



EXECUTIVE SUMMARY

Hawai'i Physical Activity and Nutrition Plan 2030

INTRODUCTION

The Hawai'i Physical Activity and Nutrition (PAN) Plan 2030 Executive Summary is an overview of the PAN Plan 2030, a guide to increasing physical activity and healthy eating in the state, with the long-term goal of reducing overweight, obesity, and chronic disease among all Hawai'i residents. Now more than ever, the importance of health, including a healthy immune system, is amplified due to the COVID-19 pandemic. Physical activity and healthy eating are vital in creating resilient communities and preventing many chronic diseases and some cancers.

The PAN Plan 2030 incorporates principles of the Social Ecological Model and is organized into four sector areas: Community Design and Access, Education, Health Care, and Worksite. The plan prioritizes goals, objectives, and strategies that lead to policy, systems, and environmental change. Objectives were developed using current data, best practices, and evidence-based science, and reflect one or more cross-cutting themes.

The PAN Plan 2030 supports and reinforces the following comprehensive, chronic disease strategic plans for the state: the Healthy Hawai'i Strategic Plan 2030; the Hawai'i Asthma Plan 2030; the Hawai'i Cancer Plan 2030; the Hawai'i Diabetes Plan 2030; the Hawai'i Heart Disease and Stroke Plan 2030; and, the Hawai'i Tobacco Prevention and Control Plan 2030.



VISION

We envision a future for Hawai'i in which all residents are physically active, eat healthy foods, and live in healthy communities.

GOAL

Through healthful eating and regular physical activity, Hawai'i residents will:

- » Reduce their burden of disease;
- » Increase years of healthy life;
- » Increase their resilience to deadly viruses; and
- » Reduce health disparities.



BACKGROUND

In Hawai'i and the rest of the United States (U.S.), the majority of adults, adolescents, and children do not engage in regular physical activity or healthy eating. In 2017, more than 75% of adults in Hawai'i did not meet the recommended guidelines for physical activity.¹ Additionally, 83% of Hawai'i high school students and 79% of middle school students did not get the recommended amount of physical activity for youth (sixty or more minutes per day).²

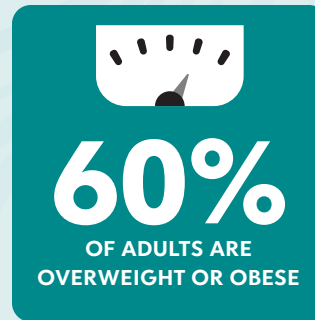
Rates of fruit and vegetable consumption are also far below recommended amounts. Recent data shows that only 20% of adults and only 14% of high schoolers ate five fruits and vegetables a day.^{5,3} Insufficient physical activity combined with unhealthy eating can substantially increase the risk of health problems such as obesity, high blood pressure, heart disease, diabetes, cancer, and arthritis.

Although Hawai'i qualifies as a healthy state on many indicators of morbidity and mortality, obesity rates continue to rise. Nearly one third of children entering Kindergarten are already overweight or obese; rates remain similarly high among students enrolled in public secondary schools.⁴ Rates of overweight and obesity among adults are much higher, with over half of adults (60%) in Hawai'i considered overweight or obese.⁷ In 2018, almost 25% of Hawai'i adults were considered obese and only 38% had a healthy body weight.⁵ Native Hawaiians and Other Pacific Islanders had the highest obesity rates, both over 41%.⁵

OVERWEIGHT AND OBESITY

Approximately two thirds of the U.S. adult population are overweight or obese.⁶ Recent estimates conclude that almost 42% of U.S. adults and 19% of children and adolescents (age 2–19 years) are obese.^{7,8} The national medical care costs of obesity are staggering. In 2014, the annual medical spending attributable to an obese individual was \$1,901, accounting

for about \$149 billion.⁹ Additionally, annual nationwide productivity costs due to obesity-related absenteeism range between \$3.38 billion (\$79 per obese individual) and \$6.38 billion (\$132 per individual with obesity).¹⁰



