



Faking on self-report emotional intelligence and personality tests: Effects of faking opportunity, cognitive ability, and job type [☆]

Robert P. Tett ^{a,*}, Kurt A. Freund ^{a,1}, Neil D. Christiansen ^{b,2}, Kevin E. Fox ^{c,3}, John Coaster ^{d,4}

^a Department of Psychology, University of Tulsa, 800 S. Tucker Dr., Tulsa, OK 74104, USA

^b Department of Psychology, Central Michigan University, Mount Pleasant, MI 48858, USA

^c Saint Louis University, 221 N. Grand Blvd., St. Louis, MO 63103, USA

^d Strategy and Foreclosure Prevention, Ocwen Loan Servicing, LLC, 1661 Worthington Rd., Suite 100, West Palm Beach, FL 33409, USA

ARTICLE INFO

Article history:

Received 29 July 2011

Received in revised form 8 October 2011

Accepted 15 October 2011

Available online 8 November 2011

Keywords:

Faking

Personality testing

Trait-emotional intelligence

Cognitive ability

Trait specificity

Trait-job-relevance

ABSTRACT

We assessed the combined effects of cognitive ability, opportunity to fake, and trait job-relevance on faking self-report emotional intelligence and personality tests by having 150 undergraduates complete such tests honestly and then so as to appear ideal for one of three jobs: nurse practitioner, marketing manager, and computer programmer. Faking, as expected, was greater (a) in higher-g participants, (b) in those scoring lower under honest conditions (with greater opportunity to fake), and (c) on job-relevant traits. Predicted interactions accounted for additional unique variance in faking. Combining all three factors yielded a “perfect storm” standardized difference of around 2, more than double the overall .83 estimate. Implications for the study of faking are discussed.

© 2011 Elsevier Ltd. All rights reserved.

1. Introduction

An ongoing challenge in the use of personality tests is their susceptibility to intentional response distortion, or faking (e.g., Hogan & Nicholson, 1988; Komar, Brown, Komar, & Robie, 2008). When instructed, people can elevate their scores on non-cognitive measures by around one standard deviation, averaging across test-takers and traits (Furnham, 1997; Rosse, Stecher, Miller, & Levin, 1998; Viswesvaran & Ones, 1999). Faking is of particular concern in personnel selection settings, where the incentive to fake is high (Hough, Eaton, Dunnette, Kamp, & McCloy, 1990; Rosse et al., 1998; Tett & Christiansen, 2007; Viswesvaran & Ones, 1999).

An emerging target of faking research is the faking process, in which motivation and ability to fake are two common components. McFarland and Ryan (2000) identified integrity, neuroticism, and

conscientiousness as motivational precursors of faking. Snell, Snyder, and Lueke (1999) considered integrity, Machiavellianism, manipulativeness, locus of control, and stages of moral development. Faking has also been linked to cognitive ability (Christiansen, Burns, & Montgomery, 2005; Vasilopoulos & Cucina, 2006). Some faking models (e.g., Tett & Simonet, 2011) further consider opportunity to fake (low honest scores allow more faking), but this is routinely ignored in empirical research (e.g., Raymark & Tafero, 2009).

Individual difference variables, although advancing understanding of the faking process, have tended to be studied in isolation of each other and of potentially important situational factors (e.g., McFarland & Ryan, 2000). That faking varies by job requirements (Furnham, 1990; Mahar, Cologon, & Duck, 1995; Raymark & Tafero, 2009) is critical not only because job requirements can be expected to influence which traits are faked, but also because context can interact with personological faking sources (Raymark & Tafero, 2009). Brighter applicants, for example, should better identify which traits are job-relevant and fake better accordingly. Faking on those traits should also be especially pronounced in test takers with more opportunity to fake. Failure to distinguish relevant from irrelevant trait-job linkages and to consider possible interactions among distinct faking precursors impedes understanding of the faking process as well as estimation of net effects under realistic conditions where all factors are in play.

