

**REPORT TO THE THIRTY-FIRST LEGISLATURE**

**STATE OF HAWAI'I  
2021**

**PURSUANT TO SECTION 321H-4  
HAWAI'I REVISED STATUTES**

**REQUIRING THE DEPARTMENT OF HEALTH TO PROVIDE AN  
ANNUAL REPORT ON THE ACTIVITIES UNDER  
THE NEUROTRAUMA SPECIAL FUND**



**PREPARED BY:  
STATE OF HAWAI'I  
DEPARTMENT OF HEALTH**

**December 2020**

## EXECUTIVE SUMMARY

In accordance with the provisions of Section 321H-4, Hawai'i Revised Statutes (HRS), "Neurotrauma," the Department of Health (DOH), Developmental Disabilities Division (DDD), Neurotrauma Program respectfully submits this annual report on the activities of the Neurotrauma Special Fund (NSF).

The NSF established DOH-DDD as the agency to "develop, lead, administer, coordinate, monitor, evaluate and set direction for a comprehensive system for survivors of neurotrauma injuries." Since January 2003, the NSF has been funded by surcharges from neurotrauma-related traffic citations that are deposited into the NSF. The Neurotrauma Program continues to work with neurotrauma survivors and their families to identify priorities for expenditure of moneys that are available in the NSF. The Neurotrauma Advisory Board (NTAB) provides stakeholder input into the Neurotrauma Program's activities and advisory recommendations regarding the special fund. Based on the feedback received from neurotrauma survivors and stakeholders during fiscal year (FY) 2020, the highest priorities of NSF expenditures, for FY 2021-2023, are to educate survivors, caregivers, parents and educators of youth on the signs, symptoms, resources and effects of a neurotrauma injury. Stakeholders also expressed a need for hospital staff to link survivors and caregivers to tools when a survivor is ready to transition back into the community.

During FY 2020, the Neurotrauma Program continued to work on meeting the goals and objectives of the Hawaii 2018-2020 Neurotrauma Supports Strategic Plan (Attachment II). Program staff implemented activities to use the NSF in accordance with the mandate of Section 321H-4, HRS, in collaboration with the Traumatic Brain Injury Advisory Board (TBIAB), NTAB, Brain Injury Association of Hawai'i, families, survivors, and other community stakeholders. The Neurotrauma Program also obtained stakeholder feedback to develop the Neurotrauma Program Strategic Plan for FY 2021-2023 (Attachment III).

The Neurotrauma Program supported:

- **Project RAPID Hawaii: A Statewide Collaboration on Acute Stroke Care** with the Queen's Medical Center (QMC) to oversee and assist with the installation and implementation of the Computerized Tomography (CT) perfusion software (RAPID) at six acute care Hawaii hospitals and training of frontline staff at these hospitals to use the software. The RAPID software is used to determine eligibility for a minimally invasive procedure called Mechanical Thrombectomy (MT) in patients experiencing large vessel occlusion (LVO) strokes. LVOs, if left untreated, have the highest rate of mortality or severe disability. Clinical trials demonstrated that MT dramatically increased chances of survival with independent level of function.
- **The Hawai'i Neurotrauma Registry (HNTR)** with the University of Hawai'i, Pacific Disabilities Center. HNTR gathers information on the long-term service and support needs of survivors of neurotrauma injuries and their family members. The number of survivors on the HNTR significantly increased during this fiscal year. HNTR also continued to provide education on neurotrauma injuries and build public awareness at community events.
- **Project Head, Neck, Spine** with the University of Hawai'i, Kinesiology and Rehabilitation Services Department (UH-KRS). Project Head, Neck, Spine developed and piloted an online educational resource aimed to educate students in grades three through nine on the seriousness of head, neck and spinal cord injuries. The

project will expand by developing, piloting, and implementing the online educational resource for lower elementary school students, homeschooled students, and teachers in Hawaii.

