NHS Foundation Trust

Audit of HIV testing in adult admissions to an Acute Care Unit for medical and surgical patients

N Mody^{1, 2}, S Ramsay², C Ferraro², M Hewitt², E Gill², L Holliday², A Ikharia², I Reeves², P Gopaldas²

1. King's College Hospital, London 2. Homerton University Hospital, London

Correspondence: nisha.mody@nhs.net

Background

- The 2011 HINTS study addressed the feasibility and acceptability of implementing the 2008 National HIV testing guidelines, with the Homerton University Hospital Acute Care Unit (ACU) used as one of the study sites
- The ACU admits adult patients from all medical and surgical specialities. Following HINTS, an opt-out testing policy has been in place for all ACU admissions
- Local diagnosed HIV prevalence is 8.25/1000

Audit Aim: review HIV testing rates in ACU admissions from January to April 2014, inclusive, with the testing rate observed during the HINTS study phase taken as a standard

Methods

- Electronic patient records (EPR) were searched for all ACU admissions, January to April 2014
- Data were collected on demographics, admitting speciality, presenting complaint, HIV tests and results
- For new positives, data were also collected on time from diagnosis to CD4 count result, baseline CD4 and viral load (VL), time to starting antiretroviral treatment (ART), retention in HIV care and partner notification (PN)
- Exclusions from the final analysis: known HIV positives, those on follow-up admissions during the audit period

Results

Demographics of ACU admissions,	Medicine (n=1806)	Surgery (n=417)	Gynaecology (n=28)
by speciality	(11=1000)	(11=417)	(11=20)
Age (years): Range	16-101	16-99	18-48
Mean	59	48	32
%<60y	48.7%	72.4%	100%
Gender: Male	50.7%	48.9%	
Female	49.3%	51.3%	100%
Black or Black			
British African	8.4%	7.7%	21.4%

Table 1: Demographics of ACU admissions

Age	59	44	46	34
Gender	Female	Female	Male	Male
Ethnicity	African	African	White British	Turkish
Presentation	Sore throat:	Focal neurology:	Productive cough,	GP referral with
	Seroconversion	Cerebral	fever:	peripheral oedema:
		toxoplasmosis	bronchopneumonia	renal lymphoma
Time from	10/7	6/7	1/7	1/7
diagnosis to				
CD4 count				
Baseline CD4,	487 (14.8)	55 (4.2)	93 (8.2)	147 (6.4)
cells/mm³ (%)				
Baseline VL,	2,871,975	44, 394	96,508	284,485
copies/ml				
Time to	2/12	12/7	n/a	10/7
starting ART	VL<40 at 4/12	VL<50 at 3/12		
Retained in	Yes	Yes	RIP at 3/12:	RIP at 1/12:
care at 18/12			Metastatic non-	Renal lymphoma
			small cell lung	
			cancer	
PN	Done	Done	Done	Done

Table 3: Details of New Positives

	HIV Testing Rate
Overall (n= 2251)	24.3%
Age: <60	33.3%
>60	14.1%
Gender: Male	28.2%
Female	20.3%
Ethnicity:	
Black or Black	
British African	37.9%
All others	23.0%
Symptoms:	
Suggestive of CIC	37.9% (146/385)
Not suggestive of	
CIC	21.4% (400/1866)
Admitting speciality:	
Medicine	26.5%
Surgery	15.3%
Gynaecology	10.7%

Table 2: HIV Testing Rates

CIC= HIV Clinical indicator conditions

- 32.6% of admissions who met the HINTS inclusion criteria were tested, vs 30% in HINTS
- There was a statistically significant difference in HIV testing rates by age, ethnicity, presenting complaint and admitting speciality with higher testing rates for:
 - < < 60 year olds
 - Black or Black British Africans
 - Those presenting with symptoms suggestive of a CIC
 - Medical admissions

(p= <0.01, chi-squared test)

- 4 new positives during the audit period
- No further new diagnoses as a result of PN

Conclusions

- •The overall testing rate was similar to HINTS, showing the feasibility of opt-out HIV testing without the need for extra resources to implement this
- •There was some evidence of more testing in higher risk groups; however, there is still much room for improvement
- •Locally, the opt-out policy should be reinforced across all specialities, particularly surgery
- •Nationally, guidelines need to consider inclusion of surgical admissions for routine testing in high prevalence areas