



# A reanalysis of measuring sexual aggression-related implicit theories: Belief in the unknowability of the opposite

sex

Richard A. Belz, Elayna J. Kinney, and Darrin L. Rogers

## Abstract

Implicit theories (ITs) are fundamental perspectives theorized to influence behavior across a variety of situations. Possessing an IT of the opposite sex as being fundamentally unknowable may lead to sexually aggressive thoughts and behaviors. The current study reports the creation and preliminary validation of the men are fundamentally unknowable (MFU) and the women are fundamentally unknowable (WFU) self-report psychometric scales. Undergraduate students responded to an online survey including pools of 18 items written to assess MFU and WFU. Exploratory factor analysis identified eight cohesive items from the pool, forming a scale with acceptable reliability. Correlations between the MFU and WFU scales and other measures provided initial evidence of validity.

## Introduction

Implicit theories (ITs; Dweck, Chiu, & Hong, 1995) have been postulated as “deep” cognitive structures. Polaschek & Ward (2002) proposed several ITs, including the belief that *women are fundamentally unknowable* (WFU), as underlying mechanisms for rape-supportive beliefs. This strong version of “men are from Mars, women are from Venus” (Gray, 2012) implies a belief that women are inherently different from men, and these differences cannot be readily understood. This impasse may lead to mistrust, hostility, and even sexual aggression toward women (Polaschek & Ward, 2002).

Although WFU has been inferred through analysis of interviews with rapists (Fisher & Beech, 2009; Polaschek & Gannon, 2004), this approach may ignore variability in WFU in non-convicted populations, bypassing opportunities to investigate the etiology of sexual aggression. Direct measures of this implicit theory are currently lacking.

The current study aimed to develop measures of WFU and an intuitively theorized companion counterpart in women, *men are fundamentally unknowable* (MFU) in a sample of undergraduates. We hypothesized that such scales would be useful in determining the presence of the belief that the opposite sex as unknowable in the general population, and in studying how this construct is related to factors known to correlate with sexual aggression.

## Method

### Participants

Participants consisted of 248 undergraduate volunteers at a public university in the Northeastern United States. 50 volunteers were male, 191 were female, three specified no sex, while four provided no answer. Participant ages ranged from 18 to over 32 (mean = 20.3 years, SD = 2.65). The sample was 85.1% White, 7.7% Black, and 6.7% Hispanic/Latino, with 4.1% indicating another race/ethnicity. The sample used for this study and subsequent analysis involved assessment of MFU using data from the female participants and assessment of WFU using data from the male participants.

### Procedures

In April 2015 and November 2015, participants responded to an anonymous online survey including pools of 18 items each written to assess WFU and MFU for heterosexual men and women, respectively. The survey also included scales known to correlate with WFU and MFU in previous research, including the Adversarial Heterosexual Beliefs Scale (AHBS; Lonsway & Fitzgerald, 1995), the Ambivalent Sexism Inventory (Glick & Fiske, 1996), the Belief in Female Sexual Deceptiveness Scale (BFSD; Rogers, Cervantes, & Espinosa, 2015) and the Misperception of Others' Sexual Interest Scale (MOSI; based on Abbey, 1987).

## Analysis and Results

Items were selected through a combination of rational and empirical analysis. Early factor analyses suggested that items prescribing (rather than simply describing) MFU or WFU (e.g., “Not understanding the opposite sex is what keeps things interesting”), and items specifically about sexual behavior (e.g., “You can never know whether a man's/woman's responses in bed truly reflect his/her feelings about sex”), loaded inconsistently with others, and were removed from final analyses. A total of 11 items were included in the final exploratory factor analysis. Parallel analysis suggested extracting two factors. Following the advice of Raubenheimer (2004), we extracted one more factor than suggested--three--with a plan to eliminate items loading only on the weakest resulting factor. Three factors were extracted using the fa() function from the psych package for the statistical package R (R Development Core Team, 2012). Oblique rotation was specified to allow potential intercorrelation between factors.

The three-factor loading structure is presented in Table 1 for WFU and Table 2 for MFU. For WFU, items loading most strongly on the third and weakest factor were eliminated, leaving eight items for the final scale. Question 8 for WFU was kept due to the strong loading for MFU and loading somewhat moderately on Factor 3.

For MFU, the second factor appeared to be responding to item keying, as it was composed of the reverse-coded items. Items with the weakest loadings for any factor were eliminated, leaving nine items for the final scale. Cronbach's alpha was acceptable for WFU and MFU with values of .81 and .74, respectively.

Table 3 summarizes the correlations between WFU and other related measures to discern construct validity. Table 4 summarizes the correlations between MFU and other related measures to discern construct validity. Columns without asterisks indicate non-significant p-values (greater than 0.05).

