



STATE OF HAWAII
DEPARTMENT OF EDUCATION
KA 'OIHANA HO'ONA'AUAO
P.O. BOX 2360
HONOLULU, HAWAII 96804

Date: 02/02/2023

Time: 02:00 PM

Location: 309 VIA VIDEOCONFERENCE

Committee: House Education

Department: Education

Person Testifying: Keith T. Hayashi, Superintendent of Education

Title of Bill: HB 1448 RELATING TO ASTHMA.

Purpose of Bill: Authorizes the department of education to stock bronchodilators for emergency use during respiratory distress and authorize department employees to volunteer to administer bronchodilators.

Department's Position:

The Hawaii State Department of Education (Department) respectfully offers comments on HB 1448.

The Department currently has systems in place to support students with chronic health conditions, such as asthma. Upon notification of a student with a chronic health condition, a team is formed with the student's parent or legal guardian, a Hawaii State Department of Health Public Health Nurse, and all appropriate school staff to develop an Emergency Action Plan individualized to the student's needs during the school day. The Emergency Action Plan is reviewed annually and as needed.

To ensure the safety and well-being of all students, every Department school has a School Health Assistant trained in first aid, cardiopulmonary resuscitation, and medication administration. Sections §302A-851 and §302A-853, Hawaii Revised Statutes (HRS), support the safe and effective administration of medication to students by School Health Assistants and the Nurse Practice Act allows and covers medication administration by School Health Assistants. Per Section §302A-1164, HRS, the Department allows for the self-administration of medication by a student for asthma, anaphylaxis, diabetes, or other potentially life-threatening illness.

Should the measure move forward, the Department respectfully requests the following revisions to better align with the intent to improve access to medication in schools to support students with asthma:

Page 3, Lines 11-12: "~~Develop~~ Follow the Department's protocol related to the training of ~~school~~-its employees and agents, the maintenance and location of the"

Page 4, Line 1: "valid prescription, accept unused and unexpired donated bronchodilators"

Page 4, Line 18: "~~Ensure~~ Encourage that a school nurse or other authorized"

Page 6, Lines 10-15: "Emergency use of bronchodilators; ~~provided that a school may maintain a supply of bronchodilators to be administered by a school nurse or other authorized employees and agents for actual or perceived asthma episodes pursuant to section 302A.~~"

Passage of this bill would have a financial impact on the Department and may adversely impact priorities as indicated in the Hawaii State Board of Education approved budget. Implementation of this bill statewide would require initial and long term costs to acquire bronchodilators, devices, and device components; obtain and install medication storage equipment; deliver the required training; and provide administrative support for schools. An annual appropriation of \$176,000 would be necessary to carry out the purposes of this act.

Thank you for the opportunity to provide testimony on HB 1448.



**TESTIMONY OF
THE DEPARTMENT OF THE ATTORNEY GENERAL
THIRTY-SECOND LEGISLATURE, 2023**

ON THE FOLLOWING MEASURE:

H.B. NO. 1448, RELATING TO ASTHMA.

BEFORE THE:

HOUSE COMMITTEE ON EDUCATION

DATE: Thursday, February 2, 2023 **TIME:** 2:00 p.m.

LOCATION: State Capitol, Room 309

TESTIFIER(S): Anne E. Lopez, Attorney General, or
Anne T. Horiuchi, Deputy Attorney General

Chair Woodson and Members of the Committee:

The Department of the Attorney General (Department) provides the following comments.

The bill authorizes the Department of Education (DOE) to stock bronchodilators for emergency use during respiratory distress and authorizes certain DOE employees to volunteer to administer bronchodilators.

The Department respectfully recommends the following amendments:

- (1) "School nurse" is not a defined term in chapter 302A, Hawaii Revised Statutes (HRS). The term "school health aides," however, is already used in section 302A-853, HRS, regarding the administration of medication. We suggest replacing "school nurse[s]" with "school health aide[s]" on page 3, line 6; page 4, lines 9, 15, and 18; page 6, line 12; and page 12, lines 1-2.
- (2) "School" is not a defined term for chapter 302A, HRS. See section 302A-1, HRS. If the new section is intended to apply to all public schools, including charter schools, we suggest inserting the word "public" before the word "school" throughout the proposed new section to be added to chapter 302A, HRS. If, however, the new section is not intended to apply to charter schools, we suggest inserting the word "department" before the word "school" throughout the proposed new section. We identified the term "school" that may need the addition of "public" or "department" on page 3, lines 4, 8, and 21.

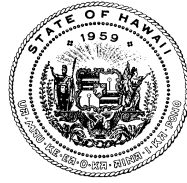
(3) The training requirements in new section 302A-1164(h), on page 11, line 14, through page 12, line 3, do not align with the training requirements currently set forth in section 302A-1164(g), and that may cause confusion.

Subsection (g) states that any employee or agent who volunteers to administer insulin or glucagon in an emergency situation shall receive instruction in the proper administration of insulin, glucagon, auto-injectable epinephrine, or blood glucose monitoring by a "qualified health care professional," which is defined as a "licensed physician, physician assistant, advanced practice registered nurse or registered nurse, or certified diabetes educator." New subsection (h) states that an employee or agent who volunteers to administer a bronchodilator in an emergency situation shall receive instruction in the proper administration of bronchodilators and use of spacers by a "qualified health care professional," but then states that training shall be provided by a "school nurse, certified emergency responder, other health care professional, or appropriate online training." (Page 12, lines 1-3.)

We suggest revising page 12, lines 1-3 to state:

emergency responder. [~~Training shall be provided by a school nurse, certified emergency responder, other health care professional, or appropriate online training.~~] A "qualified health care professional" means a licensed physician, physician assistant, advanced practice registered nurse or registered nurse.

Thank you for the opportunity to provide comments on this measure.



STATE OF HAWAII
DEPARTMENT OF HEALTH
KA 'OIHANA OLAKINO
P.O. Box 3378
Honolulu, HI 96801-3378
doh.testimony@doh.hawaii.gov

WRITTEN TESTIMONY ONLY

**Testimony COMMENTING on H.B. 1448
RELATING TO ASTHMA**

REPRESENTATIVE JUSTIN H. WOODSON, CHAIR
HOUSE COMMITTEE ON EDUCATION

Hearing Date: February 2, 2023

Room Number: Conference Room 309
& Videoconference

1 **Fiscal Implications:** The Department of Health (DOH) defers to the Department of Education
2 (DOE) on potential fiscal implications of the proposed protocols for schools.

3 **Department Testimony:** The DOH offers comments on House Bill 1448 (H.B. 1448), which
4 authorizes the DOE to stock bronchodilators for emergency use during respiratory distress;
5 authorizes protocols for a school nurse or other authorized employees and agents to volunteer to
6 administer bronchodilators as needed for actual or perceived asthma episodes; and clarifies that
7 bronchodilators are permitted for student self-administration. The DOH concurs that schools are
8 where children spend most of their days, making them an important setting for asthma
9 management interventions.

10 According to 2020 data from the Hawaii Behavioral Risk Factor Surveillance System,
11 one in thirteen children in Hawaii currently have asthma.¹ Any child, whether or not they have a
12 known asthma diagnosis, could experience an asthma exacerbation at school and require urgent
13 medical attention.² Allowing schools to stock bronchodilators and train school employees in

¹ Hawaii State Department of Health, Hawaii Health Data Warehouse. Behavioral Risk Factor Surveillance System. (2020). <http://hhdw.org>. Accessed on February 1, 2023.

² Volerman A, Lowe AA, Pappalardo AA, Anderson CMC, Blake KV, Bryant-Stephens T, Carr T, Carter H, Cicutto L, Gerald JK, Miller T, Moore NS, Phan H, Sadreameli SC, Tanner A, Winders TA, Gerald LB. Ensuring Access to Albuterol in Schools: From Policy to Implementation. An Official ATS/AANMA/ALA/NASN Policy Statement. *Am J Respir Crit Care Med*. 2021 Sep 1;204(5):508-522. doi: 10.1164/rccm.202106-1550ST. PMID: 34499024; PMCID: PMC8491259.

1 proper administration is the recommended policy to improve access to quick-relief life-saving
2 medication for any child.²

3 H.B. 1448 aligns with the Hawaii Asthma Plan 2030 objectives to expand asthma self-
4 management education in schools.³

5 Thank you for the opportunity to testify.

6 **Offered Amendments:** None

³ State of Hawaii Department of Health. (2022). *Hawai'i Asthma Plan 2030*. Asthma – Chronic Disease Prevention & Health Promotion Division | Hawai'i Asthma Plan 2030. https://hsp.hawaii.gov/assets/pdf/HHSP_Asthma_Plan_WEB.pdf. Accessed on January 31, 2023.



‘ŌNAEHANA KULANUI O HAWAII

Legislative Testimony

Hō'ike Mana'o I Mua O Ka 'Aha'ōlelo

Testimony Presented Before the
House Committee on Education
Thursday, February 2, 2023 at 2:00 p.m.

by

Clementina D. Ceria-Ulep, PhD, RN
Interim Dean and Professor

Nancy Atmospera-Walch School of Nursing
(formerly the School of Nursing and Dental Hygiene)

and

Michael Bruno, PhD
Provost

University of Hawai'i at Mānoa

HB 1448 – RELATING TO ASTHMA

Chair Woodson, Vice Chair Marten, and Members of the Committee:

Thank you for hearing HB 1448 Relating to Asthma, which will authorize the Department of Education to stock bronchodilators for emergency use during respiratory distress and authorize department employees and agents to administer bronchodilators. The Nancy Atmospera-Walch School of Nursing (NAWSON) submits testimony with comments.

The legislature, in their great wisdom, established the Hawai'i Keiki: Healthy and Ready to Learn program within the Department of Education (DOE). This program, which is a partnership between the DOE and NAWSON at the University of Hawai'i at Mānoa now has a physical presence on over 170 schools and supports all schools within the department. This program includes school nurses at the Advanced Practice Registered Nurse or Registered Nurse level in 51 schools, and 171 school health technicians who have clinical education and can support telehealth services and extend the nursing reach.

The Advanced Practice Registered Nurse can assess and diagnose health conditions and prescribe medications. Nurses have education and training in administering medications, including inhaled bronchodilators. School health technicians may be educated in medication administration as well.

NAWSON defers to the Department of Education on this measure and further respectfully offers that should the measure be passed by this committee, that the committee consider an amendment to ensure consistency in who is included as prescribers, as currently established in this statute.

Thank you for the opportunity to testify on this measure, and for your ongoing and fervent support to school aged children and healthcare access in this state.
Suggested amendment appears in bold, below.

Page 12, line 5:

(i) Any person, school district, or school and its employees and agents, including the prescribing physician, **physician assistant, or advanced practice registered nurse**, and pharmacy filling the prescription,

COMMITTEE ON EDUCATION

Rep. Justin H. Woodson, Chair

Rep. Lisa Marten, Vice Chair

Thursday, February 2, 2023, 2:00PM – Conference Room 309

Testimony in Support of House Bill 1448 Relating to Asthma

The American Lung Association is the leading organization working to save lives by improving lung health and preventing lung disease, through research, education, and advocacy. The work of the American Lung Association in Hawaii and across the nation is focused on four strategic imperatives: to defeat lung cancer; to improve the air we breathe; to reduce the burden of lung disease on individuals and their families; and to eliminate tobacco use and tobacco-related diseases.

The American Lung Association strongly supports House Bill 1448, relating to asthma. The bill would authorize the department of education to stock bronchodilators for emergency use during respiratory distress and authorize department employees to volunteer to administer bronchodilators.

