

Acute Hepatitis C in HIV-negative men who have sex with men in the Netherlands and Belgium: a call for action

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Background

- HIV treatment as prevention (TaSP) and HIV pre-exposure prophylaxis (PrEP) reduce the risk of HIV transmission.
- Sexual mixing between HIV positive and negative men having sex with men (MSM) could increase.
- Hepatitis C (HCV) can be sexually transmitted in MSM.
- Until recently HCV was thought to be limited to HIV-infected MSM.

Methods

- Through the Dutch Acute HCV in HIV Study (a Dutch-Belgian prospective multicenter study on the treatment of acute HCV, NCT02600325) and the Be-PrEP-ared study (a PrEP project in Antwerp, EudraCT2015-000054-37) several HCV infections were reported in HIV-negative MSM.

Results

- Ten cases of acute HCV were diagnosed in HIV-negative MSM.
- Median age was 39.5 years (range 25-59).
- HCV diagnosis was made at:
 - at an PrEP clinic (n=5)
 - an sexually transmitted infection (STI) clinic (n=2)
 - by the general practitioner (n=2)
 - by the infectiologist (n=1)
- Reported risk factors:
 - 10 patients reported unprotected anal intercourse (UAI)
 - 4 patients had a concomitant STI at the time of HCV diagnosis
 - 6 patients reported drug use during sex (chemsex)
 - 1 patient reported injection drug use during sex (slamming)
- Of the patients diagnosed at the PrEP clinic, 1 was diagnosed before the start of PrEP and 4 after the start of PrEP.

Discussion

- While previous reports on HCV in HIV-negative MSM were the result of an active screening policy as part of an observational study or a PrEP program, our case series illustrates that also outside these settings the diagnosis of acute HCV should be considered in HIV-negative MSM.
- Our observation calls for a larger nationwide epidemiological study on the prevalence, incidence and risk factors of HCV infection in HIV-uninfected MSM to get a reliable estimate of the size of the problem.

Conclusion

- In the changing landscape of TasP and PrEP, reliable and up-to-date epidemiological data on HCV among HIV-uninfected MSM are needed and will help in developing evidence based testing policies.

Legend Table 1

SS	Slamsex; use of intravenous drugs during sex
UAI	Unprotected anal intercourse
PN	Partner notification; Acute HCV is a reportable disease which means that the public health services contacts all traceable recent sex partners and offers them HCV testing.
CS	Chemsex; use of oral drugs during sex
PrEP	Pre exposure prophylaxis for HIV
PEP	Post exposure prophylaxis for HIV
STD	Sexually transmitted disease
LGV	Lymphogranuloma venereum
SVR12	Sustained virological response 12 weeks after treatment
GP	General practitioner
AIN	Anal intraepithelial neoplasia

^(S) DAHHS 2 study; NCT02600325; ^(*) HepNed-001 study; NTR5729; ^(#) Treatment of HCV in HIV-uninfected patients without severe liver fibrosis not reimbursed in Belgium.

Table 1 acute HCV in HIV-negative MSM

Risk factors	Geno-type	Symptomatic HCV infection?	Comorbidities at time of acute HCV infection	Earlier HCV infections?	Year of acute HCV infection	Year of HCV test	Prior HCV test indication	Tested by	Treatment given	SVR12
UAI CS SS	4	No	Chlamydia	No	2016	2014	PN	STD clinic Breda	Sofosbuvir ledipasvir 8 weeks. ^(*)	Yes
UAI	1a	Ulcerations on legs, vasculitis?	Non	No	2016	2016	During PrEP study	PrEP clinic Amsterdam	Grazoprevir elbasvir 8 weeks. ^(S)	Yes
UAI CS	Undetectable	Fatigue	LGV, syphilis, gonorrhoea, AIN	No	2017	2016	PN	STD clinic Rotterdam	No, spontaneous clearance.	N/A
UAI CS	4	Erythema multiforme	Gonorrhoea farynx, anal chlamydia	No	2016	2015	Routine testing	GP	Grazoprevir elbasvir 8 weeks. ^(S)	Yes
UAI CS	1a	No	Non	No	2016	2016	Routine testing	GP	No, spontaneous clearance.	N/A
UAI	1a	No	Chlamydia, mycoplasma genitalium	No	2016	2016	During PrEP study	PrEP clinic Antwerp	Ongoing chronic infection. No reimbursement in Belgium. ^(#)	N/A
UAI	Undetectable	Fatigue	Non	No	2016	2016	During PrEP study	PrEP clinic Antwerp	No, spontaneous clearance.	N/A
UAI CS	Undetectable	No	Depression	No	2016	2015	During PrEP study	PrEP clinic Antwerp	No, spontaneous clearance.	N/A
UAI	Unknown	Proteinuria	Non	Unknown	2016	2016	Before start PrEP	PrEP clinic Antwerp	Unknown.	N/A
UAI CS	1a	Fatigue	Non	No	2017	2017	PEP use	Hospital, Eindhoven	No, spontaneous clearance.	N/A

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