



RESEARCH

Go NAPSACC: A strategic approach to improving nutrition and physical activity practices in ECE settings

2025 Healthy Hawai'i Summit

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University of North Carolina at Chapel Hill

Kristy Sakai
Chaminade University of Honolulu

Introduction to Speakers



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What our vision for the future?



Healthy children.

Happy families.

Strong communities.

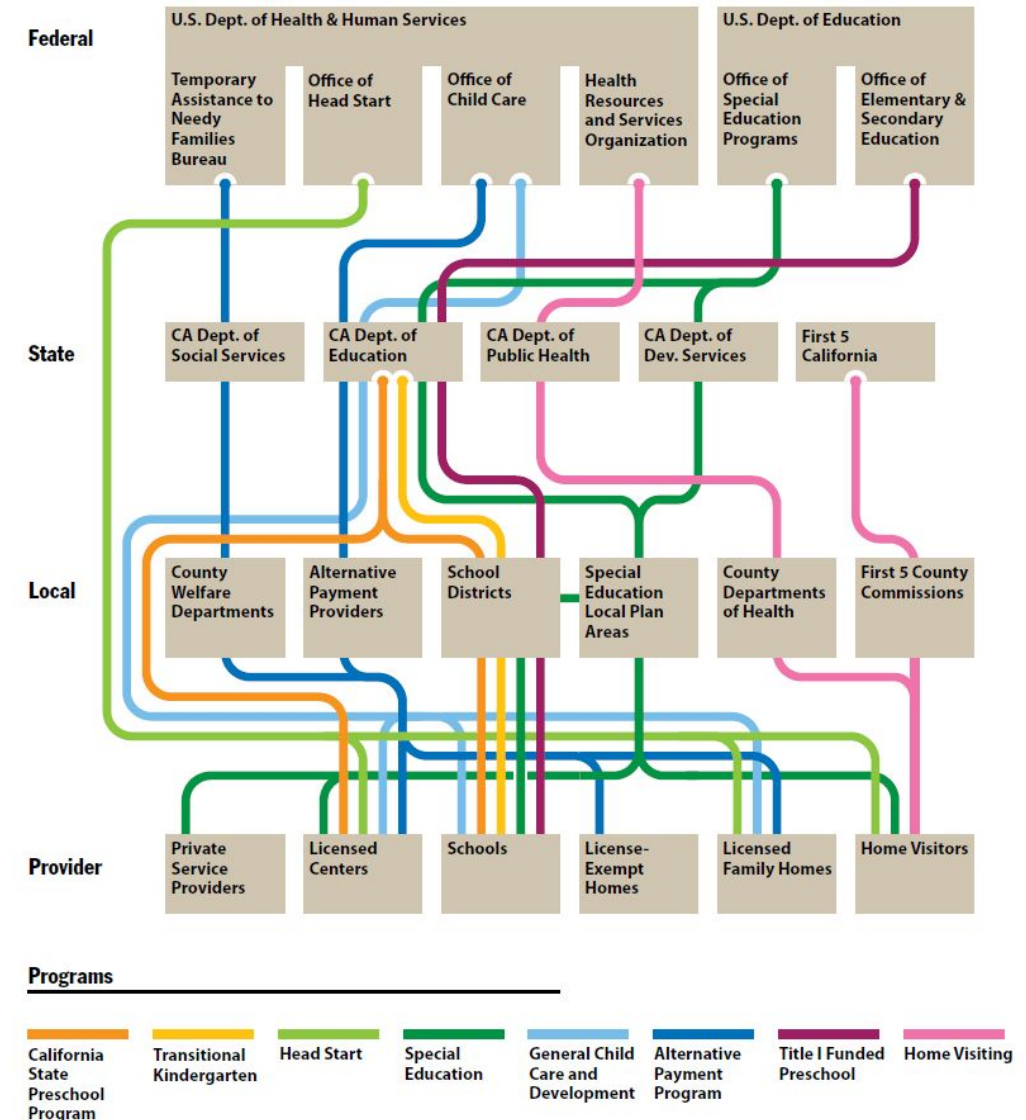


Early Care and Education (ECE)

U.S. Early Childhood Education Ecosystem

Complex & Fragmented ECE System

- Multiple oversight agencies with unique regulations
- Various funding & support infrastructures across states





EARLY CHILDHOOD SYSTEM GOVERNMENT PROGRAMS IN HAWAII

Through collaboration and partnerships, we work to establish a system that ensures a solid foundation of early childhood development and learning for Hawai'i's young children (prenatal-age 5), meaningful engagement and support for their families, and a stable, competent and supported early childhood workforce.

Publicly Funded Early Learning Providers

Public Pre-K



Charter Public Pre-K



SPED Pre-K
Migrant Pre-K



Head Start and Early Head Start Classrooms



Support for Early Learning Providers & Workforce

Licensing & Regulation of Community-Based Providers



Child Care Resource & Referral Agency



Preschool Open Doors Subsidy & Child Care Subsidy



Ready Keiki Initiative (Lt. Gov)



Hawai'i School Facilities Authority (Pre-K Facilities)

Early Childhood Educator Stipend Program



Educator Workforce Training & Certification



Family Engagement & Support

Home Visiting Services



Temporary Assistance to Needy Families



Child Welfare



McKinney-Vento Act Resources for Families in Unstable Housing



Wrap around services for Head Start families



Family Child Interaction Learning Programs (FCILs)



Health, Mental Health & Nutrition

Child and Adolescent Mental Health Division



Supplemental Nutrition for Women, Infants and Children (WIC)



Med-QUEST (Hawai'i's Medicaid Agency)



Supplemental Nutrition Assistance Program (SNAP)



Primary Prevention



Special Needs & Intervention

Children & Youth with Special Health Needs



Early Intervention (IDEA Part C)

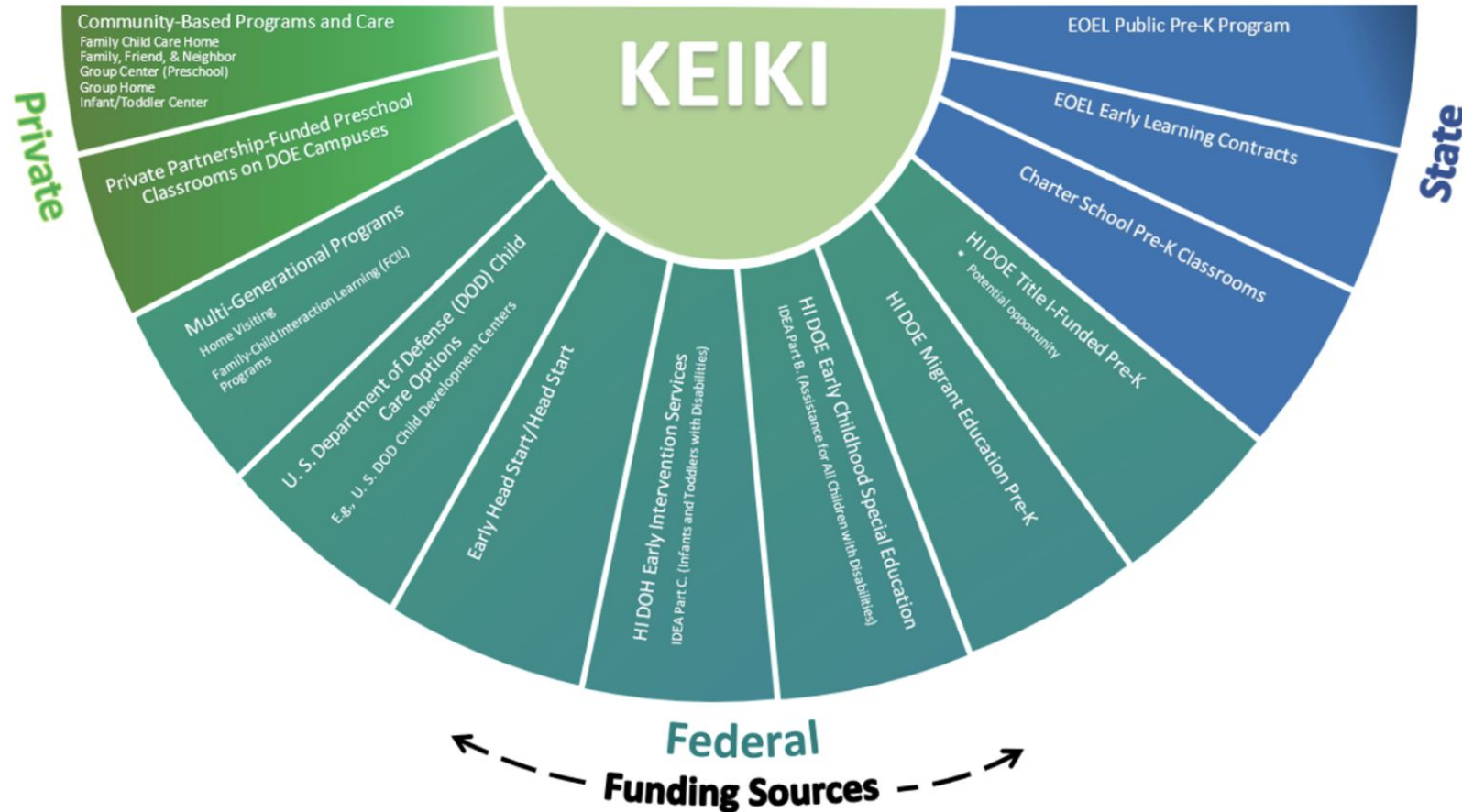


Preschool Special Education (IDEA Part B)



What does ECE look like in Hawai'i

Early Learning Opportunities in Hawai'i



Executive Office on Early Learning
earlylearning.hawaii.gov
(808) 784-5350



ECE Impact on Community Economy

ECE in United States

- 23 million children under age 5 in US
- 71% live in households where all parents work – relying on child care
- Many children spend > 30 hours each week in ECE



**Harvard
Business
Review**

Forbes

- High-quality child care drives the economy by allowing families to work.
- Inadequate childcare cost employers \$13 billion a year in lost productivity.
- Supporting child care can lower absenteeism by 30%, reduce turnover by 60%, increase recruitment, and boost productivity.