During FY 2021, the Neurotrauma Program will continue to work closely with the TBIAB, NTAB, Strategic Plan subcommittees and community organizations to meet goals consistent with Chapter 321H-4, HRS. The Neurotrauma Program will continue its efforts to collect and analyze data, provide training to prevent disabilities, educate and disseminate information on traumatic brain injury (TBI), stroke and spinal cord injury (SCI) to survivors and their families, and implement the Neurotrauma Program Strategic Plan for FY 2021-2023 to improve the statewide system of services and supports for individuals living with neurotrauma in Hawai'i.

# **REPORT TO THE LEGISLATURE IN COMPLIANCE WITH SECTION 321H-4, HAWAII REVISIED STATUTES**

## **Introduction**

Pursuant to Section 321H-4, HRS, DOH-DDD Neurotrauma Program respectfully submits this annual report on the activities of the Neurotrauma Special Fund (NSF) to the Thirty-First Legislature.

Chapter 321H, HRS, mandates the DOH to “develop, lead, administer, coordinate, monitor, evaluate, and set direction for a comprehensive system to support and provide services for survivors of neurotrauma injuries;” to establish a Neurotrauma Advisory Board (NTAB); and to administer the NSF. The NSF began accumulating moneys from neurotrauma related traffic citation surcharges (speeding, drunk driving, not wearing seat belts, leaving the scene of an accident involving bodily injury) since January 1, 2003. This report is a status report on activities funded by the special fund for the period of July 2019 to June 2020.

## **Neurotrauma Advisory Board (NTAB) and Traumatic Brain Injury Advisory Board (TBIAB)**

Chapter 321H, HRS was passed by the legislature in 2002. In compliance with the statute, the NTAB was established to advise the DOH on the use of the NSF to implement these statutes. In 1997, the legislature passed Act 333 that created the TBIAB to advise the DOH in the development and implementation of a comprehensive plan to address the needs of persons affected by disorders of the brain. As a subset of the NTAB, the TBIAB would continue to exist and advocate on behalf of the individuals affected by a brain injury and would advise the DOH in consultation with the NTAB. In 2014, the Legislature amended Section 321H-3, HRS, to reduce NTAB membership from twenty-one (21) to eleven (11) members to obtain quorum while maintaining the same representation of members for the board. All members are appointed by the Director of Health. The Board’s members consist of key stakeholder group representation statewide. Board members participated in the development of the Neurotrauma Supports Strategic Plan to guide its work. Current members of the NTAB are listed in Attachment I.

## **Neurotrauma Supports Strategic Plan FY 2018-2020**

During FY 2020, the Neurotrauma Program continued work to meet the goals and objectives defined in the Neurotrauma Supports Strategic Plan for FY 2018-2020 (Attachment II). Board members gave input to the Neurotrauma Program on strategies to meet the goals and objectives. This Legislative Report provides highlights of how the Neurotrauma Program implemented activities to address the goals and objectives of the Strategic Plan during FY 2020.

## **Use of the Neurotrauma Special Fund**

Section 321H-4, HRS, mandates that the NSF shall be used for:

- Education on neurotrauma;
- Assistance to individuals and families to identify and obtain access to services;
- Creation of a registry of neurotrauma injuries within the State to identify incidence, prevalence, individual needs, and related information; and,
- Necessary administrative expenses to carry out this chapter not to exceed two (2) percent of the total amount collected.

(1) Educational activities:

Consistent with the Neurotrauma Strategic Plan objectives 1.1, 1.2, 1.3, and 2.2, the Neurotrauma Program provided education on neurotrauma to the public and providers, with the goal of expanding capacity through disability and health care systems throughout FY 2020, through the following contracts and partnerships with community organizations.

