CREATING IMPACT

OHTN RESEARCH FUNDING 2015 TO 2016



1 November, 2016



Research funding at OHTN is about impact: making a difference in the lives of people living with and at risk of HIV.

Since 2012, OHTN has committed to funding programs of research with the potential for short-term impact (3-5 years). OHTN funds research that addresses:

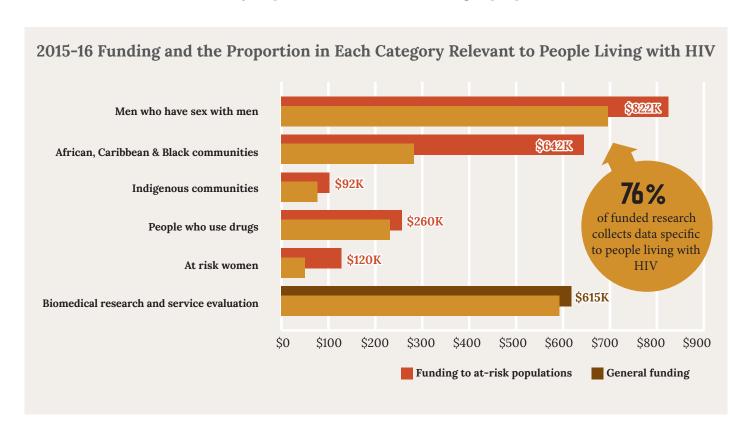
- needs identified by those Ontarians most affected by HIV ("priority populations")
- gaps in the HIV prevention, engagement and care cascade
- better integration of HIV health systems and services

2015/16 STATISTICS

- 69 research grants underway (newly & previously funded)
- 31 grants receiving new funds
- \$2,554,889 dispersed
- 6 new grants awarded

PRIORITY POPULATIONS

OHTN works with its network to identify knowledge gaps and research priorities. Our efforts focus on the needs of Ontario's priority populations – those most affected by and at risk of HIV infection. As our funding priorities emerge from these consultations, a growing proportion of our funds (about 75%) is targeted to one or more specific community; while the remaining quarter is dedicated to biomedical research and to evaluating broad HIV care and support systems. Within each of the categories presented below, most research (76%) collects information specifically about the needs and experiences of people living with HIV, while the remainder focuses solely on prevention and the well-being of people in at-risk communities.



PRIORITY POPULATION TRENDS

Investment	Changes since 2012
Men who have sex with men	3x increase
African, Caribbean & Black communities	2x increase
Indigenous communities	Slight increase
People who use drugs	2x increase
At risk women *	Decrease

^{*} Funds to at-risk women are decreasing as more funds are directed to specific populations of women such as African, Caribbean and Black women or Indigenous women

In 2015-16, funding relevant to men who have sex with men continued to rise, due to the scale up of our partnerships with CIHR around the Advancing Boys' and Men's Health Research team grant program. New student awards increased funding to Indigenous community-relevant research, while funding relevant to people who use drugs and at-risk women fell.

OHTN also increased staff positions relevant to priority population research (Indigenous Research Initiative, Researcher-in-Residence on program science for African, Caribbean and Black communities) that is not captured in this budget.

THE HIV PREVENTION, ENGAGEMENT & CARE CASCADE

The HIV, Prevention, Engagement and Care Cascade is a means of measuring how well our health system is preventing HIV, engaging people in care once they are HIV-positive, and delivering effective care. OHTN funds research that addresses gaps in this cascade. All OHTN funded research is relevant to the cascade, including funds relevant to priority populations. In 2015-16 active grants addressed elements of the cascade as follows:

PREVENT	ENGAGE	CARE
30 grants – 44%	14 grants – 20%	25 grants – 36%

CASCADE TRENDS

- Percentage of active studies focused on engagement have doubled since the launch of the impact focused program in 2012
- Percentage of prevention studies have increased by 30%
- Care studies have decreased as fewer basic science studies are funded, however investments in three chairs (Mario Ostrowski, Rupert Kaul and Charu Kaushic) continue to drive momentum in basic science, and its application to clinical use.
- Clinical funding is more frequently directed to population specific needs (human papillomavirus and anal cancer risk for men who have sex with men; the development of strategies to improve hospitalization experiences for people who use drugs).