Asthma is a serious public health concern in Hawai'i. In 2018, 10.2% of Hawai'i children were estimated to have asthma compared to 7.5% of children in the U.S. as a whole.¹ In Hawai'i, disparities in asthma prevalence are seen in race/ethnicity and region, with Native Hawaiians being disproportionately affected by asthma and experiencing the greatest burden. Native Hawaiians have the highest asthma prevalence at 28.3% compared to Caucasians (17.1%), Chinese (16.4%), Filipino (20.5%), Japanese (17.7%), or other races/ethnicities (19.8%).² Areas with high asthma prevalence include Hawai'i and Maui counties and the Nānākuli/Wai'anae sub-county areas on O'ahu. Asthma disparities can be further exacerbated by geographic isolation, lack of transportation to and from doctor's appointments, lower socioeconomic status, and limited access to healthcare specialists and subspecialists.

Absenteeism due to poorly controlled asthma may negatively affect educational outcomes and limit students with asthma's ability to fully participate in school activities, and when children miss school, a parent or guardian often misses work to care for them. Addressing asthma effectively requires a coordinated effort among school staff, home/family members, and the primary care physician in order to improve health outcomes for children with asthma.

Because asthma attacks can occur anytime and often without warning, children with asthma should always have access to medication that can quickly reverse the blockages in their lungs. This life-saving medication, called a short-acting bronchodilator, is easy to administer, inexpensive, and very safe.

While there is a system in place to help children who have diagnosed asthma by allowing children to bring their own asthma inhalers and either keep them at school or carry with them, unfortunately we cannot expect that all children with asthma will have their inhalers on them. When children do not have asthma medication, which can occur for a variety of reasons such as forgetting it or not being able to afford it, schools have few options. A parent may not be immediately accessible or close enough to respond promptly. Even if they can, there is a delay during which the asthma attack often gets worse. In such cases, the school must call 911. Doing so is likely to lead to an ambulance transport costing \$500 or more and an emergency department visit costing thousands more. Such events also take children out of the classroom for days at a time and further impede their learning.

¹ CDC, Risk Youth Behavioral Survey, Hawaii, 2019

² 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

Currently, Keiki Nurses are able to carry stock albuterol and administer to children. However, there are not enough keiki nurses to be available in every school. Even if they were in every school, it's impossible for them to keep watch on every sports practice, marching band practice, or PE class where children may more likely experience respiratory distress. Because of the safety of the medication used and the life-threatening implications of an asthma attack, we believe it is imperative that we train other staff to assess, access and administer the required medication that would potentially save a student's life.

HB 1448 also provides important liability protection for the prescriber, the school and the person who administers the medication in good faith. As mentioned before the medication used for treatment of asthma attacks is safe and effective. In addition, as part of a research project in the Sunnyside Unified School District in Tucson, Arizona that evaluated a stock asthma inhaler project there, researchers found that school nurses were afraid that giving the medication could potentially expose them to liability, so it is imperative that the liability protections as outlined in the bill remain.

HB 1448 represents a simple and low-cost solution to a problem that could save both lives and money. In total, [15 states](#) have passed legislation or have administrative guidelines in place allowing schools to stock asthma medications.

However, there are key provisions that should be included in this legislation to ensure it will be as effective as possible. These include:

- Making sure the legislation applies to all public and nonpublic schools.
- Applying the legislation to both students who have been diagnosed with asthma and students suffering from respiratory distress that may not have been diagnosed yet.
- Ensuring that school staff other than school health officials are required to be properly trained in the proper use and administration of the stock asthma medication.
- Making certain that all school staff, officials or health care providers involved in administration or prescribing of stock asthma medication receive liability protection except in cases of willful or gross negligence.

The Lung Association thanks the Hawai'i Legislature for their continued commitment to the health and wellbeing of the residents of our state and the desire to protect Hawai'i's students. The Lung Association strongly supports HB 1448 as drafted and encourages swift action to move the bill out of committee.

For further reading on this issue, attached are two articles which appeared in peer reviewed journals speaking to the efficacy and importance of stock albuterol in schools.

With gratitude,



Pedro Haro
Executive Director
American Lung Association in Hawai'i
pedro.haro@lung.org

AMERICAN THORACIC SOCIETY DOCUMENTS

Ensuring Access to Albuterol in Schools: From Policy to Implementation

An Official ATS/AANMA/ALA/NASN Policy Statement

Anna Volerman, Ashley A. Lowe, Andrea A. Pappalardo, Charmayne M. C. Anderson, Kathryn V. Blake, Tyra Bryant-Stephens, Thomas Carr, Heather Carter, Lisa Cicutto, Joe K. Gerald, Tina Miller, Nuala S. Moore, Hanna Phan, S. Christy Sadreameli, Andrea Tanner, Tonya A. Winders, and Lynn B. Gerald; on behalf of the American Thoracic Society Assembly on Behavioral Science and Health Services Research

THIS OFFICIAL POLICY STATEMENT WAS APPROVED BY THE AMERICAN THORACIC SOCIETY AND ALLERGY AND ASTHMA NETWORK MAY 2021 AND BY THE AMERICAN LUNG ASSOCIATION AND NATIONAL ASSOCIATION OF SCHOOL NURSES JUNE 2021

Abstract

Rationale: For children with asthma, access to quick-relief medications is critical to minimizing morbidity and mortality. An innovative and practical approach to ensure access at school is to maintain a supply of stock albuterol that can be used by any student who experiences respiratory distress. To make this possible, state laws allowing for stock albuterol are needed to improve medication access.

Objectives: To provide policy recommendations and outline steps for passing and implementing stock albuterol laws.

Methods: We assembled a diverse stakeholder group and reviewed guidelines, literature, statutes, regulations, and implementation documents related to school-based medication access. Stakeholders were divided into two groups—legislation and implementation—on the basis of expertise. Each group met virtually to review documents and draft recommendations. Recommendations were compiled and revised in iterative remote meetings with all stakeholders.

Main Results: We offer several recommendations for crafting state legislation and facilitating program implementation. 1) Create a coalition of stakeholders to champion legislation and implement stock albuterol programs. The coalition should include school administrators, school nurses and health personnel, parents, or caregivers of children with asthma, pediatric primary care and subspecialty providers (e.g., pulmonologists/allergists), pharmacists, health department staff, and local/regional/national advocacy organizations. 2) Legislative components critical for

effective implementation of stock albuterol programs include specifying that medication can be administered in good faith to any child in respiratory distress, establishing training requirements for school staff, providing immunity from civil liability for staff and prescribers, ensuring pharmacy laws allow prescriptions to be dispensed to schools, and suggesting inhalers with valved holding chambers/spacers for administration. 3) Select an experienced and committed legislator to sponsor legislation and guide revisions as needed during passage and implementation. This person should be from the majority party and serve on the legislature's health or education committee. 4) Develop plans to disseminate legislation and regulations/policies to affected groups, including school administrators, school nurses, pharmacists, emergency responders, and primary/subspecialty clinicians. Periodically evaluate implementation effectiveness and need for adjustments.

Conclusions: Stock albuterol in schools is a safe, practical, and potentially life-saving option for children with asthma, whether asthma is diagnosed or undiagnosed, who lack access to their personal quick-relief medication. Legislation is imperative for aiding in the adoption and implementation of school stock albuterol policies, and key policy inclusions can lay the groundwork for success. Future work should focus on passing legislation in all states, implementing policy in schools, and evaluating the impact of such programs on academic and health outcomes.

Keywords: asthma; children; health policy; inhaler; medication

Endorsed by the Pediatric Pharmacy Association June 2021.

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ORCID IDs: 0000-0002-7406-1098 (A.V.), 0000-0001-6252-0368 (A.A.L.), 0000-0002-4901-3465 (A.A.P.), 0000-0002-7279-0051 (L.B.G.).

Correspondence and requests for reprints should be addressed to Anna Volerman, M.D., Departments of Medicine and Pediatrics, University of Chicago, 5841 South Maryland Ave, MC 2007, Chicago, IL 60637. E-mail: avolerman@uchicago.edu.

This document has an online supplement, which is accessible from this issue's table of contents at www.atsjournals.org.

Am J Respir Crit Care Med Vol 204, Iss 5, pp 508–522, Sep 1, 2021

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DOI: 10.1164/rccm.202106-1550ST

Internet address: www.atsjournals.org

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Introduction

Asthma affects approximately 10% of school-aged children in the United States, with higher prevalence and morbidity being demonstrated among low-income and minority populations (1–4). Sixty percent of children experience an asthma exacerbation, leading to approximately 767,000 emergency department visits and 74,000 hospitalizations annually (1, 5). Compared with their peers, children with asthma miss more school days per year (6, 7), totaling 13.8 million absences annually (8).

School-aged children spend a majority of their day in school; therefore, evidence-based asthma care practices are important for guiding school asthma management (9–13). Guidelines recommend that all children with asthma have access to quick-relief medications. All 50 states and the District of Columbia permit children with asthma to self-carry and self-administer personal inhalers (14). However, access to emergency albuterol remains low, with studies suggesting that as few as 14% of children have quick-relief medication at school (15–17). Common barriers include difficulty accessing health care (18), challenges with obtaining asthma action plans and inhalers/valved holding chambers (VHCs) (15, 19–23), and the potential for lost or expired inhalers.

Because children with asthma may experience a sudden, unexpected, and life-threatening exacerbation at any time, access to albuterol can be life-saving. Although they are rare, there were a total of 192 asthma-related deaths among children in 2018 (1), and 38 asthma-related deaths occurred at school between 1990 and 2003 (24). Delays in albuterol administration were reported in one-third of these deaths, and a third of the delays were attributed to a lack of medication. Asthma-related deaths have also occurred among athletes on school sports teams, and up

to 10% of high school athletes have undiagnosed asthma (25).

An innovative and practical mechanism exists to ensure that students with asthma have access to potentially life-saving quick-relief medication while at school. Schools, with the assistance of a medical consultant and appropriate training for staff (26), can make albuterol available to all students with, for example, a single albuterol inhaler that is used with a different VHC/spacer for each child. Although 88% of schools are willing to store students’ personal inhalers (27), few schools stock quick-relief medicine. A stock albuterol program ensures that a school has albuterol that can be used by any child experiencing respiratory distress. Expanding schools’ capacity to acquire and maintain stock albuterol may help maintain the safety of students with asthma when personal quick-relief medicines are unavailable, expired, or empty. Furthermore, when children lack a documented asthma diagnosis in school, access to quick-relief medicine may provide ready access to treatment for a student who has an established diagnosis but no documentation at school or a student with a first-time asthma episode.

Over the past decade, stock albuterol policies have increased across the United States, with at least 15 states passing such legislation and a few states with experience implementing such policies. One state reports that 84% of respiratory events treated with a stock inhaler resulted in the child returning to class (28, 29). Because these policies are relatively new, further data are not available on the impact of stock albuterol. Notably, the evidence shows that quick-relief medications are effective for respiratory distress and safe for children, thus demonstrating that access at school is important for improving outcomes. In light of students’ limited access to albuterol and the positive outcomes with stock albuterol, the goal of this statement is to

advocate for stock albuterol legislation in all states and for wide-scale implementation to improve access to emergency asthma medications in schools.

Methods

We assembled a diverse group of stakeholders, including clinicians, pharmacists, researchers, policy experts, school nurses, and parents. Stakeholders included representatives from major organizations, including the American Thoracic Society, Allergy and Asthma Network, American Lung Association, and National Association of School Nurses. Conflicts of interest were collected from each stakeholder and vetted at the start of the project. Updates were requested throughout the project. No stakeholders had conflicts that required management during meetings and discussions. We applied our collective experience and expertise to develop this policy statement on stock albuterol legislation and implementation.

We first identified and reviewed guidelines, literature, statutes, and implementation documents related to school-based medication access. A literature search was conducted in the PubMed and Education Resources Information Center databases to identify existing literature about stock albuterol. Specific search terms included “albuterol,” “medicine,” “inhaler,” “nebulizer,” “stock,” “school,” “class,” “child,” and “student.” We examined relevant abstracts and conference programs to supplement this search. Our search focused specifically on the United States, given the differences among countries in terms of pharmaceutical and school-related regulation and legislation as well as the processes for passing and implementing policy. Because research in this area is limited, most information came from state statutes and

implementation guides. Consideration was given to specific components of current policies, including the school type, medication indications, standing medical authority, training requirements, good faith use, and medical devices.