Children Health & Well-Being

“Food & physical activity bring people together.”

Supporting Development of the Whole Child



Child Health in United States

- **1 in 5** children and adolescents have obesity (20%)
- Obesity **affects some groups** more than others
- Children with obesity are more likely to have **obesity as adults**.
- Estimated annual medical cost = approximately **\$1.3 billion**
- Obesity medical costs = **\$116 higher per person per year**
- Severe obesity medical costs = **\$310 higher per person per year**
- Contributors to excess weight: **too much screen time, lack of mealtime routines, and lack of access to affordable, healthier foods.**



Child Health in Hawai'i

- **Positive Trends:**

- Since 2021, Breastfeeding Initiation* increased 1% from 88.0 % to 88.8%⁵

- **Negative Trends:**

- Children in very good or excellent health (0-5 yrs)^{1a} (97.1%)
- Physical activity (everyday)¹ (21.4%)
- Children (1-17 yrs) with decayed teeth or cavities¹ (10.6%)

- **Food Security**

- Food Environment Index² (7.4/10)
- Households that are food insecure³ (9%)

- **Obesity & Overweight**

- 29.3% of children 10-17 are overweight or obese⁶



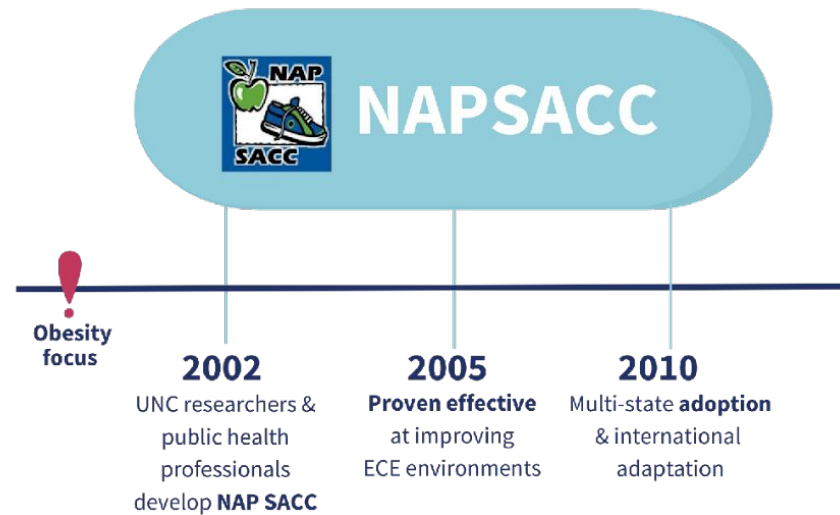
Supporting Development of the Whole Child



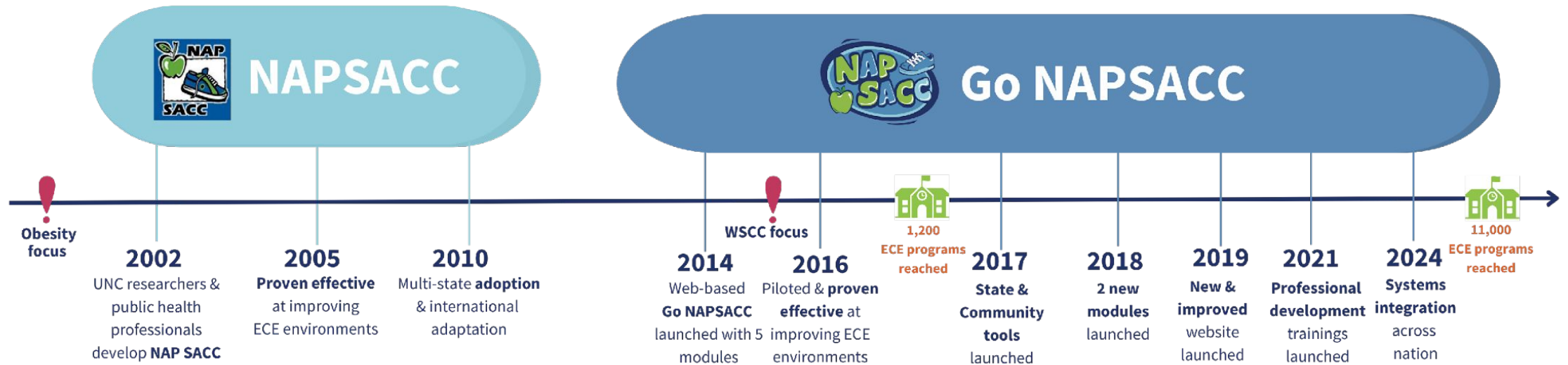
Go NAPSACC

Designed to help early childhood educators make improvements in their environments that would foster the adoption of healthy eating and physical activity habits in children.

Our History



Our History



WSCC = Whole School, Whole Community, Whole Child approach



Our Evidence

CHILDHOOD OBESITY
April 2019 | Volume 15, Number 3
© Mary Ann Liebert, Inc.
DOI: 10.1089/chi.2018.0083

RESEARCH ARTICLE

Translating a child care based intervent for online delivery: development and randomized pilot study of Go NAPSACC

Dianne S. Ward^{1*}, Amber E. Vaughn², Stephanie Mazzucca³ and Regan Burney²



Improving the physical act self-assessment (NAP SACC) North Carolina

STUDY PROTOCOL

The impact of basic vs. NAPSACC on child care eating and physical acti protocol for a type 3 hybrid effectiveness-implementation cluster-randomized trial

Amber E. Vaughn^{1*}, Christina R. Studts², Byron J. Powell^{3,4}, Alice S. Amme⁵, Geoffrey M. Curran⁶, Derek Hales^{1,5}, Erik Willis¹ and Dianne S. Ward^{1,5}

Nutrition-Related Prac Care Providers and Differences by Ethnicity

Kim M. Gans, PhD, MPH,¹⁻⁴ Alison Tovar, PhD, MPH,⁵ Qianxia Jiang, BS,^{1,2} Jennifer Mello, MPH,³ Laura Dionne, ScM,³ Augustine K Vanessa Palomo, MA,³ and P

Open Access Protocol

BMJ Open NAP SACC UK: protocol for a feasibility cluster randomised controlled trial in nurseries and at home to increase physical activity and healthy eating in children aged 2-4 years

R Kipping,¹ R Jago,² C Metcalfe,^{1,3} J White,⁴ A Papadaki,² R Campbell,¹ W Hollingworth,¹ D Ward,⁵ S Wells,¹ R Brockman,¹ A Nicholson,¹ L Moore⁵

Multi-State Implementation of Go NAPSACC to Support Healthy Practices in the Early Care and Education Setting

Margaret West, MPA^{1*}, Carrie Dooyema, MSN, MPH, RN¹, Falon T. Smith, PhD², Erik A. Willis, PhD², Emily Clarke, RD, LDN², Aviva Shira Starr, MSW², Kelly Hall, MPH^{1,3}, Derek P. Hales², Dianne S. Ward, EdD²

Notes From the Field: The Evaluation of Maine Nutrition and Physical Activity Self-Assessment for Child Care (NAPSACC) Experience

Sarah Levin Martin¹, Maurice W. Martin, [...], and Karen O'Rourke²

Volume 38, Issue 1 | <https://doi.org/10.1177/0163278714536032>

ARKANSAS: Creating Healthier Child Care Environments: Nutrition and Physical Activity Self-Assessment for Child Care (NAP SACC) in the Quality Rating Improvement System (QRIS)

CHILDHOOD OBESITY
June 2015 | Volume 11, Number 3
© Mary Ann Liebert, Inc.
DOI: 10.1089/chi.2014.0099

Child Care Provider Adherence to Infant and Toddler Feeding Recommendations: Findings from the Baby Nutrition and Physical Activity Self-Assessment for Child Care (Baby NAP SACC) Study

