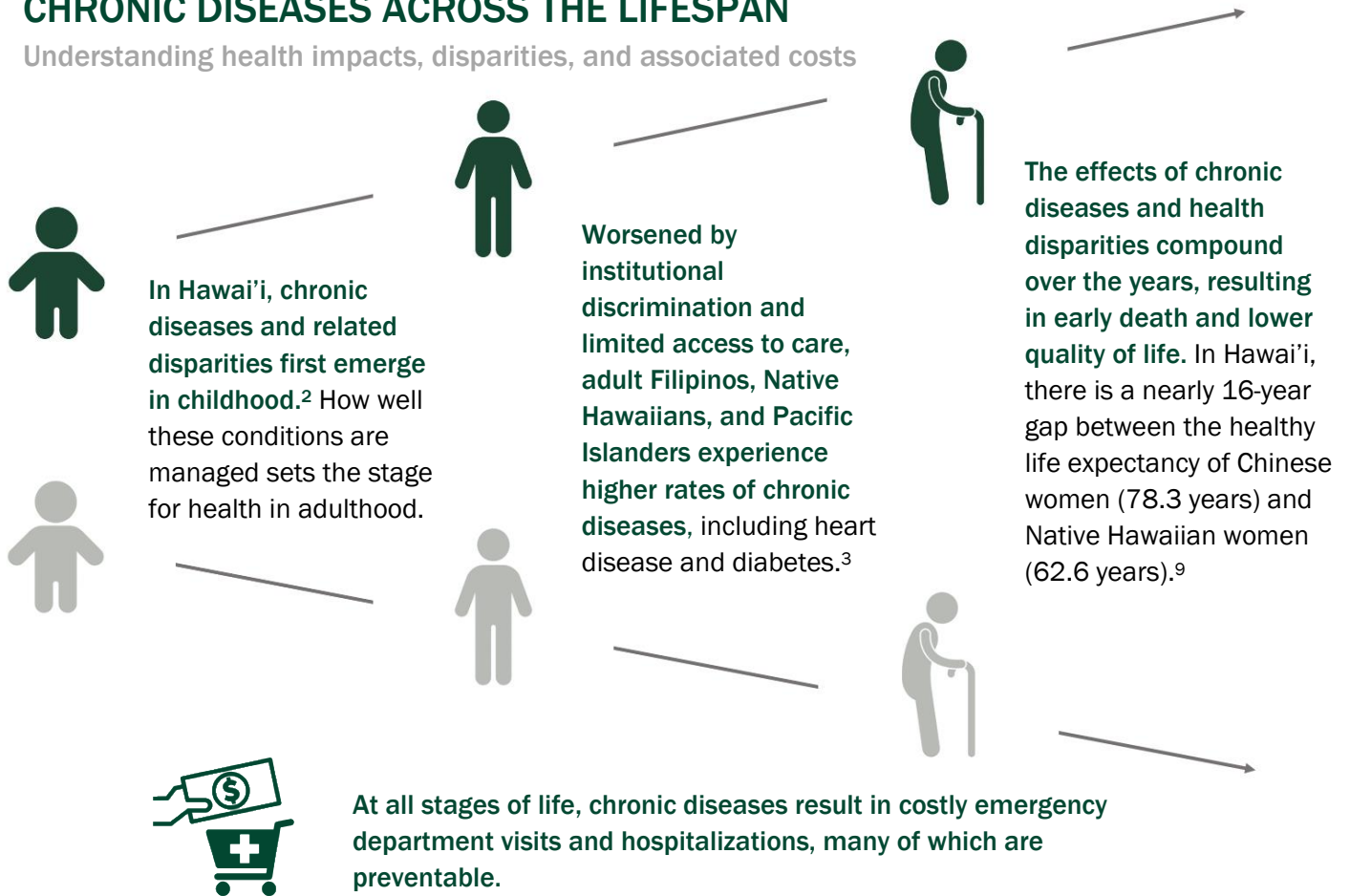
**Chronic diseases: conditions that last 1 year or more and require ongoing medical attention, limit activities of daily living, or both.**<sup>7</sup>

- Chronic diseases are also known as non-communicable diseases (NCDs), meaning they are not contagious.
- Leading chronic diseases include heart disease, cancer, diabetes, stroke, and Alzheimer's.
- In Hawai'i, over 60% of adults are living with one or more chronic diseases.<sup>8</sup>

**There are important benefits to investing in chronic disease prevention programs.** In addition to reducing COVID-19-related illness and death, research has proven that chronic disease prevention programs can address three closely related issues: health disparities, health across the lifespan, and costs of chronic disease-related emergency department visits and hospitalizations.