Stakeholders were divided into two groups—legislation and implementation—on the basis of expertise. Each group met two to three times virtually to review documents and draft recommendations. These recommendations were compiled and revised in iterative remote meetings with all stakeholders. On the basis of multiple data sources and expert opinions, we developed policy recommendations and outlined steps for passing and implementing stock albuterol laws.

Steps to Pass Stock Albuterol Legislation

Medical licensing, pharmaceutical drugs, and education are largely regulated at the state level; thus, legislation for programs like stock albuterol must occur within individual states. It is crucial to understand legislative processes and necessary steps to pass stock albuterol legislation within a state (Figure 1) (30, 31). The overall process is similar across states, and we review the basic steps below.

Build Stakeholder Coalition

The first step in passing stock albuterol legislation is to form a coalition of stakeholders (Table 1). Key stakeholders include healthcare professionals, school nurses, parents/guardians of children with asthma, pharmacy organizations, managed care organizations, advocacy groups, and legal groups, as well as health and education departments. Several key questions and pitfalls should be considered when building a stakeholder coalition (Table 2).

Create Issue Brief and Factsheets

Next, an issue brief and factsheets should be developed and disseminated to summarize key asthma facts and policy considerations to help advocates garner support. These documents provide a framework and consistent message for discussions with legislators and testimony.

An issue brief is a two- to four-page summary of an identified problem with recommendations for solutions (*see online supplement*) (32). In the case of stock albuterol, this brief provides a concise summary of asthma prevalence, morbidity,

and mortality; highlights state asthma-related policy; and describes similar legislation in other states. The brief also emphasizes how existing asthma state policies have affected change. If seeking an amendment to existing legislation (e.g., stock epinephrine for anaphylaxis), it is helpful to include any positive outcomes from that legislation.

A factsheet is a one-page document with a bulleted summary of facts relevant to the issue. This document provides a set of talking points for testimony and discussion; it can also be shared with legislators. Several organizations (e.g., the American Public Health Association) provide examples of pertinent factsheets for health-related policy issues, and states with existing stock albuterol policies have created topic relevant factsheets (*see online supplement*) (33).

Find a Legislative Sponsor

Concurrently, a legislator must be identified to sponsor the legislation. The sponsor's background, experience, committee assignments, and political party can be critical to success. An ideal sponsor would have experience with education or public health issues (e.g., asthma, health disparities, health policy, school health), have sufficient time to devote to the issue, be a member of the majority party in the legislature (or House if control is split), and ideally be a member of a committee in which the bill could be introduced (e.g., the Health, Education, or Appropriations Committees). Lobbyists or coalition partners who advocate in the legislature have relationships with legislators and their staff and are important to include.

The first step is to connect with key staff of the legislator or committee through direct outreach via phone/e-mail or working through existing relationships of partners. Once a legislator agrees to sponsor stock albuterol legislation, it is critical to remain engaged to advance the process. Although staffing structures differ in every state's legislature, staff must be treated with the same level of respect as the sponsor, given that staff remain in that role longer than some lawmakers are in office and are key to moving legislation forward. Regularly scheduled meetings and/or calls can be helpful, and frequency may depend on the legislative session length. Meetings may be held during an interim period between legislative sessions (often summer and/or fall) when preparatory writing occurs for the next session. The sponsor and staff can help advocates understand preliminary processes, which may include study sessions (to consider

long-term issues), informational hearings (to introduce potential legislative topics), or sunrise processes (to outline the costs and benefits of proposed legislation) (34).

Address Opposition

To secure bill passage, it is essential to understand the arguments opposing part or all of the bill and effectively respond. Because opposition may emerge at various times, the understanding of opposition arguments and the development of responses need to be undertaken iteratively, starting as early as sponsor identification, as they may impact sponsorship decisions. The sponsor will need this information to effectively advocate for the bill. Policy staff on health and education committees in both legislative chambers (the House and Senate), advocacy organizations with legislative experience, and provider organizations can provide context about opposition and ways to overcome issues. Federal legislation can also support efforts to pass state legislation (*see online supplement*), and national stakeholders (e.g., healthcare and education associations) can influence state policy-makers. For stock albuterol, opposition may be raised regarding prescriptions for stock albuterol, persons who can receive stock albuterol (e.g., students vs. nonstudents, asthma diagnosis vs. no diagnosis), training personnel to deliver stock albuterol, and the safety of albuterol.

Draft Legislation

Before the legislative session, stakeholder meetings should occur to discuss key components to include in the legislation. Stakeholder organizations may assist with drafting or choose to use existing model policies (*see online supplement*) (32, 33). All 50 states have school stock epinephrine laws to treat anaphylaxis, and one strategy is to amend those laws to include stock albuterol. It is important to review how stock epinephrine laws have functioned and how stock albuterol may mirror or differ from epinephrine.

Key implementation principles should be considered early and incorporated into legislation to avoid future pitfalls. For example, consider the implementation burden on school nurses, such as staff training requirements for recognizing symptoms and administering medicine. School nurses champion the health and safety of students, and it is part of their duties to instruct in care for emergencies. Depending on state nurse practice acts, nursing delegation may be key, thus making direct training by the school nurse essential. Although we advocate for full-

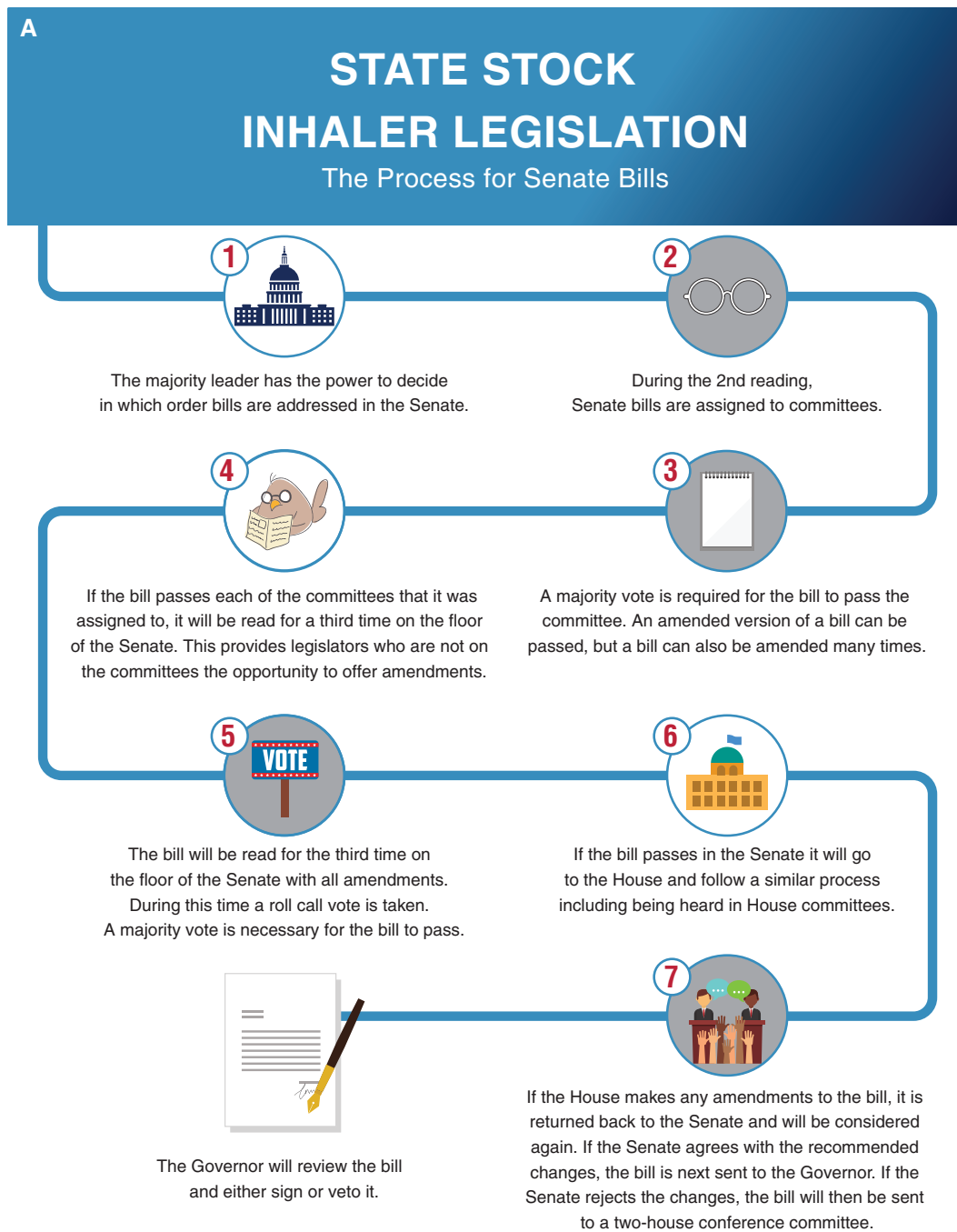


Figure 1. Stock albuterol legislative steps. (A) The process for Senate bills. (B) The process for House bills. The process of passing a bill may differ across states and within the legislative chambers of a particular state (House and Senate). It is important to understand the process within your own state.

time nurses in every school, it is important to recognize that many schools do not have nurses or that nurses have limited time in the school building. Thus, legislation can incorporate online platforms or alternative mechanisms for training by school nurses, asthma educators, or other trained

individuals; alternatively, this language can be included in committee reports or regulations developed after bill passage.

On the basis of states' experiences to date, we created a list of essential and recommended components for stock albuterol legislation (Table 3). For example, schools should be

allowed to use albuterol in respiratory emergencies, even when a child lacks a documented asthma diagnosis. Albuterol is a safe drug to administer to any child in respiratory distress (35–38). To obtain stock medication for schools/districts, pharmacy dispensing law(s) should also be addressed.