Rachel E. Blaine, MPH, RD,¹ Kirsten K. Davison, PhD,¹ Kathryn Hesketh, PhD,² Elsie M. Taveras, MD, MPH,³ Matthew W. Gillman, MD, SM,⁴ and Sara E. Benjamin Neelon, PhD, MPH, RD⁵

Research Go NAPSACC On-Demand Trainings for Early Care and Education Providers: Development and Dissemination

Emily Clarke, RD, LDN¹, Falon T. Smith, PhD¹, Erik A. Willis, PhD¹, Michelle Herr, MPH^{1,2}, Dianne S. Ward, EdD^{1,2}

PREVENT PUBLIC HEALTH

VOLUME 4: NO. 3

JULY 2007

SPECIAL TOPIC

Intervention to Promote Healthy Nutrition and Physical Activity

Prevention in Childcare Settings: Policy and Environmental Change

Annotations & Expansion

PMID: 26627214 DOI: [10.1007/s13679-015-0154-y](https://doi.org/10.1007/s13679-015-0154-y)

Our Evidence

SOLVING THE PROBLEM OF CHILDHOOD OBESITY WITHIN A GENERATION

White House Task Force on Childhood Obesity
Report to the President

MAY 2010



I. Early Childhood

Studies show that approximately one in five children are overweight or obese by the time they reach their 6th birthday⁶¹ and over half of obese children become overweight at or before age two.⁶² Even babies are affected almost doubled begin life on a high

This chapter provides information on how to improve the health of our children by:

- strengthen
- promote
- evaluate
- reduce
- improve our children

A. Prenatal

Mothers' pre-conception weight and weight gain during pregnancy affect fetal growth, birth

Higher maternal weight at birth and having gestational diabetes during pregnancy are associated with

Recent findings show that children born to mothers who were overweight or obese at the time of birth are more likely to be overweight or obese themselves. This is associated with

SOLVING THE PROBLEM OF CHILDHOOD OBESITY

order to legally operate within a state, but they must meet some basic requirements. A recent review of state child care regulations by researchers at the Duke University School of Medicine, based on ten expert-derived healthy eating model regulations, found that states had an average of 3.7 healthy eating regulations for child care centers and 2.9 for family child care homes. No state had all ten model regulations. States had particularly few regulations relating to physical activity and screen time.¹¹²

Workforce qualifications and training requirements for child care providers also vary widely from state to state. Many states are now implementing Professional Development Registries and other methods to better track and document the providers' training sessions. They are also implementing observation and feedback opportunities to understand if training is being applied in the classroom. To incorporate recommended nutrition, physical activity, and screen standards into their curricula, Federal agencies and states can partner with national organizations such as the National Association of Child Care Resource and Referral Agencies (NACCRRA), the National Association for the Education of Young Children (NAEYC), and the National Head Start Association (NHSA), as well as community colleges and other training providers.

Parents are often unaware of quality elements when choosing child care and early education settings, including the importance of nutrition, physical activity, and screen time limits provided in these settings, and they can find it difficult to get this information. Quality Rating and Improvement Systems (QRISs) are State systems that rate the quality of early child care settings (which can include Pre-K, Head Start, child care, and others) based on a clear, common set of criteria. These rating systems can provide parents with reliable, consistent information that can help them make informed decisions.

Innovative Early Childhood Programs

There are several evidence-informed initiatives and interventions for early childhood settings to combat childhood obesity, including:

- *I am Moving, I am Learning*, a proactive approach to childhood obesity in preschool classrooms that seeks to increase moderate to vigorous physical activity every day, improve the quality of movement activities intentionally planned and facilitated by adults, and promote healthy food choices. This approach is implemented by Head Start and has been adopted by some other child care programs as well.
- *Nutrition and Physical Activity Self-Assessment for Child Care (NAP SACC)*, an assessment tool for child care settings, which uses an organizational assessment of 14 areas of nutrition and physical activity policy, practices and environments to identify the strengths and limitations of the child care facility. NAP SACC also includes goal setting and action planning, continuing education and skill building for providers.
- *Nemours Program*: Delaware, under the leadership of Nemours, an integrated child health system, launched a statewide, multi-sector program to combat childhood obesity that includes changes in child care licensing to set healthy eating and physical activity standards, along with technical assistance, training and practical toolkits to help providers implement the standards. The new standards apply to all licensed center and family day care providers, impacting 54,000 children.



One of three innovative
early childhood
programs named for its
promise at combating
childhood obesity.



Our Evidence




Childhood Obesity Intervention Cost-Effectiveness Study (CHOICES) Project

“The **NAP SACC** program shows the **best evidence for impact on early childhood obesity risk** among interventions specifically targeted to children under 5; it has **been rigorously evaluated**, across multiple contexts, and demonstrated an impact on reducing obesity risk in experimental studies in several states.”




Our Evidence




**HARVARD
T.H. CHAN**
SCHOOL OF PUBLIC HEALTH


Childhood Obesity Intervention Cost-Effectiveness Study (CHOICES) Project



✓ Prevent cases of obesity




✓ Projected to be cost-effective



✓ Likely to improve health equity by race, ethnicity, and income

Barrett JL, Bolton AA, Gortmaker SL, Cradock AL. CHOICES National Action Kit: Creating Healthier Early Care and Education Environments Strategy Report. CHOICES Project Team at the Harvard T.H. Chan School of Public Health, Boston, MA; December 2023



Childhood Obesity Intervention
Cost-Effectiveness Study

Creating Healthier Early Care
and Education Environments

HEALTH EQUITY INDICATORS

Describes the projected impact of implementing a strategy nationally on health equity by race, ethnicity, and income.

Every person deserves access to healthy foods and drinks and opportunities to be physically active, which can help them grow up and live at a healthy weight. However, obesity levels vary by race, ethnicity, and income. Nationally, current and future projected obesity levels are highest among Black or African American and Hispanic or Latino race and ethnicity groups and populations with low household incomes.¹ These disparities are driven by many forces, including commercial determinants leading to increased intake of highly processed and marketed foods and drinks, as well as structural racism and social and economic determinants of health.²⁻⁴ Effective policy and programmatic strategies promoting improved nutrition and increased physical activity can reduce health disparities and improve health equity.

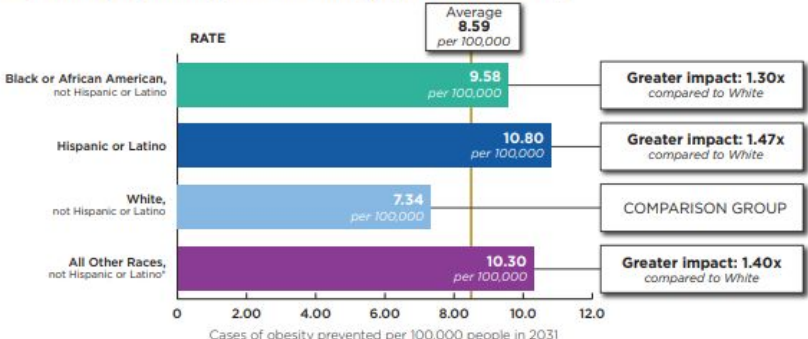
KEY TAKEAWAYS

If implemented over 10 years (2022-2031), this strategy is projected to:

- ✓ Prevent 27,400 cases of obesity in 2031
- ✓ Prevent cases of obesity in all race, ethnicity, and income groups
- ✓ Improve health equity by race and ethnicity
- ✓ Not likely to improve health equity by income


Learn more about CHOICES methods for projecting health equity impacts at choicesproject.org/methods/health-equity

Comparative projected impact of the strategy by race and ethnicity



RACE	Rate per 100,000	Comparative Impact
Black or African American, not Hispanic or Latino	9.58	Greater impact: 1.30x compared to White
Hispanic or Latino	10.80	Greater impact: 1.47x compared to White
White, not Hispanic or Latino	7.34	COMPARISON GROUP
All Other Races, not Hispanic or Latino*	10.30	Greater impact: 1.40x compared to White

*All Other Races includes people who identify as American Indian/Alaska Native, Asian, Native Hawaiian or Pacific Islander, Multi-racial, or another race or ethnicity not represented in the categories shown. While each of these groups represent distinct populations with differences in health opportunities, risk, and outcomes, they are summarized together due to limited data in national- and state-level surveillance systems.



The Black or African American and Hispanic or Latino populations are projected to experience preventive benefits that are 1.30 and 1.47 times greater compared to the White population. The comparative impact in each population group compared to the population average is provided in a table on [page 9](#).