Weight that is higher than what is considered a healthy weight for a given height is described as overweight or obese.¹¹ Obesity is defined as having an excessive amount of body fat and is known to increase a person's risk for chronic

diseases. Body Mass Index (BMI)* is often used as a screening tool for overweight or obesity.¹¹ Having a BMI greater than, or equal to, 30 in adults is associated with obesity. Obesity in children is not directly comparable with the BMI range for adults. In children, a BMI greater than or equal to the age- and sex-specific 95th percentiles found in the Center for Disease Control and Prevention (CDC) growth charts corresponds with obesity.¹²

BMI Categories

WEIGHT STATUS CATEGORY	BMI RANGE, ADULTS	BMI PERCENTILE, 2-19 YEARS OLD
Underweight	Less than 18.5	Less than the 5th percentile
Normal or Healthy weight	18.5 – 24.9	5th percentile to less than the 85th percentile
Overweight	25 – 29.9	85th to less than the 95th percentile
Obese	30 and higher	95th percentile and higher

* BMI is calculated as a person's weight in kilograms divided by height in meters squared: (Weight (kg))/[Height (M)]².² To use pounds and inches: BMI = (Weight (lbs))/ [Height (in)]² x 703.



PRIORITY POPULATIONS

Health disparities exist when a health outcome is seen to a greater or lesser extent between population groups. Identity factors such as race and ethnicity, gender, gender identity and sexual orientation, age, disability; and social determinants like educational attainment, socioeconomic status, worksite, and geographic location all contribute to an individual's ability to achieve good health. It is important to acknowledge and strive to understand these health disparities and to prioritize vulnerable populations whose access to physical activity and healthy food is compromised by environmental and policy gaps.

PHYSICAL ACTIVITY

Regular physical activity is vital for health and well-being. Among adults, being physically active can lower the risk of premature death, chronic disease, some forms of cancers, and falls and associated injuries. It can also boost mental health and immune system function, and provide important health benefits for people with chronic disease. For children and adolescents, physical activity can improve bone health, cardio-respiratory fitness and muscle strength, reduce body fat, and help manage symptoms of depression. For older adults, staying active is especially important for maintaining bone health and cognitive function. For people who are inactive, even small increases in physical activity are associated with health benefits.

NUTRITION

Good nutrition is important for everyone throughout all stages of life. Forming healthy eating habits at a young age helps prevent chronic diseases like obesity, type 2 diabetes, and hypertension, and can lead to a lifetime of wellness. A nutritious diet is the foundation of overall health, providing the body nutrients it needs to thrive.

The PAN Plan 2030 prioritizes the following groups:

- » Keiki and Youth (0–18 years old)
- » Kūpuna (65 years and older)
- » Low-income Populations (<185% Federal Poverty Line)



Fewer than 1 in 5 middle and high school students meet physical activity recommendations



14% of high school aged-youth eat the recommended amount of fruits and vegetables



Objectives and Strategies

The PAN Plan 2030 objectives strive to create sustainable change that will transform our communities, schools, health care, and worksites to increase physical activity and healthy eating, with long-term goals of reducing overweight, obesity, and chronic disease among all Hawai'i residents. Stakeholders developed the PAN Plan 2030 objectives to shape policy, systems and environmental change in the four sector areas: Community Design and Access; Education; Health Care; and Worksite. The objectives are showcased by sector area and include key strategies, baseline, and target measures. The PAN Plan 2030 is meant to be a living document that is reviewed and updated throughout the plan's timeframe. Implementation of the plan will be a collective effort by individuals and organizations across the state.

*Additional background information, including definitions of some terminology used in the objectives and strategies, can be found at the following website: www.HHSP.hawaii.gov



Objectives with this icon are being worked on by multiple program areas.