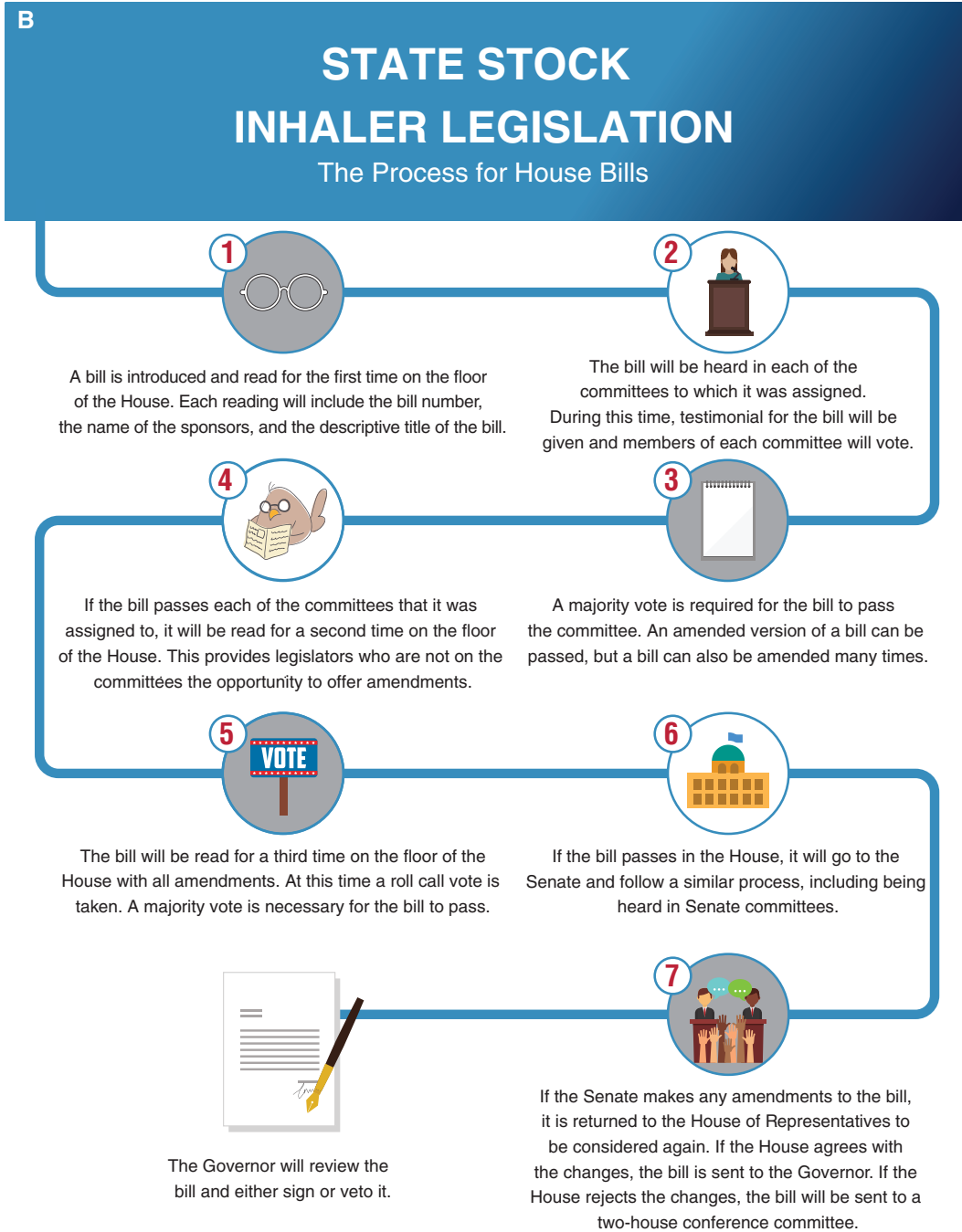


Figure 1. (Continued).

Legislation drafts should be shared with stakeholders to negotiate compromises to any key concerns. It also may be important to reach out to the state governor’s office while drafting legislation, as this office may provide feedback to incorporate into the bill. Engaging these groups early to discuss concerns helps move the bill smoothly toward passage and minimize the potential of a delay or veto.

Before bill introduction, costs incurred by the state must be estimated through a fiscal note produced by the legislature. Most state legislation has allowed, but not required, schools to stock albuterol. The reason is that funding for such policies is difficult to obtain, and as such, legislation is less likely to be passed if funding is required. Many stakeholders are not supportive of unfunded school mandates

because it puts undue burden on already underfunded schools.

Introduce Legislation

Each state has different processes for introducing and passing legislation. The state legislature’s website provides legislative session details, including the state’s processes and timelines for introducing legislation. Formal

Table 1. Key Stakeholders and Their Role in Stock Albuterol Legislation and Implementation

| Stakeholder Group | Examples | Expertise/Role in Legislation | Expertise/Role in Implementation |
|--|---|--|---|
| Nonprofit health organizations | <ul style="list-style-type: none"> • Allergy and Asthma Foundation of America • Allergy and Asthma Network • American Academy of Pediatrics • American Lung Association • American Thoracic Society • National Association of School Nurses • Asthma coalitions • National professional medical, nursing, and pharmacy organizations • State medical societies | <ul style="list-style-type: none"> • Experience with legislative process • State-specific knowledge • Relationships with specific legislators and stakeholders | <ul style="list-style-type: none"> • Experience with implementation • Knowledge about legislation passed and relevant issues • Develop and deliver training • Provide medical expertise, specifically on asthma |
| School nursing | <ul style="list-style-type: none"> • National Association of School Nurses • National, state, and local organization representatives • State school nurse consultants • School nursing leaders from districts | <ul style="list-style-type: none"> • Understand how nurses are hired and function in schools • Provide expert testimony • Provide asthma and respiratory disease expertise | <ul style="list-style-type: none"> • Provide medical expertise, specifically on asthma • Share knowledge about legislation and relevant issues • Disseminate policy to school administrators/staff and children/families • Develop and deliver training • Implement in schools |
| Healthcare professionals | <ul style="list-style-type: none"> • Primary care pediatricians • Asthma subspecialists (e.g., pulmonologists, allergists) • Certified asthma educators • Academic researchers | <ul style="list-style-type: none"> • Provide information on asthma and treating respiratory distress • Provide information on safety of albuterol • Discuss training of lay personnel | <ul style="list-style-type: none"> • Write standing orders and prescriptions • Discuss policy with patients and families |
| Health and education departments | <ul style="list-style-type: none"> • State and/or county health department • State superintendent • Board of Education • School/district administration | <ul style="list-style-type: none"> • Ensure implementation considered in legislative process | <ul style="list-style-type: none"> • Disseminate policy broadly • Help support funding of program • Develop and deliver training |
| School staff and administrators | <ul style="list-style-type: none"> • Principals/administrators • Teachers • Coaches, security guards, and office clerks • Unions for teachers and staff | <ul style="list-style-type: none"> • Share insights about asthma care in school | <ul style="list-style-type: none"> • Understand and champion policy • Participate in training |
| Healthcare organizations | <ul style="list-style-type: none"> • Managed care organizations • State Medicaid Agency • Private insurance companies • Hospitals and emergency departments | <ul style="list-style-type: none"> • Early awareness of legislation can facilitate implementation | <ul style="list-style-type: none"> • Provide avenue for potential funding |
| Pharmacy | <ul style="list-style-type: none"> • State Board of Pharmacy • Pediatric Pharmacy Association and other state and national pharmacy organizations • Durable medical supply vendors | <ul style="list-style-type: none"> • State Board of Pharmacy should be part of legislation related to dispensing of medication to schools • National and state pharmacy organizations can support stock albuterol programs | <ul style="list-style-type: none"> • Provide medications and devices to schools • Communicate about drug recalls • Help communicate with pharmaceutical companies |
| Legal expertise | <ul style="list-style-type: none"> • Legislative counsel • Trial Lawyers Association | <ul style="list-style-type: none"> • Consultation on appropriate legal language for drafting policy • Children health policy expertise | <ul style="list-style-type: none"> • Support safe adoption of policy within school |
| Children with asthma and parents/guardians | <ul style="list-style-type: none"> • Elementary, middle, and high school students • Parents/guardians/caregivers | <ul style="list-style-type: none"> • Provide personal stories and perspectives | <ul style="list-style-type: none"> • Raise awareness and champion policy • Share stories of impact |

Listing does not indicate endorsement of document unless noted otherwise in statement.

introduction typically occurs when the legislative session starts, although some states start work on bills earlier and have deadlines after which legislation can no longer be introduced.

Legislation can be introduced in one or both houses of the legislature. The strategy around advancing legislation, including whether to introduce in one or both houses, is typically decided by the coalition supporting the legislation and the legislative sponsor. States have 1- or 2-year sessions. Typically, if a bill is not acted on in a state within the first year of a 2-year session, it will carry over to the session's second year. Details of how a bill moves through the House and/or Senate are depicted in Figure 1.

Testify

It is important to identify key people to testify in support of the legislation and understand how testimony occurs. The speaker must register in advance so that they are called on during the bill's hearing. The statement should begin with the proper address and thank you to the bill sponsor. For example, an opening could be "Chair and senators, thank you for allowing me to testify on an issue that is of extreme importance for the safety of our school children." Testimony is usually limited to 1–2 minutes, prompting most individuals to prepare a script. Testimony should end with an "ask," such as, "Therefore, I would urge you to vote "yes" to Bill [number] allowing schools to stock albuterol medication for respiratory emergencies." After each testimony, legislators can ask questions.

Different stakeholders bring important expertise and experience for testimony (*see* online supplement). Clinicians can speak about asthma prevalence, symptom frequency, and safe treatment of respiratory episodes with albuterol. Common questions include "What happens if albuterol is given to children who do not have asthma?" and "What are side effects of albuterol?" We suggest that the testimony include several points: it should be noted that if the school calls 911, it is likely the child will receive albuterol from emergency responders; it should be noted that it is better for a child to be given albuterol as a potentially life-saving medication than for treatment to be withheld, which would increase the risk of poor outcomes; and it is also important to discuss the safety profile of albuterol across a range of doses (34). In addition, school nurses can discuss how difficult it is to obtain a child's asthma medications for school, care for children with respiratory distress in a nonhealthcare setting,

and reach parent/guardians. They can discuss how availability of stock albuterol would allow treatment to begin while awaiting emergency assistance (39). Most school nurses have experienced caring for students during a respiratory emergency, and without albuterol, the only option is to call parents/guardians and/or 911. This treatment delay can be difficult when albuterol may allow a child to return to class or may lessen the severity of symptoms. Finally, a school-aged child with asthma or their parent/guardian can share a story of a respiratory episode without available albuterol.

Passage of Legislation

Proposed legislation is discussed and voted on in committee and then on the floor in each chamber. Revisions to the legislation may occur at each step. The timeline for voting in each chamber depends on the legislators who control the floor schedule. Once both chambers pass the legislation, it is acted on by the state governor, and this action includes signing it or vetoing it. If signed by the governor, the legislation is enacted as a law. If the legislation is vetoed, the state legislature can override the veto, usually with a supermajority vote (e.g., two-thirds of legislators).

Components for Implementation of Stock Albuterol

Once legislation is passed, regulations are developed by designated state agencies (e.g., the board of education, health department). Then, efforts must be directed to implementation. Schools should be prepared to complete several steps for successful implementation (Figure 2) (40). Although processes may differ across schools/districts, it is critical to engage stakeholders in key components to successfully implement stock albuterol (Table 1). Importantly, it should be recognized that stock albuterol is one piece of asthma care within the school, which should include education for affected students, training for staff, access to medications, and more.

Policy Dissemination and Education

Stock albuterol policy must be broadly disseminated. State-level professional organizations and advocacy groups are useful dissemination avenues for healthcare professionals (e.g., prescribers, nurses, pharmacists). Local and state-level health

departments, education agencies, or policy e-mail listservs can serve as additional channels to disseminate policy and provide sample wording for school/district-level policies. School/district-level administrators and medical directors/nurses should notify school personnel about the policy.

Families and students are essential to effectively implementing stock albuterol policy. Annual notification about the policy should be sent home to families. To minimize barriers to life-saving medication, the policy should not require parents/guardians to sign waivers allowing albuterol administration in an emergency. Ideally, the policy should specify that school staff can assume parent/guardian consent in the case of emergency medications. Communication should be provided about by whom, when, and how medication will be administered, maintained, and stored and also about how staff will be trained. Parents/guardians must know stock albuterol does not replace the need for children to have their own quick-relief medications. A parent/guardian champion may be helpful for garnering support within the school community.

Training of School Personnel

To effectively implement the policy, annual training is critical to ensuring requisite knowledge and skills of school personnel who are designated to administer stock albuterol for respiratory symptoms or a respiratory emergency. At each school, a minimum of two individuals should be trained per building, with consideration given to additional individuals on the basis of asthma prevalence and other school indicators (e.g., population, social needs) (41). It is preferable to train as many as feasible to ensure that at least one trained individual is present in school daily. Both licensed and unlicensed school personnel, including unlicensed assistive personnel, may be designated to administer stock albuterol. Training should be geared to both groups, regardless of experience, in alignment with state legislation.