*UH-KRS Educational Activities*

The Neurotrauma Program funded UH-KRS's Project Head, Neck, Spine. During FY 2020, UH-KRS piloted the online educational resource with twelve (12) elementary, middle and high schools. Over three hundred and twenty-five (325) students were educated about the seriousness of head, neck, and spine injuries. The students had a pre-test average of 63.8% and a post-test average of 76.6%, indicating increased comprehension of the curriculum material. UH-KRS also developed and piloted a children's book complete with illustrations and coloring book worksheets to reinforce information on recognizing head, neck, and spine injuries, assisting someone who sustained an injury, and preventing these injuries. DOE teachers reviewed the content for accuracy and adherence to the Hawaii Content and Performance Standards III for Health. In FY 2021, Project Head, Neck, Spine will continue to implement the elementary, middle and high school online educational resource with additional schools and students but also expanding further to homeschooled students. Project, Head, Neck, Spine will begin developing an online educational resource to educate teachers statewide on awareness and recognition of head, neck, and spine injuries, and "Return-To-Learn" which involves protocols for students with head injuries to return to the classroom.

*QMC Educational Activities*

During FY 2020, QMC implemented a FAST School Stroke Education Program. As part of the program, QMC worked with five (5) elementary schools on the Big Island. QMC provided information on the signs and symptoms of stroke and what to do if someone is having a stroke. Students were asked to review what they learned with family members, and one-thousand, one-hundred and forty-nine (1,149) students returned their parent signature and received a blue rubber duck. A total of four thousand, one hundred and twenty (4,120) individuals received the FAST stroke education message. QMC planned but was not able to conduct the Stroke Education Program at additional schools during the spring semester of the 2019-2020 school year due to the COVID-19 pandemic.

In order to implement Project RAPID Hawaii at each of the six (6) participating hospitals, at least two (2) meetings were held with hospital administration and staff to provide education on the benefits of implementing RAPID software to improve stroke care. Additional online training for using RAPID is being conducted at all the hospitals using the online RAPID University training modules. More information on Project RAPID Hawaii is discussed below.

*UH-PDC Educational Activities*

Under contract with the Department of Health Neurotrauma Program, University of Hawaii Pacific Disabilities Center, (UH-PDC) was tasked with increasing the number of neurotrauma survivors on the Hawaii Neurotrauma Registry (HNTR). Part of UH-PDC's duties included educating the general public and professional organizations on the etiology and effects of a neurotrauma injury as well as preventive measures that could be taken to avoid injury. Presentations were customized for each audience according to level of comprehension and

purpose of the event. In Year 7, the final year of their contract, UH-PDC increased outreach efforts to the neighbor islands. UH-PDC's outreach efforts reached five thousand sixty-two (5,062) individuals across the state between May 2019 – May 2020 by participating in presentations, events and meetings. Sixty-three percent (63%) of the five thousand sixty-two (5,062) individuals reached were from the Islands of Hawaii, Kauai, Lanai, Maui or Molokai. The headcount of individuals from the Neighbor Islands consists of three thousand one hundred ninety-seven (3,197) individuals attending sixty-nine (69) events. The remaining thirty-seven percent (37%) of individuals were one thousand eight hundred sixty-five (1,865) persons from Oahu, attending one (1) of the thirty-one (31) events offered.

#### *Hawaii Concussion Awareness and Management Program (HCAMP) Concussion Summit*

The Neurotrauma Program sponsored the 11<sup>th</sup> Annual HCAMP Concussion Summit, which was held on July 12-13, 2019 at the University of Hawaii at Manoa Campus Center Ballroom. The Summit educated over one-hundred and fifty (150) individuals, including athletic trainers, students, physicians, nurses, physical therapists, occupational therapists, speech/language pathologists, and other professionals on concussion management. Results from the immediate post-conference evaluation indicated that one-hundred percent (100%) of sixty-one (61) respondents reported that the 2019 Concussion Summit met its educational objectives, and fifty-six (56) out of fifty-eight (58), or ninety-seven percent (97%) of respondents stated they will apply their learning to practice.

#### *Partnerships with Community Organizations for Education*

Throughout the fiscal year, the Neurotrauma Program participated in eight (8) community events on Oahu and the Neighbor Islands and gave away over one-thousand, six hundred (1,600) bike and multi-sport helmets to protect children and adults statewide. The community events were a Bike and Skateboard Safety Day, Ka'u Coffee Trail Run, HBL Century Ride, Children and Youth Day, Harvest Festival, Kids Fest, Westside Wellness Ohana Day, and Kaimuki Christmas Parade.

