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RHODE ISLAND HEPATITIS C ELIMINATION PLAN



2023 - 2027

Prepared by the Rhode Island Department of Health,
Rhode Island Department of Corrections, and
Rhode Island Executive Office of Health and Human Services
in collaboration with the Rhode Island Hepatitis C Action Coalition

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RHODE ISLAND HEPATITIS C ELIMINATION PLAN 2023–2027

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INTRODUCTION

This document represents a five-year plan to eliminate hepatitis C virus (HCV) in Rhode Island. The plan was prepared in partnership with the Rhode Island Department of Health (RIDOH), Rhode Island Department of Corrections (RIDOC), and the Executive Office of Health and Human Services Medicaid Office (EOHHS), and in collaboration with the Rhode Island Hepatitis Action Coalition (RIHAC) (see Appendix A for List of RIHAC Members). *The ambitious goal of this plan is for Rhode Island to be a national leader in HCV elimination.*

With input, guidance, and support from RIHAC members and other partners, the purpose of this plan is to create a framework for mobilizing action towards HCV elimination.

The target audience for this plan includes a variety of stakeholders including clinicians, community leaders, people with lived experience, policy makers, academic partners, and members of state and non-governmental agencies.

This plan is being developed to strengthen cross-sector partnerships to improve current systems and address gaps related to the prevention, screening, diagnosis, and treatment of HCV. Several developments in the field of HCV have emerged in recent years that will play important roles in the roll-out of this strategic plan. These developments include:

- Increased funding to RIDOH from the Centers for Disease Control and Prevention (CDC) to invest in HCV surveillance and prevention activities.
- Increased federal funding and focus on overdose prevention among people who use drugs (PWUD), creating opportunities to expand harm reduction and HCV testing for this high priority population.
- Passage of state legislation to create harm reduction centers and to ensure privacy and confidentiality of health services.
- Elimination of Medicaid restrictions related to access to antiviral therapies.
- Updated clinical guidelines and recommendations for routine opt-out screening in clinical settings¹, including HCV screening at least once in a lifetime for all adults 18 years and older.
- Expansion of access to HCV clinical care for high-priority populations in correctional settings, opioid treatment provider sites, and high-risk neighborhoods.

This plan is comprised of six primary components:

1. Robust HCV surveillance system
2. Community-based strategies to prevent HCV transmission among people who use drugs and other priority populations
3. Routine opt-out testing for all adults age 18 and older
4. Improved access to routine HCV clinical care, treatment, and follow-up
5. Achieve health equity and reduce shame and stigma
6. Community partnerships, policy development, and evaluation

These six components are broken down by chapter into the following elements: Key partners, background and current status, priorities, desired outcomes, and goals.

This plan is intended to complement and align with the goals outlined in the United States Health and Human Services Viral Hepatitis Strategic Plan 2021-2025:²

- **Goal 1:** Prevent new viral hepatitis infections
- **Goal 2:** Improve viral hepatitis-related health outcomes for people with viral hepatitis
- **Goal 3:** Reduce viral hepatitis-related disparities and health inequities
- **Goal 4:** Improve viral hepatitis surveillance and data usage
- **Goal 5:** Achieve integrated, coordinated efforts that address the viral hepatitis epidemics among all partners and stakeholders



HEPATITIS C VIRUS INFECTION AS A RHODE ISLAND PUBLIC HEALTH PRIORITY

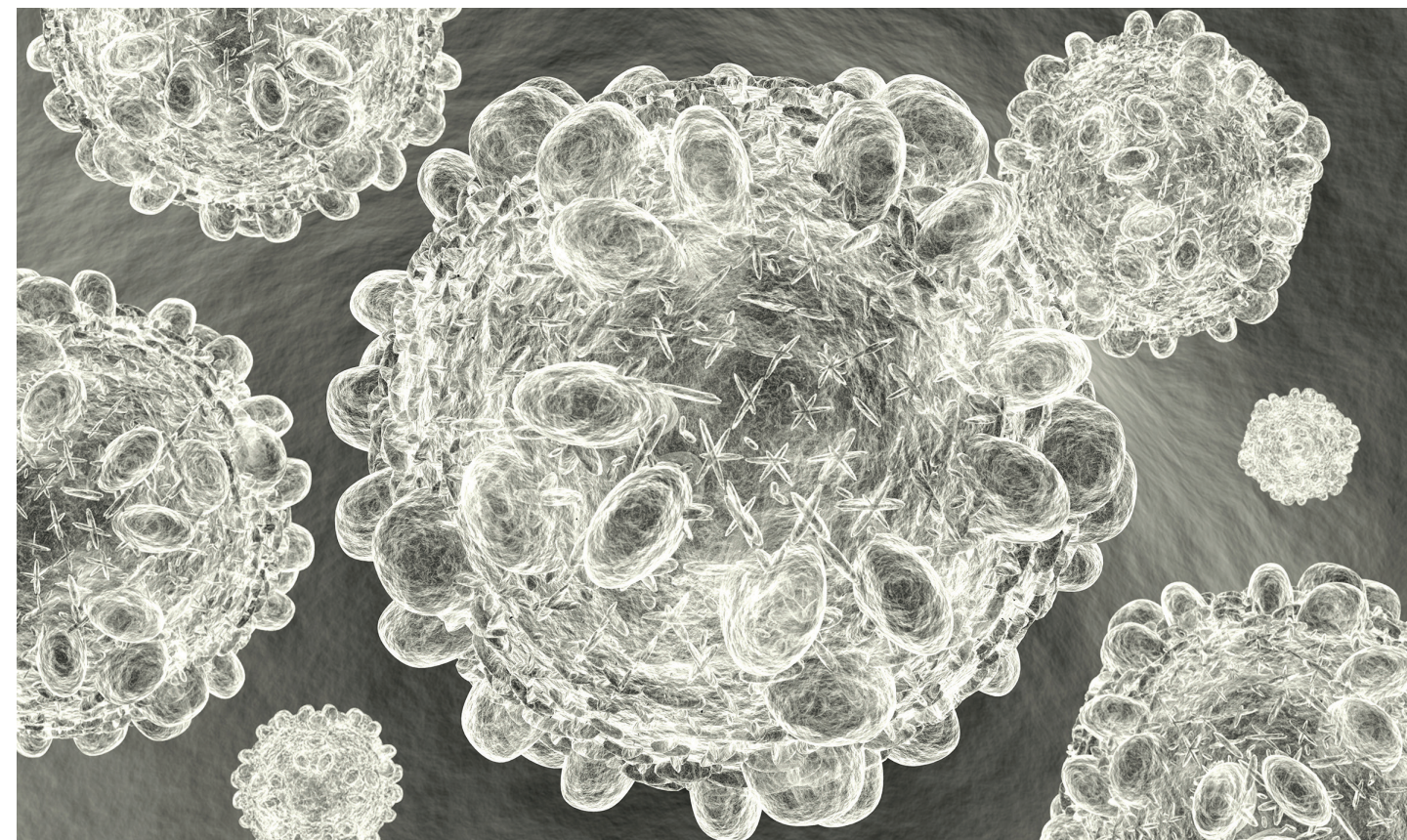
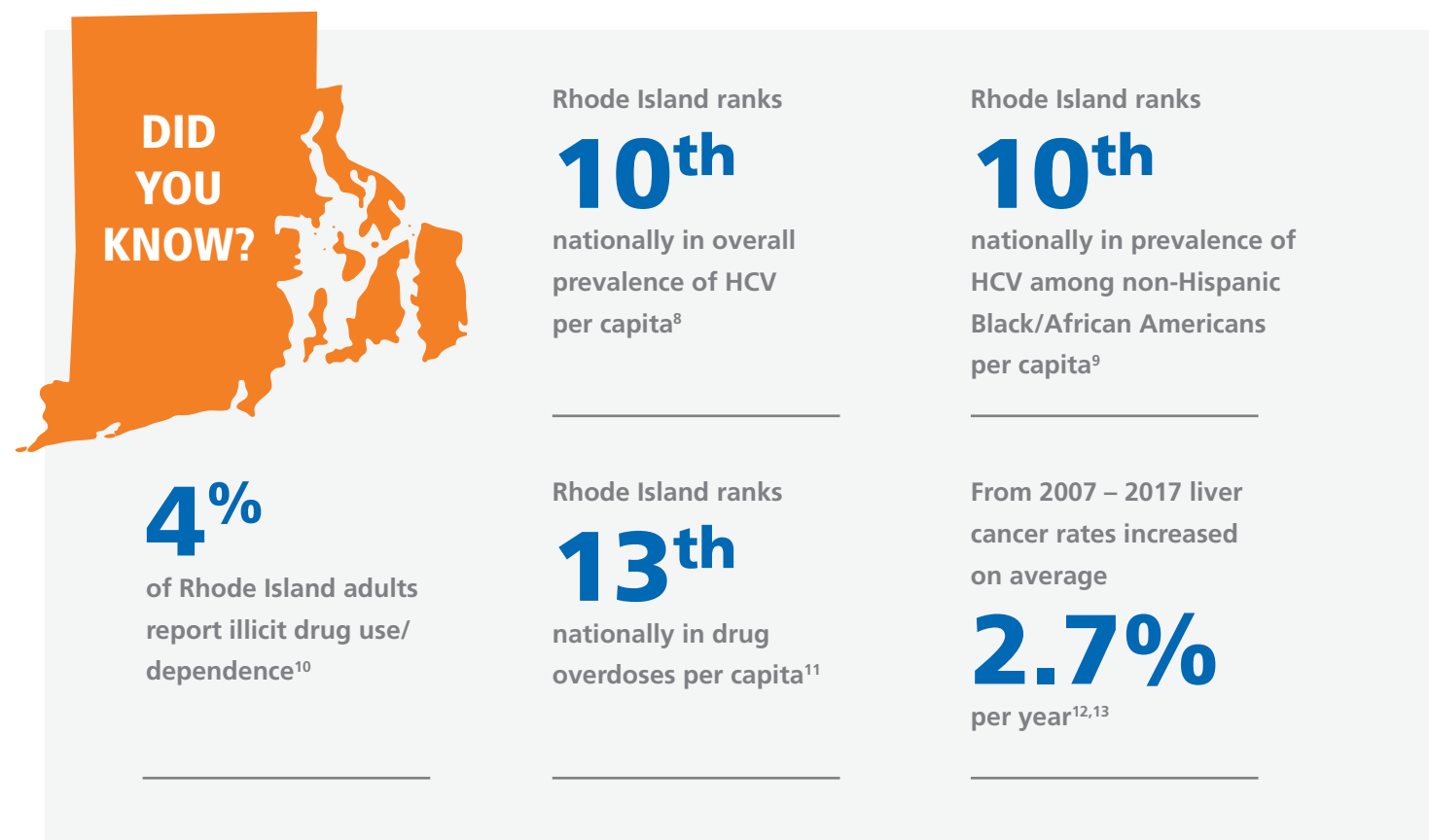
Hepatitis C is a blood-borne infectious disease caused by HCV. If left untreated, chronic HCV can lead to serious health problems and death. HCV primarily affects the liver and can cause liver disease and cirrhosis. Complications associated with cirrhosis include liver cancer and liver failure. Liver failure due to HCV infection is one of the most common reasons for liver transplantation in the United States. Among Rhode Islanders, from 2015 to 2019 HCV was a leading infectious disease cause of death, with 57 HCV-related deaths reported in 2019.³