Go NAPSACC's Core Components



Go NAPSACC's Core Components

EVIDENCE-BASED PRACTICES



Go NAPSACC's Core Components

5-STEP IMPROVEMENT PROCESS



On-demand State Partner Tools



Administer

Registration Codes



Track

TA Activity & Provider Progress

The laptop screen shows the 'Consultants' page of the NAP SACC system. The page has a green sidebar with navigation links: Consultants, Consultant Resources, Registration Codes, Tips and Materials, Reports, Provider Trainings, My Account, and Help. The main content area displays a table of registered consultants. Above the table is a search bar with the text 'Search by County or Consultant Name' and a magnifying glass icon. The table has columns for Consultant Name, Organization Type, Connections, County, and TA Activity. The data is as follows:

Consultant Name	Organization Type	Connections	County	TA Activity
Barbara Bradley	County/Regional/State Child Care Resource & Referral Agency	8 Programs Connected 1420 Children Served	Guam	11/25/2022
Trisha Adams	County/Regional/State Child Care Resource & Referral Agency	2 Programs Connected 112 Children Served	Guam	02/28/2019
Demo TA User 1 Demo	County/Regional/State Child Care Resource & Referral Agency	1 Programs Connected 10 Children Served	Guam	--
Trish TA	County/Regional/State Child Care Resource & Referral Agency	1 Programs Connected 54 Children Served	Guam	--

At the bottom of the table, there is a pagination control showing '< 1 >'.



Big data for little people

Limited datasets capture
ECE **provider-level**
evidence-based practices

Go NAPSACC captures
assessment data across
8 content areas



Pre & post
comparison

Program
characteristics
for analysis

Options for within, and
across **state comparisons**



Consultant Tools



Connect

Local child care programs



Track

Progress through 5-steps



Guide

Resources for TA's & providers



Monitor

Improvements in best practices



BARBARA BRADLEY ▾

[WHAT WE DO >](#) [WHY GO NAPSACC >](#) [HOW TO JOIN >](#) [WHO WE ARE >](#)

MY PROGRAMS

My Programs

888 Your Connections:

6 Programs Connected

407 Children Served

Connections

✉ Your Invitations:

0 Pending Connections

1 Pending Registrations

Consultant Resources

Tips & Materials

Reports

My Account

Help

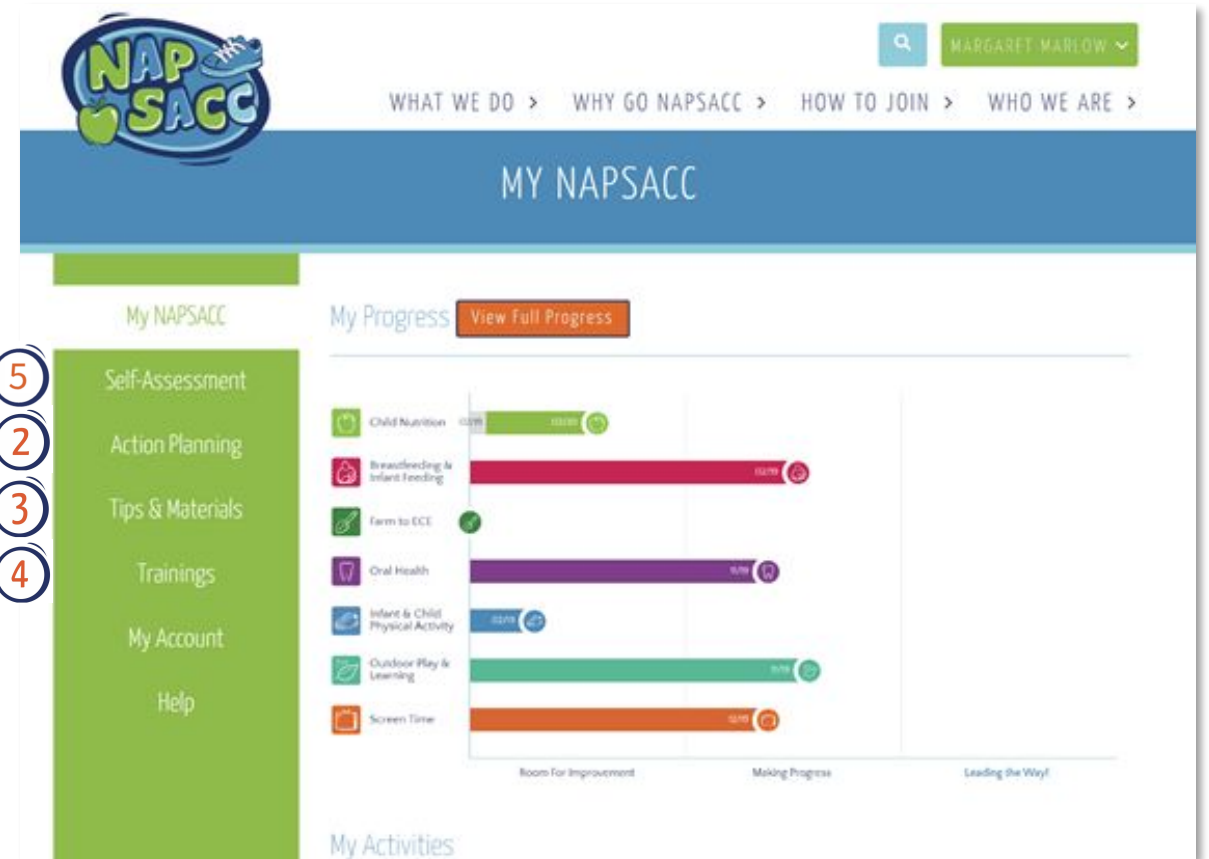
Connected Programs

Invited Programs

Connect to Programs

User Information	Connected	Most Recent Self-Assessment	Most Recent Action Planning	Disconnect
FT Center 1 >	01/22/19	Breastfeeding & Infant Feeding 02/09/2021	Child Nutrition 01/11/2021	✕
FT Home 1 >	01/22/19	Oral Health 05/08/2019	Oral Health 05/08/2019	✕
Margaret's Development Center >	02/26/19	Farm to ECE 09/23/2020	Farm to ECE 09/29/2020	✕
Margaret's dev FCCh >	11/11/19	Child Nutrition 02/17/2020	Child Nutrition 02/17/2020	✕
Kiddie Academy South Fayette >	10/22/19			✕
Demo Test Program >	11/03/20			✕

On-demand ECE Program Tools

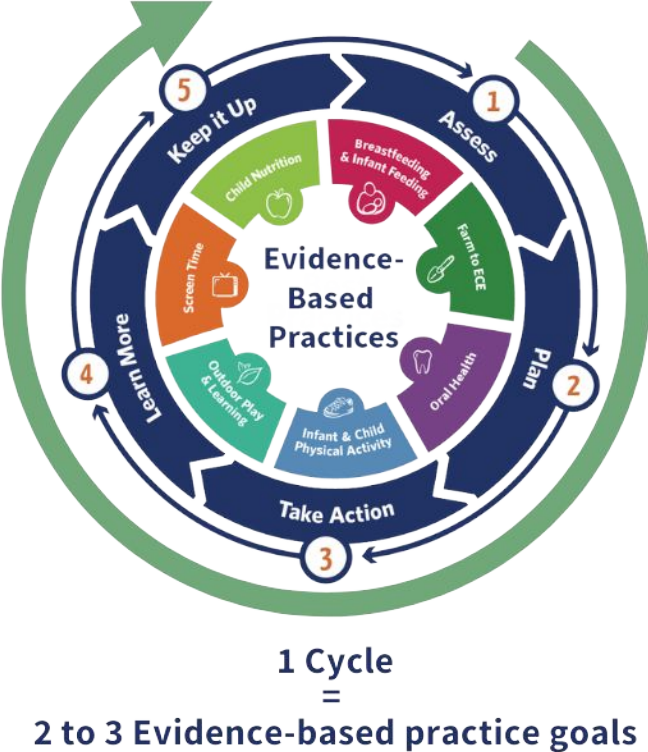
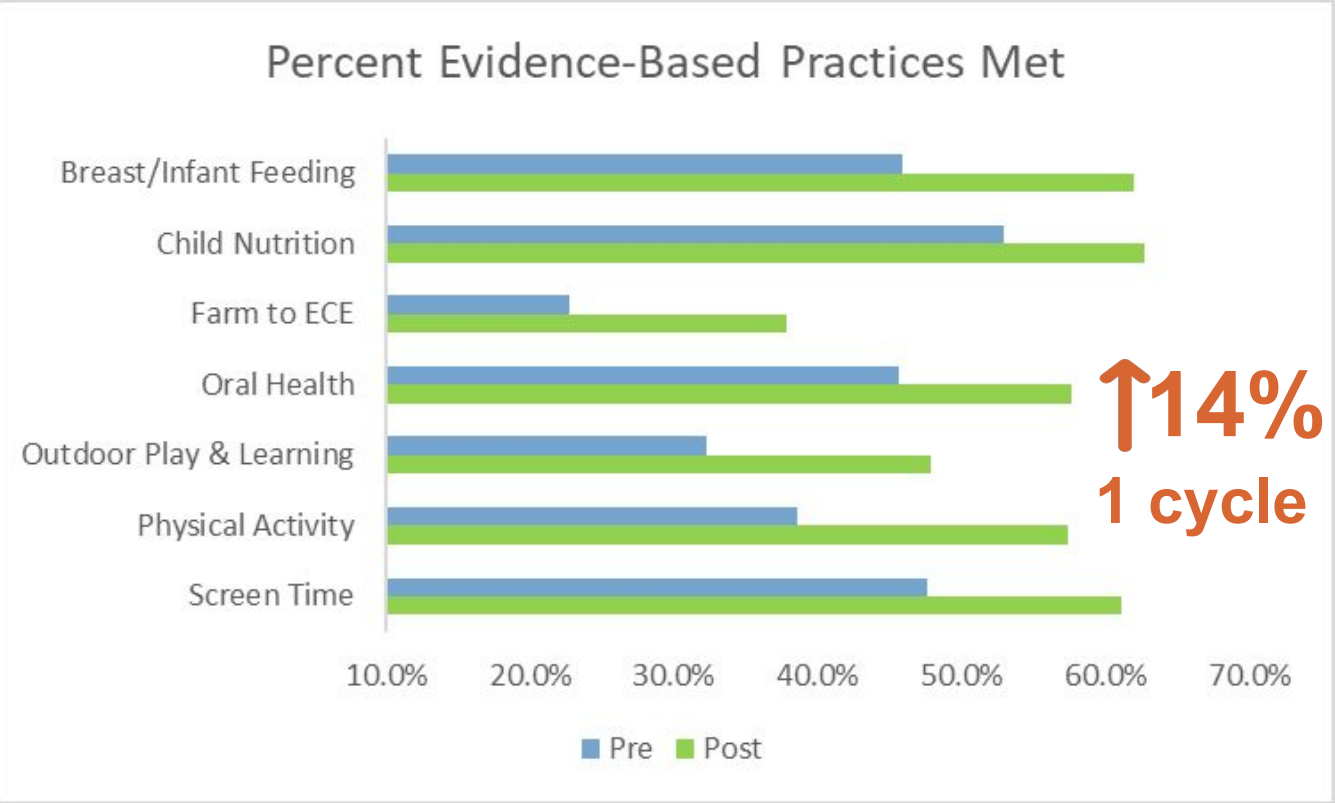


