

Association between harm reduction intervention uptake and skin and soft tissue infections among people who inject drugs

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Table 1. Demographics of PWID¹ who had a SSTI² in the past year

Demographic	N	Had a SSTI ² n %	P-value ³
Male	1306	374 (29)	0.852
Female	553	156 (28)	
Ever homeless			0.570
No	430	118 (27)	
Yes	1435	414 (29)	
Homeless in past 6 months			0.371
No	1333	388 (29)	
Yes	529	143 (27)	
Ever in prison			0.780
No	622	175 (28)	
Yes	1238	356 (29)	
Age (years)			0.129
<= 25	149	40 (27)	
26-30	277	75 (27)	
31-35	462	116 (25)	
>35	980	302 (31)	
Excessive alcohol ⁴			0.245
No	1388	385 (28)	
Yes	475	145 (30)	
Health Board Areas ⁵			0.001
West & Central	1109	290 (26)	
East	540	188 (35)	
North	220	55 (25)	
Time since onset injecting (yrs.)			0.004
< 10	711	208 (29)	
10-14	465	118 (25)	
15-19	327	79 (24)	
20+	364	128 (35)	
Poly-drug injection ⁶			0.000
No	1567	399 (26)	
Yes	300	133 (44)	

1. Defined as those who injected in past 6 months and excludes those who solely injected bodybuilding drugs
2. Defined as self-reported swelling containing pus (abscess), a sore or an open wound at an injection site.
3. Pearson chi square test
4. Defined as > 14units/week for women and >21units per week for men
5. West & Central: Greater Glasgow & Clyde, Lanarkshire, Ayrshire & Annan, Dumfries & Galloway, Forth Valley
East: Lothian, Fife, Tayside, Borders
North: Highlands and Grampian
6. Defined as use of more than one drug type in past 6 months (where drug type is Opiate, Stimulant or Other including Legal Highs)

Table 2. Univariable and multivariable models of associations between uptake of HR and SSTIs within the past year among current injectors

Model	Intervention	Had a SSTI		Univariable			Multivariable ¹		
		n/N	(%)	OR	(95% CI)	P-value	AOR	(95% CI)	P-value
1	N/S Uptake ^{2,3}								
	Low (<200% uptake)	258/767	(34)	1			1		
	High (≥ 200% uptake)	270/1085	(25)	0.654	(0.533-0.801)	0.000	0.719	(0.581-0.888)	0.002
2	Paraphernalia Uptake ⁴								
	Low (<200% uptake)	258/792	(33)	1			1		
	High (≥ 200% uptake)	270/1060	(25)	0.707	(0.577-0.867)	0.001	0.771	(0.625-0.950)	0.015
4	IE Uptake ⁵								
	Low (<200% uptake)	280/869	(32)	1			1		
	High (≥ 200% uptake)	246/979	(25)	0.706	(0.576-0.865)	0.001	0.775	(0.628-0.956)	0.017
3	OST								
	Past	139/380	(36)	1			1		
	Never	42/162	(26)	0.622	(0.413-0.936)	0.023	0.593	(0.386-0.910)	0.017
	Current	352/1320	(27)	0.646	(0.508-0.822)	0.000	0.672	(0.524-0.862)	0.002
5	Combined IE & OST ⁶								
	Low	117/316	(37)	1			1		
	Medium	225/777	(28)	0.693	(0.526-0.914)	0.022	0.732	(0.551-0.973)	0.032
	High	184/754	(24)	0.549	(0.414-0.728)	0.000	0.622	(0.463-0.834)	0.002

1. All multivariable models adjusted for Poly-drug use (No, Yes), Time since onset of injecting(<10, 10-14, 15-19, 20+ year), Region (West & Central Scotland, East Scotland, North), Gender (Male, Female), Homeless past 6 months (No, Yes)

2. Includes new, unused NS obtained from others

3. Adjusts for number of months injected

4. Paraphernalia includes spoons and filters

5. IE includes N/S and paraphernalia.

6. Low = Low IE, no OST; Medium = Low IE + OST, or High IE + no OST; High = High IE + OST (where No OST = never and in the past; OST = currently prescribed)

OR= Odds Ratio, AOR= Adjusted odds Ratio, CI = Confidence Interval, N/S = needle/syringe, IE = injecting equipment, OST = opiate substitution treatment

Table 3. Univariable and multivariable models of association between frequency of injecting, sharing any IE, re-using N/S and SSTIs among current injectors

Model	Injecting behaviour	Had a SSTI n/N (%)	Univariable			Multivariable ^{1,2}		
			OR	(95% CI)	P-value	AOR	(95% CI)	P-value
1	Injecting frequency							
	1 to 3 times a month	95/511 (19)	1			1		
	About once a week	35/158 (22)	1.246	(0.805-1.928)	0.323	1.242	(0.798-1.932)	0.337
	2 to 6 times a week	80/327 (25)	1.418	(1.013-1.986)	0.042	1.267	(0.897-1.789)	0.179
	Once a day	64/240 (27)	1.592	(1.108-2.288)	0.012	1.490	(1.029-2.158)	0.035
	2 to 3 times a day	185/455 (41)	3.000	(2.243-4.014)	0.000	2.703	(2.003-3.648)	0.000
	4 or more times a day	72/175 (41)	3.061	(2.105-4.452)	0.000	2.641	(1.791-3.892)	0.000
2	Shared any IE in the last 6 months							
	No	348/1363 (25)	1			1		
	Yes	173/465 (37)	1.728	(1.381-2.162)	0.000	1.479	(1.164-1.878)	0.000
3	Re-used own N/S in the last 6 months ³							
	No	188/875 (21)	1			1		
	Yes	345/992 (35)	1.949	(1.583-2.398)	0.000	1.506	(1.199-1.893)	0.000

1. Model 1 adjusted for Poly-drug use (No, Yes), Health Board Area (West & Central, East, North), Time since onset of injecting (<10, 10-14, 15-19, 20+ years), Gender (Male, Female), Homeless past 6 months (No, Yes)

2. Model 2 & 3 adjusted for Injecting Frequency (1 to 3 times a month, About once a week, 2 to 6 times a week, Once a day, 2 to 3 times a day, 4 or more times a day), Poly-drug use (No, Yes), Health Board Area (West & Central, East, North), Time since onset of injecting (<10, 10-14, 15-19, 20+ years), Gender (Male, Female), Homeless past 6 months (No, Yes)

3. Defined as re-used own N/S more than once before discarding it

OR= Odds Ratio, AOR= Adjusted odds Ratio, CI = Confidence Interval, N/S = needle/syringe, IE = injecting equipment, OST = opiate substitution treatment