By far the most common targets of faking research have been personality tests. Growing use of emotional intelligence (EI) as a predictor

[☆] An earlier version of this paper was presented at the 24th Annual Conference of the Society for Industrial and Organizational Psychology, April 3, 2009, New Orleans, LA.

* Corresponding author. Tel.: +1 918 631 2737; fax: +1 918 631 2833.

E-mail addresses: robert-tett@utulsa.edu (R.P. Tett), ookook123@gmail.com (N.D. Christiansen), kfox10@slu.edu (K.E. Fox), john.coaster@ocwen.com (J. Coaster).

¹ Tel.: +1 918 631 2737; fax: +1 918 631 2833.

² Tel.: +1 989 774 6495.

³ Tel.: +1 314 977 7299.

⁴ Tel.: +1 407 0737 5614.

of performance in work and other domains (e.g., Van Rooy & Viswesvaran, 2004) and the putatively desirable nature of EI prompts consideration of the fakability of self-report EI tests. Several studies have addressed the effects of response distortion on EI measurement in the workplace (e.g., Christiansen, Janovics, & Siers, 2010; Day & Carroll, 2008; Grubb & McDaniel, 2007); none, however, has addressed how faking on EI measures is affected by job requirements.

This study was undertaken to examine how *g*, opportunity to fake, and job requirements combine in determining faking. Knowing that test-takers, on average, can fake self-report measures by around one standard deviation is useful; but not everyone fakes to the same degree, owing to differences in ability and opportunity, and faking is expected to be greater on job-relevant traits. It is unclear the extent to which faking varies as a joint function of these variables. Evidence and expectations bearing on each factor are offered as follows.

1.1. Job-specific faking

Past research suggests that individuals can fake in line with the requirements of particular jobs (Furnham, 1990; Mahar et al., 2006; Raymark & Tafero, 2009; Velicer & Weiner, 1975). In the current study, faking was assessed with respect to three jobs varying in trait-relevance (nurse practitioner, marketing manager, computer programmer). Our choice of jobs was driven primarily by consideration of EI, although differences in personality trait relevance were also expected. Review of O*NET descriptions of the three targeted jobs led us to expect faking on EI scales to be greatest for nurse, second highest for manager, and least for programmer. We further expected faking to be greater on traits judged by subject matter experts as especially job-relevant.

1.2. Cognitive ability (*g*)

Prior research has yielded positive relationships between *g* and faking (Nguyen, Biderman, & McDaniel, 2005; Pauls & Crost, 2005; Vasilopoulos & Cucina, 2006). Common hypotheses include those high in *g* being better able to recognize job requirements and identify the meaning of individual items (Pauls & Crost, 2005). With regard to trait-EI, Grubb and McDaniel (2007) found *g* to be the strongest correlate of faking on the Bar-On's (1997) EQi.

1.3. Opportunity to fake

Faking is potentially problematic only to the degree the respondent is low on a desired trait (Hough, 1998). Faking estimates based on all participants obscure the problem of faking as it is individuals low on desirable traits, who are opposite what the organization is looking for, that pose the greatest risks in hiring. We addressed this issue by comparing faking in those scoring above versus below the distributional midpoint under conditions favoring honest responding. In addition to main effects for faking opportunity, we also expected stronger *g* and job type main and interaction effects in participants with greater opportunity to fake.

1.4. Emotional intelligence

Trait-EI has been defined as a “constellation of behavioral dispositions and self-perceptions concerning one's ability to recognize, process, and utilize emotion-laden information” (Petrides & Furnham, 2003; p. 278). Self-report EI measures are increasingly being used to predict work performance (Van Rooy & Viswesvaran, 2004), raising concerns with response distortion. Several studies show notable relations between such measures and social desirability (Hemmati, Mills, & Kroner, 2004; Mesmer-Magnus, Viswesvaran, Deshpande, & Joseph, 2006) and susceptibility to faking (Christian-

sen et al., 2010; Grubb & McDaniel, 2007). The current study extends this line of research by examining the susceptibility of a trait-EI measure to faking in light of trait job-relevance, cognitive ability, and faking opportunity.