Community Design and Access Sector Objectives

GOAL >> All of Hawai'i's people will live in communities that have access to healthy food choices and physical activity opportunities, and minimal exposure to unhealthy options through policy, programs, communications, and environmental supports.

OBJECTIVE

BASELINE: 62 TARGET: 93

PHYSICAL ACTIVITY AND NUTRITION-01

Increase by 50%, the number of food outlets that participate in a statewide healthy food incentive program(s).

STRATEGIES

- Secure long-term funding for Hawai'i's Double Up Food Bucks program, which matches Supplemental Nutrition Assistance Program (SNAP) food stamp dollars spent on Hawai'i-grown produce
- Implement a statewide Produce Prescription Program, which enables participants to redeem "prescriptions" for produce at participating markets and grocery stores

OBJECTIVE

BASELINE: 0 TARGET: 2

PHYSICAL ACTIVITY AND NUTRITION-02

Enact at least two statewide policies to increase access to healthy food and/or decrease access to unhealthy food/beverages.

STRATEGIES

- Enact a fee on sugar-sweetened beverages, where revenue is allocated to obesity prevention initiatives
- Establish long-term, state funding for a Double Up Food Bucks SNAP incentive program

OBJECTIVE

BASELINE: 0 TARGET: 4

PHYSICAL ACTIVITY AND NUTRITION-03

Establish and sustain a funded Food Access Coordinator in each county to facilitate an active coalition.

STRATEGIES

- Food access coalitions will create and implement county-level action plans aimed at increasing access to, and consumption of, healthy food
- Secure county funding to support the activities of the coordinator and food access coalition

OBJECTIVE

BASELINE: 0 TARGET: 1

PHYSICAL ACTIVITY AND NUTRITION-04

Establish and sustain a funded, statewide Breastfeeding Coordinator to facilitate efforts supportive of breastfeeding exclusivity and duration.

STRATEGIES

- Assess statewide resources and capacity to fund and establish state-level breastfeeding coordinator position
- Develop scope and position description to include knowledge of indigenous cultures and breastfeeding support needs
- Identify gaps and strategically integrate the breastfeeding coordinator position in a way that bridges these gaps

OBJECTIVE

BASELINE: 0 TARGET: 5

PHYSICAL ACTIVITY AND NUTRITION-05

Develop guidelines to promote healthy food donations and purchase of healthy food to be adopted by 100% of Hawai'i food banks.

STRATEGIES

- Convene a working group with representation from Hawai'i's foodbank network, to develop guidelines for healthy food donations

OBJECTIVE

BASELINE: 0 TARGET: 50

PHYSICAL ACTIVITY AND NUTRITION-06

Increase by 50 miles, the total miles of low-stress pedestrian infrastructure including, but not limited to, sidewalks and trails.

STRATEGIES

- Incorporate the specifications for “desirable” level of service described in the Hawai'i Department of Transportation's Pedestrian Toolbox into the development of low-stress pedestrian infrastructure
- Increase Safe Routes to Schools and Safe Routes to Parks programs and projects
- Develop policies to encourage shade tree planting, to increase canopy cover, on high volume pedestrian corridors and trails
- Increase share of state and county transportation budgets dedicated to pedestrian infrastructure
- Implement Vision Zero and Complete Streets policies to increase safety and comfort of pedestrian experience

OBJECTIVE

BASELINE: 0 TARGET: 100

PHYSICAL ACTIVITY AND NUTRITION-07

Increase by 100 miles, the total miles of low-stress bicycle infrastructure including, but not limited to, protected bike lanes and off-street paths.

STRATEGIES

- Increase Safe Routes to Schools and Safe Routes to Parks projects
- Develop policies to encourage shade tree planting, to increase canopy cover, on high volume bicycle corridors and trails
- Increase share of state and county transportation budgets dedicated to bicycle facilities
- Implement Vision Zero and Complete Streets policies and projects to increase safety and comfort of bicyclist experience

	BASELINE	TARGET
State	0	1
County	0	4

OBJECTIVE

PHYSICAL ACTIVITY AND NUTRITION-08

The state and each county will identify and adopt mode-share goals and measurements that prioritize walking and wheelchairs, bicycling, and transit use.