Educator Tools

- Tailored assessments and action plans
- + 600 resources
- 35 on-demand trainings



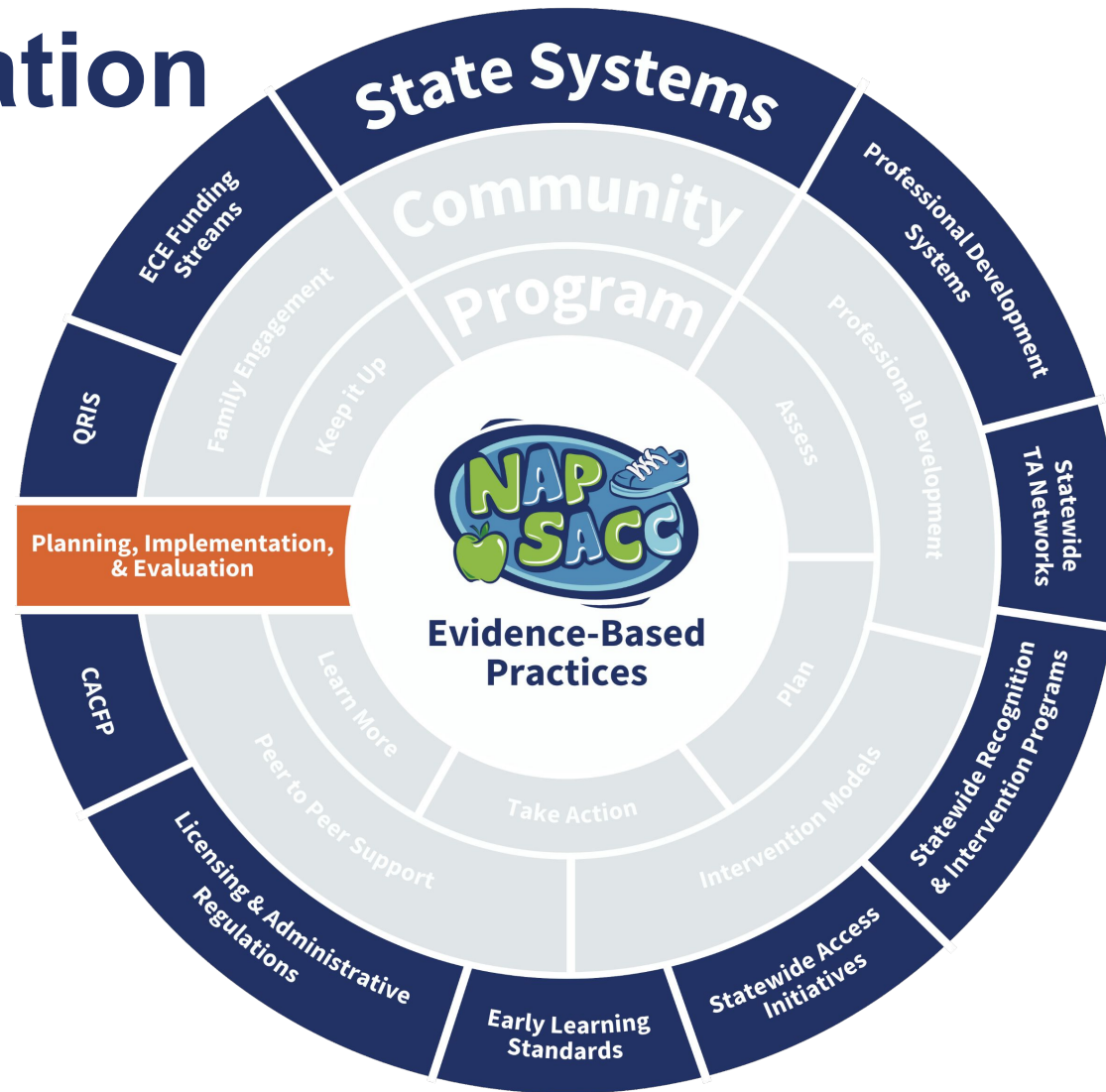
Our Evidence



Multi-level Implementation Approach



Multi-level Implementation Approach



State Government
(63.6% of states)

