Project SUCCEED: Using a Data to Care Approach to Eliminate Hepatitis C in People Living with HIV in NYC

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Data to Care

• CDC-developed public health framework

• Promotes use of Health Department surveillance and other data to identify people living with HIV (PLWH) and link to them to medical care and other services

• Multiple methods:
  • Health Department-initiated
  • Health care provider-initiated
  • Combined approach

• The NYC Health Department has applied this framework to HIV and hepatitis C (Hep C) coinfected individuals in a HRSA funded project, locally called Project SUCCEED
Project SUCCEED Model

Analysis of Co-Infected Population through matching of HIV and Hep C surveillance data

Provider Education & Training
Practice Transformation
Case Investigation & Linkage to Care
NYC Health Department
HIV and Hep C Surveillance Registries

Reportable to the NYC Health Department:

HIV surveillance registry (Provider and Laboratory Reporting)
• All HIV diagnosis, viral load, CD4 count, and HIV genotype test results
• Demographic data available

Hep C surveillance registry (Laboratory Reporting)
• Positive antibody, positive and negative RNA, and genotype test results
• Negative antibody tests and Hep C rapid tests results are not reported
• Minimal demographic data available
HIV and Hep C Co-infection Estimates for NYC

HIV and Hep C surveillance data were matched in May 2016 and May 2017 to estimate prevalence of co-infected population:

- 85,890 HIV-diagnosed people as of December 2016*
- 11,536 ever infected with HIV and Hep C
- 88,710 Hep C-diagnosed people as of December 2016*

4,200 people currently co-infected with HIV and Hep C (May 2017)

*To better account for out-migration and deaths, the number of individuals considered to be diagnosed and living in NYC has been restricted to people who had at least one HCV or HIV lab test reported since 2014 and weren't known to have died prior to 2017.
Data to Care Approach

Matched HIV and Hep C surveillance data findings were used to:

1. **Assess patient care status**
2. **Identify facilities** with the highest burden of HIV and Hep C co-infection
3. **Create Hep C dashboards** for HIV health care facilities
4. **Create lists of co-infected patients** for linkage to care or return to care
5. **Conduct a Practice Transformation intervention** with high burden facilities
6. **Monitor** project progress towards Hep C elimination
Assessing HIV Care Status to Plan Intervention

Of 4,200 co-infected people (May 2017):

- **HIV virally suppressed, 60%**
- **Out of HIV care, 16%**
- **In HIV care, 84%**

**SUCCEED Target Patients**

HIV Field Services Unit provides linkage to care for HIV out-of-care patients
Care Status of Co-Infected People in NYC

Of the 84% in HIV care:

- In care at largest HIV care facilities in NYC, 56%
- In care at other or multiple facilities, 24%
- In sporadic care, 20%

In HIV care, 84%
Hep C Dashboards for HIV Care Providers

Dashboards were created for 47 HIV health care facilities, showing:

• % HIV patients co-infected with Hep C

• % co-infected patients at facility who initiated treatment vs. treatment initiation rates across NYC

These clinics were offered surveillance based lists of their own co-infected patients to promote Hep C treatment.
Patient Lists

- **23** facilities accepted a list of their co-infected patients (799 patients in total)

- Facilities were asked to:
  - Review list and promote Hep C treatment
  - Return the list to the Health Department with patient status (i.e. Hep C care status of each patient, treatment barriers)
12 facilities returned patient lists (406 patients total), of these:

- Lost to care: 21%
- To be returned to care: 19%
- Not infected with Hep C: 14%
- Currently in treatment: 5%
- Not treatment candidates*: 5%
- Declined treatment: 4%

* Not treatment candidates (HIV uncontrolled, drug/alcohol use, co-morbid conditions)
Provider Training

Health care providers across NYC were invited to participate in training on patient navigation, care and treatment for Hep C patients. Since November 2017:

109 service providers participated in a full day Hep C Navigation Training.*

53 HIV clinical providers completed a 10-CME comprehensive online training on Hep C evaluation, care, treatment and monitoring.*

6 HIV providers participated in a half-day preceptorship at a liver clinic.

*Training topics included Hep C medication coverage/prior authorization/patient assistance programs, HIV/Hep C treatment, and co-occurring mental health and substance use disorders.
Practice Transformation Model

• Using surveillance data, Health Department identified and recruited facilities

• Health Department supports facilities to:
  1. Identify PLWH in need of Hep C screening or treatment
  2. Train HIV clinical and non-clinical providers in Hep C navigation, testing, care and treatment
  3. Develop, implement and report on Hep C service improvement plan
Site Selection for Intervention