In 2013 a study was published that estimated between 16,603 and 22,660 people in Rhode Island (approximately 2% of the population) have ever been infected with HCV.⁴

The course of HCV infection is variable. Among individuals infected with HCV, about 30% (ranging from 15% to 45%) will spontaneously clear the virus within six months of infection. The remaining 70% (ranging from 55% to 85%) of persons will develop chronic HCV infection. Of those with chronic HCV infection, the risk of cirrhosis ranges from 15% to 30% within 20 years.⁵ HCV is considered a silent killer because it can be asymptomatic until very late in the disease course.

Reducing the transmission, morbidity, and mortality associated with HCV requires a coordinated set of targeted public health, community-based, and clinical interventions. These interventions should include consideration of the various features of HCV epidemiology, transmission disruption, and clinical treatment, including:

1. HCV disproportionately impacts people who use drugs and people who have been incarcerated. Other impacted groups include people living with HIV, communities of color, men who have sex with men who are on PrEP, and people who received a blood transfusion or organ transplant before July 1992.⁶ Other risk factors for HCV include unstable housing, living in poverty, and people without a high school diploma. People who are African American represent 12% of the total population yet account for 25% of those with chronic HCV.
2. Primary prevention efforts should include referral to opioid agonist therapy and comprehensive community-based harm reduction approaches that incorporate needle exchange services and rapid HCV screening/referral services (ideally test-to-treat), in combination with other drug user health and overdose prevention efforts.
3. Guidelines recommending routine and opt-out screening in all clinical settings have recently been published.⁷ These guidelines include screening for adults aged 18 and older, and for younger patients with risk factors. People with risk factors should be tested regularly.
4. While effective medications to cure HCV are available (99% of people living with HCV may be cured with safe, short-duration antivirals), treatment needs to be made widely accessible, and appropriate payment for HCV testing and clinical care must be ensured.
5. Gaps in HCV clinical services need to be filled through provider training delivered in a variety of primary care and specialty clinical settings.
6. Gaps exist in the current statewide coordinated system of hepatitis prevention, testing, and engagement in care for high priority populations.
7. Various societal factors strongly impact at-risk groups for HCV, including social determinants of health, health equity, bias and stigma, and discrimination.



RHODE ISLAND LAWS PERTAINING TO HEPATITIS C REPORTING, PREVENTION, AND CONTROL



Reporting of Communicable Diseases

Under Rhode Island General Laws § 23-8-1, Reports of Communicable Diseases, the Director of Health may, by regulation, declare any disease to be reportable. Current regulations under Section 1.5.3 Reportable Diseases and Conditions require that laboratories report all positive HCV results, as well as levels of aspartate aminotransferase (AST), alanine aminotransferase (ALT), bilirubin total, and bilirubin direct. The regulations also require that physicians report: 1) all cases of acute HCV infection (as defined by the Centers for Disease Control and Prevention) within four days of recognition; and 2) pregnancy in a chronically infected patient.

Prevention of Blood Borne Infectious Diseases

A cornerstone of public health intervention for reducing the transmission of blood-borne infections such as HCV and HIV, is ensuring that there are laws that permit access to sterile needles and syringes. Below are the three Rhode Island state laws related to sterile needles and syringes, in addition to other health services for people who use drugs:

- 1. Needle Exchange Programs:** Passed in 1994, Rhode Island General Laws § 23-11-19 Exchange of Hypodermic Needles and Syringes, instructs the Director of the Department of Health to maintain a program offering the free exchange of new hypodermic needles and syringes for used hypodermic needles and syringes to prevent the transmission of human immunodeficiency virus (HIV) or viral hepatitis among PWUD 8 years of age and older. As of January 2022, Rhode Island is only one of 28 states that legally permit needle exchange programs.
- 2. Licensed Pharmacies Allow Sale of Syringes and Needles:** Passed in 2000, Rhode Island General Laws § 21-28-4.04 states that the sale of hypodermic and retractable hypodermic syringes, needles, or any instrument adapted for the administration of drugs by injection shall not be sold except in licensed pharmacies. Every sale shall be made subject to the rules and regulations of the Director of the Department of Health.
- 3. Two-Year Pilot of Harm Reduction Centers:** Passed in 2021, Rhode Island General Laws § 23-12.10-1, authorizes a two-year pilot program to prevent drug overdoses through the establishment of harm reduction centers, a community-based resource for health screening, disease prevention, and recovery assistance where persons may safely consume pre-obtained substances. Rhode Island is the only state to have a law that permits the operation of harm reduction centers, also known as safe injecting sites.

Privacy and Confidentiality of Health Care Services

Confidentiality of Health Care and Information: Passed in 2021, Rhode Island General Laws § 5-37.3, allows health insurers to permit an insured individual to request that communications containing confidential healthcare information be communicated to the insured individual at a specific mail or email address, or specific telephone number. This would allow a person who is covered under someone else's health insurance policy (such as a parent or spouse) to access HCV testing and treatment confidentially.

EPIDEMIOLOGY OF HEPATITIS C VIRUS IN THE UNITED STATES AND RHODE ISLAND

The Centers for Disease Control and Prevention estimates that 2.4 million adults in the U.S. were living with HCV in 2013–2016, representing about 1.0 % of all adults in the U.S. During the national opioid crisis in recent years, new HCV infections have been rising primarily in young adults, whereas in the past, the highest prevalence of chronic hepatitis C was among baby boomers (people born between 1945–1965).¹⁴

The U.S. is experiencing dramatic increases in HCV in recent years; HCV rates nearly tripled between 2011–2018, which can be attributable to injection drug use driven by the opioid crisis.¹⁵ The U.S. rates of maternal HCV infection at delivery increased from 0.8 per 1,000 live births in 2000 to 4.1 in 2015, with the highest increases among women with opioid use disorder.¹⁶

Previous studies using mathematical models drawn from national data trends suggested that approximately 16,603 to 22,660 individuals in Rhode Island (1.7% to 2.3% of Rhode Islanders) have ever been infected with HCV.¹⁷ Current HCV surveillance infrastructure in Rhode Island is being developed and implemented thanks to federal funding received in 2021 from the Centers for Disease Control and Prevention. To date, HCV estimates are based on a combination of National Health and Nutritional Examination Survey (NHANES) extrapolation and modeling exercises, rather than data collected and reported through an electronic HCV surveillance system.