#### *Education for Neurotrauma Awareness Months*

Consistent with Strategic Plan Objective 1.1, the Neurotrauma Program partnered with community agencies to promote awareness of neurotrauma during the designated months for Spinal Cord Injury, Brain Injury, and Stroke Awareness. For Spinal Cord Injury and Traumatic Brain Injury Awareness Month, the Neurotrauma Program invited the public to come and hear life stories of individuals who survived traumatic brain and spinal cord injuries. The November 17, 2019 Storytelling event sponsored by Hawaii's DOH Neurotrauma Program and the Injury Prevention Branch focused on survivors' experiences as the injury changed their cognition, emotions, language, physical mobility, and sensory perception impacting how they live, work and participate in everyday life. The message was one of prevention, educating community members on safeguards that can be taken when engaging in physical activity. Educational partners for the event included University of Hawaii's College of Education, Hawai'i Disability Rights Center, Pacific Disabilities Center, 'Ōlelo Community Media, brain injury support group Hui Malama Po'o and Dr. Sheri Hiroi DuBay, neuroscientist and research specialist.

In the interest of reaching a wider audience with a message of safety and awareness, Neurotrauma Program teamed with spinal cord injury (SCI) survivor Mark Matheson and 'Ōlelo Community Media to produce a Public Service Announcement, (PSA). Despite his injury Mark became the first and only person, so far, with an SCI to participate in the Molokai2Oahu Paddleboard World Championships. The PSA played on all 3 'Ōlelo channels, throughout the

day and evening over the course of 3 months. In addition to raising awareness of injury, the PSA is also a message of hope that encourages people to be their best selves and commit to their aspirations.



*Scan QR code with any smartphone or tablet camera app to view the PSA.*

For Brain Injury Awareness Month, the Neurotrauma Program teamed up with community partners to hold the first ever “Rock It, Don’t Stock It” rally on March 4, 2020, at the University of Hawaii at Manoa. Two hundred (200) attendees interacted with eight (8) informational booths that provided injury prevention tips, resources, and fun activities. Over one hundred sixty (160) helmets (bike, multi-sport, and moped) were properly fitted and given away to those in attendance. Those who received moped helmets were surveyed: sixty-five percent (65%) of respondents never wear a helmet; sixty-nine percent (69%) of those who never wear a helmet stated that it was because they didn’t have a helmet; and sixty-eight percent (68%) stated that they would wear a helmet if they had one. Those who received bike or multi-sport helmets were surveyed: forty-four percent (44%) of respondents never wear a helmet; sixty percent (60%) of those who never wear a helmet stated that it was because they didn’t have a helmet; and sixty-four percent (64%) stated that they would wear a helmet if they had one. The Neurotrauma Program also collaborated with the UnMasking Brain Injury Project. Survivors of brain injury participated by designing a blank mask canvas using art mediums to raise awareness and share their experiences of what it is like to live with a brain injury. The Neurotrauma Program held mask making workshops on Oahu, Maui, and the Big Island and over thirty (30) masks and survivors’ stories were completed. The masks and stories were mounted on foam core board and assembled on a ten foot by five foot (10’ x 5’) display board to showcase on a mobile exhibit. The UnMasking Brain Injury Mobile Exhibit was unveiled at the “Rock It, Don’t Stock It” rally. The exhibit was also displayed at the Honolulu Hale third (3<sup>rd</sup>) Floor Gallery from March 5 - March 12 and the State Capitol Chamber Level from March 13 - March 30. The Neurotrauma Program extended awareness efforts to reach a wider audience by running a bus ad campaign. The bus ad was designed with pictures of completed masks, mask descriptions, and Neurotrauma Program contact information. The bus ad was displayed on twenty (20) City and County of Honolulu buses, with routes between Honolulu and Pearl City from March 15 - May 31, 2020.