## CHRONIC DISEASES ACROSS THE LIFESPAN

Understanding health impacts, disparities, and associated costs



- 1. ADDRESSING HEALTH DISPARITIES:** There are major disparities in health and life expectancy across our communities.<sup>2,3,9</sup> This is directly related to institutional discrimination, which refers to policies and practices embedded within a society that positively impact one group of people and negatively impact another. Institutional discrimination shapes a variety of health-related factors, including health insurance coverage and quality of care, availability of healthy food options, and time and resources to engage in physical activity.<sup>3</sup> Closely related, there are higher rates of COVID-19 associated illness and death among some populations with higher rates of chronic disease, including Pacific Islanders.<sup>10</sup> Pacific Islanders have experienced the highest rates of COVID-19 infections and mortality in Hawai'i.<sup>10</sup>
- 2. PROMOTING HEALTH AND WELLNESS OVER THE LIFESPAN:** In Hawai'i, chronic diseases negatively impact people at all stages of life, from childhood through their later years. Disparities are seen as early as childhood and young adulthood in Hawai'i, as Pacific Islander, Filipino, and Native Hawaiian youth are more affected by chronic disease and related hospitalizations and emergency department visits than

others.<sup>2</sup> This is also very relevant in the COVID-19 context, as 1 in 5 infections in the Pacific Islander community have been among 0–17-year-olds.<sup>10</sup>

- 3. REDUCING HEALTHCARE COSTS FOR THE STATE:** Reducing budgets for chronic disease prevention shows up in acute care settings, as people may wait longer to seek care and develop more severe, complicated, and costly conditions. There were nearly 28,000 preventable hospitalizations related to heart disease and diabetes among Hawai'i adults between 2007-2012, with associated costs exceeding \$350 million.<sup>3</sup> There were nearly 775 preventable hospitalizations among Hawai'i's youth between 2015-2016, with an associated cost of \$16.5 million.<sup>4</sup> Emergency room visits for asthma in youth also have high costs.<sup>5</sup> As these figures are underestimates, additional analyses can help to refine potential cost savings for the state for other chronic diseases. With over half of hospitalizations among youth and growing numbers among adults covered by Hawai'i's Medicaid program, this has important implications for state budgets.

**THE BOTTOM LINE: chronic disease prevention is a smart investment.** Given current trends, chronic diseases will continue to be a major health concern in Hawai'i. Taking a proactive approach will help us to be more resilient in the face of unexpected challenges such as COVID-19.

Authors: Katherine Peck, MPH; Tetine L. Sentell, PhD; Catherine M. Pirkle, PhD

UNIVERSITY OF HAWAII AT MĀNOA  
OFFICE of PUBLIC HEALTH STUDIES

Suggested Citation: Peck K, Sentell T, Pirkle C. Making the Case: Investing in Chronic Disease Prevention in Hawai'i. Published July 8, 2021.

THOMPSON SCHOOL  
SOCIAL WORK & PUBLIC HEALTH

#### References

- O'Hearn M, Liu J, Cudhea F, Micha R, Mozaffarian D. Coronavirus Disease 2019 Hospitalizations Attributable to Cardiometabolic Conditions in the United States: A Comparative Risk Assessment Analysis [published correction appears in J Am Heart Assoc. 2021 Apr 6;10(7):e020858]. *J Am Heart Assoc.* 2021;10(5):e019259. doi:10.1161/JAHA.120.019259
- Sentell T, Choi SY, Ching L, et al. Prevalence of Selected Chronic Conditions Among Children, Adolescents, and Young Adults in Acute Care Settings in Hawai'i. *Prev Chronic Dis.* 2020;17:E67. Published 2020 Jul 23. doi:10.5888/pcd17.190448
- Sentell TL, Ahn HJ, Miyamura J, Juarez DT. Cost Burden of Potentially Preventable Hospitalizations for Cardiovascular Disease and Diabetes for Asian Americans, Pacific Islanders, and Whites in Hawai'i. *J Health Care Poor Underserved.* 2015;26(2 Suppl):63-82. doi:10.1353/hpu.2015.0068
- Sentell T, Choi SY, Ching L, Uchima O, Keliikoa LB, Irvin L, Pirkle C. Potentially Preventable Hospitalizations for Chronic Conditions among Children and Young Adults in Hawai'i. APHA Oral Presentation. San Francisco (virtual). October 27, 2020.
- Uchima O, Taira DA, Ahn HJ, Choi SY, Okihiro M, Sentell T. Disparities in Potentially Preventable Emergency Department Visits for Children with Asthma among Asian Americans, Pacific Islanders, and Whites in Hawai'i. *International Journal of Environmental Research and Public Health.* 2021; 18(13):7096. <https://doi.org/10.3390/ijerph18137096>
- Ahmad FB, Cisewski JA, Miniño A, Anderson RN. Provisional Mortality Data — United States, 2020. *MMWR Morb Mortal Wkly Rep* 2021;70:519–522. DOI: <http://dx.doi.org/10.15585/mmwr.mm7014e1>
- Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion. About Chronic Diseases. <https://www.cdc.gov/chronicdisease/about/index.htm>. Updated April 28, 2021. Accessed July 8, 2021.
- State of Hawai'i, Department of Health, Chronic Disease Prevention and Health Promotion Division. Events. <https://health.hawaii.gov/chronic-disease/events/#:~:text=Three%20in%20every%20five%20Hawaii,community%20partners%20attended%20the%20symposium>. Updated 2021. Accessed July 8, 2021.
- Wu Y, Uchima O, Browne C, Braun K. Healthy Life Expectancy in 2010 for Native Hawaiian, White, Filipino, Japanese, and Chinese Americans Living in Hawai'i. *Asia Pac J Public Health.* 2019;31(7):659-670. doi:10.1177/1010539519875614
- Hawai'i State Department of Health. COVID-19 in Hawai'i: Addressing Health Equity in Diverse Populations. Disease Outbreak Control Division: Special Report. <https://hawaiiicovid19.com/wp-content/uploads/2021/03/COVID-19-Race-Ethnicity-Equity-Report.pdf>. Published March 16, 2021. Accessed July 8, 2021.