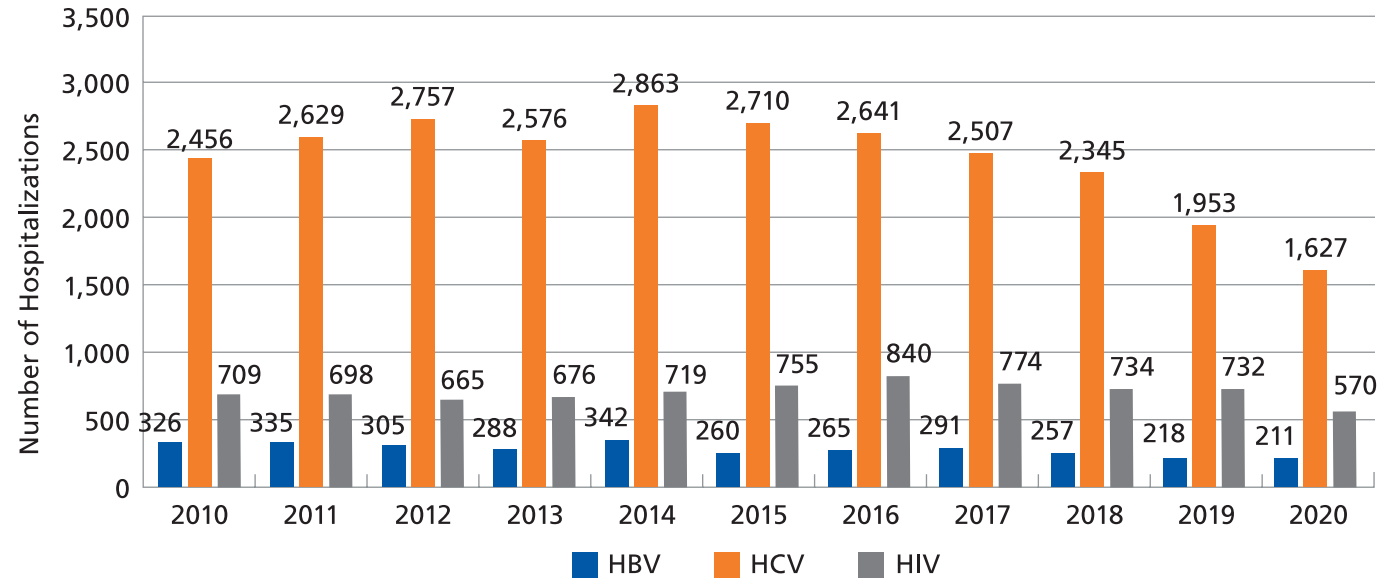
Aligning with the global HCV prevalence among the incarcerated population, HCV prevalence at the RIDOC is significantly higher than the general population. The prevalence estimation ranged from 10% to 23.1% (10% from a rapid HCV testing study¹⁸, 17.3% from a mathematical model¹⁹, and 23.1% from its retrospective study.)²⁰ The infections are significantly associated with injection drug use.²⁰

HCV screening in Rhode Island has also increased in recent years, both in clinical and non-clinical settings. The HCV prevalence rate, based on antibody testing from health systems and laboratories represented, ranged from 3.7% to 6%. The percentage of individuals with confirmed chronic HCV who underwent antibody screening is unknown. However, based on national estimates, this percentage would likely range from 3.1% to 5.1%. These trends suggest that the HCV disease burden in Rhode Island may be higher than previously estimated.²¹

In the last eight years, there has been a 44% decrease in HCV-related hospitalizations and deaths in Rhode Island.²² In 2020 there were 1,627 hospitalizations and 57 deaths associated with HCV among Rhode Islanders (based on death certificate data), compared to 2,863 hospitalizations and 102 deaths in 2014. In the decade prior to 2014, there was a fivefold increase in deaths observed due to HCV.

Historically, there has been little federal or state funding to build a comprehensive and complete HCV surveillance system in Rhode Island. The federal funding received in 2021 from the Centers for Disease Control and Prevention is an important investment in developing a robust HCV surveillance program that will allow for monitoring acute and chronic HCV case counts, detecting outbreaks, and informing prevention efforts.

FIGURE 1
Number of Inpatient Hospitalizations with Any Discharge Diagnosis of HBV, HCV, or HIV, Rhode Island, 2011-2020



Source: Rhode Island Department of Health

Between 2010 and 2020, the total number of HCV-related hospitalizations per year was greater than those related to HBV and HIV combined. The decline in HCV hospitalizations in recent years may be related to the availability of FDA-approved curative direct-acting antiviral (DAA) therapies beginning in December 2013.

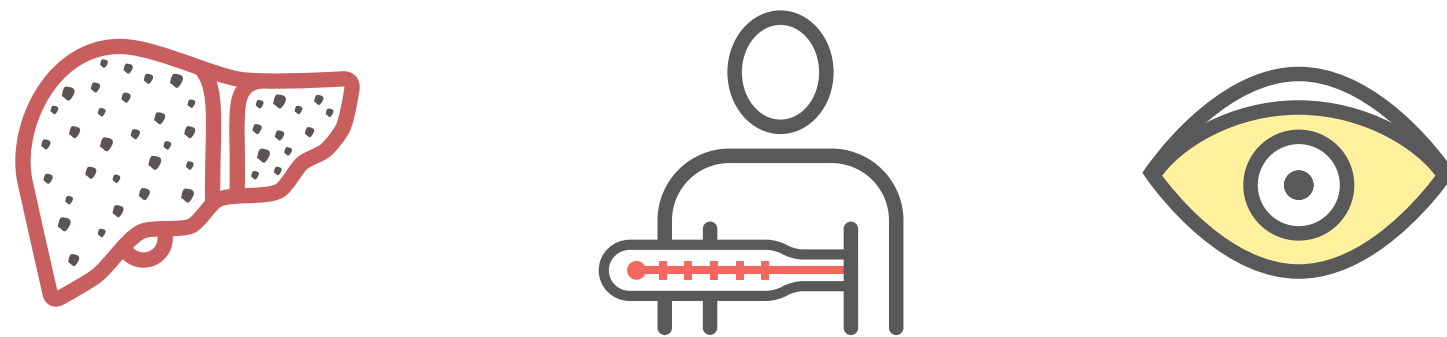
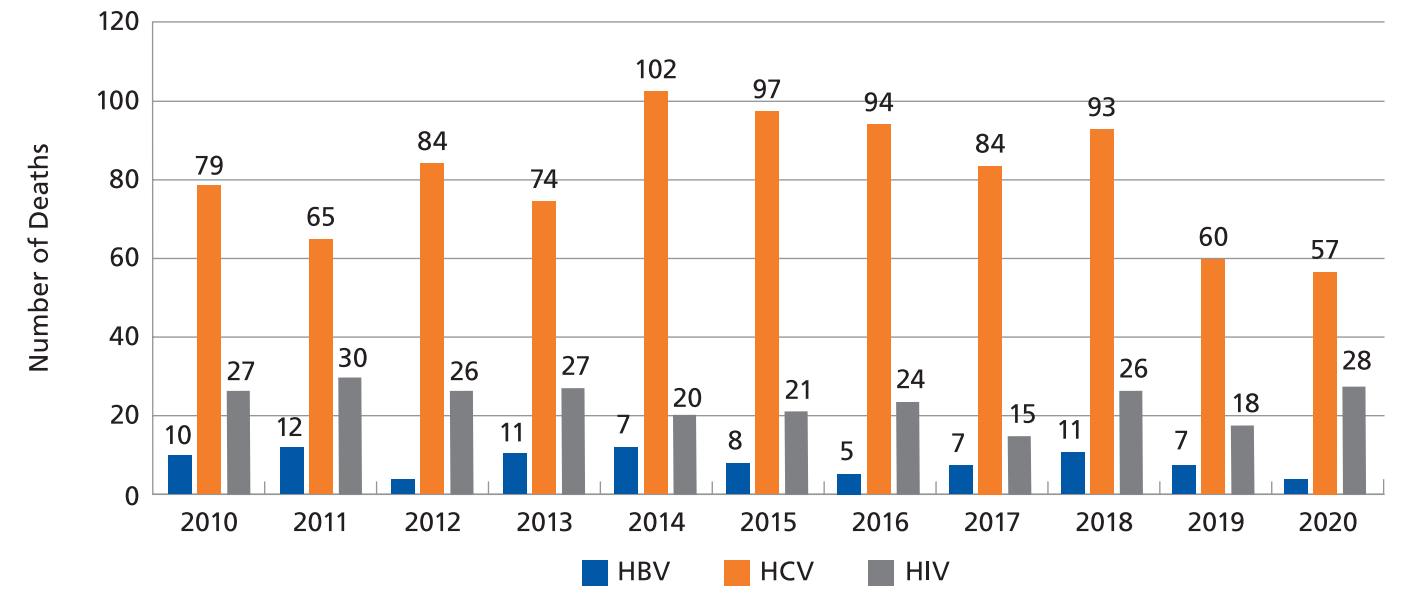
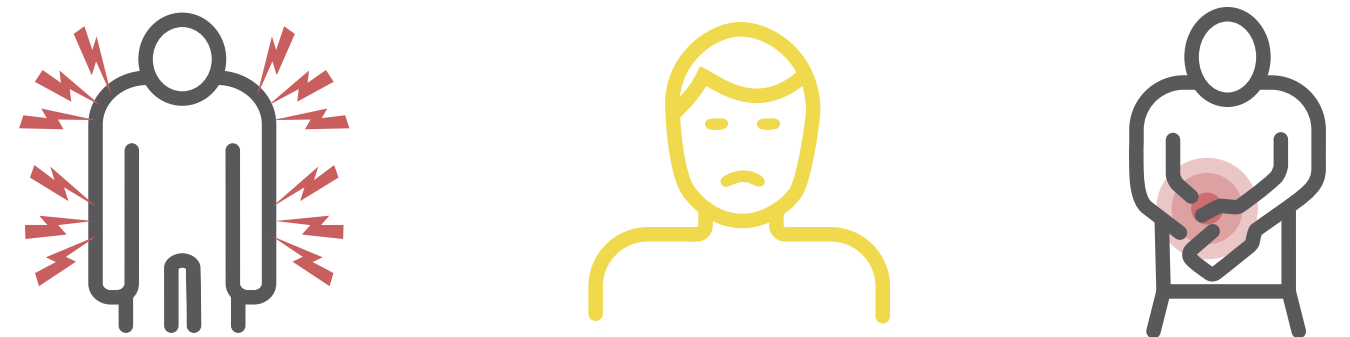


