## Supplementary Table S5. The Association Between Health Worker Training, Perceptions of Coworker Attitudes, and Stigmatizing Attitudes with Four Stigma Outcomes for Men Who Have Sex with Men

Variable	Categories	I would be ashamed if a man in my family had sex with other men			Other people deserve access to health services more than MSM			If I had a choice, I would prefer not to provide services to MSM			MSM engage in irresponsible behaviors		
		n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$
Training on infection control <sup>a</sup>	No Yes Missing	243/318 (76.4) 773/977 (79.1) 49/71 (69.0)	1 1.13 (0.87–1.47)	0.349	41/318 (12.9) 164/977 (16.8) 17/71 (23.9)	1 1.34 (0.97–1.85)	0.077	30/318 (9.4) 99/977 (10.1) 12/71 (16.9)	1 1.06 (0.75–1.50)	0.725	218/318 (68.6) 683/977 (69.9) 49/71 (69.0)	1 1.03 (0.81–1.30)	0.821
My coworkers sometimes treat	Strongly disagree	386/510 (75.7)	1	0.065	55/510 (10.8)	1	<0.001	27/510 (5.3)	1	<0.001	326/510 (63.9)	1	0.007
people living with HIV poorly <sup>b</sup>	Disagree Agree Strongly agree	143/167 (85.6)	1.07 (0.70–1.65) 1.85 (1.09–3.14) 1.15 (0.45–2.97)		100/623 (16.1) 53/167 (31.7) 12/35 (34.3)	1.58 (1.09–2.27) 3.88 (2.61–5.78) 4.32 (1.76–10.62)		60/623 (9.6) 40/167 (24.0) 9/35 (25.7)	1.92 (1.23–2.98) 5.84 (3.33–10.27) 6.32 (2.81–14.20)		439/623 (70.5) 137/167 (82.0) 27/35 (77.1)	1.33 (1.02–1.74) 2.56 (1.50–4.38) 1.76 (0.65–4.76)	
My coworkers sometimes talk	Missing Strongly disagree	27/31 (87.1) 205/281 (73.0)	1	0.008	2/31 (6.5) 34/281 (12.1)	1	<0.001	5/31 (16.1) 24/281 (8.5)	1	<0.001	21/31 (67.7) 156/281 (55.5)	1	<0.001
badly about PLHIV <sup>c</sup>	Disagree Agree Strongly agree	274/327 (83.8)	1.15 (0.72–1.84) 1.85 (1.20–2.87) 2.04 (1.09–3.82)		84/630 (13.3) 70/327 (21.4) 31/108 (28.7)	1.14 (0.75–1.72) 2.00 (1.41–2.84) 2.98 (1.87–4.77)		47/630 (7.5) 48/327 (14.7) 18/108 (16.7)	0.88 (0.57–1.38) 1.87 (1.11–3.17) 2.21 (1.28–3.80)		438/630 (69.5) 258/327 (78.9) 85/108 (78.7)	1.80 (1.42–2.27) 2.93 (2.07–4.15) 2.85 (1.77–4.58)	
I would be ashamed if someone in my	Missing	15/20 (75.0) 528/685 (77.1)	1	0.235	3/20 (15.0) 81/685 (11.8)	1	<0.001	4/20 (20.0) 45/685 (6.6)	1	<0.001	13/20 (65.0) 462/685 (67.4)	1	0.482