Table 1. WFU Items and Three-Factor Solution Loadings

		2	3	1
1	I understand my male friends, but I will never understand my female friends.	.86	-.13	.06
2	I've lived around women all my life, but I still don't understand them at all.	.75	.16	.17
3	When a woman tells me something, I immediately get confused about what she really means.	.63	-.03	-.24
4	A man could never truly know how a woman feels.	.55	.06	.10
5	I simply cannot imagine what goes on in women's heads.	.48	.40	-.07
6	Men who claim they understand women are either lying or fooling themselves	.29	.51	-.05
7	Women are not so hard to understand, if you put your mind to it. (R)	-.09	.75	.12
8	Most men understand most women. (R)	.08	.22	.00

(R) = Reverse-coded item

Table 2. MFU Items and Three-Factor Solution Loadings

		1	2	3
1	I've lived around men all my life, but I still don't understand them at all	.81	.07	-.04
2	I understand my female friends, but I will never understand my male friends	.72	-.09	.05
3	I simply cannot imagine what goes on in men's heads	.49	.04	.25
4	Men are not so hard to understand, if you put your mind to it. (R)	.03	.78	.00
5	My understanding of men has grown consistently throughout my life (R)	-.07	.60	.03
6	Most women understand most men. (R)	-.05	.52	-.07
7	A woman could never truly know how a man feels.	-.04	-.03	.71
8	Women who claim they understand men are either lying or fooling themselves	.04	.05	.66
9	When a man tells me something, I immediately get confused about what he really means.	.13	-.01	.47

(R) = Reverse-coded item

## Discussion

MFU's and WFU's positive correlations with AHBS, ASI.B, and ASI.H give support to the notion of construct validity. This IT relates to the belief that sexual relationships are exploitative (AHBS), as Fisher & Beech (2009) explained the corollary to women being unknowable is that they are deceptive and disguise their wants so their wants are obtained from men. MFU's relation to measures of sexism reinforced its association with potential aggression.

The factor analysis supported the idea of the opposite sex being unknowable as a stand-alone construct, as proposed by Polaschek and Ward (2002). Although other researchers combined or relabeled the IT women are unknowable to women are dangerous (Polaschek & Gannon, 2004), other researchers have not (see Blake & Gannon, 2014), and this may be due to differing methodologies.

Currently, the impact of dangerousness on MFU or WFU is unclear, as no items on this preliminary scale measured dangerousness, so further research with larger sample sizes should focus on including items that can measure the extent dangerousness accounts for unknowability to determine its impact on a survey measure.

This scale does provide a starting point for further research on the unknowability of the opposite sex through a direct survey measure, and gives support to the idea that this IT is not only found among those who commit sexual offenses.

Table 3

Correlations between WFU and Measures of Validation

Scale	WFU	Significance
AHBS	.38	*
ASI.B	.82	**
ASI.H	.73	*
BFSD	.54	***
MOSI (log)	-.015	

\*p<.05      \*\*p<.01      \*\*\*p<.001

Table 4

Correlations between MFU and Measures of Validation

Scale	MFU	Significance
AHBS	.25	**
ASI.B	.28	
ASI.H	.16	
BFSD	.15	
MOSI (log)	.00	

\*\*p<.01

## References

- Abbey, A. (1987). Misperceptions of friendly behavior as sexual interest: A survey of naturally occurring incidents. *Psychology of Women Quarterly, 11*, 173-194.
- Blake, E., & Theresa, G. A. (2014). Investigating the implicit theories of rape-prone men using an interpretative bias task. *Legal and Criminological Psychology, 19*, 40-53.
- Dweck, C. S., Chiu, C., & Hong, Y. (1995). Implicit theories and their role in judgments and reactions: A world from two perspectives. *Psychological Inquiry, 6*, 267-285.
- Fisher, D. & Beech, A. R. (2009). The implicit theories of rapists and sexual murderers. In T. A. Gannon, T. Ward, A. R. Beech and D. Fisher (Eds.), *Aggressive offenders' cognition: Theory, research, and practice* (pp. 31-52). Oxford, UK: John Wiley & Sons Ltd.
- Gray, J. (2012). *Men are from Mars, women are from Venus: The classic guide to understanding the opposite sex*. New York: HarperCollins.
- Lonsway, K. A., & Fitzgerald, L. F. (1995). Attitudinal antecedents of rape myth acceptance: A theoretical and empirical reexamination. *Journal of Personality and Social Psychology, 68*(4), 704-711.
- Polaschek, D. L., & Gannon, T. A. (2004). The implicit theories of rapists: What convicted offenders tell us. *Sexual Abuse: A Journal of Research and Treatment, 16*(4), 299-314. doi:10.1177/107906320401600404
- Polaschek, D. L., & Ward, T. (2002). The implicit theories of potential rapists: What our questionnaires tell us. *Aggression and Violent Behavior, 7*, 385-406. doi:10.1016/S1359-1789(01)00063-5
- R Development Core Team. (2012). R: A language and environment for statistical computing. Vienna, Austria: R Foundation for Statistical Computing.
- Raubenheimer, J. (2004). An item selection procedure to maximise scale reliability and validity. *SA Journal of Industrial Psychology, 30*(4), 59-64. doi:10.4102/sajip.v30i4.168
- Rogers, D.L., Cervantes, E., & Espinosa, J.C. (2015). Development and validation of the belief in female sexual deceptiveness scale. *Journal of Interpersonal Violence, 30*, 744-761. doi: 10.1177/0886260514536282