FIGURE 2
Number of Deaths Associated with HBV, HCV, and HIV, Rhode Island, 2011-2020

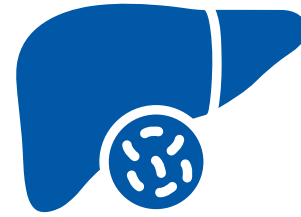


Source: Rhode Island Department of Health
 Note: values less than five are suppressed for confidentiality.

Between 2010 and 2020, the total number of HCV-related deaths per year was greater than those related to HBV and HIV combined. The decline in HCV deaths in recent years may be related to the advent of curative direct-acting antiviral (DAA) therapies.



COMPONENT 1: ROBUST HEPATITIS C SURVEILLANCE SYSTEM



Key Partners:

Rhode Island Department of Health (RIDOH), hospital clinical laboratories, commercial clinical laboratories, Rhode Island Medical Society.

Background and Current Status

RIDOH is the single, centralized health department in Rhode Island that carries out functions of both a local and state health department. RIDOH is home to the Division of Preparedness, Response, Infectious Disease, and Emergency Medical Services (PRIDEMS), which oversees the reporting of national- and state-reportable conditions, including acute and chronic HCV infections. PRIDEMS maintains a largely paper-based surveillance system with hard-copy reporting from laboratories and providers, although significant improvements to the electronic laboratory reporting (ELR) system have been made in recent years.

In Rhode Island, infectious disease surveillance is conducted using the NEDSS Base System (NBS) which has the capability of accepting ELRs. As of January 2022, laboratories that have been onboarded to report HCV results via ELR include Lifespan, LabCorp, Mayo Clinic Laboratories, and Quest Laboratories (location-dependent).

The movement to ELR is a major success in infectious diseases surveillance, especially among high volume laboratories, such as Lifespan and commercial laboratories. On an ongoing basis, RIDOH is actively onboarding more laboratories and health systems to receive results and count cases more efficiently.

A top RIDOH priority is to conduct a statewide laboratory needs assessment and review. Promotion of HCV reflex testing (routinely conducting an HCV RNA diagnostic test on all specimens that have an initial positive HCV antibody test) is a goal, in addition to ensuring robust reporting to the state health department for all cases of acute HCV and cases of pregnancy in chronically infected patients.

A prominent feature of the current HCV surveillance system is that it acts as a prompt for investigations into possible mother-to-child transmission of HCV. Specifically, positive HCV laboratory reports among women of child-bearing age are reviewed, and outreach to the ordering provider is conducted to ensure that proper medical care (including treatment for opioid use disorder) is provided to pregnant women and their infants, as appropriate.

As more laboratories are onboarded to the ELR system, RIDOH will have near real-time access to HCV antibody and nucleic acid testing (NAT) results, which facilitate confirmation of HCV infections and offer a greater opportunity to practice routine, robust surveillance in conjunction with established practices.

Priorities	Desired Outcomes
1. Develop a system to count and report to CDC cases of acute HCV reported to RIDOH that meet the CSTE case definition; maintain an HCV registry to avoid duplication of cases and monitor continuum-of-care.	a. Annually report cases of acute and chronic HCV to CDC using the NEDSS Base System (NBS).
2. Promote viral HCV-related testing in outpatient and hospital settings; encourage automatic reflex testing among laboratories; ensure functional reporting streams to the state health department.	b. Increased number of anti-HCV and RNA results performed statewide and in non-hospital settings.
3. Per CDC guidance, engage surveillance stakeholders; collaborate with internal and external partners to develop a plan to rapidly detect and respond to outbreaks of acute HCV.	c. Documented plan to detect and respond to outbreaks of HCV; surveillance system in place to report outbreaks to CDC.

Goals

1. Establish baseline data of annual counts of acute and chronic HCV infection.
2. Publish annual epidemiologic trends of HCV infection.
3. Create a Rhode Island HCV continuum-of-care cascade.



COMPONENT 2: COMMUNITY-BASED STRATEGIES TO PREVENT HEPATITIS C TRANSMISSION AMONG PEOPLE WHO USE DRUGS AND OTHER PRIORITY POPULATIONS



Key Partners:

Rhode Island Department of Health, Rhode Island Hepatitis Action Coalition, AIDS Care Ocean State (ACOS), CODAC, Project Weber/RENEW (PWR), Community Care Alliance, Governor’s Task Force on Overdose Prevention, Brown University School of Public Health, and Parent Support Network of Rhode Island.

Background and Current Status

Currently, Rhode Island has one of the most comprehensive statewide community-based programs in the United States to prevent HCV transmission among people who use drugs (PWUD). Using a harm reduction approach (that includes the distribution of sterile needles, disposal of used needles, rapid HCV screening, and referral to opioid agonist therapy), services are available through fixed site locations in core cities, street outreach, mobile van services, home delivered services, and harm reduction vending machines.

These services have been made available through community partnerships among AIDS service organizations, social service agencies serving commercial sex workers, homeless shelters, correctional facilities, and opioid treatment programs. Recent federal funding for overdose prevention efforts have been combined with drug user health funding to dramatically build and grow community-based harm reduction activities in Rhode Island.

Drug user harm reduction efforts at the community level began in the 1990s through the efforts of leaders and staff at ACOS, which opened the first Rhode Island needle exchange program in 1994. Since establishing the ACOS needle exchange program, the incidence of HIV among PWUD has dropped significantly, with fewer than five cases per year from 2010-2020.

During this time, ACOS adopted a drug user health philosophy that integrates the holistic needs of their client population into their services. These services include condom distribution to prevent HIV and sexually transmitted diseases, naloxone training/distribution to prevent overdose deaths, and opioid agonist therapy with methadone or buprenorphine treatment. In tandem, ACOS established a rapid HCV screening program that includes referrals to diagnostic testing and clinical care, as necessary.

