Global Viral Hepatitis Disease Burden and Targets for Elimination by 2030
## HCV Global Disease Burden

<table>
<thead>
<tr>
<th>HCV Stats</th>
<th>71 million Infected</th>
<th>&lt;20% Diagnosed</th>
<th>&lt;2% Treated</th>
<th>400,000 Annual Deaths</th>
<th>One death every 80 seconds</th>
</tr>
</thead>
</table>

Source: Polaris Observatory (http://www.polarisobservatory.com/)
### HBV Global Disease Burden

<table>
<thead>
<tr>
<th>HBV Stats</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>292 million</strong></td>
<td>Infected</td>
</tr>
<tr>
<td><strong>10%</strong></td>
<td>Diagnosed</td>
</tr>
<tr>
<td><strong>1.5%</strong></td>
<td>Treated</td>
</tr>
<tr>
<td><strong>420,000</strong></td>
<td>New liver cancers</td>
</tr>
<tr>
<td><strong>1.1 million</strong></td>
<td>Annual Deaths</td>
</tr>
<tr>
<td>One death every 30 seconds</td>
<td></td>
</tr>
</tbody>
</table>

Source: Polaris Observatory (http://www.polarisobservatory.com/)
An emerging call for VH elimination...

- **World Health Assembly ratified** (May 2010)
  - World Hepatitis Day - July 28 (only 1 of 4 disease-specific WHO days)

- **World Health Assembly requested** (May 2014)
  - “Feasibility of and strategies needed for the elimination of hepatitis B and hepatitis C with a view to setting global targets”

- **UN General Assembly ratified** (Sept 2015)
  - *Sustainable Development Goals*

- **World Health Assembly ratified** (May 2016)
  - WHO member states commit to VH elimination by 2030
  - Adopted Global Health Sector Strategy on Viral Hepatitis (GHSS)
On September 25th, countries will have the opportunity to adopt a set of global goals to **end poverty, protect the planet, and ensure prosperity for all** as part of a new sustainable development agenda. Each goal has specific targets to be achieved over the next 15 years.

For the goals to be reached, everyone needs to do their part: governments, the private sector, civil society and people like you.
Global goal - SDG

Goal 3: Ensure healthy lives and promote well-being for all at all ages

By 2030, end the epidemics of AIDS, tuberculosis, malaria and neglected tropical diseases and combat hepatitis, water-borne diseases and other communicable diseases

Ratified at the UN General Assembly on Friday, September 25, 2015
WHO Global Strategy on Viral Hepatitis - 2016 - 2021

- **Vision:** “A world where viral hepatitis transmission is halted and everyone living with viral hepatitis has access to safe, affordable and effective prevention, care and treatment services”

- **Goal:** Eliminate viral hepatitis as a major public health threat by 2030.
Roadmap to Elimination by 2030

The first WHO report with validated baseline estimates (2015)
- Global and regional burden, mortality, incidence
- Coverage data on key interventions (including the test and treat cascade)
- Focus on hepatitis B and C (96% mortality)
- Calls for urgent response to viral hepatitis
HEPATITIS DEATHS, BY VIRUS AND REGION, 2015

96% hepatitis deaths from HBV and HCV (cirrhosis and hepatocellular carcinoma)

~1.34m annual deaths

HBV
HCV
HAV
HEV
HEPATITIS MORTALITY IS INCREASING

96% hepatitis deaths from HBV and HCV (cirrhosis and hepatocellular carcinoma)

1.34 million deaths in 2015
VIRAL HEPATITIS DEATHS, BY VIRUS, 2015
## HEPATITIS STRATEGY, 2016: ELIMINATION BY 2030