CHANGING HOW RESEARCH HAPPENS

OHTN's **Impact Focused Research Program** aims to change not only what is funded, but how. Calls for research are targeted to identified needs, and successful projects must demonstrate consultation with knowledge users.

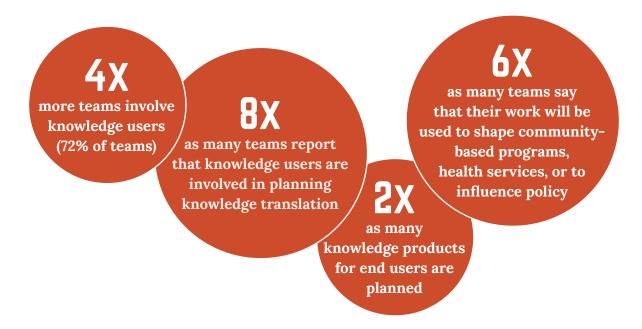
Two thirds of grants administered by the OHTN are now the direct outcome of needs identified by one of Ontario's five priority populations.

OHTN consults to develop research calls and identify priorities. OHTN education and training programs work to develop peer researchers. Research teams also commit to build capacity and skills within priority populations.

2015/16 CONSULTATIONS

- 1. Facing Forward (people living with HIV)
- 2. En Avant (African, Caribbean and Black)
- 3. Indigenous Research Steering Committee
- 4. A consultation about research priorities for HIV-positive women

This approach is revolutionizing how OHTN research is done. Compared to the period before 2012:



OHTN respects and affirms our commitment to the greater involvement and meaningful engagement of people living with HIV/AIDS. In 2015-16, reporting verifies that 54% of research teams include people living with HIV (a likely under-estimate as confidentiality concerns from researchers and funding partners hamper information gathering.)

IMPACT ON THE GOALS OF THE ONTARIO AIDS STRATEGY

OHTN research works to help achieve the goals of the Ontario HIV/AIDS Strategy by creating new knowledge and gathering evidence to shape policy and practice. Peer-reviewed publications are a measure of knowledge generation.

MAKING A DIFFERENCE: HIGHLIGHTS OF IMPACT FROM 2015-16

OF PAPERS

Improve the health and well being of affected populations

28

- Restorative justice facilitators trained in an OHTN-funded pilot project have become a valuable resource at St. Stephen's Corner Drop-In. Research showed that the facilitators could reduce conflict at the harm reduction site and may protect clients from service loss due to conflict. With this evidence, Rittenhouse has secured funds for the program at two other Toronto centres.
- Guidelines for sexual health educators about online programs and outreach created and disseminated by the Gay Men's Sexual Health Alliance are being updated with evidence from the Cruising Counts study. The research team, led by Dr. David Brennan, is acting as an advisory committee on the guidelines and is helping create a training webinar.

Promote sexual health and prevent new Infections (HIV, HCV, STI)

32

• Ottawa Public Health has committed new operational funds for post-exposure prophylaxis (PEP) based on evidence from a study led by Patrick O'Byrne and Paul MacPherson. None of the 112 participants who received PEP seroconverted during the trial's four-month follow-up period and six undiagnosed cases of HIV were discovered during pre-PEP screening.

Diagnose HIV infections early and engage people in timely care

4

- Community-based research supports the continuation of a peer worker program at Street Health. The study showed that workers with their own experiences of sex work and drug dependency, were effective in delivering education on HIV and safer drug use to at-risk women, and at connecting them to services. Eighty per cent of the women who accessed point-of-care HIV testing at Street Health did so due to interactions with a peer worker.
- OHTN Community Scholar, Winston Husbands, worked with leaders from the African and Caribbean Council on HIV/AIDS in Ontario (ACCHO) and Africans in Partnership against AIDS (APAA) to improve engagement with heterosexual Black men. The team secured funding for research, involved men in creating programming and developed a video about testing, *The Test*, that has been viewed more than 1000 times.