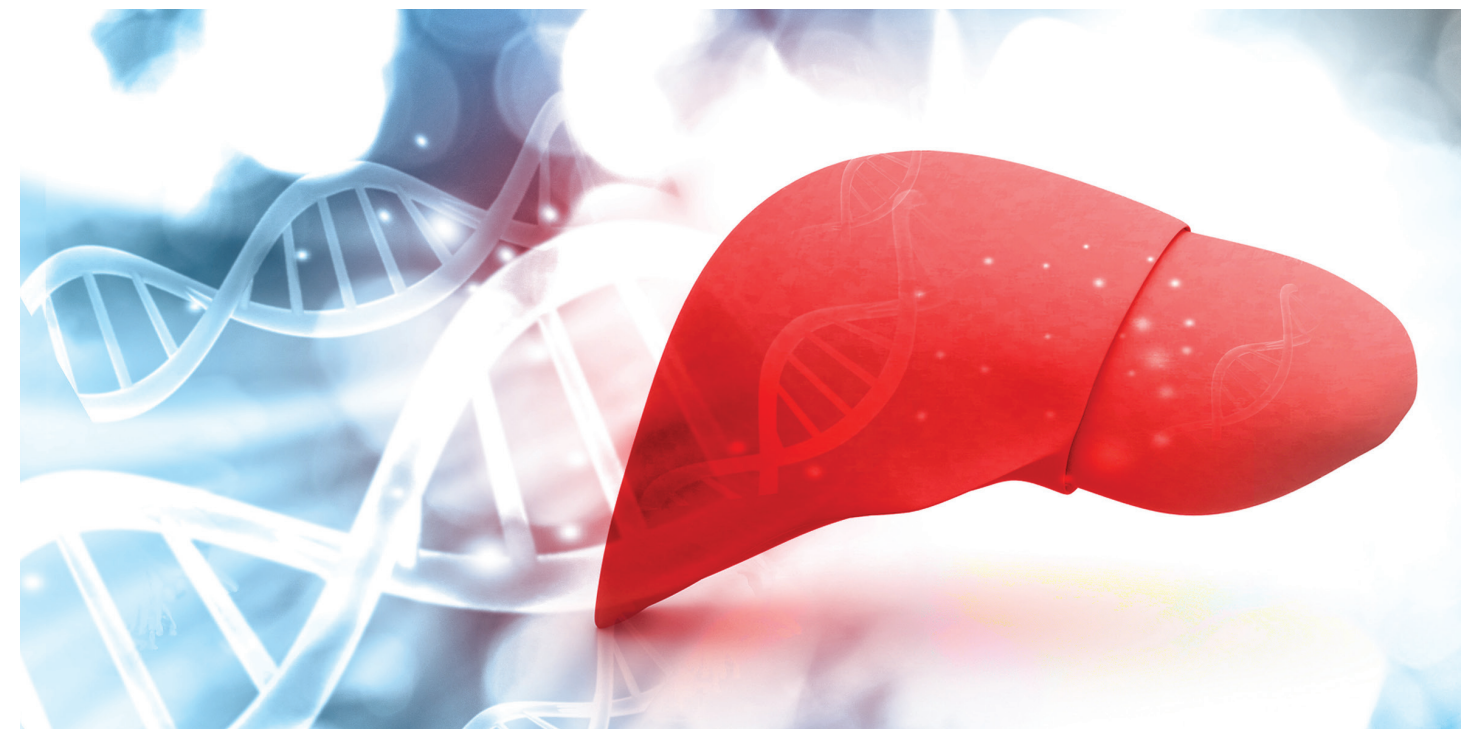
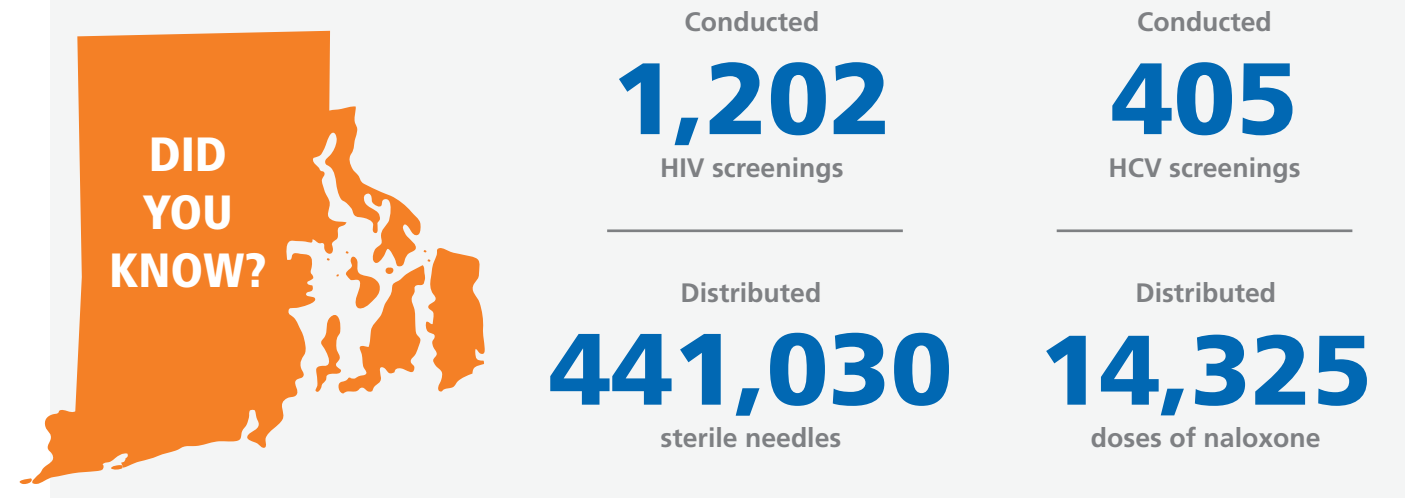
The advent of national and state funding for overdose prevention in recent years has created opportunities to work with new partners to advance and grow a system of harm reduction services. An outgrowth of this work is reaching a wider group of people at-risk for HCV, including commercial sex workers, communities of color, and people recently discharged from correctional facilities. Information about community-based programs (e.g., ENCORE Needle Exchange Program and community treatment) is included in HCV educational materials provided to incarcerated populations.

A primary feature of harm reduction organizations in Rhode Island is that their outreach workers are primarily staffed by peer recovery specialists. While the exact proportion peer staff at each organization varies, the percentage of peers range from 80% to 100%.

New funding has also supported efforts by the Brown University School of Public Health to conduct sophisticated machine-learning analyses to pinpoint specific neighborhoods in Rhode Island that represent communities at risk for drug user harms, including HCV and HIV outbreaks, as well as drug overdoses.

From a policy perspective, the Governor’s Taskforce on Overdose Prevention created a Harm Reduction Subcommittee in 2019 that acts as a forum for information sharing, advocacy, and policy development related to drug user health.

In a recent 12-month period, RIDOH’s community partners conducted 1,202 HIV screenings and 405 HCV screenings.



Rhode Island is a Pioneer in Harm Reduction Work



Harm Reduction Vending Machines

Rhode Island is one of only five states that has installed harm reduction vending machines (in partnership with social service agencies and health clinics) that make supplies available to individuals 24/7. These supplies include: sterile syringes, sharps disposal boxes, wound care kits, hygiene kits, condoms, naloxone, and fentanyl test strips.



Door-to-Door Delivery

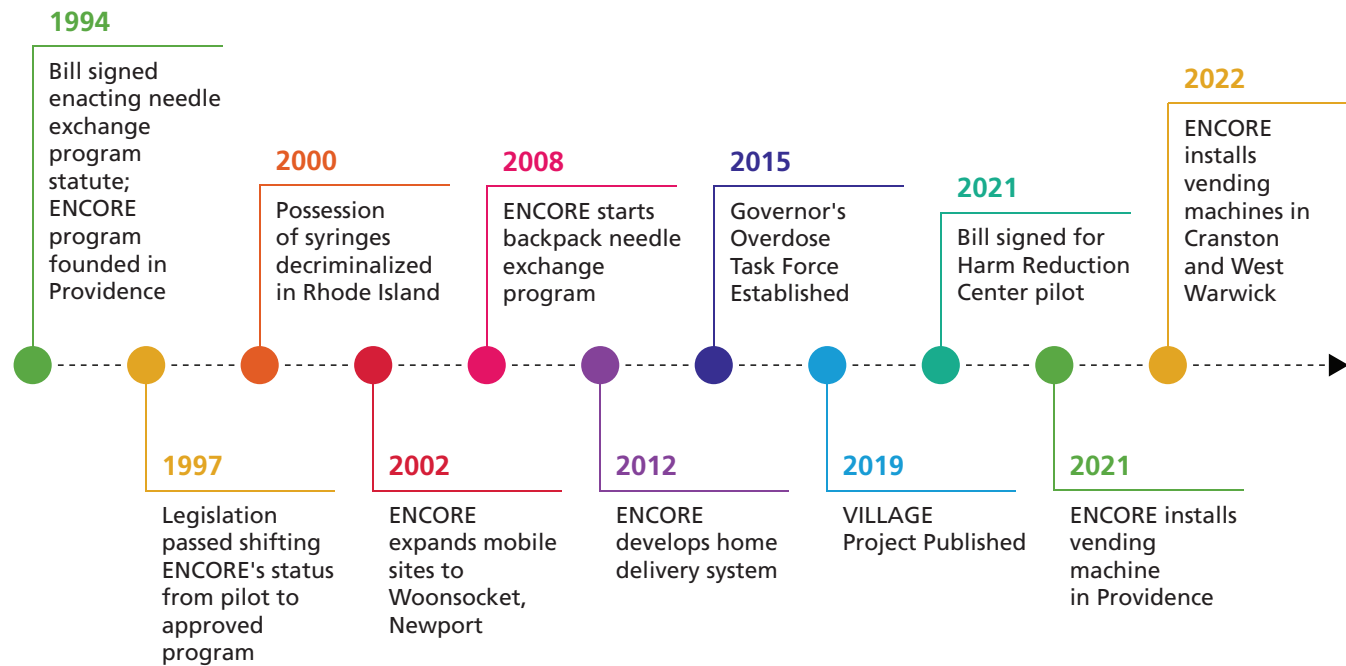
Rhode Island is the only state that provides statewide home-delivered harm reduction services. Within 24 hours of a request, harm reduction services (including HIV and Hepatitis C rapid testing) are delivered to a client's preferred location in every city and town in Rhode Island.



Harm Reduction Centers

Rhode Island is the first state to pass legislation related to harm reduction centers that will include the provision of harm reduction services and HCV testing to their consumers.