<table>
<thead>
<tr>
<th>Interventions</th>
<th>2030 targets</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1. Service coverage</strong></td>
<td></td>
</tr>
<tr>
<td>1. Three dose hepatitis B vaccine</td>
<td>90%</td>
</tr>
<tr>
<td>2. HBV PMTCT</td>
<td>90%</td>
</tr>
<tr>
<td>3. Blood and injection safety</td>
<td>100% screened donations</td>
</tr>
<tr>
<td>90% reuse-prevention devices</td>
<td></td>
</tr>
<tr>
<td>4. Harm reduction</td>
<td>300 injection sets/PWID/yr</td>
</tr>
<tr>
<td>5. Treatment</td>
<td>90% diagnosed</td>
</tr>
<tr>
<td></td>
<td>80% treated</td>
</tr>
<tr>
<td><strong>2. Impact</strong></td>
<td></td>
</tr>
<tr>
<td>A. Incidence reduction</td>
<td>90%</td>
</tr>
<tr>
<td>B. Mortality reduction</td>
<td>65%</td>
</tr>
</tbody>
</table>
* Measurement of progress on HBV treatment target currently limited by the absence of data on the proportion of persons eligible and the absence of a functional cure
Impact targets for elimination

90% reduction in new cases of chronic HBV and HCV infection

6-10 million infections (in 2015) to 900,000 infections (by 2030)

65% reduction in deaths from chronic HBV and HCV

1.34 million deaths (in 2015) to under 500,000 deaths (by 2030)
STATUS OF HEPATITIS B

Incidence:
Chronic HBV infection in children under 5 reduced from 4.7% to 1.3% (immunization)

Prevalence:
257 million people living with HBV 68% in Africa /Western Pacific
STATUS OF HEPATITIS C

Incidence:
1.75 million new infections / year
(Unsafe health care and injection drug use)

Prevalence:
71 million infected, all regions
In 2015, the global fund board agreed to cover cost for management of co-infections.

- **2.7 million HIV + and HBsAg +**
- **37 million HIV infections**
- **71 million HCV infections**
- **2.3 million HIV+ and anti-HCV +**

**HEPATITIS / HIV COINFECTIONS**

**HBV**

- **257 millions HBV infection**

**HCV**
3-DOSE HEPATITIS B VACCINE: 84% COVERAGE

Coverage (%) vs. Year

- African
- American
- Eastern Mediterranean
- European
- South East Asia
- Western Pacific
- Global

Source: WHO AND UNICEF
HEPATITIS B BIRTH DOSE: 39% COVERAGE

Coverage (%)

Year

African
American
Western Pacific
Global

Source: WHO AND UNICEF

HEPATITIS B BIRTH DOSE: 39% COVERAGE
HARM REDUCTION–NEEDLE SYRINGE DISTRIBUTION

11.8 million PWIDs* worldwide

27 needle and syringes/PWID* / year (< 10% of goal)


*PWID: Person who injects drugs
CASCADE: 9% OF 257 MILLION DIAGNOSED, 1.7 MILLION ON TREATMENT IN 2015
CASCADE: 20% OF 71 MILLION DIAGNOSED, 1.1 MILLION STARTED TREATMENT IN 2015
Countries with national hepatitis plans

(May 2017)

52 countries have plans
43 are developing.
Early adaptors are already on the path to elimination

HCV Elimination Targets
2016

Countries on Track
Iceland
Qatar
Australia
Georgia
Japan
Netherlands
Egypt
France
Germany

A different strategy is needed to get the remaining countries to implement programs to achieve WHO 2030 targets – focus on gains rather than losses
A PUBLIC HEALTH APPROACH NEEDS TO DELIVER TO ALL, INCLUDING TO SPECIFIC GROUPS

- Health care workers
- Indigenous populations
- Persons who inject drugs
- Migrants
- Blood donors
- Prisoners
- Men who have sex with men
How can elimination be made affordable?

• Radical reductions in treatment costs (includes ineffective treatment and care costs in middle and high income countries)

• Shared costs with other strategies
  – Harm reduction costs, immunization and blood safety
  – Co-infection with HIV and service delivery

• Innovations and efficiencies over time
  – Simplified treatment package, non-specialist care
  – Hepatitis B cure
Moving the Hepatitis Response toward Elimination

✓ Partnerships – governments, civil society, private sector, donors

✓ Champion countries are emerging

✓ Innovation in implementation and monitoring is key

✓ Improved diagnostics are critical

✓ Further reduction in cost of meds, diagnostics

✓ Political Will