1.5. Hypotheses

Hypothesis 1. Faking will be greatest in those with greater opportunity to fake, i.e., those scoring low on desirable traits or high on undesirable traits under honest score conditions.

Hypothesis 2a. Faking on a self-report EI measure will be greatest for the nurse practitioner position and weakest for computer programmer.

Hypothesis 2b. Faking on a self-report personality test will vary meaningfully by job type.

Hypothesis 3. Faking will be greatest in those higher in cognitive ability.

Hypothesis 4. Differential faking by job (as per H2) will be more pronounced in those with greater opportunity to fake (i.e., faking opportunity and job type will interact).

Hypothesis 5. The effect of cognitive ability on faking (as per H3) will be strongest in those with greater opportunity to fake (i.e., cognitive ability and opportunity will interact).

Hypothesis 6. Differential faking by job (as per H2) will be more pronounced in those scoring higher on cognitive ability (i.e., cognitive ability and job type will interact).

Hypothesis 7. The interaction between cognitive ability and job type (as per H6) will be strongest among those with the greatest opportunity to fake (i.e., there will be a 3-way interaction between cognitive ability, job type, and opportunity to fake).

Expectations were refined in light of experts' judgments of the job relevance of particular EI facets and personality traits, as described below.

2. Material and methods

2.1. Participants

The initial sample included 182 undergraduate students from two American universities. Dropping cases with high infrequency scores (i.e., >2.5 on a 1–6 scale), indicative of non-purposeful responding, yielded a final *N* of 150. Academic majors included psychology (20%), health sciences (8%), communications (5%), English (3%), and other areas. Women constituted 78% of the sample, and ages ranged from 18 to 36 years (mean = 20.4).

2.2. Measures

2.2.1. Trait-EI

Tett, Fox, and Wang's (2005) *Multidimensional Emotional Intelligence Assessment* (MEIA) includes 150 items targeting ten dimensions proposed by Salovey and Mayer (1990). Core EI traits include Recognition of Emotion in the Self (RecSelf), Regulation of Emotion in the Self (RegSelf), Recognition of Emotion in Others

(RecOth), Regulation of Emotion in Others (RegOth), Non-verbal Emotional Expression (NVExp), and Empathy (Emp); proximal outcomes include Intuition versus Reason (IvR), Creative Thinking (CrTh), Mood Redirected Attention (MRA), and Motivating Emotions (MotEm). Alpha coefficients based on current data are provided below. The median test–retest reliability reported in the manual is .76.

2.2.2. Personality

Jackson, Paunonen, and Tremblay's (2004) 108-item *Six-Factor Personality Questionnaire* (SFPQ) targets Extraversion, Agreeableness, Independence, Openness to experience, methodicalness, and Industriousness. Alpha coefficients based on current data are provided below.

2.2.3. Cognitive ability

Jackson's (2004) *Personnel Assessment Form* (PAF) is a timed measure including 36 verbal and 21 numerical ability items. Alpha for the two scales (under untimed conditions) is reported to be .89 and .87, respectively.

2.3. Procedure

Participants completed the MEIA and SFPQ twice, first under instructions to respond as honestly and as accurately as possible and then “in a way that will make you appear as an ideal job candidate” for one of three jobs: nurse practitioner, marketing manager, or computer programmer. A job description based on O*NET data was provided in each case, assigned randomly. Each description contained a list of job duties and relevant skills. (See [Supplementary Material: Appendix A](#) for the nurse practitioner description.) Participants later completed the PAF and a brief demographics form.