Achievements in Harm Reduction in Rhode Island, 1994-2022

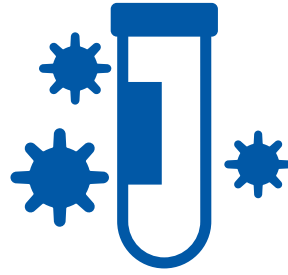


Priorities	Desired Outcomes
1. Prevent new viral hepatitis infections.	a. PWUD will have a decreased risk of contracting HCV-related to the sharing of syringes and other injecting equipment.
2. Utilize the Governor's Taskforce on Overdose Prevention Harm Reduction Workgroup to support funding for harm reduction.	b. Discuss and promote evidence-based interventions for harm reduction to reduce risk of infectious disease and overdose prevention.
3. Ensure programs are supported using a data-driven approach.	c. Establish a program dashboard evaluating key metrics on a quarterly basis. d. Regularly monitor trends and use data to support decision-making.
4. Continued funding for harm reduction activities in collaboration with OD partners	e. In partnership with community organizations, RIDOH will ensure that harm reduction programs have the greatest impact.
5. Continue to support SSPs.	f. PWUD will have access to safe syringes, which will decrease their risk for contracting HCV through injection drug use.
6. Increase community-based rapid screening programs for HCV.	g. Increased community-based HCV screening to facilitate referrals to clinical care (including diagnosis and treatment) for people living with undiagnosed HCV infection.

Goals

1. Ongoing support and strengthening of a state-wide coordinated network of harm reduction services.
2. Maintain multiple community points-of-access for harm reduction services including fixed sites, mobile vans, vending machines, and home-delivered services.
3. In conjunction with community-based rapid HCV screening programs, develop an efficient referral system for people living with undiagnosed HCV infection to clinical settings for HCV diagnosis and treatment services.
4. Annually update GIS mapping of neighborhoods at risk for drug user harms to pinpoint street outreach efforts.

COMPONENT 3: ROUTINE OPT-OUT TESTING FOR ALL ADULTS AGE 18 AND OVER



Key Partners:

Rhode Island Department of Corrections, Rhode Island Medical Society, Rhode Island Health Center Association, CODAC, Rhode Island AIDS Education and Training Center, The Warren Alpert Medical School of Brown University.

Background and Current Status

Routine opt-out HCV testing in all clinical settings is a key component of HCV elimination. Timely testing enables early identification of chronic HCV infection and treatment. Diagnostic HCV testing by serum or point-of-care with reflex testing for HCV RNA is highly accurate and critical to identifying those with chronic HCV infection.²³ Routine, opt-out HCV testing is recommended at least once for all adults 18 to 79 years old, and all pregnant women during each pregnancy.²⁴ Populations with ongoing risk factors for HCV infection, such as people who use drugs (PWUD), should be screened more frequently. Timely identification allows those with chronic HCV infection to be treated and prevents transmission to others.²⁵

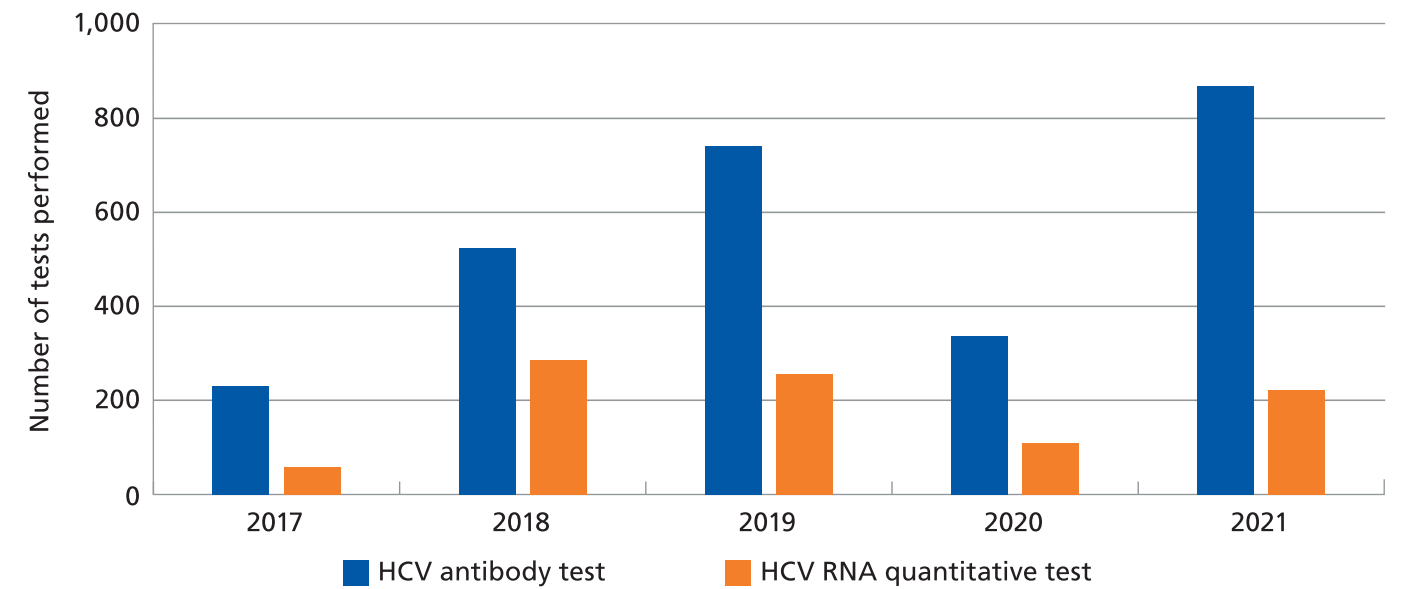
Barriers to HCV testing include lack of awareness of healthcare providers about current screening recommendations, lack of awareness of patients about HCV, lack of access to healthcare, discomfort discussing stigmatizing behaviors among healthcare workers, and the cost associated with care.²⁶ These barriers are especially prominent among marginalized and underserved populations including PWUD, incarcerated individuals, and communities of color. Offering routine, opt-out HCV testing in clinical testing has the potential to overcome some of these barriers. Testing in settings which engage at-risk individuals such as correctional settings, homeless shelters, substance use treatment clinics, emergency departments, and community healthcare centers has the potential to be a significant step toward HCV elimination.

The RIDOC has offered a routine opt-out HCV screening for all sentenced individuals since 2016. Non-sentenced individuals can self-report or request HCV screening at any time. Providers can refer patients with HCV risks such as injection drug use, previous incarceration, jailhouse tattoos, sexually transmitted disease diagnosis and/or HIV to the health specialists for disease education and HCV testing.

At RIDOC, a chronic hepatitis C status is determined either by previous diagnosis or confirmatory testing. A confirmatory test is an HCV RNA qualitative or quantitative test performed at six months after incarceration. If the test remains positive due to detectable virus, the individual has not self-cleared the infection and should be treated. Confirmed chronic HCV patients are then assessed for treatment. NAT or HCV RNA quantitative testing, instead of HCV antibody testing, may be obtained in known chronic HCV patients to accelerate HCV treatment. With this approach, testing at the RIDOC has gradually increased – 231 HCV antibody tests and 61 HCV RNA quantitative tests in 2017, 523 HCV antibody tests and 288 HCV RNA quantitative tests in 2018, and 860 HCV antibody tests and 224 HCV RNA quantitative tests in 2021. However, the screening rate remains lower than 50% due to a unique dynamic turnover of this population.

FIGURE 3

Number of HCV Tests Performed, Rhode Island Department of Corrections, 2017-2021



Source: Rhode Island Department of Corrections

Despite current HCV screening recommendations, rates are suboptimal and uneven across settings. National surveys of HCV screening rates have found that they are generally lower than 20%. Additionally, only 0.8% of persons born between 1945 and 1965 were screened over a one-year period.²⁷ These studies indicate that much more needs to be done in terms of HCV screening to address HCV elimination, including supporting the establishment of co-located test-to-treat sites.

Priorities	Desired Outcomes
1. Routine opt-out HCV screening in community clinics (i.e., federally qualified health centers).	a. 90% of patients will have been tested for HCV infection at least once in their lifetime.
2. Increase coverage of routine opt-out HCV screening in correctional settings.	b. All individuals at the RIDOC will be offered routine, opt-out HCV screening, regardless of their trial status. c. All sentenced individuals with an unknown HCV status will be tested for HCV infection.
3. Routine opt-out HCV screening in emergency departments and urgent care centers.	d. All individuals presenting at emergency or urgent care settings will be offered routine, opt-out HCV screening.
4. Expand role of pharmacists in offering-point of-care HCV testing.	e. Increased HCV testing in pharmacy settings.

Goals

1. All adult Rhode Islanders receive HCV screening at least once in their lifetime.
2. All people sentenced at RIDOC receive HCV testing.
3. All clients of outpatient treatment providers receive at least one HCV test.
4. All pregnant women receive HCV screening during pregnancy.



