

Correlates of recent testing among young Australians at risk of sexually transmissible infections

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Background

Annual chlamydia testing is recommended for all Australians aged 15-29 years. Mathematical modelling estimates that 40% of young people require testing annually for chlamydia prevalence to decrease in the population (Regan et al., 2008). Currently, less than 10% of young Australians test for chlamydia annually. As a result of this, population prevalence is unlikely to decrease (Kong et al., 2011). A change in testing approach, such as targeting people at high risk, may be required.

Aim

To identify correlates of sexually transmissible infection (STI) testing in the past 12 months among young Australians identified as at risk of STIs.

Methods

Between 2012-2014, 3588 participants completed the *Sex, Drugs and Rock 'n' Roll* questionnaire at a popular Melbourne music festival. Participants were asked about socio-demographics, sexual behaviours, drug and alcohol use and other health domains. Participants who reported they did not always use condoms with casual, new or multiple sex partners were classified as at risk of STIs. Logistic regression was used to identify correlates of STI testing among participants who were identified as at risk.

Results

Overall, 72% of participants reported having sex in the past year; 38% were classified as at-risk of STIs. In the past year, at-risk participants had significantly higher odds of reporting an STI test (37%) than participants who were not at risk (23%) (OR=1.9; CI=1.6-2.3). Among at-risk participants, STI testing in the past year was associated with being aged 20-29 years, visiting a GP in the past year, scoring $\geq 4/6$ on a sexual health knowledge quiz, earlier sexual debut and reporting more than five lifetime partners (see Table 1).

Table 1. Correlates of STI testing among at-risk participants

	STI test past 12 months (n=341) n(%)	No STI test past 12 months (n=581) n(%)	Odds ratio (95% CI)	Adjusted odds ratio (95% CI)
Age group (years)				
16-19	143 (41.9)	352 (60.6)	1.0	1.0
20-29	198 (58.1)	229 (39.4)	2.1 (1.6-2.8)**	1.6(1.1-2.4)*
Gender				
Male	104 (30.5)	254 (43.7)	1.0	1.0
Female	237 (69.5)	327 (56.3)	1.8 (1.3-2.3)**	1.3(0.9-1.9)
Education				
No post-high school education	145 (42.5)	321 (55.2)	1.0	1.0
Post high-school education	193 (56.6)	258 (44.4)	1.7(1.3-2.2)**	1.0(0.7-1.5)
Living arrangements				
Do not live with parents	161 (47.2)	183 (31.5)	1.0	1.0
Live with parents	176 (51.6)	392 (67.5)	0.5 (0.4-0.7)**	0.8(0.6-1.2)
Visited a GP in past year				
No	13 (3.8)	194 (33.7)	1.0	1.0
Yes	327 (95.9)	381 (66.3)	12.8(7.2-22.9)**	10.5(5.5-19.8)**
Sexual health quiz score (/6)				
Less than 4 correct	80 (23.5)	280 (48.2)	1.0	1.0
4 or more correct	261 (76.5)	301 (51.8)	3.0(2.3-4.1)**	2.3(1.6-3.2)**
Age at sexual debut				
Less than 16 years	160 (46.9)	190 (32.7)	1.0	1.0
16 years or older	167 (49.0)	345 (59.4)	0.6 (0.4-0.8)**	0.5(0.3-0.7)**
Number of lifetime partners				
Five or less	105 (30.9)	330 (57.7)	1.0	1.0
More than five	235 (69.1)	242 (42.3)	3.1(2.3-4.1)**	2.3(1.6-3.3)**

Conclusion

Testing rates in our sample were low and did not meet levels required to reduce chlamydia prevalence in the population. However, testing was higher in participants classified as at-risk compared to participants who were not at risk. Future programs aiming to increase testing and reduce prevalence should also aim to increase STI knowledge and promote the importance of regular testing after exposure to risk, particularly among 16-19 year olds.



Image 1. Participants at the Big Day Out

References

Kong FY, Guy RJ, Hocking JS, Merritt T, Pirotta M, Heal C, Bergeri I, Donovan B, Hellard ME (2011) Australian general practitioner chlamydia testing rates among young people. *Medical Journal of Australia*. 194:249-252

Regan DG, Wilson D, Hocking J (2008) Coverage Is the Key for Effective Screening of Chlamydia trachomatis in Australia. *Journal of Infectious Diseases* 198(3): 349-358.

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