For Stroke Awareness Month, the Neurotrauma Program developed a creative way to raise stroke awareness while adhering to the Governor’s ‘Stay at Home’ order and held its first ever Stroke Awareness Virtual Scavenger Hunt. Over thirty-eight thousand (38,000) Hawaii residents were emailed the invitation to engage in up to ten (10) activities that could be done while social distancing. The activities promoted prevention, awareness of the signs and symptoms of stroke, and informing the importance of calling 9-1-1 immediately if they experience or witness someone experiencing a stroke. Participants who engaged in hunting down eight (8) to ten (10) “treasures” were recognized as brain champions.

- (2) Assistance to individuals and families to identify and obtain access to service activities:

In October 2019, the Neurotrauma Program entered a three-year contract with QMC to oversee and assist with the installation and implementation of the RAPID CT perfusion software at six (6) acute care Hawaii hospitals and training of frontline staff at these hospitals to use the software. The six (6) hospitals include Wahiawa General Hospital, Kuakini Medical Center, Kona Community Hospital, Kauai Veterans Memorial Hospital, Hilo Medical Center, and Castle Medical Center. The contract also funds the software licensing fees for each hospital from the installation date through September 2022.

Until 2015, the only proven treatment for ischemic stroke, which occurs when a blood vessel supplying blood to the brain is blocked by a clot, was intravenous (IV) tissue plasminogen activator (tPA), also known as clot buster medication. However, treatment with IV tPA alone has only a ten (10) to thirty (30) percent success rate at fully restoring blood flow to the brain with large vessel occlusions (LVOs). LVOs, if left untreated, have the highest rate of mortality or severe disability. In 2015, several landmark clinical trials demonstrated that manual removal of the blockage within six (6) hours of symptom onset through a procedure called mechanical thrombectomy (MT) dramatically increases the chance of survival with independent level of functioning.

The goals of this project are to improve access for eligible patients at the six (6) remote hospitals to receive MT at tertiary hospitals that can perform this procedure; reduce the time and cost associated with on-site processing of CT perfusion imaging; and reduce the delay in treatment times for patients.

Due to COVID-19, priorities at the RAPID-Hawaii participating hospitals and QMC changed, delaying implementation of the project during the timeframe initially projected. As of the end of FY 20, RAPID was installed at Wahiawa General Hospital, and the other hospitals were preparing for installation. As of September 30, 2020, the end of year one (1) of the contract, RAPID was installed and live at Wahiawa General Hospital, installed and in the final testing phase prior to going live at Castle Medical Center, was currently being installed at Kona Community Hospital, and was scheduled for installation at the remaining three (3) hospitals.

The Neurotrauma Program continued to fund UH-PDC to provide information and referrals (I&R) to individuals with neurotrauma or family members to assist individuals in identifying and obtaining access to services and supports. During FY 2020, PDC provided I&R to ninety-five (95) individuals.

(3) Development of a registry within the State to identify incidence, prevalence, needs, and related information of survivors of neurotrauma injuries:

The Neurotrauma Program continued its work through its contract with UH-PDC to develop and administer a neurotrauma registry, which includes individuals who have sustained a traumatic brain injury, spinal cord injury or stroke, disseminate an effective public service announcement and social media campaign to provide education and awareness of neurotrauma, and to encourage participation in the neurotrauma registry. Information obtained and analyzed from the registry will assist the neurotrauma program in prioritizing activities to support the needs of neurotrauma survivors. Creating and maintaining a neurotrauma registry is consistent with Objective 2.1 of the Neurotrauma Supports Strategic Plan, that involves increasing data reporting to obtain a more accurate assessment of the needs of individuals with neurotrauma and their family members through the neurotrauma registry.

During FY 2020, UH-PDC recruited two-hundred thirty-seven (237) new survey participants, a significant increase from the previous contract year. As of June 2020, HNTR had a total of five-



hundred and sixty-three (563) individuals. UH-PDC is compiling information on service and support needs (needs assessment) of individuals who have experienced a neurotrauma injury and their families. Consistent with Strategic Plan objectives 3.1 and 3.2, information of available services and supports to individuals and families will go into a searchable database operated and maintained by the UH-PDC. UH-PDC will analyze this data and make recommendations to the Neurotrauma Program and the NTAB.