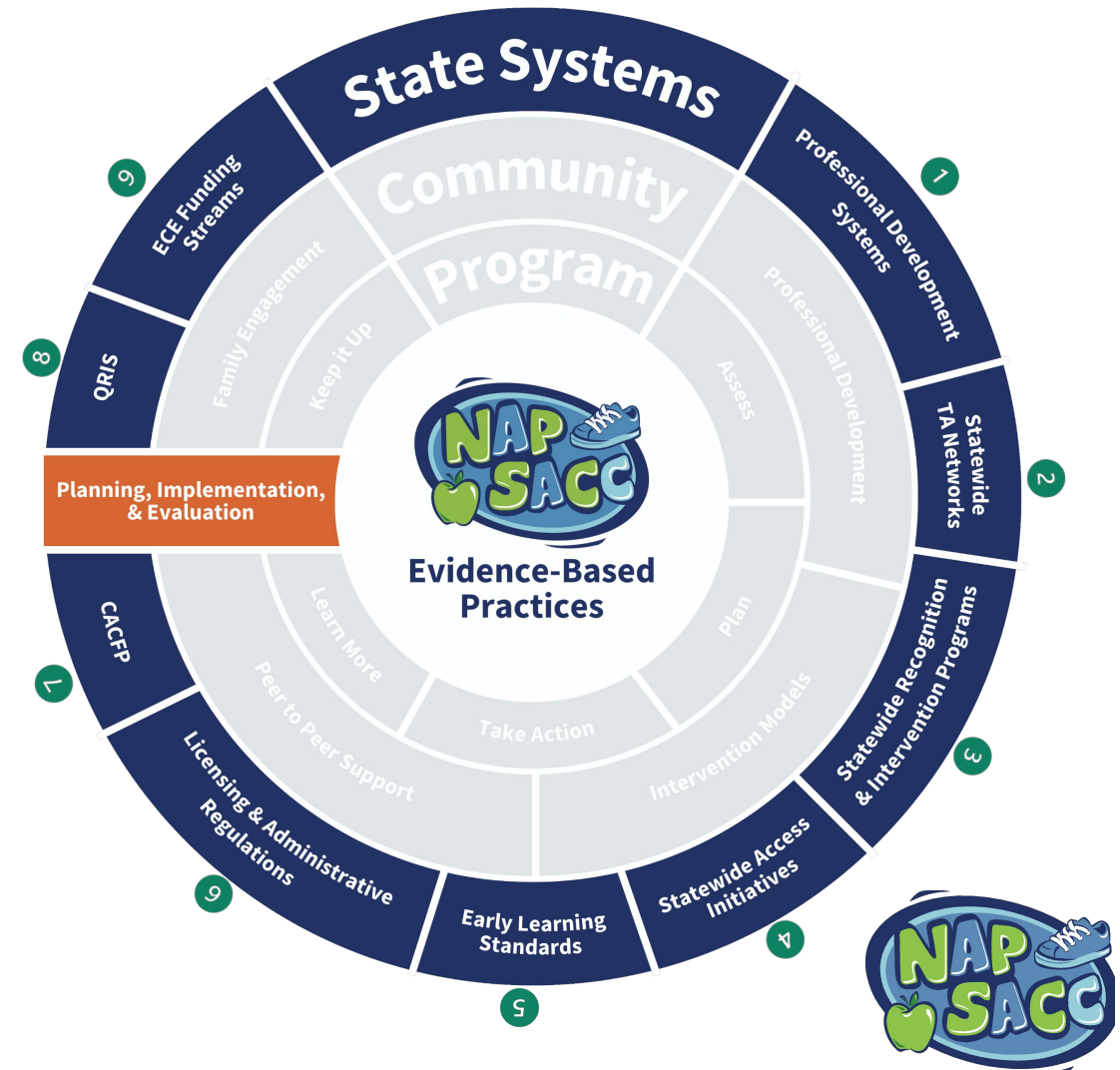
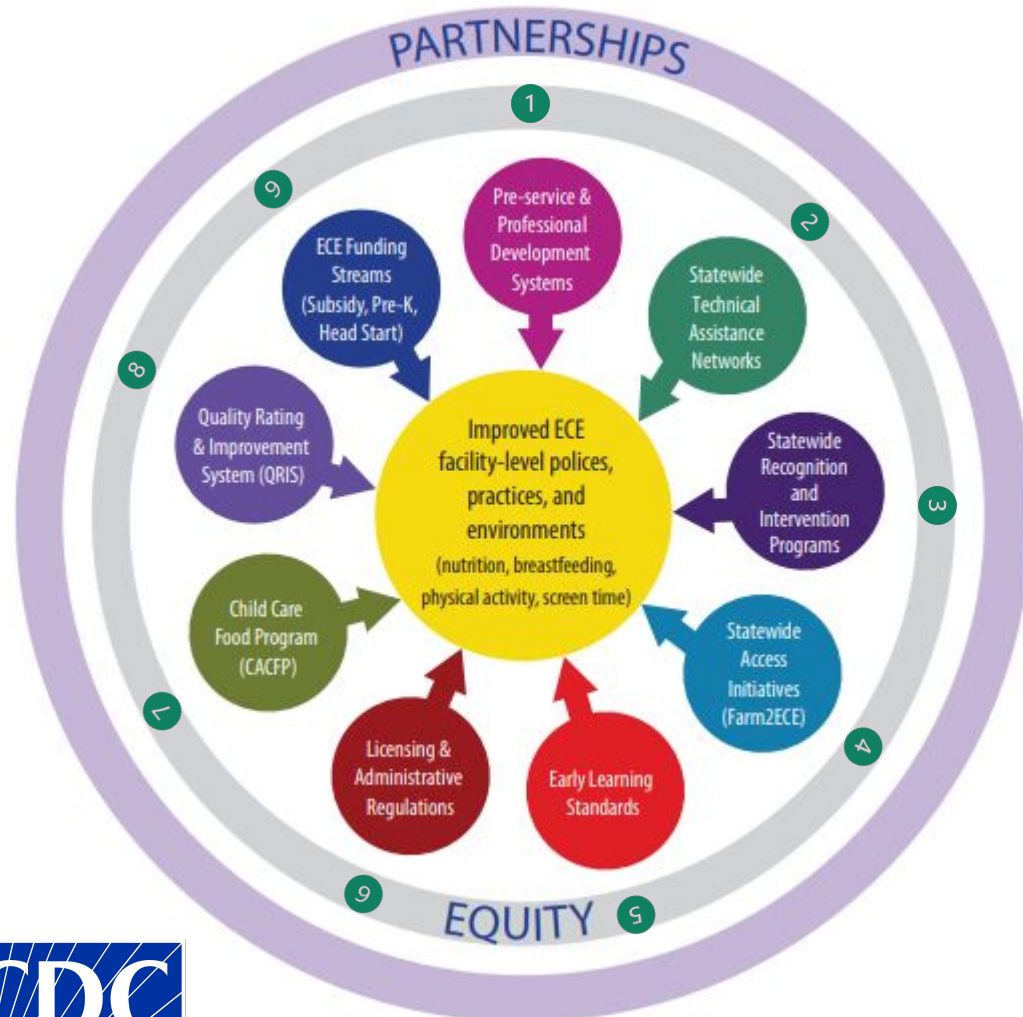
ECE Agency/Non-Profit
(18.2% of states)

University/Cooperative Extension
(18.2% of states)