COMPONENT 4: IMPROVED ACCESS TO HEPATITIS C CLINICAL CARE



Key Partners:

Rhode Island Department of Corrections, Rhode Island Medical Society, Rhode Island Health Center Association, CODAC, Rhode Island AIDS Education and Training Center, Thundermist Health Centers, Roger Williams Medical Center, The Warren Alpert Medical School of Brown University, Rhode Island Defeats Hepatitis C Coalition.

Background and Current Status

In recent years, effective clinical treatments have reduced morbidity and mortality associated with HCV infection. These HCV treatments, called direct-acting antiviral (DAA) therapy, can cure HCV infections with an efficacy rate of greater than 99%. Despite the availability of effective treatments, according to the Centers for Disease Control and Prevention (CDC), new or acute viral hepatitis infections have increased in recent years. Nationally, from 2014 to 2018, the rate of acute HCV cases increased by 71%, with two-thirds of cases occurring among persons aged 20 to 39 years, the age group most impacted by the opioid crisis.

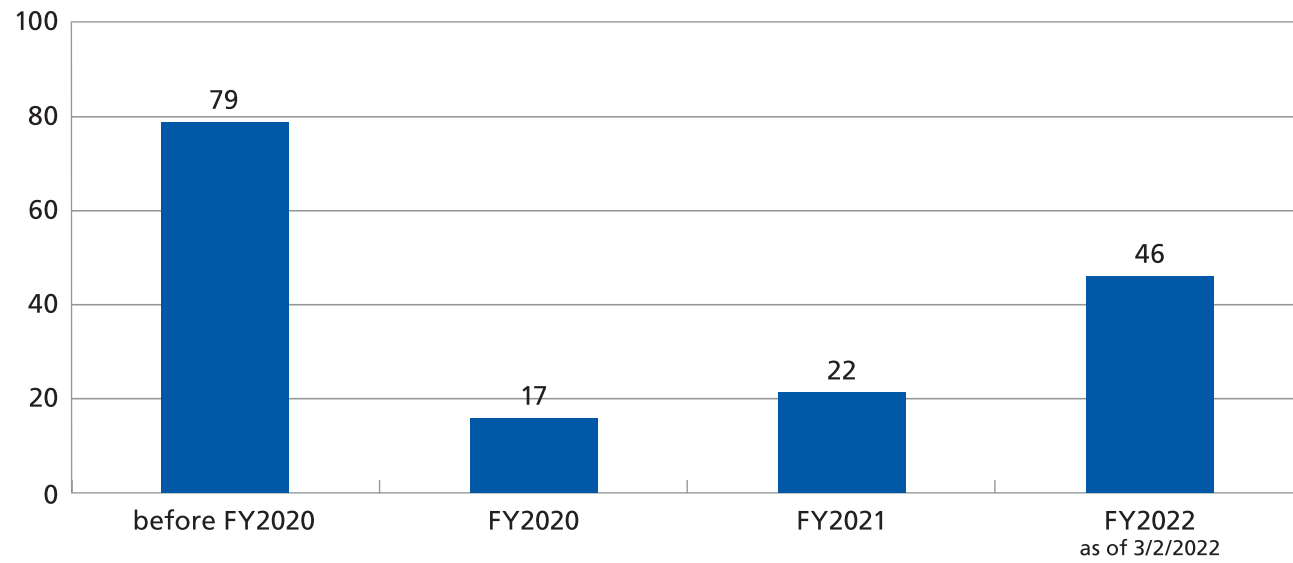
Access to HCV treatment in Rhode Island has been suboptimal. Historically, access to newer treatments has been restricted by high prices, required prior authorizations, and other barriers. Currently, many barriers have been removed. A current major challenge to improving HCV treatment access across Rhode Island is increasing provider awareness, comfort, time, and reimbursement to prescribe these treatments. Suboptimal provider knowledge is a critical component to address in improving access to HCV treatments. The current landscape of HCV clinical care in Rhode Island represents a mix of services in a variety of settings including private practices, community health centers, STD/STI specialty clinics, opioid treatment providers, and the RIDOC.

RIDOC has historically offered DAA treatment only to inmates who have chronic HCV, whose sentenced time was long enough to ensure treatment completion and SVR12. Approximately 100 patients were treated at the RIDOC before 2020. Of chronic HCV patients referred to community clinics, many cannot have their treatment status determined. Led by RIDOC Medical Director Justin Berk, MD, the RIDOC HCV committee is comprised of HCV providers and a case manager/health specialist that analyzes and improves the care process.

HCV identification-to-treatment time among RIDOC inmates has been reduced from an average of five months to two months. Collaborations with community providers (e.g., Open Door Health, CODAC, Thundermist) enable DAA initiated at RIDOC to be completed in the community. Liver fibrosis/cirrhosis is assessed with an on-site transient elastography machine, when indicated. The treatment is offered to patients with any liver fibrosis status. These efforts have greatly improved treatment access at RIDOC.

As RIDOC has escalated its treatment process and has increased access to HCV treatment for incarcerated patients, post-incarceration case navigation is a critical component to ensure preferable outcomes. It is especially important for patients with in-facility treatment initiation without in-facility treatment completion or SVR confirmation. An increase in case navigation on discharge (e.g., getting to appointments, tracking community follow up after incarceration, etc.) will also improve treatment compliance and offer more harm reduction discussion.

FIGURE 4
Number of HCV Treatment Provided at Rhode Island Department of Corrections (Fiscal Year)



Source: Rhode Island Department of Corrections



Priorities	Desired Outcomes
1. Increase HCV treatment and care (including hepatitis A and hepatitis B vaccinations, as appropriate) in Rhode Island by primary care providers through trainings.	a. Expanded access to HCV treatment for all populations and increase vaccination coverage for hepatitis A and B.
2. Increase the number of people with chronic HCV infection who achieve a sustained viral response.	b. Reduce HCV morbidity, mortality, and transmission.
3. Provide HCV comprehensive care and increase HCV treatment at RIDOC.	c. Treatment at RIDOC will be secured at the same or reduced cost. d. All RIDOC primary care providers will be able to treat and prescribe treatment for non-complex HCV-positive patients, as suggested by the expert guidelines (a simplified treatment algorithm by AASLD) e. All sentenced chronic HCV-positive patients receive comprehensive care at RIDOC. f. All sentenced chronic HCV-positive patients will have a treatment plan to complete DAA treatment either at RIDOC or in the community. g. All sentenced HCV-positive patients who will complete treatment in the community will be connected to community providers before release and followed up on by RIDOC after release to ensure care continuum.
4. Increase case navigation upon release from RIDOC (and other facilities) for individuals without treatment completions or SVR confirmation.	h. Increase percentage of individuals completing HCV therapy who are discharged from RIDOC.
5. Establish collaborative practice agreements between HCV treatment prescribers and pharmacists to initiate, maintain, and monitor treatment in community and ambulatory pharmacy practice settings.	i. Increased adherence and completion of HCV therapies.

Goals

1. Accessible healthcare, including HCV treatment, for all people diagnosed with HCV.
2. All people starting hepatitis DAA therapy complete treatment.
3. For sentenced patients with HCV who are receiving DAA treatment at RIDOC, ensure care continuum after their release through the provision of a PHI sharing system, designated patient navigators, and accessible community clinics for follow-up visits.

COMPONENT 5: ACHIEVING HEALTH EQUITY AND REDUCING STIGMA/DISCRIMINATION



Key Partners:

Rhode Island Department of Health Equity Zones, The United Way of Rhode Island, American Civil Liberties Union, The Rhode Island Foundation.

Background and Current Status

According to the U.S. Department of Health and Human Services Viral Hepatitis Strategic Plan, social determinants of health – the social and economic conditions that influence the health of individuals and communities – contribute to the viral hepatitis epidemic and the unequal burden of viral hepatitis in the U.S. The Plan recognizes that in addition to being influenced by language, cultural barriers, stigma, discrimination, racism, intimate partner violence, the quality of health care can also be influenced by lack of income, employment, education, unstable housing, and community infrastructure. Even when people can access HCV prevention services and medical care, they may face discrimination in health care settings, have concerns about privacy and confidentiality, or mistrust health care professionals.

Stigma and discrimination may result in people avoiding HCV testing and treatment. Many people living with HCV fear disclosing their status to healthcare providers, friends, family members, and colleagues. This can lead to worsening health outcomes and further HCV transmission.

Achieving health equity, and reducing the stigma and discrimination faced by people with and at risk for HCV represents a major challenge because the two greatest at-risk groups, PWUD and people who are incarcerated, have historically been disenfranchised and marginalized.

While Rhode Island has been a national leader in advancing harm reduction and privacy/confidentiality legislation intended to meet the unique needs of at-risk groups, the stigma and discrimination associated with drug use, incarceration, and infection with HCV should not be underestimated.

