

BACKGROUND

- Emotion is a crucial component of verbal communication that conveys messages besides the semantic meanings in speech.
- There are phonological and locutionary cues that reflect various emotional affects.
- The usage of words and expressions that reflect emotions share high similarities among people who are physically and psychologically close to each other. (mimicry, interactions, and exposures)
- Past research has demonstrated the influence of parents on their infants' development.
- It is unclear whether the effect exists between parents and youth.
- Therefore, the analysis of linguistic similarities of negative affects between parent and youth require further investigation.

HYPOTHESIS

Hypothesis: A positive correlation exists between the frequency of negative affect words present in parents' and youths' speech.

METHODS



Participants. Follow-up interviews are conducted on participants (parent-youth pairs) from a previous study through zoom. Parents are measured using SCIDS interview; Youth is measured using KSADS interview.

Data. The audio recordings of the interviews are transcribed through the subtitling software in Zoom. The automated transcriptions are then inspected and corrected manually into text files.

Analyses. Language parameters are specified on LIWC-22 (linguistic analysis software), capturing negative affects of personal pronouns, tone, anxiety, and sadness. The percentage of target words captured is compared through analytical software SPSS

RESULTS

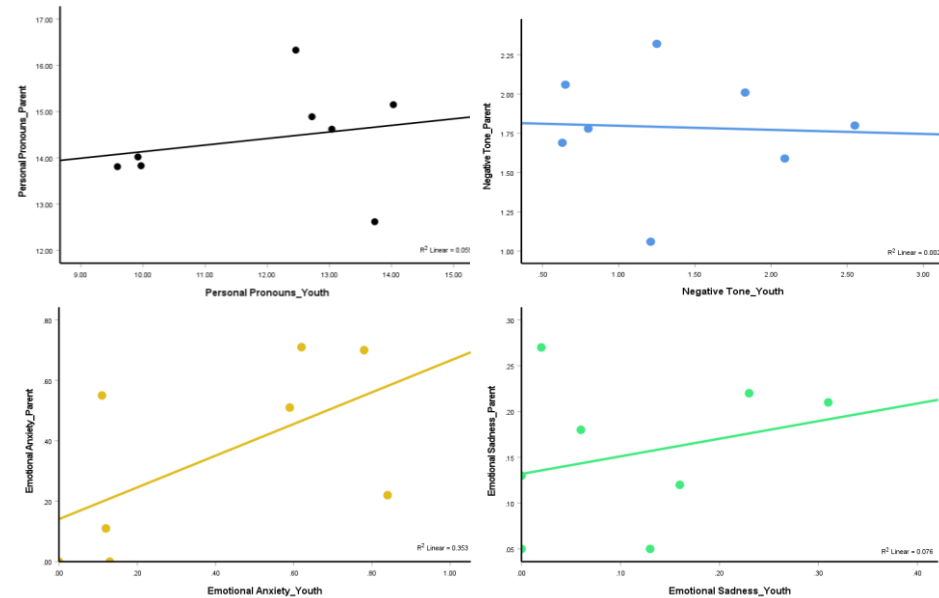


Figure 1. Bivariate Correlations of Language Parameters. Personal Pronouns (top left); Negative Tone (top right); Emotional Anxiety (bottom left); Emotional Sadness (bottom right).

	M (SD)	1	2	3	4	5	6	7	8	9	10
1. Personal Pronouns (Parent)	14.41 (1.11)	-									
2. Negative Tone (Parent)	1.79 (.38)	-.51	-								
3. Anxiety (Parent)	.35 (.30)	-.02	.45	-							
4. Anger (Parent)	.29 (.27)	-.33	.42	-.54	-						
5. Sadness (Parent)	.15 (.80)	.18	.16	-.17	.08	-					
6. Personal Pronouns (Youth)	11.93 (1.81)	.23	-.52	-.07	-.49	.07	-				
7. Negative Tone (Youth)	1.38 (0.71)	-.36	-.49	.37	-.46	-.25	-.12	-			
8. Anxiety (Youth)	.40 (.34)	-.52	.27	.59	.46	.02	.04	.81	-		
9. Anger (Youth)	.23 (.17)	.65	-.28	-.26	.27	-.44	-.39	.35	-.09	-	
10. Sadness (Youth)	.11 (.12)	-.32	.47	.71	-.40	.28	-.24	.54	.84**	-.27	-

Note. ** $p < .01$, * $p < .05$

RESULTS CONT.

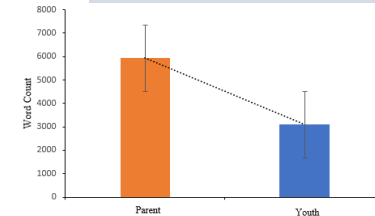


Figure 2. Word Count between participant groups. Parents (\bar{x} = 5927.375) on average are more verbose than youths (\bar{x} = 3096.875).

DISCUSSION

- Emotional sadness in youth correlates with emotional anxiety in youth ($p < .01$). This suggests internal correlations between measures of these negative affect parameters.
- Emotional anxiety appears to positively correlate between parents and youths.
- Calculations in Cohen's d suggest language parameters of personal pronouns, negative tones, and anger have medium effect sizes; anxiety and sadness have small effect sizes.

Limitations and future directions

- The current analysis only consists of $n=8$ parent-youth pairs. The small sample size makes it difficult to determine the truthfulness of the correlational findings.
- From a statistical standpoint, the limited sample size increases the margin of error. Thus, the null hypothesis may be inaccurately accepted due to the difficulties in reaching statistical significance ($p < .05$).
- While the current study only focuses on the negative affect words recorded in the semi-structured interviews, the future study may compare these parameters to objective measures such as depression and anxiety scales.

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