

Running Head: Résumé photograph and personality

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*Does your résumé photograph tell who you are?*

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### **Abstract**

Given the importance of personality to predict consequential outcomes in the workplace, it is important to be able to measure it accurately. To date, no research has examined if people leave valid cues of their personality in résumé photographs. This research examined to what extent résumé photographs provide accurate information about the personality traits of their owner. Two observers rated 97 résumé photographs on four aspects: color photograph, photograph background, smile and professional attire. These ratings were compared with an accuracy criterion of the big five dimensions (self and peer reports). Results indicate that three out of the four cues are linked to extraversion, conscientiousness, agreeableness and emotional stability. These results suggest that résumé photographs can convey valid information about personality.

**Keywords:** big five; personality; selection; résumé; photographs; cues; LinkedIn.

## Introduction

Given the importance of personality to predict consequential outcomes in the workplace (Barrick & Mount, 1991), it is important to be able to measure it accurately. Considering the fact that self-reports are prone to distortions in personnel selection settings, researchers aim at identifying alternative methods to measure personality (Morgeson, Campion, Dipboye, Hollenbeck, Murphy & Schmitt, 2007). For this reason, studies have recently been published about the measurement of personality in selection interviews (Powell & Bourdage, 2016; Schmid Mast, Bangerter, Bulliard & Aerni, 2011). In this study, we investigate if résumés (and more precisely résumé photographs) provide accurate information about the personality of their owner.

The résumé, or curriculum vitae, is regularly observed as one of the selection instruments that recruiters use the most often (König, Klehe, Berchtold, & Kleinmann, 2010; Zibarras & Woods, 2010). Despite its prevalence, studies about the predictive validity of résumés are scarce (Robertson & Smith, 2001). However, it seems that résumés contain cues that provide valid information about their owner's personality (Cole, Feild, Giles & Harris, 2009). Cole and colleagues (2009) have for instance shown that the Grade Point Average is correlated positively with conscientiousness and that participation in extracurricular activities is linked positively with extraversion.

In many countries, the résumé is accompanied by a photograph of the applicant (Frauendorfer, Schmid Mast & Sutter, 2015). Even in countries where this practice is unusual (e.g. the U.S.), recruiters have access to applicants' photographs through social networking websites such as LinkedIn. Recently, Frauendorfer, Schmid Mast and Sutter (2015) have demonstrated that observers are able to detect to some extent the personality of strangers by merely examining

their résumé photograph. It means then that résumé photographs contain cues that provide information about the personality of their owner.

There are many cues that appear in a résumé photograph (if the photograph is in color or black and white, if the person is smiling or not, if the person's attire is professional or sloppy, etc.). Some studies have already shown that people who smile in a photograph tend to score higher on the dimension of extraversion than people who do not smile (Meier, Robinson, Carter & Hinsz, 2010; Naumann, Vazire, Rentfrow & Gosling, 2009). Another study has shown that professional attire is associated with higher scores in conscientiousness (Borkenau & Liebler, 1992). It is then very likely that these same cues are linked respectively to extraversion and conscientiousness in résumé photographs. The goal of the present study is to examine if résumé photographs convey accurate information about the personality of their owner, and which cues are predictive of personality.

## **Method**

### **Procedure**

Pairs of students in a hospitality management school were asked:

- To rate their own personality (self-report)
- To rate the personality of the other student (peer report).
- To send their résumé photograph by email.

Once the photographs had been received, all the photographs were rated by two coders. To reduce the risk of order effects, the order in which the photographs were viewed was varied systematically.

## **Participants**

A power analysis using G\*Power 3.1.9.2 (Faul, Erdfelder, Lang, & Buchner, 2007) was performed. A sample size of 97 participants was required with the following parameters entered,  $\rho = 0.25$  (this value has been chosen as previous studies have found correlations in the range of  $r = .21$  to  $r = .28$  between smile (or professional attire) and personality traits; e.g. Borkenau & Liebler, 1992; Naumann et al., 2009); 80% power and  $\alpha = 0.05$ . One hundred students in their final year of the bachelor program were approached by a researcher. However, the final sample consisted of 47 males and 50 females due to the fact that three participants did not provide their résumé photograph. The sample ranged from 18-30 years of age, with an average of 22.8 (SD=1.68). 49.5% of the students knew each other for more than 3 years and only 16.5% knew each other for 1 year or less. Moreover, 67 % of the peer-ratings came from friends, 17.5% from classmates, 12.5% from coworkers, family members or romantic partners.