Training content about stock albuterol for school staff should include 1) signs and symptoms of respiratory distress; 2) an overview of asthma medications that includes inhaler administration, technique, maintenance, and cleaning; and 3) a protocol to manage respiratory episodes. Opportunities to teach back are particularly important to ensuring proper technique. Training should be delivered by individuals with requisite knowledge and expertise in asthma and stock

Table 2. Key Questions and Pitfalls in Building a Coalition of Stakeholders

| Building Coalition | Key Questions and Inclusions | Pitfalls to Avoid |
|---|--|--|
| Be clear about goals of engaging diverse stakeholders. | <ul style="list-style-type: none"> • How does engaging diverse stakeholders fit into your goals? • What do you hope to achieve in short-term for legislation and long-term for implementation? | <ul style="list-style-type: none"> • Trying to engage people without clarity about goals • Tokenistic approach in which focus is “getting people to the table” without commitment to authentic partnership and learning |
| Invest in building relationships and trust. | <ul style="list-style-type: none"> • What types of relationships exist among different stakeholders? • What are ways to strengthen relationships and build trust? • The goal is to engage diverse stakeholders early on to help future implementation efforts with due understanding of distinct perspectives and roles of each participant or group represented. | <ul style="list-style-type: none"> • Narrow focus on “getting people to the table,” rather than partnership building • Paternalistic approach that does not recognize strengths • Unwillingness to hear feedback that is not positive • Overlooking importance of relationship-building and focusing on tasks • Focusing prematurely on formal structure of relationships |
| Recognize and work with different agendas and interests. | <ul style="list-style-type: none"> • What are priorities of different stakeholders you wish to engage? • What are common interests? • Can involvement in coalition add value for each stakeholder’s work or help them achieve goals? • Do agendas of dominant groups within coalition get in way? | <ul style="list-style-type: none"> • Assuming that coalition issues should be a priority for everyone or that people who do not engage are apathetic • Allowing agendas of one group or few groups to dominate coalition |
| Explore different strategies for engaging communities. | <ul style="list-style-type: none"> • What are best strategies and structures to reach goals for engaging different stakeholders? • Are there other strategies that might meet your needs? • How can momentum be maintained once legislation is passed but before implementation? | <ul style="list-style-type: none"> • Structuring coalition in a way that makes it difficult for groups with fewer resources to participate • Restricting engagement strategies to coalition building |
| Build inclusive coalition culture. | <ul style="list-style-type: none"> • Are there barriers to participation built into coalition’s structure or how it conducts business? • What type of coalition culture would be most welcoming and inclusive to diverse groups? | <ul style="list-style-type: none"> • Making assumptions about how to be inclusive without talking to people you want to engage • Attachment to “right” way to do things, leaving no room for exploration |
| Acknowledge and address differences in power and resources. | <ul style="list-style-type: none"> • How do differences in power and resources impact coalition and partnerships between groups? • What are ways to navigate differences and share power? • How can different groups in coalition share resources and strengths in a way that will benefit everyone? • Are there ways to invest resources to build infrastructure and support participation of groups that have fewer resources? It is key to build infrastructure in the legislative process so that future implementation is successful. | <ul style="list-style-type: none"> • Ignoring differences in power and resources, and operating as if they do not exist • Undervaluing the strengths of groups that have fewer resources • Bringing people to the table without sharing power • Allowing any group or clique to dominate the coalition |

albuterol policy. School nurses are key professionals who can provide and/or facilitate training on stock albuterol for school personnel. Partnerships with local organizations and/or coalitions (e.g., the

American Lung Association, Allergy and Asthma Network) are also encouraged. Content may be delivered synchronously or asynchronously with in-person or remote (e.g., web-based, video) methods. In-person

workshops are ideal for school personnel with limited prior health experience or who prefer hands-on learning, especially for reviewing inhaler techniques for which immediate feedback is beneficial. In contrast, a

Table 3. Essential and Suggested Components of Stock Albuterol Legislation

| Component | Explanation/Reasoning |
|--|--|
| <p>Essential components Medication can be administered in good faith to any child in respiratory distress.</p> | <p>The bill should permit emergency use of stock albuterol for any student in respiratory distress, not only students known to have an asthma diagnosis.</p> <p>Reasoning:</p> <ul style="list-style-type: none"> • Many students have undiagnosed asthma and may have their first asthma exacerbation at school. • Emergency administration of albuterol may be necessary and time sensitive; review of records to determine whether a student has asthma may delay care. • There are few causes of respiratory distress in children that would not respond to or would be harmed by administration of albuterol. • Albuterol is a safe medicine. |
| <p>Establish training requirements for school staff.</p> | <p>The bill should outline details about how many staff should be trained and about how training should be conducted to ensure that enough staff have the necessary knowledge and skills to administer stock albuterol.</p> <ul style="list-style-type: none"> • The recommendation is that a minimum of two individuals be trained per school building at a ratio of one individual for every 225 students. • Recommend permitting live or remote training that can be accessed by school staff at a convenient time at no cost. |
| <p>Ensure immunity from civil liability for staff and prescribers.</p> | <p>The bill should provide:</p> <ul style="list-style-type: none"> • Immunity for medical professionals who write the orders as well as pharmacists who dispense orders. • Immunity for school districts, school staff, or agents of the school who have the required training and administer the albuterol in good faith. |
| <p>Ensure that pharmacy laws allow medication dispensing to schools.</p> | <p>In parallel with preparing legislation, review the state’s current pharmacy dispensing laws and assess whether it is necessary to update pharmacy state board laws. Specifically, it is important that pharmacies are able to dispense medication to a school/district rather than to a specific individual.</p> |
| <p>Suggested components Allow schools to accept donations of money or product.</p> | <p>Donations can help with financing for the implementation of stock albuterol programs.</p> |
| <p>Use metered-dose inhalers with VHCs/spacers.</p> | <p>Metered-dose inhalers with VHCs/spacers for administration of quick-relief medication allows for the inhaler to be used for multiple individuals with less cleaning, easier storage/portability, and reduced aerosolization of particles.</p> |
| <p>Ensure authorization of parents or caregivers/school volunteers to administer albuterol.</p> | <p>Include parents or caregivers as well as school volunteers as authorized administrators of stock albuterol to ensure that they are indemnified from good faith use if they have appropriate training.</p> <ul style="list-style-type: none"> • There are many situations in which parents or caregivers as well as school volunteers act as agents of the school, such as during after-school activities, field trips, and sports. |
| <p>Ensure inclusion of nonpublic schools (e.g., private, tribal).</p> | <p>States often do not have significant oversight for activities in nonpublic (e.g., private, tribal) schools, as they are not state licensed.</p> <ul style="list-style-type: none"> • Stakeholders should explore state-specific strategies with legislators to include nonpublic schools in legislation. • Even if a school does not fall under state licensing requirements, prescribing providers and dispensing pharmacists need to legally be able to provide stock albuterol for nonpublic schools. |

Definition of abbreviation: VHC = valved holding chamber.

Stock Inhaler Program Quick Reference Guide for Schools



1 Pre-Implementation

1. Ensure your state has a current stock inhaler law
2. Review the key components of your state's law
 - a. Types of schools
 - b. Training requirements
 - c. Devices (e.g., spacers)
 - d. Prescriptive authority
 - e. Liability
 - f. Documentation, Reporting & Medication administration requirements
3. Conduct outreach to stakeholders
 - a. School administration
 - b. Parents
 - c. Teachers & school personnel
 - d. Pediatricians
 - e. Pharmacists
 - f. EMS providers
 - g. Hospitals & urgent care facilities

2 Implementation

1. Procure all necessary supplies for your school
 - a. Inhaler (albuterol sulfate)
 - b. Supply of spacers
 - c. Prescription for both stock inhaler & spacers
 - a. Signed standing medical order
 - b. Protocol for medication administration
 - c. Documentation forms
2. Complete training requirements
 - a. Training platform (online training, in-person training or either)
 - b. Who conducts training (non-licensed / licensed health care provider)
 - c. Frequency of training
 - d. Minimum number of individuals who shall be trained at each school (**1 trained person to 225 students (1:225) but ≥2 trained, school personnel**)
3. Notify parents of the stock inhaler program at the beginning of the academic year

“School Champion” 3

1. Identify a stock inhaler **“School Champion”** who can lead your school's stock inhaler program
 - a. District-level nurses or supervisors
 - b. School nurses or Health Assistants (HAs)
2. Roles of the School Champion include:
 - a. Organizes and distributes stock inhaler program supplies
 - b. Ensures staff are trained in accordance with state law
 - c. Monitors documentation requirements including retention & reporting requirements
 - a. Communicates program updates to school administration, parents (when applicable) & trained, school personnel

Capacity Building 4

1. Build strong partnerships with community stakeholders & governmental organizations who can help sustain your program
 - a. County & State Health Departments
 - b. Department of Health Services
 - c. Local & state organizations
 - d. American Lung Association
 - e. Asthma & Allergy Network
 - f. Local health care providers
 - g. Pediatricians / Primary Care Providers (PCPs)
 - h. Pediatric Pulmonologists
 - i. Local health care facilities
 - j. Rural hospitals
 - k. Local businesses
 - l. Philanthropic partners
 - m. Parent teacher associations (PTAs) / Parent teacher organizations (PTOs)

Sustainability 5

1. Identify sustainable program funding. Schools can have a stock inhaler for approximately **\$85 per school**
 - a. Community stakeholders & partners (listed above)
 - b. School health office budget
 - c. Grant funds
 - d. Foundation funds
2. Capture program data if possible

Stock Inhaler Programs: A Quick Reference Guide to Implementation for Schools, December 2020.

Figure 2. Stock albuterol program: quick reference guide for schools. Reprinted by permission from Reference 40.

Table 4. Essential Components to Implement Stock Albuterol in Schools

| Essential Component | Explanation/Reasoning |
|--|---|
| Dissemination and education about policy | <p>After legislation is passed, it is critical to broadly disseminate the policy to healthcare providers, school staff, and families. It is also important to provide annual education and communication about the legislation. Key individuals who should be involved in dissemination and education about the policy include:</p> <ul style="list-style-type: none"> ● Policy-makers ● Schools, school boards, and superintendents ● School nurses ● Local hospitals and urgent care facilities ● Primary care and subspecialty clinicians ● Emergency medical service personnel ● Pharmacists ● Local health departments (city, county, state) ● Nonprofit health organizations |
| Training | <p>At each school, a minimum of two individuals should be trained per building at a ratio of one trained individual for every 225 students. School nurses are key professionals who can provide and/or facilitate training of school personnel on stock albuterol. Training should include:</p> <ul style="list-style-type: none"> ● Basic asthma pathophysiology and common triggers ● How quick-relief medications work to treat respiratory distress ● Recognizing mild, moderate, and severe respiratory distress ● Demonstration of correct technique to administer treatment by using a metered-dose inhaler with a valved holding chamber ● Determining the course of action for managing respiratory distress events ● Maintenance of stock albuterol devices ● Postincident instructions, including timely documentation and parent/guardian/caregiver contact instructions |
| Orders and prescriptions | <p>Key supplies needed for stock albuterol program (with cost*) include:</p> <ul style="list-style-type: none"> ● Albuterol sulfate metered-dose inhaler (\$20–\$100 per inhaler) ● Supply of one-way valved holding chambers/spacers (plastic or cardboard, \$3–6 per unit) ● Alcohol wipes to clean canister body and nozzle ● Template documents (<\$20/yr) <p>A standing medical order and/or prescriptions are needed to obtain albuterol and valved holding chambers/spacers for each school.</p> |
| Supplies | <p>Program supplies require funding of <\$85 for a stock inhaler and needed materials for a school. Program expenses may vary on the basis of student enrollment, the school layout, and the community asthma prevalence. Schools with a large student body, sports programs, or extracurricular activities may opt to purchase additional stock albuterol inhalers to store in convenient locations (e.g., the gym, fields).</p> |
| Standardized protocol | <p>The protocol provides instructions regarding the use of stock albuterol in case of respiratory distress. It should include:</p> <ol style="list-style-type: none"> 1. Signs and symptoms of mild, moderate, and severe respiratory distress 2. The course of action based on the initial presentation of the individual 3. Specific indications for when to summon emergency medical services 4. The dose of albuterol to give (e.g., the number of inhaler puffs for initial use and subsequent use for same episode of respiratory distress) 5. Postincident instructions 6. The duration that an individual’s documentation log shall remain on file with the school |
| Documents | <p>Schools need the following forms for the implementation of stock albuterol:</p> <ul style="list-style-type: none"> ● Instruction sheet for stock albuterol implementation process ● Template letters for communication with parents/guardians/caregivers and school/district administrative personnel ● Directions about and a pictorial graphic of the effective technique for administering treatment using a metered-dose inhaler with a valved holding chamber/spacer ● Documentation forms (stock albuterol documentation log; see online supplement) (46) ● Copies of the State Board of Education regulation and stock albuterol law or statute |

*Cost is based on 2020 dollars.