STRATEGIES

- Develop context-appropriate county-level Transportation Demand Management (TDM) Plans to establish mode baselines
- Develop more inclusive and comprehensive metrics for measuring active transportation beyond work and school commutes
- Support development of community Safe Routes to School (SRTS) plans, funding of SRTS infrastructure, free transit for minors, etc

Increase by 10%, the proportion of existing urbanized land zoned to support walkable communities.

STRATEGIES

- Promote Equitable Transit Oriented Development (ETOD), town centers, mixed-use development, and upzoning for new development and zoning updates
- Adopt parking policy reforms to reduce parking oversupply, unbundle residential parking, reduce or eliminate parking minimums, and/or shift costs
- Change Level-of-Service to Vehicle Miles Traveled (VMT) in environmental review of new development



Education Sector Objectives

GOAL >> All of Hawai'i's educational settings will promote healthy eating and and daily physical activity, through programs, policies, environmental supports, and professional development opportunities.

	BASELINE	TARGET
Health Education courses	0	1
Physical Education courses	0	1

Adopt at least one policy to require annual courses in Health Education and Physical Education from grades K-8, in the Department of Education, that are aligned with national recommendations for instructional time and teacher licensing.

STRATEGIES

- Support a Board of Education policy change to require annual courses in Health Education in grades K-8 in Department of Education (DOE) public non-charter schools
- Support a Board of Education policy change to require annual courses in Physical Education in grades K-8 in DOE public non-charter schools

OBJECTIVE

BASELINE: 0 TARGET: 1

PHYSICAL ACTIVITY AND NUTRITION-11

Develop a system to monitor and support implementation of the Early Childhood Care and Education Wellness Guidelines.

STRATEGIES

- Convene both public and private early learning community stakeholders to determine barriers to implementation of Hawai'i's Early Childhood Care and Education (ECE) Wellness Guidelines
- Collaborate with ECE stakeholders to create a physical activity and nutrition ECE setting focused training curricula developed from the Hawai'i ECE Wellness Guidelines
- Partner with leaders in the early learning community to identify and implement incentives to support provider implementation of the ECE Wellness Guidelines

OBJECTIVE

BASELINE: 30% TARGET: 50%

PHYSICAL ACTIVITY AND NUTRITION-12

50% of public non-charter schools participating in the Safety and Wellness Survey will meet at least 90% of the wellness guidelines.

STRATEGIES

- Create a toolkit to share with all participating public schools that highlights resources for the four lowest scoring wellness guidelines
- Create a social media campaign to educate families and community stakeholders on the DOE safety and wellness guidelines and opportunities to support wellness in schools
- Conduct a study to evaluate qualities/characteristics/infrastructure/resources that contribute to the schools with the lowest Safety and Wellness Survey (SAWS) score and the highest SAWS score

OBJECTIVE

BASELINE: 0 TARGET: 1

PHYSICAL ACTIVITY AND NUTRITION-13

Establish and sustain a funded statewide Food Systems Education Coordinator position to support 'āina-based education, which promotes healthy eating in preschool through grade 12 (P-12) education settings.

STRATEGIES

- Assess statewide resources and capacity to fund and establish a statewide Food Systems Education Coordinator position
- Develop scope and position description to include knowledge of 'āina-based education
- Identify gaps and strategically integrate the Food Systems Education Coordinator position in a way that bridges these gaps



Health Care Sector Objectives

GOAL >> All of Hawai'i's health care systems will promote health equity and maximize utilization of prevention by improving coverage, health information technology, programs, practices, and guidelines.

OBJECTIVE

BASELINE: Pending TARGET: Increase by 5%

PHYSICAL ACTIVITY AND NUTRITION-14

Increase by 5%, the number of people enrolled in nutrition and physical activity programs that are offered by health system payers.