Using surveillance data, the Health Department

- Generated a full list of facilities with coinfected patients in need of Hep C treatment
- Selected top 15 facilities with highest number or percentage of patients not yet treated for Hep C
- 10 facilities made formal commitments to receive Practice Transformation intervention

- 4 community health centers
- 6 hospitals
- 404 co-infected patients
Practice Transformation Project

EHR Query Support
• Facility runs query to assess baseline, monitor progress and generate up to date patient lists:
  • Number and rate of PLWH screened for Hep C
  • Number of PLWH who are in need of Hep C treatment
  • Generate lists of patients in need of screening or treatment

Hep C Service Improvement Plan
• Health Department supports facility to create the plan at baseline
• Facility submits interim progress report and final report with sustainability plan
Practice Transformation Methods & Tools

**Methods**
- Introductory presentation and call
- Brief needs assessment
- Three site visits
- Training
- Technical assistance

**Project Tools**
- Organization profile
- Screening report
- Hep C service and workflow description
- Hep C Service Improvement planning worksheet (SMART)
- Electronic Health Record Query Tool
# Organization Profile

**Due: 8/17/2018**

<table>
<thead>
<tr>
<th>Category</th>
<th>Details</th>
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<tbody>
<tr>
<td><strong>Info</strong></td>
<td></td>
</tr>
<tr>
<td>- Organization Name</td>
<td></td>
</tr>
<tr>
<td>- Main Address (Street, City, Zipcode)</td>
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<tr>
<td>- Additional Locations (create new rows as needed)</td>
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</tr>
<tr>
<td><strong>Hepatitis Services at Organization (If any, type “Y”)</strong></td>
<td>Other Hepatitis Programs (provide name)</td>
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<tr>
<td>- HBV Testing</td>
<td></td>
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<tr>
<td>- HBV Vaccine</td>
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<td>- HBV Treatment</td>
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<td>- HCV Rapid Antibody Testing</td>
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<td>- HCV RNA Testing</td>
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<td>- HCV Treatment</td>
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<td>- Radiology Services</td>
<td></td>
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<tr>
<td>- Fibrosis Staging</td>
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<tr>
<td><strong>General Services at Organization (If any, type “Y”)</strong></td>
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<tr>
<td>- Medical Care</td>
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<td>- Phlebotomy</td>
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<td>- Behavioral Health</td>
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<td>- Substance Abuse Treatment</td>
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<td>- Case Management</td>
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<td>- Health Homes</td>
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<td>- Syringe Exchange</td>
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<td>- Pharmacy Services</td>
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<td>- Benefits Enrollment</td>
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<td>- Transportation Services</td>
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<td>- Support Group</td>
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<tr>
<td>- Mobile Unit</td>
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<tr>
<td>- Other Services (describe)</td>
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<tr>
<td><strong>Organization Capacity (If any, type “Y”)</strong></td>
<td>Describe type of incentives</td>
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<td>- Community Outreach</td>
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<tr>
<td>- Electronic health record (EHR)</td>
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<tr>
<td>- Name of EHR</td>
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<tr>
<td>- Computer Shared Drive or Server</td>
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<tr>
<td>- Incentives for patients</td>
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<tr>
<td><strong>NYC Health</strong></td>
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</tbody>
</table>
# Project Reporting Tool

<table>
<thead>
<tr>
<th>Surveillance Based Patient List Review</th>
<th>Date List Downloaded</th>
<th>Date List Returned</th>
</tr>
</thead>
<tbody>
<tr>
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</tbody>
</table>

## Baseline Report

**Due:** 8/17/2018

1. **HIV patients seen at your organization between 1/1/2017-12/31/2017**
2. **Of previous column, 1st ever screened for HCV (RNA or antibody) as of 12/31/2017**
3. **% Screened** (field auto-populates)
4. **Number of HIV/HCV co-infected patients with a visit in 2017 still in need of HCV treatment as of 12/31/2017**

1. Describe the organization’s existing HCV testing, linkage to care and treatment protocols or procedures.
2. Describe the organization’s HCV testing, linkage to care and treatment service improvement plan.

See “Project Checklist” tab for list version of plan.

