



NORTHWESTERN UNIVERSITY

# Positive Facial Expressions in Marriage: Genuine and Non-Genuine Smiles as Predictors of Marital Satisfaction

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## BACKGROUND

- Marital emotional functioning is an important predictor of marital satisfaction [1]
- Positive emotions play an important role in social relationships [2], but few studies have examined positive emotions in marriage

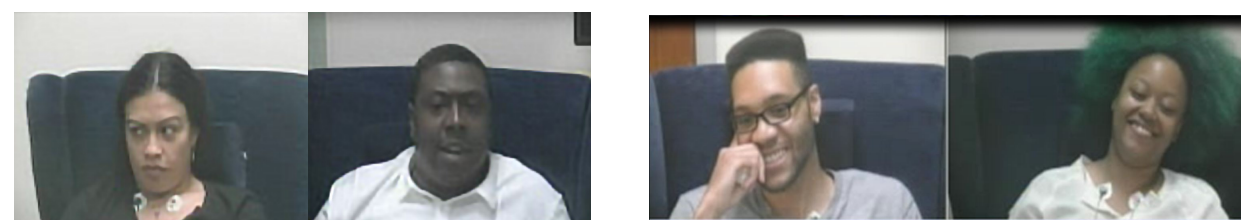
### The Present Study

- Examined an aspect of positive marital emotional functioning via displays of positive facial expressions (i.e., genuine and nongenuine smiles) during marital interactions and their associations with marital satisfaction
- Hypothesized positive association between genuine (but not non-genuine) smiles and marital satisfaction

## METHOD

### Participants

- $N = 66$  married spouses from Chicago area from highly diverse backgrounds
- Age:  $M = 42.77$ ,  $SD = 9.3$
- Household income:  $M = \$72.5K$ ,  $SD = \$ < \$27.5K$ , range:  $< 20K$  to  $> 150K$  ( $n=6$ )
- Education (in years):  $M=15.08$ ,  $SD=2.79$



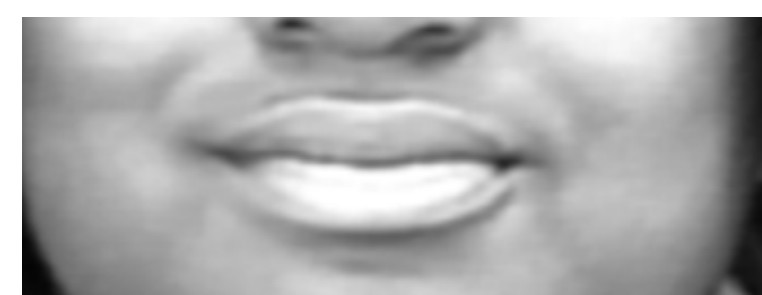
### Measures and Procedure

- **Smiles** were measured as spouses engaged in unrehearsed 10-minute conversations about (1) a pleasant topic (i.e., positive conversation) and (2) a topic of disagreement (i.e., conflict conversation) (in counterbalanced order)
- **Amusement experience** was measured after each conversation using an emotion checklist (i.e., 0 = no amusement at all; 8 = strongest amusement ever felt)
- **Marital satisfaction** was measured using the Marital Adjustment Test (i.e., 15 items,  $\alpha = .8$ ; e.g., "To what extent do you and your mate agree or disagree on demonstration of affection?")

## Genuine and Non-Genuine Smiles Coding



Action Unit 6: Cheek Raiser



Action Unit 12: Lip Corner Puller

- Two trained coders objectively coded genuine and non-genuine smiles based on the Facial Action Coding System ( $\kappa = .93-1$ ) on a second-by-second basis for the first 3-minutes of each conversation.
- Genuine smile was defined as contraction of (1) action unit (AU) 6 (i.e., cheek raiser) and (2) AU 12 (i.e., lip corner raise).
- Non-genuine smile was defined as contraction of only AU 12
- To take into account that smiles were coded during a conversation, we included two covariate codes: (1) talking and (2) laughing.

## RESULTS

### Preliminary Analyses

	1.	2.	3.	4.	5.
1. Genuine smiles: Conflict conversation	-	.50***	.27*	.16	.36**
2. Non-Genuine smiles: Conflict conversation		-	.57***	.51***	-.06
3. Genuine smiles: Positive conversation			-	.44***	.29*
4. Non-genuine smiles: Positive conversation				-	.36**

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

- Results indicated no significant correlations ( $r_s < |.10|$ ,  $p_s < .05$ ) between smiles (genuine and non-genuine) and marital satisfaction, regardless of conversation context. Results held controlling for talking and laughing.

## Exploratory Analyses

Conflict Conversation	Amusement experience	
	Genuine smiles	.36**
Non-Genuine smiles	-.06	

Positive Conversation	Amusement experience	
	Genuine smiles	.29*
Non-Genuine smiles	.36**	

## DISCUSSION

- Findings do not support link between smiles during marital conversations and marital satisfaction
- Exploratory analyses support positive link between smiles (in particular genuine smiles) and positive emotional experiences during marital conversations
- Study has limitations, which suggest directions for future research, including increasing sample size to afford sufficient statistical power to detect medium-sized effects; expanding smiles coding to capture  $> 2$  action units for  $> 3$  minutes; and accounting for statistical interdependence between spouses
- Findings guide us in continuing to examine how positive emotional expressions fit into the larger body of positive emotion research

### ACKNOWLEDGMENTS

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### REFERENCES

- [1] Levenson, R. W., & Gottman, J. M. (1985). Physiological and affective predictors of change in relationship satisfaction. *Journal of Personality and Social Psychology*, 49(1), 85–94. <https://doi.org/10.1037/0022-3514.49.1.85>
- [2] Fredrickson, B. L. (2001). The role of positive emotions in positive psychology: The broaden-and-build theory of positive emotions. *American Psychologist*, 56(3), 218–226. <https://doi.org/10.1037/0003-066X.56.3.218>