Table 5. Data Elements for Documentation of Stock Albuterol Usage Event Reporting in Schools

| Description | Data Element |
|---|---|
| Date | Date the event occurred |
| Time | Time of the event occurred |
| Responding person | Fill-in-the-blank space for name and role |
| Student’s or individual’s name | First name Last name |
| Student’s or individual’s age or date of birth | Fill-in-the-blank space |
| Student’s or individual’s gender | Male Female Nonbinary |
| Student’s or individual’s race | American Indian or Alaska Native Asian Black or African American Native Hawaiian or Pacific Islander White Multiracial |
| Student’s or individual’s ethnicity | Hispanic or Latino Non-Hispanic or non-Latino |
| Previously known asthma diagnosis | Yes No Unknown |
| Reason for stock albuterol use (e.g., symptoms) | Fill-in-the-blank space |
| Number of inhaler actuations (e.g., puffs) | Checkboxes for number of puffs based on protocol; also provide option for off-protocol with blank for number puffs and reason |
| Student or individual’s disposition status | Returned to class Sent home Summoned EMS and not transported Summoned EMS and transported |
| Contact with parent/guardian | Open-ended |
| Comments (e.g., why stock albuterol inhaler was used) | Open-ended |

Definition of abbreviation: EMS = emergency medical services. Additional information can be recorded at the school level or individual level, including the national drug code and lot number of the albuterol medication.

standardized web or video-based curriculum provides flexibility, as many schools are unable to hold training that can be attended by all designated personnel. Because schools typically experience cyclic transitions of personnel throughout the academic year, flexible training options are necessary.

Program Supplies

Stocking albuterol in schools requires annual funding, primarily for supplies, for effective

implementation. Essential program supplies are reported in Table 4 (*see also* the online supplement). To enable each school/district to meet its unique needs, policy should specify flexible options to procure supplies and promote equity for all students in the state, regardless of resources within a school or district.

Ideally, schools can procure supplies by using the school health annual budget. Alternative mechanisms include product or monetary donations from interested

organizations (e.g., pharmaceutical companies, patient advocacy groups, hospitals), discounts or reimbursements from pharmaceutical companies, or fundraising through existing stakeholders, such as parent-teacher groups. Current programs cost less than \$85.00 (in 2020 dollars) for an albuterol inhaler and needed supplies for a school (29). Program expenses may be affected by the number of inhalers needed at the school. We recommend at least one quick-relief inhaler per school building, with additional inhalers being added on the basis of student enrollment, the school layout (e.g., the number of buildings, locations of playgrounds and fields), and asthma prevalence.

Albuterol may come from pharmacies, pharmaceutical companies, or manufacturers. School nurses or medical directors should keep records of where medication is obtained and contact information if product issues arise. They should also monitor national databases for drug recalls (42). If the school uses a pharmacy to obtain albuterol, it is beneficial to develop relationships with the pharmacy manager to ensure notification of a drug recall or shortage.

In the school, stock albuterol should be stored in a temperate, dry, and unlocked place that is easily accessible to trained individuals for medication administration. Medication expiration dates should be monitored. All medications should be disposed of on the basis of school procedures.

Metered-dose inhalers (MDIs) should be primed before administration and cleaned after each use, as per manufacturer instructions (e.g., before the first dose, if not used for 2 wk). The MDI should always be used in conjunction with a one-way VHC/spacer (\$3–\$6 per unit). Most VHCs/spacers are constructed of plastic, but they are also available in cardboard models. The plastic models are available in rigid and collapsible versions and tend to be more expensive. Cardboard VHCs/spacers are also collapsible and relatively less expensive. Plastic and cardboard VHCs are equally effective, not suitable for use by more than one child, and should be cleaned or stored as per the manufacturer instructions. Schools can stock a supply of VHCs/spacers and use one per child, while using a single MDI. Once a child uses a VHC/spacer (plastic or cardboard), it should be stored in its original packaging and labeled with the child’s name if reuse is needed later during the school year, as studies show

paperboard spacers can safely last the entire school year without microbial growth (43).

Standardized Protocol for Medication Administration

Every school should follow a standardized protocol for stock albuterol administration that is created and adopted at the school, district, or potentially state level and aligns with school, nursing, and other relevant regulations. The protocol should include specifics about who can receive medicine, what symptoms warrant albuterol, the number of doses to administer, how to assess the response, when to repeat administration, and what to do if medication is or is not effective.

Schools/districts in states that lack a standardized protocol should identify a medical consultant (or prescriber authority) to work with them to implement an existing or modified protocol that can be widely adopted. Medical consultants who sign the standing medical order should have the ability to modify existing protocols on the basis of their clinical practice and guideline-based care. For example, in Arizona, a protocol using a standardized number of inhaler actuations (instead of a dose range) stratified by the initial presentation of symptoms was widely adopted (29). Importantly, treatment for any child who requires stock albuterol should follow the standardized protocol and prescription instructions specified on the standing medical order, regardless of whether they have an asthma action plan on file at school. An asthma action plan provides school personnel with instructions on how to use a child's personal medicine, not stock albuterol.

Procedures for Event Documentation

All respiratory episodes requiring stock albuterol should be documented by trained school personnel (Table 5). Documentation should be retained on file with the school in accordance with school policy for student health information as well as state legislation and regulation for stock albuterol. For states that have adopted stock epinephrine in schools, these procedures can be adapted to document stock albuterol administration.

States with existing infrastructure can assist schools with maintaining documentation of quick-relief medication through centralized databases with

medication events for epinephrine, naloxone, and albuterol. However, many states do not have infrastructure capable of systematic data collection on medication administration in schools. In this scenario, schools should create a documentation system that reports events in both the child's individual health record and a centralized place (within the school or electronically) for all stock albuterol events that occurred during a single academic year. Procedures should be reviewed annually.

Together with documentation, parents/guardians should be notified each time their child uses stock albuterol to encourage follow-up with their primary care or subspecialty clinician and to obtain an inhaler to have at school. Frequent communication among the school, family, and medical home should occur, especially for children who use stock albuterol more than once in a school year. If a child does not have an asthma diagnosis, the family should be advised to follow up with a healthcare professional to be evaluated for asthma, and, if necessary, a referral should be made. Template communication resources are available (*see* online supplement).

Additional Considerations

Children and/or adults. Traditionally, emergency use protects both children and adults with emergency needs. For stock albuterol, the legislation varies by state in terms of whether only children or anyone is included. Approximately half of the 15 states with stock albuterol legislation include adults, representing a gap that should be considered in future legislation and in amendments to current policies.

Stock inhaler versus nebulizer. Several states allow administration of stock albuterol via an inhaler and/or nebulizer, although specific policies vary by state in terms of which of these can be administered by school nurses or designated personnel. The literature shows that MDIs with VHCs/spacers are as, if not more, effective than nebulizers in children during acute respiratory episodes (44). Stock nebulizers also have greater upfront cost, although the cost of albuterol used in nebulizers is presently less expensive than an inhaler; this may change as generic quick-relief inhalers become more available. Nebulizer machines are bulky and lack portability,

making them less practical in certain situations (e.g., recess, before exercise). Although the administration of medicine through nebulizers tends to be easier, it takes longer to administer the same dose when using nebulizers, keeping students out of class longer. On balance, we recommend inhalers with VHCs/spacers as the preferred stock albuterol delivery system in schools, unless otherwise clinically indicated.

Stock albuterol and coronavirus disease.

The severe acute respiratory syndrome coronavirus 2 pandemic has changed practices around albuterol administration via nebulizers. Nebulizers are not recommended in school settings during the pandemic because of the potential for the spread of infectious aerosols. Instead, stock albuterol MDIs can be used when they are properly cleaned after use with a single, one-way VHC/spacer for each child. As per CDC guidance, proper personal protective equipment should be used by the staff person aiding in any inhaled or nebulized medication administration, and medicine should not be administered in the classroom with other children present (45).

Conclusions

Because albuterol is a safe and potentially life-saving medication that is recommended by guidelines, it is important that schools make quick-relief medications available to all school-aged children, both with and without a documented asthma diagnosis. This failsafe measure can prevent exacerbations, reduce emergency service calls to schools, and enable children to return to class (29). Stock albuterol legislation is imperative to aiding in adoption and implementation, and key policy inclusions can lay the groundwork for success. A strong group of stakeholders and a carefully chosen sponsor are crucial to successful legislation and implementation across the United States. Future work should focus on passing legislation in all states and implementing policy in schools as well as on evaluating the impact of such programs on academic and health outcomes. Effective implementation of stock albuterol can help ensure that children have access to medication that enables them to live, learn, and play. ■

This official policy statement was prepared by an *ad hoc* task force of the American Thoracic Society, Allergy and Asthma Network, American Lung Association, and National Association of School Nurses.

Members of the task force are as follows:

ANNA VOLERMAN, M.D. (Co-Chair)^{1,2,*†}
 ASHLEY A. LOWE, PH.D., M.S.P.H. (Co-Chair)^{3,*†}
 LYNN B. GERALD, PH.D., M.S.P.H. (Co-Chair)^{3,*}
 CHARMAYNE M. C. ANDERSON, M.P.A.⁴
 KATHRYN V. BLAKE, PHARM.D.⁵
 TYRA BRYANT-STEPHENS, M.D.⁶
 THOMAS CARR, B.A.⁷
 HEATHER CARTER, ED.D.^{8§}
 LISA CICUTTO, R.N., A.C.N.P., PH.D.⁹
 JOE K. GERALD, M.D., PH.D.¹⁰
 JAMILA JEFFERSON, B.S., M.S.N., R.N., C.S.N.^{11||¶}
 TINA MILLER, B.S.N., R.N., N.C.S.N.^{12¶}
 NUALA S. MOORE, M.A.¹³
 ANDREA A. PAPPALARDO, M.D.^{14,15,*†}
 HANNA PHAN, PHARM.D.¹⁶
 S. CHRISTY SADREAMELI, M.D., M.H.S.¹⁷
 ANDREA TANNER, M.S.N., R.N., N.C.S.N.¹⁸
 TONYA A. WINDERS, M.B.A.⁴

*Subgroup leader.

†Co-first author.

§Former Arizona State Senator.

||Member of the task force who was not part of the writing committee.

¶School nurse.

¹Department of Medicine and ²Department of Pediatrics, University of Chicago, Chicago, Illinois; ³Department of Health Promotion Sciences, ⁸Arizona Center for Rural Health, Mel and Enid Zuckerman College of Public Health, and ¹⁰Community, Environment, and Policy Department, University of Arizona, Tucson, Arizona; ⁴Allergy and Asthma Network, Vienna, Virginia; ⁵Nemours Center for Pharmacogenomics and Translational Research, Nemours Children's Health System, Orlando, Florida; ⁶Community Asthma Prevention Program, Children's Hospital of Philadelphia, Philadelphia, Pennsylvania; ⁷American Lung Association, Chicago, Illinois; ⁹Department of Medicine, National Jewish Health and University of Colorado, Denver, Colorado; ¹¹The School District of Philadelphia, Philadelphia, Pennsylvania; ¹²Clark County School District, Las Vegas, Nevada; ¹³American Thoracic Society, Washington, DC; ¹⁴Department of Medicine and ¹⁵Department of Pediatrics, University of Illinois at Chicago, Chicago, Illinois; ¹⁶Department of Clinical Pharmacy, College of Pharmacy, C. S. Mott Children's Hospital and University of Michigan, Ann Arbor, Michigan; ¹⁷Department of Pediatrics, Eudowood Division of Pediatric Respiratory Sciences, Johns Hopkins University, Baltimore, Maryland; and ¹⁸School of Nursing, Indiana University, Indianapolis, Indiana

Acknowledgment: The authors thank Rachel Abraham and Kayleigh Lawson-Michod, both M.P.H. graduates in Health Policy at the University of Arizona, for creating the figures. They also thank Jamila Jefferson for thoughtful insights provided for the development of this statement.