(4) Necessary administrative expenses to carry out this chapter:

In FY 2020, the DOH expended \$70,000 from the NSF for various statewide educational and awareness activities. These expenses were consistent with the goals and objectives set forth by the TBIAB, NTAB, and DOH.

In FY 2020, a total of \$780,000 was deposited into the funds from traffic surcharge collections. This amount is a \$111,658 increase compared to FY 2019. The total expenditure as of June 30, 2020 was \$650,854. As of July 1, 2020, there was a beginning unencumbered cash balance of \$1,062,153 in the NSF.

A projected FY 2021 budget for the NSF is provided in Attachment IV. The Neurotrauma Program, with the input from the TBIAB, NTAB and other community constituents plans to utilize the NSF in accordance to Section 321H-4, HRS, by supporting:

- **RAPID Hawaii: A Statewide Collaboration on Acute Stroke Care** with QMC to increase capacity to treat patients throughout the islands by educating providers on assessing the appropriateness of using mechanical thrombectomy for patients to prevent disabilities;
- **Project Head, Neck & Spine: Safety Awareness and Education** by UH-KRS to develop and implement an online educational resource that will educate school-age children on the seriousness of head (concussions), neck and spinal cord injuries;
- **Education & Dissemination of Information** to the public through dissemination of written information (e.g. TBI, Spinal Cord and Stroke Discharge folders; conferences; helpline; mentoring, etc.) and information on its website. The website allows the program to give and receive feedback from the public.

## ATTACHMENT I

### NEUROTRAUMA ADVISORY BOARD

#### Chapter 321H-3, HRS

##### VOTING MEMBERSHIP

Molly Trihey

Angie Enoka

Rita Manriquez

Sara Farnham

Leilani Nutt

VACANT

Matthew Wells

Milton Takara

Scott Sagum

Stella Wong

Valerie Yamada

##### TERM REPRESENTATION

Neurotrauma Injury Survivor/Spinal  
Cord Injury

Neurotrauma Injury  
Survivor/Traumatic Brain Injury

TBIAB Member

Private Sector

Queen's Medical Center Trauma  
Center

Brain Injury Association of Hawaii  
Representative

Pali Momi Medical Center

At-Large

Chair and Neurotrauma Injury  
Survivor/Stroke

At-Large

At-Large

## ATTACHMENT II

### **NEUROTRAUMA SUPPORTS STRATEGIC PLAN**

#### **FISCAL YEARS 2018-2020**

**Goal 1: Expand public and professional awareness about neurotrauma and service delivery.**

**Objectives:**

**1.1:** Identify partners and organizations (e.g., Brain Injury Association of Hawai'i, Hawai'i Disability Rights Center, Pacific Disabilities Center at the University of Hawai'i and the American Stroke Association) to promote neurotrauma awareness during various designated months (e.g. national spinal cord injury awareness month, stroke awareness month, brain injury awareness month, disability awareness month, disability employment awareness month).

**1.2:** Expand presentations for community organizations and the public, featuring interviews with professionals in the field of neurotrauma and survivors of neurotrauma and their family members

**1.3:** Increase awareness and knowledge of neurotrauma and identification among disability and health care providers, including mental health; community health; health care agencies providing in-home supports or caregiver services; and substance abuse programs.

**Goal 2: Increase state's capacity to identify and disseminate information about resources, services, and supports to individuals with neurotrauma and their families.**

**Objectives:**

**2.1:** Increase data reporting to obtain a more accurate assessment of the needs of individuals with neurotrauma and their family members through the neurotrauma registry.

**2.2:** Expand capacity through existing disability and health care systems.

**2.3:** Identify funding mechanisms and opportunities for expanding capacity.

**Goal 3: Identify strategies and partnerships to improve access to health care, rehabilitation, education, and community-based long-term services and supports and community integration for individuals with neurotrauma.**

**Objectives:**

**3.1:** Research to identify and expand the database of services and supports currently available in order to link survivors of neurotrauma and family members to these resources (e.g., Aging and Disability Resource Center, SPIN, 2-1-1, etc.).