## **Measures**

### *IPIP Big-Five factor markers* (Goldberg, 1992)

Each participant answered a self-report version of the 50-item instrument taken from the International Personality Item Pool. This instrument was used to measure the big five dimensions: extraversion, agreeableness, conscientiousness, emotional stability and openness to experience. Each trait was measured with 10 items on a Likert scale from 1 (very inaccurate) to 5 (very accurate). A peer-report version of the IPIP Big Five factor markers was also developed for the present study. The Cronbach alphas were .85, .82, .76, .79, and .81 for extraversion, agreeableness, conscientiousness, emotional stability, and openness to experience respectively for the self-report (and .85, .87, .81, .83, and .86 for extraversion,

agreeableness, conscientiousness, emotional stability, and openness to experience respectively for the peer report). As studies have shown that self-ratings and other-ratings contribute significantly and independently to a person's personality, both perspectives are used in this study (Oh, Wang & Mount, 2010; Vazire, 2010). In the present study, self-reports and peer-reports correlated significantly for the five traits (for extraversion,  $r = .53, p < .001$ ; for agreeableness,  $r = .41, p < .001$ ; for conscientiousness,  $r = .39, p < .001$ ; for emotional stability,  $r = .32, p < .01$ ; and for openness to experience,  $r = .32, p < .01$ ). Self-reports and peer-reports were then averaged for each of the five personality traits as done previously in other studies of this kind (Gosling et al., 2011).

#### *Cues from résumé photographs*

A coding scheme was developed to rate the résumé photographs. Four cues were chosen to rate the photographs: Color photograph (1 = Yes; 0 = No); Photograph background (1 = Neutral background (white or any single background color); 0 = Not a neutral background (e.g. at home or outdoors); Smiling (1 = Not at all; 7 = A lot); Professional attire (1 = Not at all; 7 = A lot). The cues of smiling and professional attire were chosen because they were hypothesized to be correlated positively to extraversion and conscientiousness respectively. Photograph background was chosen because it was expected to relate positively to conscientiousness. As people scoring high in conscientiousness tend to be purposeful and goal-oriented, we thought that they would make effort in order to get a better quality résumé photograph than people scoring low in conscientiousness. Finally, color photograph was chosen because it was hypothesized that people scoring high on openness to experience would be more likely to use black and white photographs than people scoring low on this personality trait. The rationale was that black and white photographs are less common than color

photographs and would be more likely to be used by more sophisticated and creative applicants. The two coders unanimously agreed on the cue of the color photograph and 92.8% agreement for the cue of the photograph background. After discussion, it was possible to reach agreement for 100% of the ratings regarding the photograph background. The item used to measure smiling was taken from Meier et al. (2010). The average rating was taken as the independent measure because the inter-rater reliability was more than satisfactory ( $r = .96, p < .001$ ). For professional attire, the average rating was taken as the independent measure because the inter-rater reliability was satisfactory ( $r = .70, p < .001$ ).

In the results section, bivariate correlations as well as partial correlations controlling for age and gender are reported between the five dimensions averaged between the self-report and the peer-report and the four cues. All the analyses were conducted using SPSS 22.

### **Results and discussion**

As demonstrated in Table 1, 82% of the résumé photographs were in color and 72% had a neutral background (most often white, but sometimes blue or red). Males and females differed significantly on many variables. The females were more likely to pose in a neutral background and were more likely to smile than males. They scored higher on agreeableness and conscientiousness than males but they scored lower on extraversion and emotional stability. There was only one significant relationship between the four cues of résumé photographs. Participants who posed in a neutral background in the résumé photographs appeared to be more professionally dressed than participants who posed at home or outdoors.

Insert Table 1

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Based on the above findings, it was decided to examine the relationship between the four cues and the five personality traits by running partial correlations taking into account gender and age. As shown in Table 2, none of the five personality traits was linked with the color of the photographs. In other words, participants who provided a black-and-white photograph did not differ in any of the five traits from participants who provided a photograph in color. There was however a relationship between the photograph background and two personality traits, namely agreeableness and conscientiousness. Participants who posed in a neutral background tended to score higher on the traits of agreeableness and conscientiousness than participants who posed at home or outdoors. The more the participants smiled on their résumé photographs the higher they scored on the traits of extraversion and emotional stability. Finally, the higher the professional attire, the higher the score on the trait of emotional stability. However, there was no association between conscientiousness and professional attire.