Author Disclosures: A.V. served on an advisory committee for Chicago Asthma Consortium; and received research support from ATS Foundation, CHEST Foundation, Health Resources and Services Administration, National Heart, Lung, and Blood Institute, National Institutes of Health, and Robert Wood Johnson Foundation. L.B.G. received research support from Thayer Medical. T.C. is an employee of the American Lung Association. L.C. received research support from the Colorado Department of Public Health and Environment, and the National Institutes of Health. A.A.P. served on an advisory committee for Chicago Asthma Consortium; served as a consultant for OptumRx/UnitedHealth Group; and received research support from the FARE Discovery Network. A.A.L., C.M.C.A., K.V.B., T.B.-S., H.C., J.K.G., J.J., T.M., N.S.M., H.P., S.C.S., A.T., and T.A.W. reported no commercial or relevant noncommercial interests.

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Hawai'i
Children's Action Network Speaks!
Building a unified voice for Hawai'i's children

Hawai'i Children's Action Network Speaks! is a nonpartisan 501c4 nonprofit committed to advocating for children and their families. Our core issues are safety, health, and education.

To: House Committee on Education

Re: **HB 1448 - Relating to Asthma**

Hawai'i State Capitol, Conference Room 309 & Via Videoconference

February 2, 2023, 2:00 PM

Dear Chair Woodson, Vice Chair Marten, and Committee Members,

On behalf of HCAN Speaks!, I am writing **in SUPPORT of HB 1448, relating to asthma**. This bill authorizes the department of education to stock bronchodilators for emergency use during respiratory distress and authorizes department employees to volunteer to administer bronchodilators.

According to the Centers for Disease Control and Prevention, in a classroom of 30 children, on average about 3 are likely to have asthma.¹ In Hawai'i, there are disparities in asthma prevalence: Native Hawaiians are disproportionately affected by asthma and experience the greatest burden, with the highest prevalence of 28.3%.²

Asthma attacks can strike at any time, including at school, and often without warning. These episodes may result in hospitalization, and can even be fatal. Quick-relief bronchodilators are a safe and effective treatment for asthma. Ensuring access to rescue medication is part of guidelines-based response to asthma emergencies.³

Best practices recommend that schools be allowed to stock this lifesaving medication and have trained adults ready to administer it in an emergency. Seventeen states have laws or policies allowing schools to stock quick-relief medications for students with asthma. Hawai'i should join them.⁴

Please pass this bill. It could save the lives of keiki with asthma.

Thank you,

Nicole Woo

Director of Research and Economic Policy

¹ <https://www.cdc.gov/healthyschools/asthma/index.htm>

² <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8296946/>

³ https://www.nhlbi.nih.gov/files/docs/resources/lung/NACI_ManagingAsthma-508%20FINAL.pdf

⁴ <https://www.lung.org/lung-health-diseases/lung-disease-lookup/asthma/health-professionals-educators/asthma-in-schools/asthma-medication-in-schools>



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Hawai'i Public Health Training Hui

Healthy Eating + Active Living

Kūpuna Collective

Date: February 1, 2023

To: Representative Justin H. Woodson Chair
Representative Lisa Marten, Vice Chair
Members of the House Committee on Education

Re: Support for HB 1448, Relating to Asthma

Hrg: Thursday, February 2, 2023

Hawai'i Public Health Instituteⁱ (HIPHI) is in **support of HB 1448**, which allows schools in Hawaii to provide more immediate access to medications for students with asthma or who are suffering from respiratory distress.

Our youth suffer from asthma.

Hawai'i Public Health Institute (HIPHI) appreciates the opportunity to provide SUPPORT for **HB 1448**. This measure will help to keep our children who suffer from asthma safe in schools and may prove potentially lifesaving.

Asthma impacts millions of lives and tremendously affects our nation's healthcare system and economy. In the US, over 25 million Americans, including 5.1 million children, have asthma.ⁱⁱ In Hawaii, 21,411 children have asthmaⁱⁱⁱ, which can be made worse due to our environmental factors, such as cockroaches, vog, and allergies.

An asthma episode can be brought on at any moment and can often quickly escalate. Short-acting bronchodilators, often referred to as "inhalers," are inexpensive, extremely safe, and most importantly, easy to use. This medication will save a person's life by quickly opening up the lungs' passages and enabling oxygen to flow freely.

There are many reasons that children do not always have access to an "inhaler". Sometimes kids forget it, leave it in a classroom or locker, or simply can't afford the medication. Once the attack begins, it can quickly escalate, and if the inhaler is inaccessible or can't be found, the child can go into respiratory distress. An ambulance must be called, which leads to expensive transport costs and an emergency department visit costing thousands more. Such events also take children out of the classroom for days at a time and further impede their learning.

By stocking schools with low-cost bronchodilators and inexpensive disposable spacers, students can quickly receive lifesaving medication. At the first sign of an asthmatic episode, a trained school representative will be able to help administer this rescue medication.

All students should have rapid access to this medication. The medication is proven safe and effective. More importantly, it is a way to ensure that we keep all of our keiki safe and healthy.

Thank you for considering HB 1448, a measure that puts the health of our keiki first.

Mahalo,

Peggy Mierzwa

Peggy Mierzwa
Advocacy & Policy Director
Hawai'i Public Health Institute

ⁱ Hawai'i Public Health Institute is a hub for building healthy communities, providing issue-based advocacy, education, and technical assistance through partnerships with government, academia, foundations, business, and community-based organizations..

ⁱⁱ CDC. 2019 National Health Interview Survey.

ⁱⁱⁱ CDC. 2019 Behavioral Risk Factor Surveillance System.



To: The Honorable Representative Woodson, Chair
The Honorable Representative Martin, Vice-Chair
House Committee on Education

From: Paula Arcena, Government Affairs
Mike Nguyen, Government Affairs

Hearing: Thursday, February 02, 2023

RE: **HB1448 Relating to Asthma -Support**

AlohaCare appreciates the opportunity to provide testimony in **support of HB1448**. This measure will authorize the Department of Education to stock bronchodilators for emergency use during respiratory distress and authorize department employees to volunteer to administer bronchodilators.

Founded in 1994 by Hawai'i's community health centers, AlohaCare is a community-rooted, non-profit health plan serving over 80,000 Medicaid and dual-eligible health plan members on all islands. Approximately half of our membership are keiki. We are Hawaii's only health plan exclusively dedicated to serving Medicaid beneficiaries. Our mission is to serve individuals and communities in the true spirit of aloha by ensuring and advocating for access to quality health care for all. We believe that health is about supporting whole-person care.

Asthma impacts millions of lives and has a tremendous impact on our nation's healthcare system and economy. In the U.S., over 25 million Americans, including 5.1 million children have asthma.ⁱ In Hawaii, 21,411 children have asthmaⁱⁱ, which can be made worse due to our environmental factors, such as cockroaches, vog, and allergies.

Because asthma attacks can occur anytime and often without warning, children with asthma should always have access to medication that can quickly reverse the blockages in their lungs. This life-saving medication, called a short-acting bronchodilator, is easy to administer, inexpensive, and very safe.

It is critical as outlined in the proposed legislation that school staff other than Keiki nurses are trained in the signs and symptoms of asthma and when it is appropriate to administer the rescue medications. Unfortunately, every school in Hawaii does not a keiki school nurse present. However, because of the safety of the medication used and the life-threatening implications of an asthma attack, it is imperative that we train other staff to assess, access and administer the required medication that would potentially save a student's life.

Mahalo for this opportunity to testify in **support of SB1448**.

ⁱ CDC. 2019 National Health Interview Survey.

ⁱⁱ CDC. 2019 Behavioral Risk Factor Surveillance System.



DATE: February 1, 2023

To: Committee Chair Justin H. Woodson
Committee Vice Chair Lisa Marten
House Committee on Education

Re: Testimony in Support of HB537, Relating to Electronic Smoking Devices; E-Liquids; Electronic Smoking Device Retailer Registration Unit; Wholesalers; Tax

Hrg: **HB 1448** 2 Feb 2023, 2:00PM, House Conference room 309 via Videoconference

The Hawai'i Public Health Association (HPHA) is a group of over 450 community members, public health professionals, and organizations statewide dedicated to improving public health. Our mission is to promote public health in Hawai'i through leadership, collaboration, education and advocacy. Additionally, HPHA aims to call attention to issues around social justice and equity in areas that extend beyond the traditional context of health (e.g., education, digital equity, cultural sensitivity), which can have profound impacts on health equity and well-being. Therefore, as stewards of public health, HPHA is also advocating for equity in all policies.

We strongly support HB1448, which will authorize the Department of Education to stock short-acting bronchodilators (rescue inhalers) for emergency use during an acute asthma attack and authorize department employees to volunteer to administer bronchodilators. Asthma impacts millions of lives and has a tremendous impact on our nation's healthcare system and economy. In the U.S., over 25 million Americans, including 5.1 million children have asthma.¹ In Hawaii, 21,411 children have asthma², which can be made worse due to our environmental factors, such as cockroaches, vog, and allergies.

Because asthma attacks can occur anytime and often without warning, children with asthma should always have access to medication that can quickly reverse the blockages in their lungs. This life-saving medication, called a short-acting bronchodilator, is easy to administer, inexpensive, and very safe. When children do not have asthma medication, which can occur for a variety of reasons such as forgetting it or not being able to afford it, schools have few options. A delay during the administration of bronchodilators usually results in an asthma attack worsening and, in such cases, the school must call 911.

These adverse events are largely avoidable with a simple low-cost solution: stock medication or inhalers. According to the American Lung Association, one study demonstrated that 84% of students returned to the classroom after an asthma event when provided a stock inhaler. Schools can use a single inhaler containing a short-acting bronchodilator along with inexpensive disposable spacers that can be used for anyone who experiences the sudden onset of cough, shortness-of-breath, and chest tightness that signals an asthma attack.

Additionally, it is critical as outlined in the proposed legislation that school staff other than school nurses are trained in the signs and symptoms of asthma and when it is appropriate to administer the rescue medications. Unfortunately, in Hawaii there is not a school nurse present in every school. Because of the safety of bronchodilators and the life-threatening implications of an asthma attack, it is vital that we train other staff to assess, access and administer the required medication that would potentially save a student's life. House Bill 1448 also provides important liability protection for the prescriber, the school and the person who administers the medication in good faith. As previously mentioned, the medication used for treatment of asthma attacks is safe and effective.

We strongly support HB 1448 and respectfully ask that you pass this measure to ensure that our keiki with asthma have access to life saving rescue inhalers and staff who is prepared to provide the required medication.



Thank you for the opportunity to provide testimony on this important public health issue affecting youth in our communities.

Respectfully submitted,

Holly Kessler
Executive Director

1 CDC. 2019 National Health Interview Survey.
2 CDC. 2019 Behavioral Risk Factor Surveillance System.

**Testimony Presented Before the
House Committee on Education
Thursday, February 2, 2023 at 2:00 P.M.
Via Videoconference and Conference Room 309**

**By
Laura Reichhardt, APRN, AGPCNP-BC
Hawai'i State Center for Nursing
University of Hawai'i at Mānoa**

Comments on H.B. 1448

Chair Woodson, Vice Chair Marten, and Members of the House Committee On Education, thank you for the opportunity for the Hawai'i State Center for Nursing to provide testimony in strong support of this measure. This measure seeks allow for the department of education to stock bronchodilators for emergency use during respiratory distress and authorize department employees and agents to administer bronchodilators.

