

# ESTIMATING PROGRESSION THROUGH THE CASCADE OF CARE AMONG PATIENTS WITH HEPATITIS C INFECTION IN VICTORIA, AUSTRALIA AFTER THE INTRODUCTION OF DIRECT-ACTING ANTIVIRALS

Traeger M<sup>1</sup>, Pedrana A<sup>1,2</sup>, Draper B<sup>1</sup>, Asselin J<sup>1</sup>, Doyle J<sup>1,3</sup>, El-Hayek C<sup>1</sup>, Howell J<sup>1,2,3,4</sup>, Thompson A<sup>4,5</sup>, Hellard M<sup>1,2</sup>, Guy R<sup>6</sup>, Callander D<sup>6,7</sup>, Stoové M<sup>1,2</sup>

<sup>1</sup>Disease Elimination Program, Public Health Discipline, Burnet Institute, Melbourne, Australia;

<sup>2</sup>Department of Epidemiology and Preventive Medicine, Monash University, Melbourne, Australia;

<sup>3</sup>Department of Infectious Diseases, The Alfred and Monash University, Melbourne, Australia;

<sup>4</sup>Department of Gastroenterology, St Vincent's Hospital Melbourne, Melbourne, Australia; <sup>5</sup>Department of Medicine, University of Melbourne, Melbourne, Australia; <sup>6</sup>The Kirby Institute, University of New South Wales, Sydney, Australia; <sup>7</sup>Centre for Social Research in Health, University of New South Wales, Sydney, Australia.

## Background:

With public subsidy of hepatitis C virus (HCV) direct-acting antiviral (DAA) treatments in Australia from March 2016, new national elimination strategies focus on testing and treatment uptake among people who inject drugs (PWID) and retaining HCV infected patients in clinical care. Achieving elimination targets will require localised responses at the health service level. We describe progression through the HCV care cascade among patients attending health services in Victoria, Australia post-DAA introduction.

## Approach:

HCV testing and treatment data were extracted retrospectively (March 2016-March 2018) from eight community health centres and general practice clinics engaging large numbers of PWID via the Australian Collaboration for Co-ordinated Enhanced Sentinel Surveillance (ACCESS). We calculated service-level and network-wide HCV care-cascades describing the progression of patients transitioning between antibody testing, RNA testing, diagnosis, treatment and sustained virologic response 12 weeks post-treatment (SVR12).

## Outcomes:

4367 patients were tested for HCV (antibody or RNA). Antibody positivity among the 3463 tested was 20% (range 11%-68% by service). Of the 689 testing antibody-positive, 557 (81%) received RNA testing, of which 366 (66%) were RNA-positive. For an additional 973 patients the first test record was an RNA test, of which 575 (59%) were RNA-positive. At the three sites with available prescription data, 92 of 241 RNA positive patients (38%) were prescribed DAAs (range 29-51% by service). 22 (32%) of the 68 patients with sufficient follow-up time had completed SVR12 testing and 21 of those (95%) achieved SVR12.

## Conclusions:

Most antibody-positive patients received HCV RNA testing. Treatment uptake was low among RNA-positive patients, and less than a third returned for SVR12 testing at the service they received treatment. Considerable variability was observed across clinics. Epidemiological surveillance data can be used to drive service delivery improvements. These data suggest a need to focus on increasing HCV treatment uptake and retention in care.

## Disclosure of interest:

Nothing to disclose.