STRATEGIES

- Expand coverage for Diabetes Prevention Programs (DPPs), or evidence-based DPP-like programs (e.g., Pili 'Ohana Department of Native Hawaiian Health)
- Work with providers, health system payers, and worksites to increase awareness of and referrals to covered PAN programs
- Participate in Health Information Technology (HIT) workgroup to discuss potential referral options between health care organizations and self-management education programs related to physical activity and nutrition

OBJECTIVE

BASELINE: 0 TARGET: 12

PHYSICAL ACTIVITY AND NUTRITION-15

Implement a Hawai'i-specific hospital recognition program to incentivize promotion of exclusive breastfeeding through adoption of best practices that 100% of maternity care hospitals will participate in.

STRATEGIES

- Develop a statewide maternity care hospital recognition program, which sets policies and standards to support exclusive breastfeeding
- Convene a Hawai'i hospital recognition program workgroup to create, administer, and evaluate the program

OBJECTIVE

BASELINE: 0 TARGET: 6

PHYSICAL ACTIVITY AND NUTRITION-16

Establish comprehensive coverage for lactation consultation services and lactation supplies by all health insurance companies in the State of Hawai'i.

STRATEGIES

- Engage lactation consultants and other breastfeeding stakeholders to:
 - Develop reimbursement models for Medicaid and commercial payers
 - Pilot coverage processes



Worksite Sector Objectives

GOAL >> All of Hawai'i's worksites will create a culture of wellness through supportive programs and policies that promote breastfeeding, healthy food and beverage choices, and physical activity and active commuter opportunities.

OBJECTIVE

BASELINE: 0 TARGET: 2

PHYSICAL ACTIVITY AND NUTRITION-17

Establish at least two statewide policies designed to increase physical activity and/or healthy food options in government worksites.

STRATEGIES

- Establish a comprehensive worksite physical activity policy
- Establish a policy that requires nutrition standards for worksite vending machines and for meetings/events where food is served

OBJECTIVE

BASELINE: 0 TARGET: 1

PHYSICAL ACTIVITY AND NUTRITION-18

Establish at least one statewide policy that supports breastfeeding exclusivity and duration.

STRATEGIES

- Establish a statewide Paid Family Leave policy, which will support mothers' ability to breastfeed by providing leave time for mothers to care for their newborns
- Encourage employers to adopt an Infant at Work policy, which allows employees the option of bringing their infants into the workplace and can support exclusive breastfeeding
- Encourage employers to adopt a Work from Home policy, which provides telecommuting options for breastfeeding mothers



ASTHMA-11 • CANCER-13 • DIABETES-07
HEART DISEASE AND STROKE-09 • TOBACCO-12

Implement a statewide, comprehensive worksite wellness recognition program that at least 10 very small-, 15 small-, 10 medium-, and 5 large-employers will participate in.

STRATEGIES

- Identify stakeholders and convene an advisory group to develop a Hawai'i-specific, evidence-based worksite wellness recognition program that includes the following areas:
 - Asthma
 - Cancer
 - Diabetes
 - Heart Disease and Stroke
 - Physical Activity and Nutrition
 - Tobacco
- Pilot the recognition program with a group of diverse employers and modify the program based on their feedback.

BASELINE:

very small = 0
small = 0

medium = 0
large = 0

TARGET:

very small = 10
small = 15

medium = 10
large = 5

ADDITIONAL INFORMATION

Please refer to www.HHSP.hawaii.gov for comprehensive details and information related to this Executive Summary, in addition to an overview of statewide goals and strategies for the prevention and management of chronic diseases.