Improve the health, longevity and quality of life for people living with HIV

49

- OHTN Scientist Sharon Walmsley has played a pivotal role in the clinical testing of dolutegravir, a highly effective drug used in once-a-day ARV therapy. Dr. Walmsley's research on dolutegravir has changed clinical management guidelines and standards around the world; her 2013 paper on the topic is in the top one percent of internationally-cited papers.
- The Exclusionary Circle Game is a learning tool developed to address stigma associated with HIV infection and social exclusion. Developed by Alan Li and his colleagues, it is being adopted as a training tool by some community-based agencies and within the nursing program at Ryerson.

Ensure the quality/effectiveness of provincially funded HIV programs & services

14

• A team led by Saara Greene worked with four Children's AID Societies and three accredited social work programs to develop training on the needs of families affected by HIV. The pilot increased understanding of issues such as vertical transmission and HIV criminalization and created a cadre of workers committed to act as advocates for these families within the Ontario system.

BUILDING RESEARCH CAPACITY AND LEADERSHIP IN ONTARIO

OHTN research funding aims to build Ontario's capacity to use rigorous, high-quality research to address policy and practice questions. With the advent of the Impact Focused Research Program in 2012, OHTN began to prioritize investments in people, who could work with our network to understand the needs in Ontario and to, develop, evaluate and implement new programs and services addressing these needs.

OHTN APPLIED RESEARCH CHAIRS

In total, 37% of research funding in 2015-16 was invested in Applied Research Chairs. These Chairs are a way to invest in leadership and innovation. The OHTN Applied Chair awards allow us to support and retain effective researchers in key areas, with three primary objectives:

OBJECTIVES	IN 2015-16	OUTCOMES
1. Bring peer-reviewed HIV funding to Ontario	As principal investigators, OHTN chairs brought \$1.6 million in peer-reviewed HIV funds to Ontario in 2015-16. This is \$1.72 for every dollar OHTN invests in their salaries.	OHTN chairs bring funding for critical research projects to Ontario.
2. Mentor new researchers	Chairs mentored 35 graduate and post-doctoral students; 6 community mentees and 3 clinicians.	OHTN Chairs created research capacity by encouraging and supporting other researchers.
3. Recruit leaders in key, under–served fields	Began recruitement of chairs in program science for African, Caribbean, and Black communities; gay men's health; and HIV clinical care and aging.	OHTN Chairs provide leadership to develop and implement research programs in gap areas.

EXAMPLES OF CHAIR CAPACITY BUILDING IN 2015-16

- New CIHR funds awarded to Charu Kaushic will expand our knowledge of how sex hormones influence immunity in the female genital tract. This \$1.2 million CIHR grant, was developed with input from the African, Caribbean and Black community and returns resources to research in that community by supporting a new research nurse at Women's Health in Women's Hands.
- Marie Faaborg-Andersen, a mentee of Trevor Hart, successfully defended her Master's Thesis
 on a sub-analysis of the Gay Strengths Study, and won the best poster prize at the Canadian Sex
 Research Forum.
- Evaluation metrics for safer inhalation materials develop by Lynne Leonard's team were shared and tested in multiple Ontario regions to facilitate ongoing evaluation of this element of the Ontario Harm Reduction Distribution Programme

OHTN / CIHR NEW INVESTIGATORS

Since 2013, OHTN has partnered with CIHR to expand Ontario's HIV research capacity by funding new investigators. OHTN invested \$390,000 in this program in 2015-16, offering one new award in biomedical/clinical fields and one in population health and health services. As the graph at right shows, Ontario now has more HIV new investigators than all other provinces combined.

The seven new investigators supported in 2015/16 by OHTN are shown below. Together they are expanding Ontario's capacity to understand population health issues, to monitor and adapt health systems and to develop innovative clinical care. Ultimately each of these programs of research are intended to lead to new program science interventions, which will improve care and services in Ontario.