family had HIV <sup>d</sup>	Disagree Agree Strongly	35/39 (89.7)	1.08 (0.78–1.48) 2.53 (0.64–9.99) 0.71 (0.30–1.67)		106/593 (17.9) 17/39 (43.6) 15/40 (37.5)	1.62 (1.21–2.16) 5.72 (2.82–11.63) 4.23 (2.06–8.69)		21/39 (53.8)	1.61 (1.08–2.38) 17.42 (7.34–41.35) 4.33 (2.07–9.06)		424/593 (71.5) 30/39 (76.9) 28/40 (70.0)	1.19 (0.90–1.57) 1.58 (0.78–3.21) 1.02 (0.47–2.20)	
PLHIV engage in irresponsible	agree Missing Strongly disagree	7/9 (77.8) 251/339 (74.0)	1	0.118	3/9 (33.3) 30/339 (8.8)	1	<0.001	5/9 (55.6) 18/339 (5.3)	1	0.007	6/9 (66.7) 205/339 (60.5)	1	0.002
behaviors <sup>e</sup>	Disagree Agree Strongly	228/292 (78.1)	1.22 (0.77–1.92) 1.14 (0.70–1.87) 2.32 (1.17–4.60)		103/607 (17.0) 58/292 (19.9) 25/104 (24.0)	2.12 (1.33–3.36) 2.48 (1.78–3.45) 3.11 (1.82–5.32)		65/607 (10.7) 38/292 (13.0) 14/104 (13.5)	2.16 (1.05–4.44) 2.59 (1.45–4.66) 2.63 (1.12–6.15)		424/607 (69.9) 222/292 (76.0) 84/104 (80.8)	1.49 (0.96–2.31) 1.95 (1.24–3.07) 2.48 (1.51–4.09)	
Other people deserve access to services	agree Missing Strongly disagree	20/24 (83.3) 385/478 (80.5)	1	0.249	6/24 (25.0) 32/478 (6.7)	1	<0.001	6/24 (25.0) 32/478 (6.7)	1	<0.001	15/24 (62.5) 336/478 (70.3)	1	0.051
more than PLHIV <sup>f</sup>	Disagree Agree Strongly	172/224 (76.8)	0.75 (0.53–1.06) 0.79 (0.48–1.29) 0.93 (0.58–1.50)		53/558 (9.5) 99/224 (44.2) 31/76 (40.8)	1.46 (0.85–2.51) 10.96 (6.57–18.29) 9.48 (4.65–19.31)		38/558 (6.8) 51/224 (22.8) 13/76 (17.1)	1.02 (0.53–1.95) 4.07 (2.52–6.55) 2.84 (1.44–5.60)		373/558 (66.8) 169/224 (75.4) 53/76 (69.7)	0.82 (0.59–1.15) 1.27 (0.85–1.92) 0.91 (0.62–1.35)	
Prefer not to provide services to PLHIV <sup>g</sup>	agree Missing Strongly disagree	23/30 (76.7) 556/714 (77.9)	1	0.525	7/30 (23.3) 82/714 (11.5)	1	<0.001	7/30 (23.3) 49/714 (6.9)	1	<0.001	19/30 (63.3) 491/714 (68.8)	1	0.906
	Disagree Agree Strongly	44/51 (86.3)	0.97 (0.69–1.37) 1.76 (0.59–5.27) 0.61 (0.27–1.34)		104/555 (18.7) 21/51 (41.2) 13/38 (34.2)	1.78 (1.30–2.43) 5.28 (3.60–7.75) 3.89 (1.88–8.04)			1.53 (0.99–2.37) 12.04 (7.03–20.64) 4.69 (2.10–10.46)		391/555 (70.5) 37/51 (72.5) 26/38 (68.4)	1.05 (0.83–1.31) 1.17 (0.50–2.75) 0.84 (0.47–1.50)	
	agree Missing	7/8 (87.5)			2/8 (25.0)			2/8 (25.0)			5/8 (62.5)		