Fortunately, progress has been made in Rhode Island that lays the groundwork for future efforts related to health equity and HCV, such as:

- Establishing a racial equity workgroup co-chaired by Project Weber Renew.
- Establishing Open Door Health in South Providence, a neighborhood easily accessible to high-priority populations.
- Funding from the CDC to support rapid HCV testing and referrals in high-risk neighborhoods.
- Two new Project Weber/RENEW sites in Olneyville and Pawtucket.
- A robust harm reduction program that predominantly employs peers and has multiple access points through street outreach, mobile vans, home delivered services, and community-based vending machines.
- A statewide network of RIDOH-funded Health Equity Zones (HEZs) poised to be partners.

Priorities	Desired Outcomes
1. Adopt a drug user health philosophy that integrates support for basic needs and referrals to social service agencies.	a. Harm reduction services that include a comprehensive set of wrap-around services
2. Integrate public health programs to address the syndemic of viral hepatitis, HIV, STIs, and substance use disorders.	b. Contract with community groups for drug user health include allowable costs associated with prevention, screening and referral for hepatitis, HIV, STIs, and substance use disorders.
3. Collaborate with Health Equity Zones to increase access to services.	c. Increase the number of HEZs that prioritize and invest in drug user health at the community level.
4. Invest in social service agencies that provide wrap-around services to PWUD.	d. Expansion of available support services for PWUD, including case management, transportation, and housing.
5. Educate individuals about their healthcare rights.	e. More people with HCV exercising their healthcare rights and experiencing care that is free of discrimination and bias. f. HCV educational materials disseminated to incarcerated patients
6. Remove barriers to harm reduction supplies in pharmacy settings through over-the-counter syringe access.	g. More individuals feel comfortable obtaining syringes in pharmacies.
7. Expand knowledge of privacy legislation.	h. More people with HCV seek screening and care without concerns related to privacy. i. Development and dissemination of HCV educational materials for incarcerated patients

Goals

1. Eliminate racial/ethnic health disparities in HCV infection rates.
2. Completion of HCV treatment for all at-risk populations.
3. Expansion of supportive services for people living with HCV including housing, transportation, and case management – particularly for marginalized populations (e.g., post-incarceration).
4. Expand knowledge of HCV risks, and healthcare rights among at-risk populations.

COMPONENT 6: COMMUNITY PARTNERSHIPS, POLICY DEVELOPMENT AND EVALUATION

Key Partners:

Rhode Island Hepatitis Action Coalition, Governor’s Task Force on Overdose Prevention, Rhode Island Medical Society, Rhode Island Defeats Hepatitis C Coalition, Rhode Island Public Health Institute, Brown University School of Public Health.

Background and Current Status

Currently, the Rhode Island Hepatitis Action Coalition (RIHAC) is a statewide community planning group co-chaired by medical directors from the RIDOH and RIEOHHS. RIHAC is composed of 45 multidisciplinary members (see Appendix A) such as medical providers, community agencies, individuals with lived experience, academic institutions, and other state agencies such as the Rhode Island Department of Corrections.

RIHAC meets three to four times a year and serves as a forum for planning, information sharing, and discussions related to Medicaid policies, the activities of community-based organizations, disease trends, and national updates.

RIHAC was formed originally in 2014 as a partnership between the RIDOH, RIEOHHS, and the Rhode Island Public Health Institute. From 2002 to 2014, RIDOH coordinated the Viral Hepatitis Advisory Group.

A community-driven initiative called Rhode Island Defeats Hepatitis C, began in 2014 when it was awarded an Innovation Fellowship from the Rhode Island Foundation. Led by Lynn E. Taylor, MD, FACP, FAASLD, FIDSA, Rhode Island Defeats Hepatitis C is a comprehensive program to prevent, seek, treat, cure, and eliminate HCV in Rhode Island; save money by enhancing proactive HCV care; and bring resources into Rhode Island to help combat the state’s HCV epidemic. Since its inception, Rhode Island Defeats Hepatitis C has supported Waterfire events featuring HCV awareness and testing, community forums, and academic symposiums.

Priorities	Desired Outcomes
1. Continue ongoing quarterly RIHAC meetings.	a. Forum created for sharing HCV updates, coordinating efforts, and monitoring progress towards elimination goals.
2. Establish collaboration with drug user health partners.	b. Expansion of integrated drug user health services at the community level. c. Ongoing resource investment in drug user health and harm reduction. d. Shared data sets and publications.
3. Improve mechanisms to measure, monitor, evaluate, report, and disseminate progress toward achieving organization, local, and national goals, including RIHAC dashboard.	e. Develop an online dashboard to track activities, progress, and metrics related to HCV elimination.
4. Monitor state legislation related to HCV and drug user health.	f. Engage elected officials and support legislation to further HCV prevention, screening, and treatment.
5. Identify, evaluate, and scale-up best practices through implementation and communication science research.	g. Implement best practices and evidenced-based interventions related to HCV prevention, screening, testing, and treatment.

Goals

1. Strong participation of diverse stakeholders in RIHAC.
2. Creation of a dynamic statewide HCV dashboard to monitor progress towards elimination activities and goals.

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APPENDIX A: RHODE ISLAND HEPATITIS C ACTION COALITION MEMBERS

Coalition Co-Chairs

Philip A. Chan, MD, *Rhode Island Department of Health*

Jerry Fingerhut, MD, *Rhode Island Office of Health and Human Services, Medicaid Office*

Health Care Providers

Justin Berk, MD, *Rhode Island Department of Corrections*

Ilana Black, APRN, *Rhode Island Department of Corrections*

Sapna Chowdry, MD, *Thundermist Health*

Tracey Cohen, MD, *Neighborhood Health Plan*

Alan Epstein, MD, *CharterCare*

Joseph Garland, MD, *The Miriam Hospital*

Vania Kasper, MD, *Lifespan*

Matthew Murphy, MD, *Rhode Island Department of Corrections*

Christopher Ottiano, MD, *Neighborhood Health Plan*

Michael Poshkus, MD, *Thundermist Health*

Christopher Salas, MD, *Rhode Island Department of Corrections*

Thomas Sepe, MD, *Roger Williams Medical Center*

Lynn Taylor, MD, *CODAC Behavioral Health*

Vinod Thomas, MD, *Providence Community Health Centers*

Kristin Torrico, PA-C, *Rhode Island Department of Corrections*

Danial Valicenti, MD, *Rhode Island Department of Corrections*

Tilak Verma, MD, *Tufts Health Plan*

Saengnapha Williams, MD, MPH, *Rhode Island Department of Corrections*

Community Based Organizations (including people with lived experience)

Ray Joseph, *AIDS Care Ocean State*

Oz Lugo, *AIDS Care Ocean State*

Gina Mercure, *AIDS Care Ocean State*

Coleen Daley Ndoeye, *Project Weber/RENEW*

Ashley Perry, *Project Weber/RENEW*

Nya Reichley, *Project Weber/RENEW*

Dennis Bailer, *Project Weber/RENEW*

Sophie Sprecht-Walsh, *CODAC Behavioral Health*

Linda Hurley, *CODAC Behavioral Health*

Amy Nunn, PhD, *Rhode Island Public Health Institute*

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Brendan Jacka, PhD, *Brown University School of Public Health*

Brandon Marshall, PhD, *Brown University School of Public Health*

Thomas Stopka, PhD, *Tufts University*

Rhode Island Department of Health

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Erin Brown, MPH

Dhwani Dave, MPH

Hsiu Chin Shen, RN

Katharine Howe, MPH

Richard Huard, PhD

Caroline Gummo, MHS

Margo Katz, MA

Jenn Koziol, MPH

William Lyman, MA

Theodore Marak, MPH

James McDonald, MD

Cathy Schultz, MPH

Membership list as of March 2022

APPENDIX B: ABBREVIATIONS

AASLD: American Association for the Study of Liver Diseases

ACOS: AIDS Care Ocean State

ALT: alanine aminotransferase

AST: aspartate aminotransferase

CDC: Centers for Disease Control and Prevention

DAA: Direct-acting antiviral

ELR: Electronic laboratory reporting

ENCORE: Education, Needle Exchange, Counseling, Outreach and Referral by AIDS Care Ocean State

EOHHS: Rhode Island Executive Office of Health and Human Services

FDA: Food and Drug Administration

HCV: Hepatitis C Virus

HEZ: Health Equity Zone

HIV: Human Immunodeficiency Virus

NAT: Nucleic acid testing

NBS: NEDSS Base System

NHANES: National Health and Nutritional Examination Survey

OD: Overdose

OTP: Outpatient Treatment Provider

PrEP: Pre-Exposure Prophylaxis is medicine people at risk for HIV take to prevent getting HIV from sex or injection drug use. When taken as prescribed, PrEP is highly effective for preventing HIV.¹

PRIDEMS: Division of Preparedness, Response, Infectious Disease, and Emergency Medical Services

PWUD: People who use drugs

RIDOC: Rhode Island Department of Corrections

RIDOH: Rhode Island Department of Health

RIHAC: Rhode Island Hepatitis C Action Coalition

STD/STI: Sexually Transmitted Disease/Sexually Transmitted Infection

¹ <https://www.cdc.gov/hiv/basics/prep.html>