State Systems



ECE Systems Change Using Using CDC Spectrum of Opportunities & Go NAPSACC



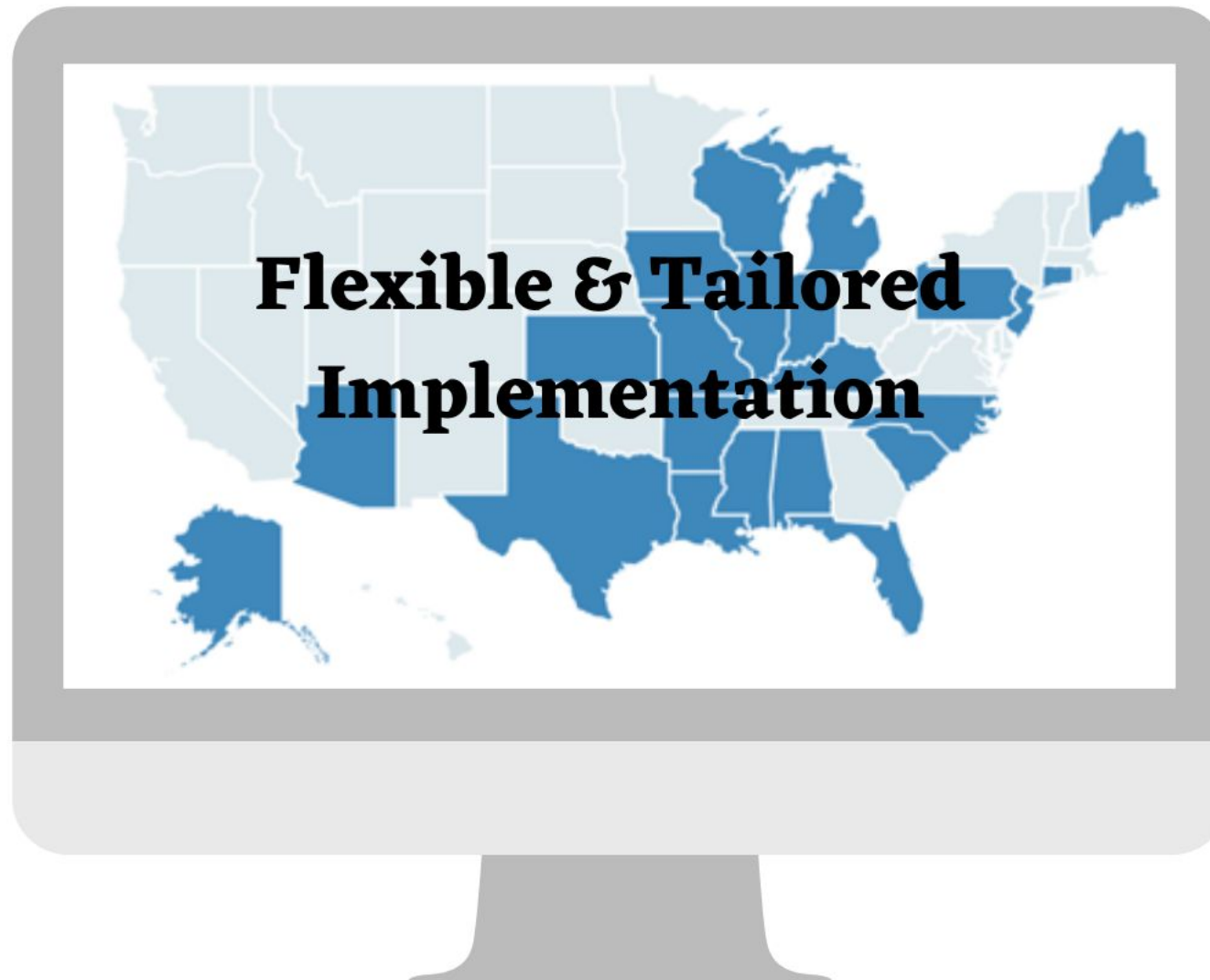
Implementation Timelines

Learning Collaboratives

Learning Cohorts & Communities of Practice

Dissemination

- Statewide
- Target populations



State Initiatives

- Farm to ECE
- Outdoor Play & Learning

State Systems

- QRIS/CQIS
- Recognition Programs

Mini-Grants

State Training Registry

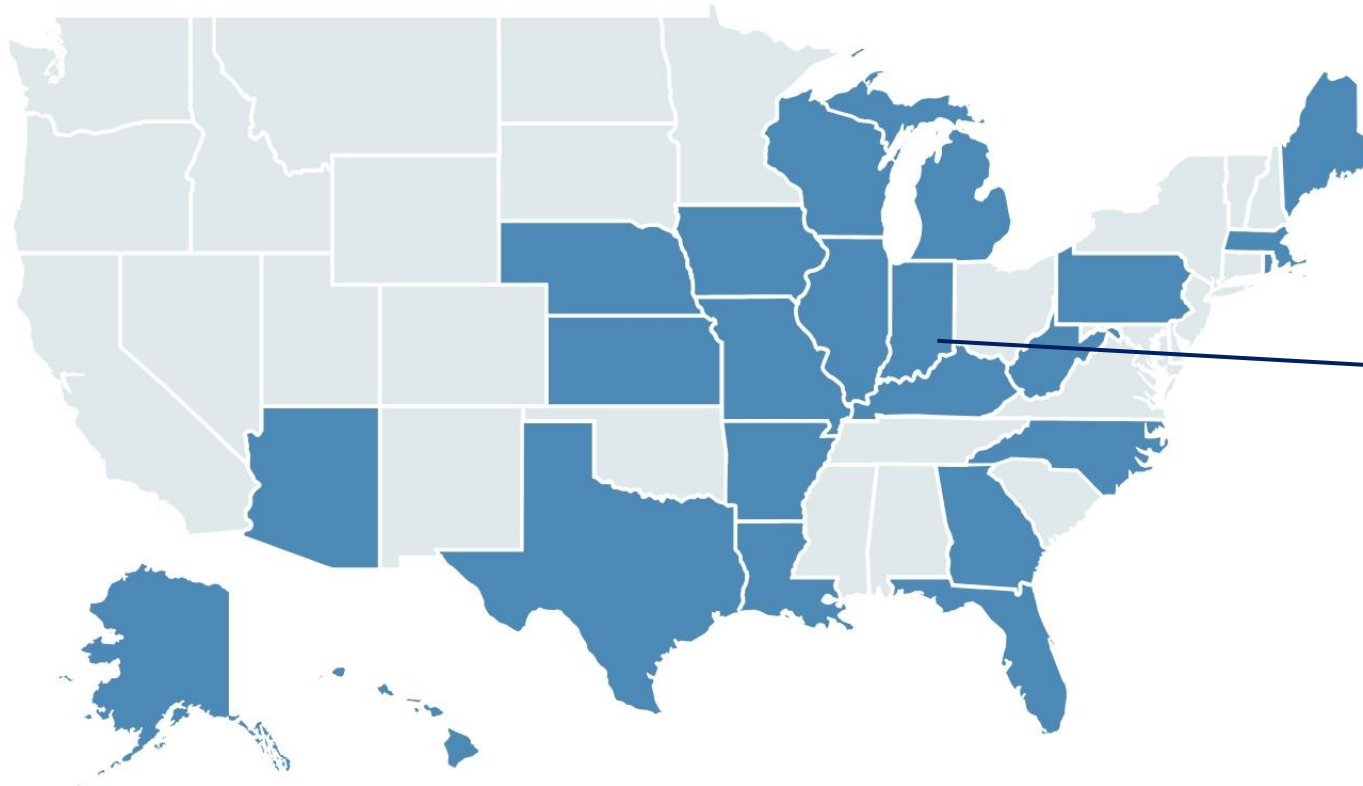


ECE Systems Change

From NAPSACC Nation

1

Preservice & Professional Development Systems



Go NAPSACC trainings included in curriculum for Indiana's Child Development Credentialing course.

The screenshot shows the inaeyc website with a header navigation bar. The main content area features a section titled "Indiana Non Formal CDA Project" with a sub-header "Empowering early childhood educators with greater knowledge and advanced skills to better meet children's individual needs and enhance the overall quality of care and education." Below this is an "APPLICATION" button and a photo of three women. A line from the map points to this section.

Indiana



ECE Systems Change

From NAPSACC Nation

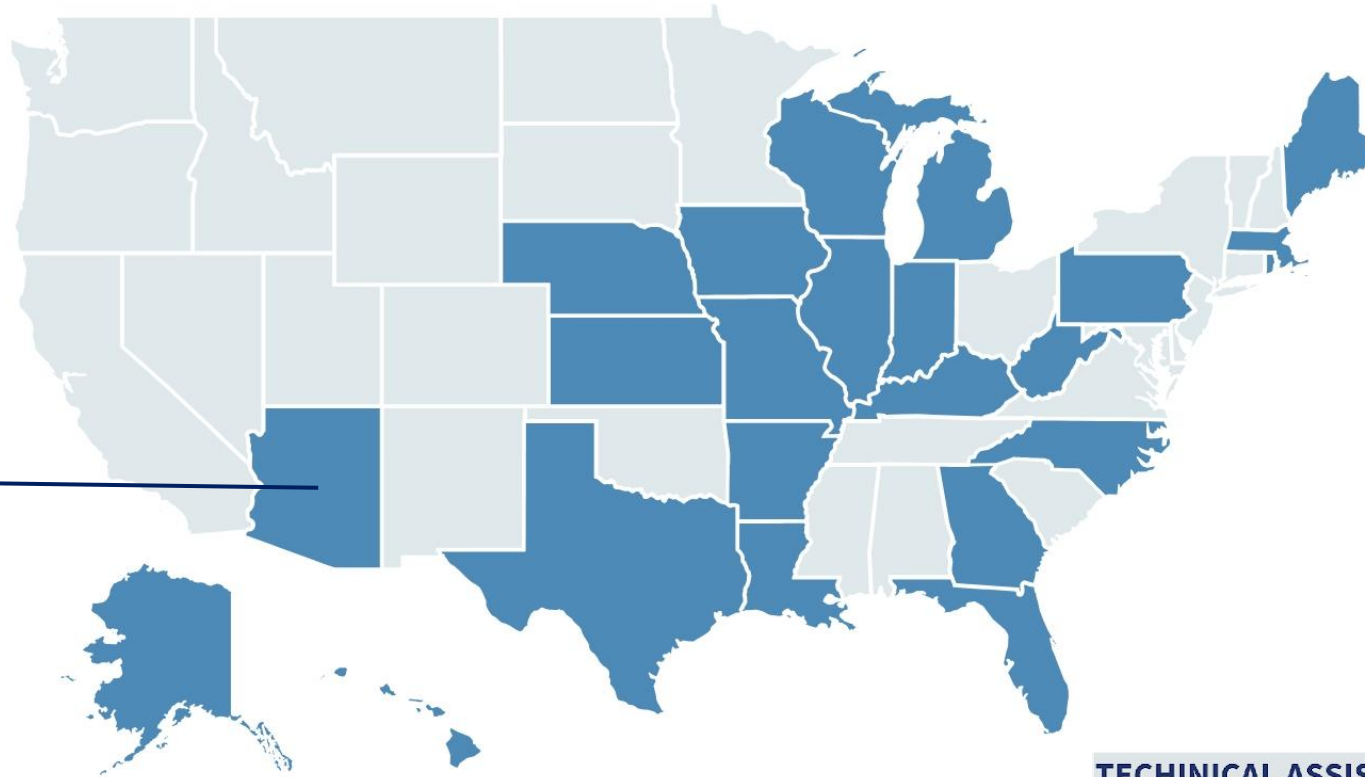
2

Statewide Technical Assistance Networks



SNAP Ed TAs certified as Go NAPSACC Consultants who evaluate ECE systems using Go NAPSACC

Arizona



TECHNICAL ASSISTANCE NETWORKS USED

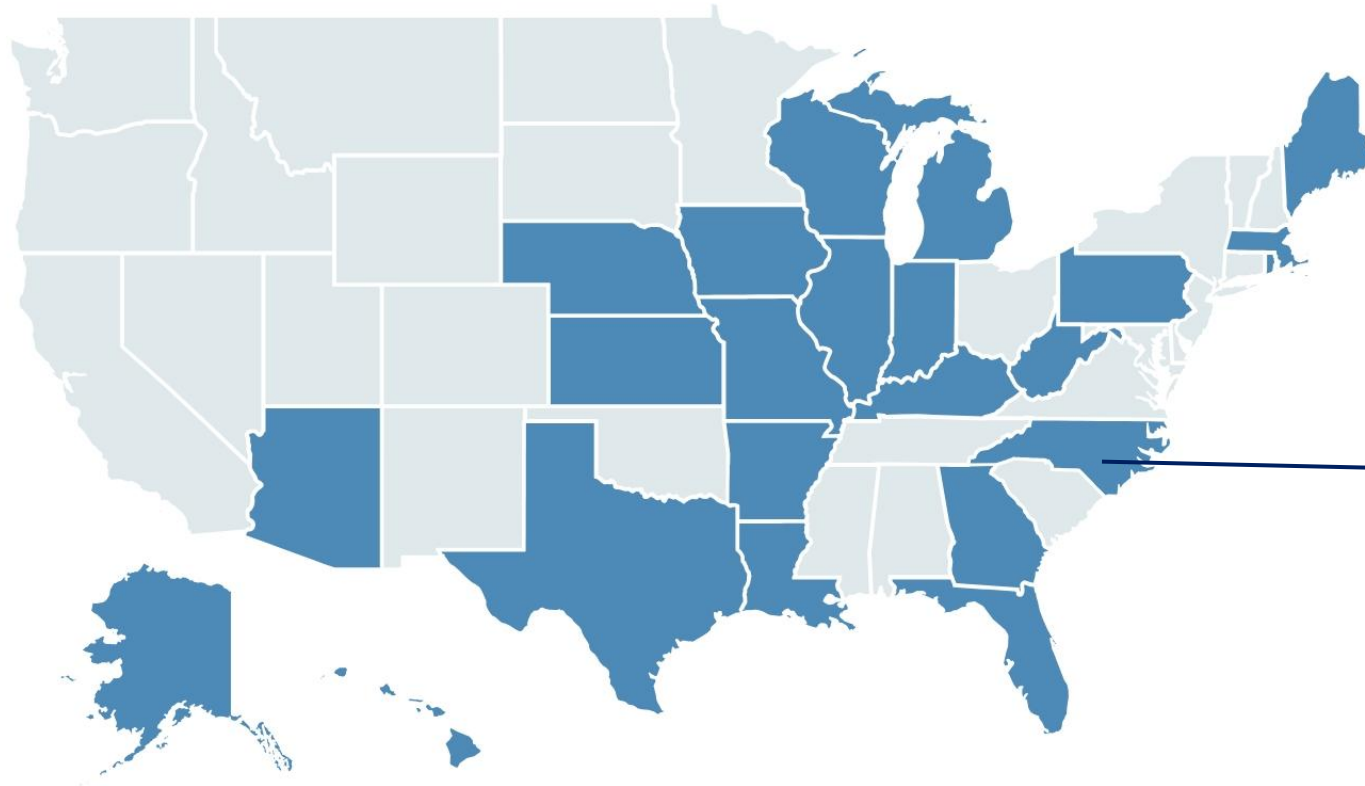
- Child Care Resource (**28.6%**)
- SNAP-ed/Univeristy/Extention Agents (**26.5%**)
- Child Care Health Consultants (**14.3%**)
- Community Health Educators (**24.5%**)
- Private Contractors (**6.1%**)