**3.2:** Identify methods to access services and supports for individuals with neurotrauma who live on the neighbor islands (e.g., telehealth, support groups, mentorships, disability programs).

**3.3:** Identify opportunities for self-advocacy training to empower individuals with neurotrauma to access services to meet their needs.

## ATTACHMENT III

### **NEUROTRAUMA SUPPORTS STRATEGIC PLAN**

FISCAL YEARS 2021-2023

**Goal 1: In coordination with community partners, expand educational opportunities to the public sector on all neurotrauma injuries to increase awareness on the effects of neurotrauma and how to respond to an injury.**

**Objectives:**

**1.1:** Provide survivors and caregivers with awareness of how a neurotrauma injury can affect a person's life immediately following an injury and throughout their lifetime.

**1.2:** Educate the public on the signs, symptoms and what to do when recognizing a TBI, SCI or Stroke.

**1.3:** Coordinate public education efforts to maximize the impact and ensure efforts are not being duplicated.

**Goal 2: In coordination with community partners, connect providers to educational opportunities to increase awareness of neurotrauma and improve service delivery and outcomes for the survivors they serve.**

**Objectives:**

**2.1:** Provide social workers and medical providers with insight on survivors' experiences and methods for effective communication to improve collaboration between patient and provider.

**2.2:** Work with administration and staff involved with educating youth to establish and implement a Return-to-Learn protocol for students exhibiting signs of a TBI, including the identification of TBI signs and symptoms and how to discuss with parents.

**Goal 3: Expand survivors', family members', and caregivers' connections to available resources in Hawaii.**

**Objectives:**

**3.1:** Work with hospital staff and interested stakeholders to develop and implement an effective way to share information and resources with survivors to increase access to services and supports.

**3.2:** Provide guidance for members of the neurotrauma community to gather in a safe space to share thoughts, ideas and resources on a regular basis.

**Goal 4: Use data to identify the needs and service gaps for survivors of neurotrauma and family members/caregivers.**

**Objectives:**

**4.1:** Develop and implement a plan for obtaining generalizable data.

**4.2:** Develop and implement a plan to analyze data and identify service gaps to direct program activities.

**ATTACHMENT IV**

**PROJECTED BUDGET FOR THE NEUROTRAUMA SPECIAL FUND**  
**FY 2021**

Beginning Cash Balance as of 7/1/20	\$ 1,062,153
Estimated Revenues FY 2021	\$ 550,000
<u>FY 21 Estimated Expenses</u>	
Contract Encumbrances	
1. Queen's Medical Center RAPID Hawaii	\$ 180,000
2. University of Hawai'i Kinesiology and Rehabilitation Science Project Head, Neck, Spine	\$ 219,670
3. Online survey for Hawaii Neurotrauma Registry	\$ 12,500
4. Research Corporation of the University of Hawaii Concussion Summit	\$ 10,000
5. Website Maintenance	\$ 7,540
Get with the Guidelines Stroke Data	\$ 8,500
Behavioral Risk Factor Surveillance System Data	\$ 6,000
NASHIA Membership	\$ 1,000
Support for Virtual Conferences	\$ 25,000
Personnel	\$ 292,636
<hr/> Total Expenses	\$ 762,846
Estimated Ending Cash Balance as of 6/30/2021	\$ 849,307

**[CHAPTER 321H]  
NEUROTRAUMA**

Section

- 321H-1 Definitions
- 321H-2 Neurotrauma system
- 321H-3 Neurotrauma advisory board
- 321H-4 Neurotrauma special fund
- 321H-5 Rules

**[\$321H-1] Definitions.** As used in this chapter, unless the context requires otherwise:

"Board" means the neurotrauma advisory board established under section 321H-3.

"Department" means department of health.

"Director" means the director of health.

