What Works and What Doesn't?
Valid Cues to Deception Based on Age and Liar

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INTRODUCTION

- Most people are not accurate when detecting lies in strangers (average accuracy 54%; Bond & DePaulo, 2006).
- Older adults (OA) are even less accurate than young adults (YA; Stanley & Blanchard-Fields, 2008).
- However, people tend to be *more* accurate detecting lies in a familiar partner, (McCornack & Levine, 1990).
- Valid cues to deception as a function of **age of the judge** and the **familiarity** between the rater and the liar have not been examined.
- OA may be more motivated, than YA to detect lies in a close relationship (Carstensen, 1995).

Hypotheses

H1: OA will report fewer valid cues to deception than YA.

H2: OA, but not YA, will report using more cues in the familiar partner (FP) condition than the stranger condition.

Method

Participants

OA (12 couples; n = 23) 58-80 yrs; M =67.69; SD =5.46

YA (16 couples; n = 32) 18-39 yrs; M =22.91; SD =3.99

Materials

Unique Thoughts Questionnaire

Excluded items previously discussed with partner
Participant chose 5 items to lie about, 5 truths
Example: *What do you think you would be reincarnated as?*

Interrogation

6 Questions (Frank & Ekman, 1997)
For example: How long have you held this belief?

Judged Veracity of FP, YA stranger, and OA stranger

Max Accuracy: 30

Reported Cues used after each liar condition

What cues or strategies did you use to determine which statements were truths and which statements were lies?

Two independent coders coded self-reported cues using theory and data-driven methods (Kappas ranged from .80-.95)

RESULTS

Age Differences in Valid Cues Reported (H1)

OA (n = 1) relied on Speech Characteristics ($\chi^2_{(1,43)}$ = 5.50, p =.02) less often than YA (n = 7) when the liar was a YA stranger and this cue predicted accuracy (r = .32, p = .02). There were no age differences (OA n = 9; YA n = 8) in reliance on Facial Expressions ($\chi^2_{(1,44)}$ = .18, p =.67); those who reported this cue were less accurate identifying when an OA stranger was lying (r = -.36, p = .01).

Cue	Example	Frequency (YA)	Frequency (OA)	Totals
Speech Characteristics	***But especially her vocal tone, her voice went up a lot***	**24**	**6**	**30**
Hesitation	*Length of pause prior to response*	11	5	16
Facial Expressions	*He pursed his lips*	28	22	50
Eye Movement	*The way her eyes shifted*	27	25	52
Logical Response	*Considered credibility of response*	18	14	32
Nonverbal Behavior	*Head movements*	12	13	25
Nervous Manner	*Appeared somewhat uncomfortable after some answers*	12	4	16
Details	*Amount of details*	4	3	7
Knowledge of Liar	*Just know how he feels*	18	24	42
	Totals:	154	116	270

Frequency of Reported Cues by Condition (H2)

Eye movement and Logical Response were reported more often when the lair was a stranger, compared to a FP. Nervous Manner was reported most often when the liar was a YA stranger. Knowledge of Liar was reported only when the liar was a FP, however, there were no age differences in reported usage ($\chi^2_{(1,57)}$ = .84, p =.36) and this was *not* a valid cue to deceit detection (r = -.004, p = .49).

Cue	$\chi^2_{(2,148)}$, p	Familiar Partner	YA Stranger	OA Stranger
		Frequency (YA | OA)		
Eye Movement	11.08, <.01	7 | 5	10 | 12	10 | 8
Logical Response	7.99, .02	3 | 3	7 | 6	8 | 5
Nervous Manner	9.02, .01	3 | 1	8 | 2	1 | 1
Knowledge of Liar	90.99, <.001	18 | 24	0 | 0	0 | 0

DISCUSSION

- Speech characteristics and facial expressions were the only cues that accurately predicted deceit detection accuracy.
- OA are failing to use the valid cue of speech characteristics, which could be contributing to their lower accuracy detecting deceit in strangers.
- People change their deceit detection strategies depending on who is lying. When the liar is a stranger, people rely more on eye movements and logical response. When a FP is lying, people reported use far fewer cues.
- This could suggest people are more likely to rely on a "gut instinct" to indicate if a partner is lying.