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Insert Table 2

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Overall, these results tend to demonstrate that résumé photographs contain information about their owner. First, people who pose with a neutral background tend to score higher on agreeableness and conscientiousness. One reason for this result could be that people scoring high on these two dimensions are the ones who are the most likely to conform to the expectations of a résumé photograph. As these individuals are more purposeful and want to please the recruiter, it is possible that they took time to pose in front of a professional photograph. On the contrary, it is possible that individuals who score lower in conscientiousness and agreeableness preferred to take the first photograph that they had in their possession even if this photograph was taken in front of a landscape or in a social gathering. As predicted, smiling was correlated positively with extraversion. This result replicates findings observed with photographs spontaneously taken from participants in other studies (Meier et al., 2010; Naumann et al., 2009). One explanation for this relationship could be due to positive affect. Extraverts tend to be in a good mood more often than introverts (Wilt & Revelle, 2009) and people tend to smile more often when they are in a good mood (Bradley, 2000), therefore extraverts tend to smile more in a résumé photograph than introverts. It is however surprising to observe this relationship during the application process as it is important to portray a desirable image to the recruiter and as the smile can be a way to do so (Borkenau, Brecke, Möttig & Paelecke, 2009; DePaulo, 1992). It is probable that people smile more on a résumé photograph than on a photograph used in the context of a scientific study. Indeed, the amount of smiling is higher in this study ( $M = 3.73$ ,  $SD = 2.00$ ) than the amount of smiling observed in Meier et al. (2010; study 1:  $M = 2.42$ ,  $SD = 1.57$ ; study 2:  $M = 3.48$ ,  $SD = 1.69$ ).

Contrary to what was expected, professional attire was not related to conscientiousness. One possible reason could be due to the fact that the participants in this study come from a

hospitality management school where it is mandatory for them to comply with a strict dress code. Therefore, all of them wear suits in the photographs and the small differences remaining only pertain to if they have omitted the tie or the jacket.

Two limitations of this study should be highlighted. Firstly, the sample is limited to business school students only. It is then difficult to ascertain that the results observed in this study could be replicated in other samples. Secondly, it could have been relevant to include another criterion to examine if the cues that reflect conscientiousness and extraversion are related for instance to academic or work performance. In the future, it will then be important to determine to which extent résumé photographs (or photographs available on LinkedIn) can predict future performance above and beyond the self-ratings of personality traits (see for instance, Di Domenico, Quitasol, & Fournier, 2015; or Kluemper, Rosen & Mossholder, 2012).

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Table 1.

Descriptive statistics and correlations.

	M	SD	1	2	3	4	5	6	7	8	9	10	11
1. Age	22.8	1.68	-										
2. Gender	.49	.50	.19	-									
3. Color photograph	.82	.35	.02	.07	-								
4. Photograph background	.72	.45	-.02	-.23*	.08	-							
5. Smiling	3.72	2.00	-.18	-.41**	.02	.13	-						
6. Professional attire	5.78	1.49	-.02	.05	.03	.41**	.17	-					
7. Extraversion	3.64	.58	-.07	.22*	-.03	.02	.19	.13	-				
8. Agreeableness	3.92	.54	-.01	-.31**	-.11	.26**	.28**	.18	.23*	-			
9. Conscientiousness	3.45	.54	.07	-.41**	.04	.29**	.07	.01	-.21*	.32**	-		
10. Emotional stability	3.28	.54	-.24*	.33**	-.02	.07	.08	.27**	.43**	.10	-.10	-	
11. Openness to experience	3.75	.50	.15	-.02	-.05	.04	-.14	-.02	.31**	.33**	.12	.23	-

Note: for gender: 1 = males, 0 = females; for color photograph: 1 = yes, 0 = no (black and white); for photograph background: 1= neutral background, 0 = not a neutral background. For the five personality traits, scores range from 1 to 5.

\*p < .05, two-tailed. \*\*p < .01, two-tailed



Table 2

Partial correlations between résumé photographs cues and personality.

	Extraversion	Agreeableness	Conscientiousness	Emotional stability	Openness to experience
Color photograph	-.04 [-.24, .16]	-.09 [-.28, .11]	.07 [-.13, .27]	-.04 [-.24, .16]	-.05 [-.25, .15]
Photograph background	.07 [-.13, .27]	.21* [.01, .39]	.23* [.03, .41]	.16 [-.04, .35]	.03 [-.17, .23]
Smiling	.31** [.12, .48]	.18 [-.02, .37]	-.10 [-.29, .10]	.22* [.02, .40]	-.14 [-.33, .06]
Professional attire	.12 [-.08, .31]	.20 [.00, .38]	.03 [-.17, .23]	.27** [.07, .45]	-.01 [-.21, .19]

Note: these partial correlations control for age and gender. Values in brackets represent 95% confidence intervals

\*p < .05, two-tailed. \*\*p < .01, two-tailed