ECE Systems Change

From NAPSACC Nation

3

Statewide Recognition Programs



Recognizes NC ECE
programs meeting
Go NAPSACC
evidence-based practices

North
Carolina



ECE Systems Change From NAPSACC Nation

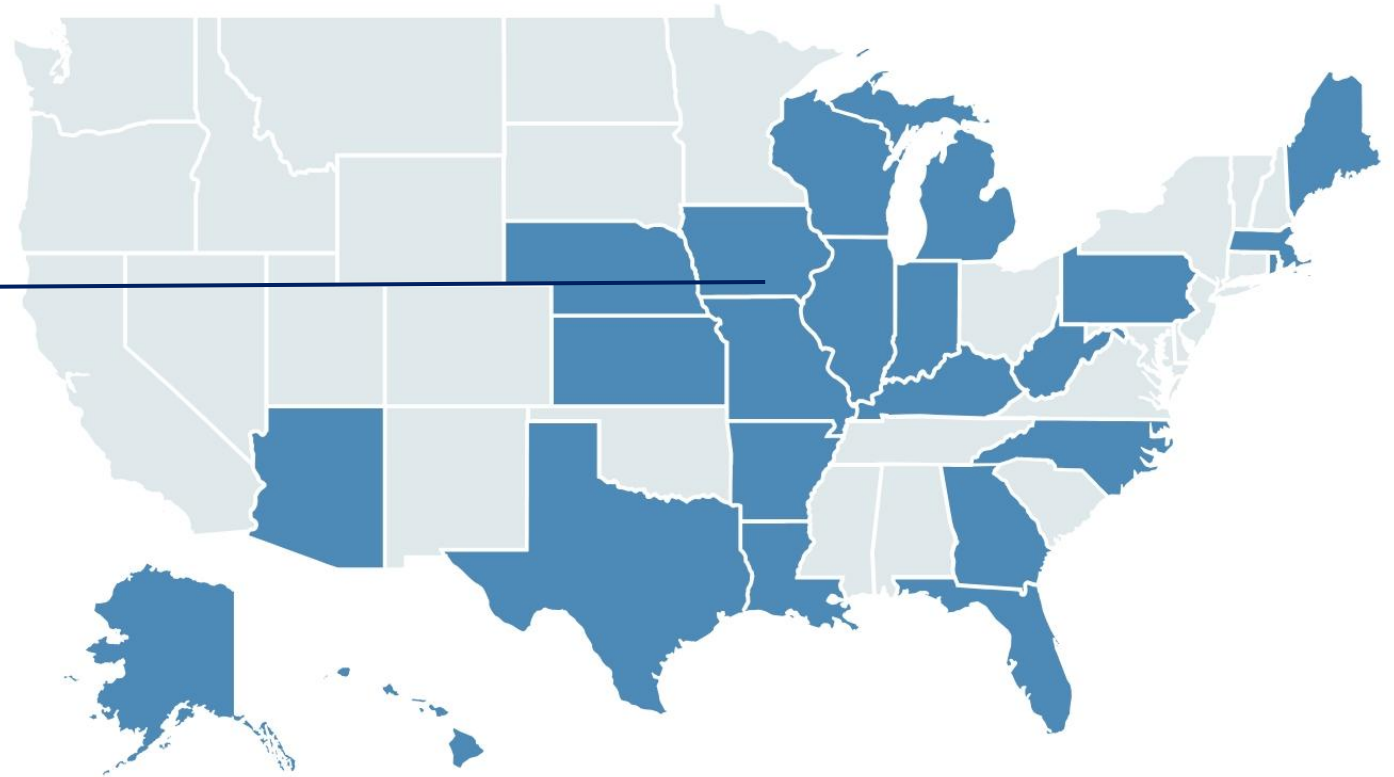
8

Quality Rating & Improvement Systems



Programs must complete
Go NAPSACC
self-assessment & action
plan to increase quality
levels.

lowa



Coordinated Efforts to Improve Health-Related Evidence-Based Practices in Early Care and Education Setting in Hawai'i

A vision for a healthier future

Program Implementation is Hard...

- 1 *“It takes 17 years for...original [public health] research to make its way to practice.”¹*
- 2 Differences exist across each of the 50 states’ ECE systems, capacity, and health promotion goals.
- 3 A clear plan with the right partners is needed to reach any goal.



Things to Consider...

What success does hawaii want to see in early childhood?

What lays the foundation for this success?

What is central to expansion of ECE that Hawaii is willing to invest in?

What are Go NAPSACC related goals?



Examples of Potential Mapping



Determine Partners

Cooperative
Extension

CCHCs

PD Systems

Professional
Associations

State ECE
Advisory
Councils

Regulation &
Licensing

Tribal
Communities

Birth – 3/ Early
Intervention
Programs

CCDF

QRIS

Early Learning
Standards

CCR&Rs

Head Start

CACFP

State PRE-K

Colleges &
Universities

WIC

Obesity
Prevention
Grantees

Parks & Rec

Health
Departments

Determine goals and outcomes

Number of
Consultants
Trained

Number of ECE
Programs
Enrolled

Number of
Counties with
Active ECE
Programs

Number of ECE
Programs
Completing 1st
Self-Assessments

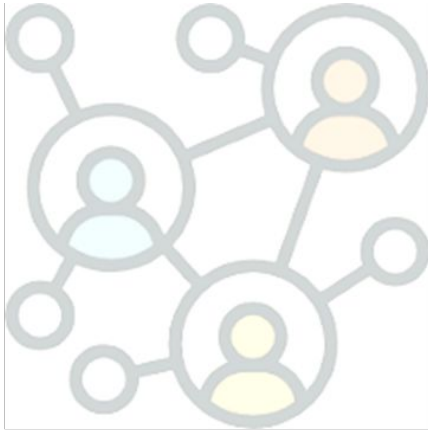
Number of
ECE Programs
Creating
Action Plans

Number of
ECE Programs
Completing
Trainings

Number of
ECE Programs
Re-Assessing,
Completing an
Entire 5-Step
Process

Number of
ECE programs
earning a state
recognition,
QRIS
standards, etc.

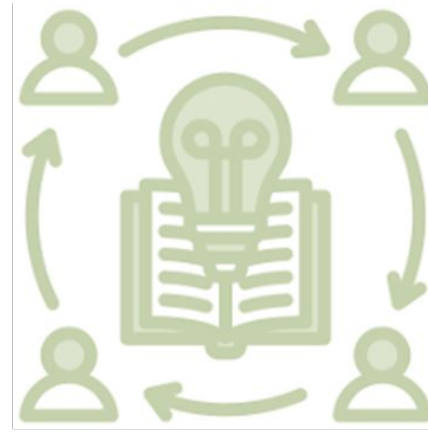




General Technical Assistance



Cohort Support



Learning Collaboratives



QRIS/QIS

Lower Cost?
Lower Complexity?
Lower Impact?
Less time?

Higher Cost?
Higher Complexity?
Higher Impact?
More Time?

Determine Implementation Models

Centralized TA

Expanded TA

Train the
Trainer

Recognition
Programs

QRIS/CQIS

Cohorts
&
Communities
of Practice

Learning
Collaborative

Mini Grants

Content
Specific
Initiatives

Other?

Questions?