(continued)

## SUPPLEMENTARY TABLE S5. (CONTINUED)

Variable	Categories	I would be ashamed if a man in my family had sex with other men			Other people deserve access to health services more than MSM				choice, I would prefer wide services to MSM	MSM engage in irresponsible behaviors			
		n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$
I would be ashamed if a woman in my	Strongly disagree	39/75 (52.0)	1	<0.001	6/75 (8.0)	1	0.271	8/75 (10.7)	1	0.909	41/75 (54.7)	1	<0.001
family sold sex <sup>h</sup>	Disagree Agree Strongly	513/610 (84.1)	0.72 (0.37–1.40) 4.97 (2.83–8.74) 9.11 (4.55–18.23)		34/212 (16.0) 102/610 (16.7) 80/457 (17.5)	2.26 (0.85–6.00) 2.33 (0.97–5.59) 2.49 (0.99–6.24)		19/212 (9.0) 66/610 (10.8) 48/457 (10.5)	0.86 (0.48–1.55) 1.04 (0.50–2.16) 1.01 (0.52–1.97)		107/212 (50.5) 447/610 (73.3) 348/457 (76.1)	0.83 (0.51–1.37) 2.26 (1.42–3.60) 2.64 (1.40–5.01)	
Women who sell sex engage in	agree Missing Strongly disagree	6/12 (50.0) 52/81 (64.2)		<0.001	0/12 (0.0) 10/81 (12.3)	1	0.381	0/12 (0.0) 2/81 (2.5)	1	0.041	7/12 (58.3) 23/81 (28.4)	1	<0.001
irresponsible behaviors <sup>i</sup>	Disagree Agree Strongly agree	604/716 (84.4)	0.68 (0.34–1.34) 3.04 (1.42–6.50) 3.81 (1.58–9.19)		37/234 (15.8) 125/716 (17.5) 48/311 (15.4)	1.32 (0.56–3.14) 1.48 (0.76–2.87) 1.29 (0.65–2.53)		26/234 (11.1) 65/716 (9.1) 46/311 (14.8)	4.96 (0.97–25.31) 3.94 (1.03–15.00) 6.90 (1.51–31.42)			1.37 (0.67–2.82) 10.74 (5.43–21.26) 18.07 (10.05–32.50)	
Other people deserve access to services	Missing Strongly disagree	12/24 (50.0) 326/423 (77.1)		0.378	2/24 (8.3) 16/423 (3.8)	1	<0.001	2/24 (8.3) 20/423 (4.7)	1	<0.001	6/24 (25.0) 278/423 (65.7)	1	<0.001
more than women who sell sex <sup>j</sup>	Disagree Agree Strongly agree	139/166 (83.7)	0.98 (0.78–1.22) 1.46 (0.87–2.46) 1.20 (0.53–2.71)			2.58 (1.57–4.25) 52.03 (30.71–88.16) 43.66 (17.44–109.32)		54/723 (7.5) 51/166 (30.7) 14/45 (31.1)	1.65 (0.83–3.28) 8.95 (5.06–15.86) 9.52 (5.13–17.68)		500/723 (69.2) 129/166 (77.7) 37/45 (82.2)	1.15 (0.85–1.55) 1.72 (1.21–2.45) 2.44 (1.50–3.97)	
Prefer not to provide services to women	Missing Strongly disagree	8/9 (88.9) 391/514 (76.1)		0.536	1/9 (11.1) 51/514 (9.9)	1	<0.001	2/9 (22.2) 22/514 (4.3)	1	<0.001	6/9 (66.7) 338/514 (65.8)	1	0.142
who sell sex <sup>k</sup>	Disagree Agree Strongly agree	71/84 (84.5)	1.13 (0.78–1.63) 1.67 (0.84–3.34) 1.41 (0.47–4.28)		114/733 (15.6) 42/84 (50.0) 13/29 (44.8)	1.69 (1.16–2.47) 9.14 (5.36–15.57) 7.11 (3.29–15.40)			1.80 (1.11–2.90) 27.06 (14.75–49.65) 35.97 (14.89–86.88)		521/733 (71.1) 61/84 (72.6) 25/29 (86.2)	1.26 (0.94–1.68) 1.32 (0.78–2.26) 3.02 (0.90–10.09)	
I would be ashamed if a young woman in	Missing	5/6 (83.3) 163/229 (71.2)		<0.001	2/6 (33.3) 28/229 (12.2)	1	<0.001	3/6 (50.0) 16/229 (7.0)	1	0.005	5/6 (83.3) 130/229 (56.8)	1	<0.001
my family became pregnant before marriage <sup>1</sup>	Disagree Agree Strongly	386/439 (87.9)	0.93 (0.68–1.26) 2.90 (1.77–4.74) 2.24 (1.28–3.92)		62/493 (12.6) 93/439 (21.2) 36/188 (19.1)	1.05 (0.68–1.63) 1.94 (1.37–2.73) 1.69 (1.05–2.73)		36/493 (7.3) 60/439 (13.7) 26/188 (13.8)	1.08 (0.58–2.02) 2.14 (1.24–3.71) 2.15 (1.14–4.07)		315/493 (63.9) 350/439 (79.7) 143/188 (76.1)	1.37 (0.92–2.06) 2.94 (1.85–4.68) 2.34 (1.45–3.78)	
	agree Missing	14/17 (82.4)			3/17 (17.6)			3/17 (17.6)			12/17 (70.6)		

(continued)