The Hawai'i Physical Activity and Nutrition Plan 2030 works in coordination with other chronic disease prevention and management plans in the state, specifically the following:

- Healthy Hawai'i Strategic Plan 2030
- Hawai'i Asthma Plan 2030
- Hawai'i Cancer Plan 2030
- Hawai'i Diabetes Plan 2030
- Hawai'i Heart Disease and Stroke Plan 2030
- Hawai'i Tobacco Prevention and Control Plan 2030



REFERENCES

- ¹ Hawaii State Department of Health, Hawaii Health Data Warehouse. Behavioral Risk Factor Surveillance System. (2017). <http://hhdw.org>. Accessed on March 23, 2020.
- ² Hawaii State Department of Health, Hawaii Health Data Warehouse. Youth Risk Behavior Survey Module. (2017). <http://hhdw.org>. Accessed on March 25, 2020.
- ³ Hawaii State Department of Health, Hawaii Health Data Warehouse. Behavioral Risk Factor Surveillance System. (2015). <http://hhdw.org>. Accessed on March 23, 2020.
- ⁴ Pobutsky, A., Bradbury, E., Reyes-Salvail, F., & Kishaba, G. (2013). Overweight and obesity among Hawai'i children aged 4 to 5 years enrolled in public schools in 2007-2008 and comparison with a similar 2002-2003 cohort. *Hawai'i journal of medicine & public health: a journal of Asia Pacific Medicine & Public Health*, 72(7), 225-236.
- ⁵ Hawaii State Department of Health, Hawaii Health Data Warehouse. Behavioral Risk Factor Surveillance System. (2018). <http://hhdw.org>. Accessed on March 23, 2020.
- ⁶ Centers for Disease Control and Prevention. National Center for Chronic Disease Prevention and Health Promotion, Division of Nutrition, Physical Activity, and Obesity. Data, Trend and Maps [online]. [accessed Mar 24, 2020]. URL: <https://www.cdc.gov/nccdphp/dnpao/data-trends-maps/index.html>.
- ⁷ Hales C.M., Carroll M.D., Fryar C.D., & Ogden C.L. (2020). Prevalence of obesity and severe obesity among adults: United States, 2017-2018. NCHS Data Brief, no 360. Hyattsville, MD: National Center for Health Statistics.
- ⁸ Hales C.M., Carroll M.D., Fryar C.D., & Ogden C.L. (2017). Prevalence of obesity among adults and youth: United States, 2015-2016. NCHS data brief, no 288. Hyattsville, MD: National Center for Health Statistics.
- ⁹ Kim DD, & Basu A. (2016). Estimating the medical care costs of obesity in the United States: Systematic review, meta-analysis, and empirical analysis. *Value in Health*, 19, 602-613. <https://doi.org/10.1016/j.jval.2016.02.008>.
- ¹⁰ Centers for Disease Control and Prevention. Overweight & Obesity – Adult Obesity Causes & Consequences. [accessed Mar 24, 2020]. URL: <https://www.cdc.gov/obesity/adult/causes.html>.
- ¹¹ Centers for Disease Control and Prevention. Defining Adult Overweight and Obesity. Retrieved from <https://www.cdc.gov/obesity/adult/defining.html>.
- ¹² Ogden C.L., & Flegal K.M. (2010). Changes in terminology for childhood overweight and obesity. *National health statistics reports*; no 25. Hyattsville, MD: National Center for Health Statistics.



David Ige, *Governor of Hawai'i*
Elizabeth A. Char, M.D., *Director of Health*

For more information contact:

Hawai'i State Department of Health
Chronic Disease Prevention and Health Promotion Division
1250 Punchbowl St. Room 422
Honolulu, Hawai'i 96813
PHONE: (808) 586-4488

The PAN Plan 2030 can be accessed, downloaded, and interacted with
at the following website: www.HHSP.hawaii.gov

Non Discrimination in Services

We provide access to our programs and activities without regard to race, color, national origin, language, age, sex, religion, or disability. Write or call the Chronic Disease Prevention and Health Promotion Division or our Affirmative Action Officer at P.O. Box 3378, Honolulu Hawai'i 96801-3378 or (808) 586-4110 (voice/TTY) within 180 days of a discrimination incident.