Advanced Practice Registered Nurses (APRNs) with prescriptive authority are authorized to assess and diagnose health care conditions and prescribe medications to patients (H.R.S. 457-8.6). Registered Nurses and Licensed Practical Nurses, in addition to Advanced Practice Registered Nurses, are able to administer prescribed medications (NSCBN Model Rules Scope and Standards of Practice as adopted by the Hawai'i Board of Nursing Administrative Rules, Chapter 89, Subchapter 17).

Should the Committee choose to move this measure forward, the Hawai'i Center for Nursing respectfully asks that the committee amend Section 3 (Page 12, line 5) to include APRNs and PAs, as these professions already established the statute the Section 3 aims to amend.

Page 12, line 5: (i) Any person, school district, or school and its employees and agents, including the **prescribing physician, physician assistant, or nurse practitioner**, and pharmacy filling the prescription, except for a qualified health care professional providing the training required in [~~subsection (g)~~], subsections (g) and (h), who acts in accordance with the requirements of this section shall be immune from any civil or criminal liability arising from these acts, except where the person's conduct would constitute gross negligence, wilful and wanton misconduct, or intentional misconduct."

The Hawai'i State Center for Nursing urges you to pass this measure through your committee. Thank you for the dedication and care for healthcare workers and the people in Hawai'i.

The mission of the Hawai'i State Center for Nursing is that through collaborative partnerships, the Center provides accurate nursing workforce data for planning, disseminates nursing knowledge to support excellence in practice and leadership development, promotes a diverse workforce, and advocates for sound health policy to serve the changing health care needs of the people of Hawai'i.

HB-1448

Submitted on: 1/31/2023 5:06:28 PM

Testimony for EDN on 2/2/2023 2:00:00 PM

| Submitted By | Organization | Testifier Position | Testify |
|---------------------|---------------------|---------------------------|---------------------------|
| Lee Buenconsejo-Lum | Individual | Support | Written Testimony Only |

Comments:

Provided the proper training and procedures are in place, this measure would allow for improved care and, ultimately, improved learning for asthmatic children. Asthma is more common in certain populations, including Native Hawaiians and Filipinos. Asthma prevalence is also higher in certain communities - many of these communities are also challenged with lower educational attainment (for a large variety of social determinants). Having albuterol accessible in the schools, as part of a comprehensive asthma management plan done in conjunction with their health care provider, will help keep these children in school and, if implemented correctly, will also provide important communication back to the primary care provider that a child needed a rescue inhaler. This communication should trigger a closer follow-up to determine if the asthma is under control.

COMMITTEE ON EDUCATION

Rep. Justin H. Woodson, Chair

Rep. Lisa Marten, Vice Chair

Thursday, February 2, 2023 – 2pm Conference Room 309

Testimony in Support of House Bill 1448 Relating to Asthma

Dear Chairperson Woodson and Members of the Committee:

Thank you for the opportunity to provide comments on House Bill 1448 relating to asthma. I strongly supports this bill as it will allow schools in Hawaii to provide more immediate access to medications for students with asthma or suffering from respiratory distress. Asthma can be a deadly disease if flare-ups are not treated immediately. This bill has the potential to save lives and keep kids safe in schools.

I, my husband and both our children as well as several other relatives have had asthma all our lives and know first-hand how important it is for patients who are suffering from acute and severe shortness of breath to get the prompt and effective relief they need so they can continue to function and carry on with life. In Hawaii, 21,411 children have asthma¹, which can be made worse due to exercise as well as our environmental factors, such as cockroaches, VOG, and allergies.

Because asthma attacks can occur anytime and often without warning, children with asthma should always have access to medication that can quickly reverse the blockages in their lungs. This life-saving medication, called a short-acting bronchodilator, is easy to administer, inexpensive, and very safe.

Unfortunately, when children do not have asthma medication, which can occur for a variety of reasons such as forgetting it or not being able to afford it, schools have few options. A parent may not be immediately accessible or close enough to respond promptly. Even if they can, there is a delay during which the asthma attack often gets worse. In such cases, the school must call 911. Doing so is likely to lead to an ambulance transport cost and an emergency department visit costing thousands more. Such events also take children out of the classroom for days at a time and further impede their learning.

These adverse events are largely avoidable with a simple low-cost solution: stock medication or inhalers. Schools can use a single inhaler containing a short-acting bronchodilator along with inexpensive disposable spacers that can be used for anyone who experiences the sudden onset of cough, shortness-of-breath, and chest tightness that signals an asthma attack.

It is critical as outlined in the proposed legislation that school staff other than Keiki nurses are trained in the signs and symptoms of asthma and when it is appropriate to administer the rescue medications. Unfortunately, in Hawaii there is not a keiki school nurse present in every school. However, because of the safety of the medication used and the life-threatening implications of an asthma attack, it is imperative that we train other staff to assess, access and administer the required medication that would potentially save a student's life.

House Bill 1448 also provides important liability protection for the prescriber, the school and the person who administers the medication in good faith. As mentioned before the medication used for treatment of asthma attacks is safe and effective.

Sincerely,

Valerie Chang, Honolulu parent
starion06@yahoo.com

TO: House Committee on Education
Representative Justin H. Woodson, Chair
Representative Lisa Marten, Vice Chair

DATE: Thursday, February 2, 2023
TIME: 2:00 PM
PLACE: Via Videoconference
Conference Room 309

TESTIMONY IN SUPPORT OF HB 1448, RELATING TO ASTHMA

Dear Chair Woodson, Vice Chair Marten, and Members of the Committee,

My name is Cynthia J. Goto, and I am writing to express my support for House Bill 1448, relating to asthma. This bill will allow schools in Hawaii to provide more immediate access to medications for students with asthma or suffering from respiratory distress.

Asthma is one of the most common chronic childhood diseases in Hawaii. In Hawaii, 21,411 children have asthma¹, and this bill has the potential to save lives and keep kids safe at school.

According to the Centers for Disease Control and Prevention (CDC), on average, in a classroom of 30 children, about 3 are likely to have asthma. Low-income populations, Native Hawaiians, and children living near traffic intersections experience more emergency department visits, hospitalizations, and deaths due to asthma than the general population.

Because asthma attacks can occur anytime and often without warning, children with asthma should always have access to medication that can quickly reverse the blockages in their lungs. This life-saving medication, called a short-acting bronchodilator, is easy to administer, inexpensive, and very safe.

Unfortunately, when children do not have asthma medication, which can occur for a variety of reasons such as forgetting it or not being able to afford it, schools have few options. A parent may not be immediately accessible or close enough to respond promptly. Even if they can, there is a delay during which the asthma attack often gets worse. In such cases, the school must call 911. Doing so is likely to lead to an ambulance transport cost and an emergency department visit costing thousands more. Such events also take children out of the classroom for days at a time and further impede their learning.

These adverse events are largely avoidable with a simple low-cost solution: stock medication or inhalers. Schools can use a single inhaler containing a short-acting bronchodilator along with inexpensive disposable spacers that can be used for anyone who experiences the sudden onset of cough, shortness-of-breath, and chest tightness that signals an asthma attack.

Please support House Bill 1448 to ensure that our children with asthma have access to safe and effective medication which could potentially save a student's life.

Thank you for the opportunity to testify.

Cynthia J. Goto

¹ CDC. 2019 National Health Interview Survey.

H.B.1448
February 2, 2023

Committee on Education
Chair: Rep. Woodson
Vice Chair: Rep. Martin

Testimony in Support of H.B.1448, Relating to Asthma

Chair Woodson, Vice Chair Martin, Members of the Committee on Education, I am Julian Lipsher, a member of the American Lung Association of Hawaii's Local Leadership Board, testifying as a private citizen in support of H.B.1448.

This bill would enable Hawaii schools the ability to provide more immediate access to medications for students with asthma, in medically threatening situations that potentially can escalate to where 911 emergency calls and hospitalization would be necessary.

Hawaii's asthma rates tend to be higher than national averages in both adults and children. According to data from the Centers for Disease Control and Prevention, there are approximately 30,000 or one in ten children that have been diagnosed with asthma in Hawaii. Conditions, both indoor and outdoor such as dust, mold, pets, cockroaches, VOG, vigorous exercise and a variety of allergies can trigger and worsen an asthma condition.

In that asthma attacks can occur at anytime and without warning, children with asthma need medications that can quickly reverse blockages in the lungs. Life saving medications may not always be readily available on site or at that moment to administer for a variety of reasons. This bill would address that situation.

Medically adverse and costly issues can be prevented through allowing schools to stock a supply of medications or inhalers, training on administering the medications along with providing liability protection for all parties involved as provided for in H.B.1448.

This bill can both reduce the potential severity of asthma attacks for children with asthma and reduce the risk and cost of emergency and hospital situations. I urge the committee to consider the important health and economic advantages of the bill and advance this measure.

Thank you for the opportunity to provide testimony.

Julian Lipsher, M.P.H.
jdlipsher@hawaii.rr.com

HB-1448

Submitted on: 2/1/2023 12:29:28 PM

Testimony for EDN on 2/2/2023 2:00:00 PM

| Submitted By | Organization | Testifier Position | Testify |
|---------------------|---------------------|---------------------------|---------------------------|
| Shauna Springer | Individual | Support | Written Testimony Only |

Comments:

Kāko‘o wau! I support!

COMMITTEE ON EDUCATION

Rep. Justin H. Woodson, Chair

Rep. Lisa Marten, Vice Chair

Thursday, February 2, 2023 – 2pm Conference Room 309

Testimony in Support of House Bill 1448 Relating to Asthma

Chairperson Woodson and Members of the Committee:

Thank you for the opportunity to provide comments on House Bill 1448 relating to asthma. I strongly support this bill as it will allow schools in Hawaii to provide more immediate access to medications for students with asthma or suffering from respiratory distress. Asthma can be a deadly disease if flare-ups are not treated immediately. This bill has the potential to save lives and keep kids safe in schools.

Asthma impacts millions of lives and has a tremendous impact on our nation's healthcare system and economy. In the U.S., over 25 million Americans, including 5.1 million children have asthma.¹ In Hawaii, 21,411 children have asthma², which can be made worse due to our environmental factors, such as cockroaches, vog, and allergies.

Because asthma attacks can occur anytime and often without warning, children with asthma should always have access to medication that can quickly reverse the blockages in their lungs. This life-saving medication, called a short-acting bronchodilator, is easy to administer, inexpensive, and very safe.

Unfortunately, when children do not have asthma medication, which can occur for a variety of reasons such as forgetting it or not being able to afford it, schools have few options. A parent may not be immediately accessible or close enough to respond promptly. Even if they can, there is a delay during which the asthma attack often gets worse. In such cases, the school must call 911. Doing so is likely to lead to an ambulance transport cost and an emergency department visit costing thousands more. Such events also take children out of the classroom for days at a time and further impede their learning.

These adverse events are largely avoidable with a simple low-cost solution: stock medication or inhalers. Schools can use a single inhaler containing a short-acting bronchodilator along with inexpensive disposable spacers that can be used for anyone who experiences the sudden onset of cough, shortness-of-breath, and chest tightness that signals an asthma attack.

It is critical as outlined in the proposed legislation that school staff other than Keiki nurses are trained in the signs and symptoms of asthma and when it is appropriate to administer the rescue medications. Unfortunately, in Hawaii there is not a keiki school nurse present in every school. However, because of the safety of the medication used and the life-threatening implications of an asthma attack, it is imperative that we train other staff to assess, access and administer the required medication that would potentially save a student's life.

House Bill 1448 also provides important liability protection for the prescriber, the school and the person who administers the medication in good faith. As mentioned before the medication used for treatment of asthma attacks is safe and effective.

Sincerely,
Troy Siruno
Honolulu, HI
tsiruno@gmail.com

¹ CDC. 2019 National Health Interview Survey.

² CDC. 2019 Behavioral Risk Factor Surveillance System.