## SUPPLEMENTARY TABLE S5. (CONTINUED)

Variable	Categories	I would be ashamed if a man in my family had sex with other men			Other people deserve access to health services more than MSM			If I had a choice, I would prefer not to provide services to MSM			MSM engage in irresponsible behaviors		
		n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$	n/N (%)*	aOR (95% CIs) <sup>†</sup>	$p_w^{\ddagger}$
Young women who become pregnant	Strongly disagree	104/144 (72.2)	1	<0.001	12/144 (8.3)	1	<0.001	5/144 (3.5)	1	<0.001	71/144 (49.3)	1	<0.001
before marriage	Disagree	379/554 (68.4)	0.87 (0.53-1.41)		71/554 (12.8)	1.67 (0.85–3.29)		48/554 (8.7)	2.76 (1.09–7.02)		332/554 (59.9)	1.63 (1.03-2.56)	
engage in	Agree	468/537 (87.2)	2.66 (1.66–4.25)		102/537 (19.0)	2.67 (1.32–5.39)		69/537 (12.8)	4.32 (1.87–9.98)		438/537 (81.6)	4.72 (2.87–7.75)	
irresponsible	Strongly	102/116 (87.9)	2.81 (1.38–5.70)		35/116 (30.2)	4.92 (2.35–10.29)		16/116 (13.8)	4.60 (1.68–12.64)		103/116 (88.8)	8.29 (4.50–15.26)	
behaviors <sup>m</sup>	agree	· · · · ·			` ′	· · · · · · · · · · · · · · · · · · ·		` ′	,		` ′	, ,	
	Missing	12/15 (80.0)			2/15 (13.3)			3/15 (20.0)			6/15 (40.0)		
Other people deserve access to services	Strongly disagree	360/453 (79.5)	1	0.335	20/453 (4.4)	1	< 0.001	31/453 (6.8)	1	<0.001	303/453 (66.9)	1	0.501
more than young	Disagree	507/667 (76.0)	0.81 (0.59-1.12)		54/667 (8.1)	1.93 (1.34-2.78)		42/667 (6.3)	0.92 (0.68-1.26)		468/667 (70.2)	1.15 (0.84-1.58)	
women who	Agree	143/176 (81.3)	1.11 (0.69–1.77)		115/176 (65.3)	43.24 (25.13–74.40)		48/176 (27.3)	5.27 (3.21–8.65)		127/176 (72.2)	1.25 (0.80–1.97)	
become pregnant before marriage <sup>n</sup>	Strongly agree		0.94 (0.41–2.14)		26/54 (48.1)	20.02 (9.92–40.42)		15/54 (27.8)	5.22 (2.55–10.68)		41/54 (75.9)	1.46 (0.84–2.54)	
0	Missing	12/16 (75.0)			7/16 (43.8)			5/16 (31.3)			11/16 (68.8)		
Prefer not to provide	Strongly	465/602 (77.2)	1	0.436	66/602 (11.0)	1	< 0.001		1	< 0.001		1	0.884
services to young	disagree	( , ,			(,			()			( , , ,		
women who	Disagree	535/685 (78.1)	1.03 (0.77-1.38)		117/685 (17.1)	1.67 (1.28-2.18)		68/685 (9.9)	2.15 (1.51–3.05)		485/685 (70.8)	1.10 (0.87-1.40)	
become pregnant	Agree	43/50 (86.0)	,		26/50 (52.0)	8.72 (4.72–16.12)		32/50 (64.0)	36.07 (19.54–66.60)		35/50 (70.0)	1.05 (0.58–1.88)	
before marriage <sup>o</sup>	Strongly				11/25 (44.0)	6.17 (2.38–15.97)		9/25 (36.0)	10.30 (4.27–24.85)		18/25 (72.0)	1.13 (0.58–2.22)	
	agree	( , , , ,	, , , , , , ,			, , , , , , , , , , , , , , , , , , , ,		(/	, , , , , , , , , , , , , , , , , , , ,		( , , , ,	` ' '	
	Missing	3/4 (75.0)			2/4 (50.0)			2/4 (50.0)			2/4 (50.0)		

<sup>\*</sup>Proportion of health workers responding strongly agree or agree.

The aOR for sex is adjusted for age group; the aOR for age group is adjusted for sex; the aOR for all other predictor variables is adjusted for sex and age group. A p value of <0.05 indicates that the predictor creates a statistically significant improvement in the fit of the model.

A p value of 20.03 indicates that the predictor creates a statistically significant improvement in the fit of a lafection control and universal precautions (including postexposure prophylaxis and waste management). bMy coworkers sometimes treat people living with HIV poorly when providing them. cMy coworkers sometimes talk badly about people thought to be living with HIV.

<sup>&</sup>lt;sup>d</sup>I would be ashamed is a woman in my family was PLHIV.

<sup>&</sup>lt;sup>c</sup>PLHIV engage in irresponsible behaviors. <sup>f</sup>Other people deserve access to health services more than PLHIV.

gIf I had a choice, I would prefer not to provide services to PLHIV.

<sup>&</sup>lt;sup>g</sup>I would be ashamed if a woman in my family was a woman who sells sex.

Women who sell sex engage in irresponsible behaviors.

Other people deserve access to health services more than women who sell sex.

If I had a choice, I would prefer not to provide services to women who sell sex.

<sup>&</sup>lt;sup>1</sup>I would be ashamed if a young woman in my family became pregnant before marriage.

<sup>&</sup>lt;sup>m</sup>Young women who become pregnant before marriage engage in irresponsible behaviors.

Other people deserve access to health services more than young women who become pregnant before marriage.

OIf I had a choice, I would prefer not to provide services to young women who become pregnant before marriage.

aOR, adjusted odds ratio; CIs, confidence intervals; MSM, men who have sex with men; n, number of individuals reporting the four types of stigma within groups; N, total number of individuals within groups; PLHIV, people living with HIV;  $p_w$ , p value of the Wald test.

p-Values marked in bold indicate numbers that are significant on the 95% confidence limit.