## Interim Report

**Due:**

1. **HIV patients seen at your organization between Intervention start date-2 weeks before interim report date**
2. **Of previous column, 1st ever screened for HCV (RNA or antibody) as of 2 weeks before interim report date**
3. **% Screened**
4. **Number of HIV/HCV co-infected patients with a visit in 2017 still in need of HCV treatment as of 2 weeks before interim report date**

Use “Project Checklist” tab to report progress implementing the service improvement plan.
# Electronic Health Record Query Tool

## Health Centers included in this report:

## Review Period:

<table>
<thead>
<tr>
<th>Measure</th>
<th>Interpretation</th>
<th>Number in column</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Total adult patients with a visit [Ia] in the specified review period in your Health Center + a diagnosis of HIV [Ib]</td>
<td>At-risk visits</td>
<td></td>
</tr>
<tr>
<td>2 From Row #1, number with documentation of a HCV antibody test order/result [IIa] or HCV RNA test order/result in or prior to review period [IIb]</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proportion of HIV patients seen at health center ever tested for HCV</td>
<td>Column 2 / Column 1</td>
<td></td>
</tr>
<tr>
<td>3 Of Row #2, number with a positive HCV RNA test result or diagnosis of HCV in problem list/ICD 9/10 codes [III]</td>
<td></td>
<td></td>
</tr>
<tr>
<td>4 Of Row #3, number whose most recent HCV RNA test result was positive [IV]</td>
<td></td>
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</tr>
<tr>
<td>5 Number of patients from Row #3 for whom HCV medication was prescribed/initiated treatment [V]</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proportion of patients with HCV who initiated treatment</td>
<td>Column 5 / Column 3</td>
<td></td>
</tr>
</tbody>
</table>

[Ia] CPT codes for patient encounter during the reporting period: CPT codes 99201, 99202, 99203, 99204, 99205, 99212, 99213, 99214, 99215 or HCPCS codes (Medicare) G0402, G0438, G0439 (outpatient only) Inpatient CPT codes could include: 99221, 99222, 99223 (initial care), 99231, 99232, 99233 (subsequent care), or 99218, 99219, 99220 (observation initial care) [Ib] ICD-10 codes for HIV: B20 “Human immunodeficiency virus [HIV] disease” or Z21 “Asymptomatic human immunodeficiency virus [HIV] infection status”, ICD-9 codes for HIV: V08 “Asymptomatic HIV” or 042 “HIV Disease”
Baseline EHR Query Results (7 Facilities)

Hep C screening rates in PLWH

• Average 77%
• Range 57% – 100%

Number of PLWH in need of Hep C treatment

• Range: 31 - 183

Findings

• Screening rates were lower than expected
• Informed Hep C Service Improvement Plan
• Facilities reported conducting EHR query was helpful
Hep C Services Improvement Plans (7 Facilities)

Staff Support

• Training and motivation
• Hire staff to fill service gaps (e.g. Hep C testing)
• Clinical mentoring to promote treatment in PWUD (facilitated by a clinical expert)

Enhanced Case Management

• Use EHR query to update lists of cases in need of screening and treatment
• Set up regular case conferences
• Develop community outreach capacity (e.g. phone calls, home visits, community health workers)
• Identify and utilize case finding tools to return lost patients to care
Hep C Services Improvement Plans (7 Sites)

Improve Utilization of Existing Facility Resources

• Support referral to HIV or Hep C navigation, case management and care coordination programs available at the facility
• Leverage 340B to support Hep C navigation staff
• Utilize incentives and other priority resources to promote engagement in care

Systems Changes

• Develop and implement QI tools to monitor patient status/outcomes and provide feedback to staff
• Improve EHR systems (alerts, order sets, auto ordering, patient panels)
Progress Eliminating Hep C in PLWH, NYC*
May 2017 – August 2018

4200 PLWH who were Hep C RNA positive in May 2017

- 25% are now Hep C RNA negative
- 61% Hep C RNA positive/indeterminate
- 14% No follow up needed**

*Result at the time of their last test, as of August 30, 2018.
** Deceased, found to be uninfected with HIV or HCV, now living outside of NYC
Outstanding Hep C Elimination Needs Identified through Project SUCCEED

• Increased resources for Hep C surveillance
  • Enhance surveillance system capacity to enable receipt of negative Hep C antibody test results (to assess screening rates)
  • Case investigation resources (to assess demographics and risk)
  • Generate surveillance based tools for data to care projects (dashboards, patient lists, facility lists)

• Case finding resources
  • Tools to assist with finding patients who are lost to care
  • Community outreach, navigation and retention in care

• Interventions to improve health care facility and provider capacity to provide care for people who use drugs
HIV Undetectable, Hep C Cured!

For more information, contact:

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