## **Hepatitis B and C**Cost-effectiveness study

Additional resource needs for viral hepatitis elimination through universal health coverage: projections in 67 low-income and middle-income countries, 2016–30 (2019)





To estimate the **incremental commodity cost** of adding scaled up hepatitis testing and treatment interventions to WHO SDG investment scenarios.



We were involved in development of the **cost projection model** and the **economic analysis**. Resource requirements were quantified across 67 LMICs from 2016–2030, and modelled costs to implement hepatitis testing and treatment were added to 2017 WHO cost projections. **Total costs and additional investment** needed were estimated across a progress scenario (scale up) and an ambitious scenario (elimination).



- For 2016-2030, estimated resource needs for testing and treatment ranged from US\$27 billion for the progress scenario to US\$58.7 billion for the ambitious elimination scenario.
- Under the ambitious elimination scenario, hepatitis testing and treatment would add a 1.5% increase to the WHO SDG price tag.
- Hepatitis elimination would also **avert an additional 4.6% premature deaths** and add an additional **9.6% healthy life years** from 2016-2030.



## **Publication**

"Additional resource needs for viral hepatitis elimination through universal health coverage: projections in 67 low-income and middle-income countries, 2016–30" was published in **The Lancet Global Health**.



## **Hepatitis B and C**Cost-effectiveness study

Cost-effectiveness of testing and treatment for hepatitis B virus and hepatitis C virus infections: an analysis by scenarios, regions, and income





To estimate the **cost-effectiveness** of scaling up hepatitis testing and treatment interventions by scenarios, regions, and income groups.



We developed a model to project the cost and impact of hepatitis elimination in 67 LMICs from 2016-2030. We modelled disease progression to estimate DALYs averted and estimated incremental cost-effectiveness ratios (ICERs) by regions and income groups according to three scenarios: flatline (status quo), progress (testing/treatment per WHO guidelines) and ambitious (elimination).



- Scaling up hepatitis testing and treatment per WHO guidelines is a costeffective intervention with ICERs less than the average GDP/capita of countries.
- Elimination scenarios lead to a much larger impact while remaining costeffective with higher ICERs lower than the average GDP/capita of countries.



## **Publication**

"Cost-effectiveness of testing and treatment for hepatitis B virus and hepatitis C virus infections: an analysis by scenarios, regions, and income" was published in ISPOR Value in Health.

WHO Global progress report on HIV, viral hepatitis and sexually transmitted infections (2021)

This research contributed to the <u>WHO Global progress</u> report on HIV, viral hepatitis and sexually transmitted infections to promote investment into the reduction and elimination of viral hepatitis.