"Neurotrauma" means a severe chronic disability of a person that is attributable to an injury to the central nervous system, such as traumatic brain injury and spinal cord injury, and likely to continue indefinitely. Neurotrauma can include other neurological dysfunctions but does not include substance misuse and abuse, Alzheimer's disease, or the infirmities of aging. Neurotrauma or other neurological deficits result in substantial functional limitations in two or more of the following areas:

- (1) Self-care;
- (2) Speech, hearing, or communication;
- (3) Learning;
- (4) Mobility;
- (5) Self-direction;
- (6) Capacity for independent living; and
- (7) Economic sufficiency. [L 2002, c 160, pt of §2]

**[\$321H-2] Neurotrauma system.** The department of health shall develop, lead, administer, coordinate, monitor, evaluate, and set direction for a comprehensive system to support and provide services for survivors of neurotrauma injuries. [L 2002, c 160, pt of §2]

**§321H-3 Neurotrauma advisory board.** (a) There is established within the department a neurotrauma advisory board to advise the director in implementing this chapter.

(b) The board shall consist of eleven members to be appointed by the director. The director shall designate a member to be the chairperson of the advisory board. The director or a designee shall serve as an ex officio, nonvoting member of the advisory board. The director may also appoint up to three state and county representatives whose work relates to

neurotrauma to be ex officio, nonvoting members of the board. The members shall serve for a term of four years; provided that upon the initial appointment of members, two shall be appointed for a term of one year, three for a term of two years, three for a term of three years, and three for a term of four years. In establishing the advisory board, the director shall appoint:

- (1) Two survivors of neurotrauma or their family members (one for traumatic brain injuries and one for spinal cord injuries);
- (2) One member of the Brain Injury Association of Hawaii;
- (3) One member representing the state traumatic brain injury advisory board;
- (4) Two members representing private sector businesses that provide services for neurotrauma survivors;
- (5) One member representing trauma centers that provide services for neurotrauma survivors;
- (6) One representative for persons with stroke; and
- (7) Three at-large members.

(c) The members shall serve without compensation but shall be reimbursed for actual expenses, including travel expenses, that are necessary for the performance of their duties.

(d) The number of members necessary to constitute a quorum to do business shall consist of a majority of all the voting members who have been appointed by the director and have accepted that appointment. When a quorum is in attendance, the concurrence of a majority of the voting members in attendance shall make any action of the board valid. [L 2002, c 160, pt of §2; am L 2014, c 191, §1]

**§321H-4 Neurotrauma special fund.** (a) There is established the neurotrauma special fund to be administered by the department with advisory recommendations from the neurotrauma advisory board. The fund shall consist of:

- (1) Moneys raised pursuant to the surcharges levied under sections 291-11.5, 291-11.6, 291C-12, 291C-12.5, 291C-12.6, 291C-102, 291C-105, and 291E-61;
- (2) Federal funds granted by Congress or executive order, for the purpose of this chapter; provided that the acceptance and use of federal funds shall not commit state funds for services and shall not place an obligation upon the legislature to continue the purpose for which the federal funds are made available; and
- (3) Funds appropriated by the legislature for the purpose of this chapter.

(b) The fund shall be used for the purpose of funding and contracting for services relating to neurotrauma as follows:

- (1) Education on neurotrauma;
- (2) Assistance to individuals and families to identify and obtain access to services;
- (3) Creation of a registry of neurotrauma injuries within the State to identify incidence, prevalence, individual needs, and related information; and
- (4) Necessary administrative expenses to carry out this chapter not to exceed two per cent of the total amount collected.

(c) Moneys in the neurotrauma special fund may be appropriated to obtain federal and private grant matching funds, subject to section 321H-4(a)(2).

(d) In administering the fund, the director shall maintain records of all expenditures and disbursements made from the neurotrauma special fund.

(e) The director shall submit to the legislature an annual report on the activities under the neurotrauma special fund no later than twenty days prior to the convening of each regular session. [L 2002, c 160, pt of §2; am L 2006, c 129, §6]

**[§321H-5] Rules.** The director may adopt rules under chapter 91 necessary to carry out this chapter. [L 2002, c 160, pt of §2]