

# Supporting Information

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## SI Text

We suggest that parental overvaluation contributes to the development of narcissism in children. An alternative interpretation might be that parents who overvalue their children are likely to be narcissistic themselves: Parental overvaluation, then, might predict children's narcissism merely because children mimic or inherit parents' narcissism. Additional analyses, however, refute this interpretation. We assessed parental narcissism at wave 1 using the Narcissistic Personality Inventory-16 (1), which consists of 16 forced-choice items (e.g., "I think I am a special person" vs. "I am no better or no worse than most people") (potential range = 0–1; Cronbach  $\alpha$  = 0.74 and 0.72,  $M$  = 0.29 and 0.20,  $SD$  = 0.20 and 0.17, for fathers and mothers, respectively). First, we found that parental narcissism and overvaluation were only weakly-to-moderately correlated, both for fathers and for mothers ( $R$  values = 0.18–0.32). Second, and more importantly, we

found that, even when controlling for parental narcissism, parental overvaluation still predicted child narcissism one wave later, both for fathers ( $B$  = 0.082,  $\beta$  = 0.082–0.085,  $P$  = 0.006) and for mothers ( $B$  = 0.069,  $\beta$  = 0.064–0.072,  $P$  = 0.002). Child narcissism did not predict parental overvaluation one wave later, neither for fathers ( $B$  = –0.021,  $\beta$  = –0.020,  $P$  = 0.472) nor for mothers ( $B$  = 0.014,  $\beta$  = 0.014–0.015,  $P$  = 0.493). These models demonstrated good fit to the data, both for fathers [ $\chi^2_{SB}(27)$  = 37.210, CFI = 0.987, RMSEA (90% CI) = 0.035 (0.000, 0.061), SRMR = 0.059] and for mothers [ $\chi^2_{SB}(27)$  = 69.756, CFI = 0.966, RMSEA (90% CI) = 0.060 (0.043, 0.077), SRMR = 0.070]. These findings refute the alternative interpretation and show that parental overvaluation contributes to the development of narcissism in children above and beyond parents' own narcissism levels.

1. Ames DR, Rose P, Anderson CP (2006) The NPI-16 as a short measure of narcissism. *J Res Pers* 40(4):440–450.

**Table S1. Internal consistencies (Cronbach  $\alpha$ ), means ( $M$ ), and SDs for the main study variables across waves**

Variable	Wave 1			Wave 2			Wave 3			Wave 4		
	$\alpha$	$M$	$SD$	$\alpha$	$M$	$SD$	$\alpha$	$M$	$SD$	$\alpha$	$M$	$SD$
Paternal overvaluation	0.75	1.31	0.50	0.81	1.26	0.52	0.84	1.29	0.53	0.84	1.21	0.50
Maternal overvaluation	0.80	1.15	0.53	0.81	1.11	0.50	0.82	1.12	0.50	0.81	1.13	0.50
Paternal warmth (child-report)	0.83	2.29	0.55	0.86	2.31	0.54	0.84	2.39	0.47	0.86	2.42	0.49
Maternal warmth (child-report)	0.82	2.43	0.50	0.79	2.48	0.44	0.82	2.53	0.42	0.83	2.57	0.40
Paternal warmth (parent-report)	0.83	2.54	0.35	0.84	2.54	0.35	0.85	2.52	0.36	0.87	2.48	0.38
Maternal warmth (parent-report)	0.82	2.69	0.31	0.86	2.68	0.33	0.87	2.66	0.34	0.88	2.64	0.35
Child narcissism	0.76	1.06	0.51	0.78	1.09	0.51	0.82	1.02	0.50	0.81	1.08	0.50
Child self-esteem	0.78	2.17	0.60	0.82	2.27	0.57	0.82	2.34	0.52	0.84	2.39	0.51

**Table S2. Correlations between main variables at wave 1**

Variable	1	2	3	4	5	6	7	8	9
1. Child sex									
2. Child age	0.08								
3. Paternal overvaluation	–0.03	–0.07							
4. Maternal overvaluation	–0.03	–0.01	0.39***						
5. Paternal warmth (child-report)	0.10*	0.05	0.04	–0.01					
6. Maternal warmth (child-report)	0.09*	0.06	0.09	0.08	0.70***				
7. Paternal warmth (father-report)	0.05	–0.02	0.08	0.02	0.27***	0.12*			
8. Maternal warmth (mother-report)	0.06	–0.10*	0.15*	0.01	0.03	0.04	0.14*		
9. Child narcissism	–0.15***	–0.18***	0.16**	0.01	0.08	0.13**	0.05	0.05	
10. Child self-esteem	–0.07	0.06	0.03	–0.09	0.28***	0.20***	0.04	0.01	0.08

Child sex: 1 = boy, 2 = girl. The correlation table including all waves is available from E.B. upon request. \* $P$  < 0.05, \*\* $P$  < 0.01, \*\*\* $P$  < 0.001.