2.4. Judged trait-job linkages

Seven male and four female subject matter experts, 21–47 years of age (mean = 28.5), independently rated the desirability of each of the 10 EI and six personality traits for each of the three targeted jobs, based on trait definitions and job descriptions. Six SMEs were graduate students in I/O psychology, three held their doctorate in I/O psychology, and two were senior undergraduate psychology students. Judges were asked to rate on a –2 to +2 scale whether it is “desirable or undesirable to be high on the given trait in order to be considered a top candidate for the given job.” To assess interrater reliability, the 48 trait-job ratings were “stacked” into a single column per judge. Alpha, with judges serving as “items,” was .94.

2.5. Analyses

The dependent variable, per trait, was the difference between the faking condition and honest condition scores, a positive difference indicating greater faking (median reliability = .73; see [Supplementary Material: Appendix B](#) for all difference-score reliabilities). Hierarchical regression was used to assess all targeted effects in seven successive blocks per trait. Faking opportunity (i.e., honest trait level) was entered first, given its strong effects in previous research (e.g., McFarland & Ryan, 2000), job type second using two dummy-code variables, then cognitive ability. The three two-way and one three-way interactions were then entered as product terms created after centering.⁵ To clarify the direction of effects in light of hypotheses, standardized mean differences (*ds*) between honest and faking

condition scores were calculated using the standard deviation, per scale, from the honest condition ($N = 150$).

3. Results

3.1. Reliability and descriptive statistics

Table 1 presents means, standard deviations, and alphas for all 16 scales under honest ($N = 150$) and faking (n range = 41–59) conditions. Statistics for cognitive ability (“honest” condition only) are also shown. Honest-faking mean differences are clarified below, using *d*. (See [Supplementary Material: Appendix C](#) for honest-condition correlations among all variables.)

3.2. Main effects: Hypotheses 1–3

Table 2 shows changes in R^2 for all seven effects per trait. In support of H1, results from step 1 show that faking is strongly linked to opportunity for all trait measures. As per H2a, effects for job type are significant for all 10 trait-EI dimensions and, as per H2b, for four of the six personality traits (67%). Cognitive ability shows significant main effects for seven of the 16 traits (44%), after controlling for earlier effects, in moderate support of H3.

Standardized differences (*ds*) for main effects are presented in Table 3. Values in the first column show that, averaging across conditions, participants faked upward on all but IvR and MRA.⁶ Faking was greatest on RegSlf ($d = 1.70$), Industriousness (1.65), MotEm (1.45), and Openness (1.32). Faking opportunity effects are clearly evident in the second and third columns. Averaging across all scales yields mean $d = 1.35$ for those scoring below the median, per scale, under honest conditions versus .48 for those scoring above (using absolute values to account for faking-down effects observed on four scales).

Standardized *d* values in the middle of Table 3, plotted in Fig. 1, reveal differential faking by job. In support of H2a, faking on the core-EI traits is greatest for nurse, moderate for manager, and weakest for programmer. Marked differences in faking between jobs are evident in personality as well, consistent with H2b. Agreeableness, for example, was faked highest for nurse. Faking was uniformly strong across jobs in some cases, most notably, Industriousness and MotEm.

Faking was expected to be greatest on traits SMEs judged as desirable for particular jobs. Using ± 1 as a cutoff (corresponding to at least moderately desirable/undesirable), we averaged *d* values for job-relevant traits. The resulting mean *ds*, reported at the bottom of Table 3, show that faking is 26% greater on job-relevant traits relative to faking on all traits combined.

Main effects of cognitive ability, shown in the right columns of Table 3, are plotted in Fig. 2. On average, high-*g* participants raised their scores by nearly 1 standard deviation, compared to .7 for low-*g* participants. High-*g* participants tended to fake in the same direction as the low-*g* participants, but to a greater degree, in general support of H3.

3.3. Interaction effects: Hypotheses 4–7

Returning to Table 2, six (37.5%) of the opportunity-by-job interactions are significant. Review of *d* values⁷ reveals, for example, that opportunity to fake on Extraversion is especially conducive to faking for the nurse job, in support of H4. Interactions between

⁵ Centering reduces problematic collinearity between main variables and their products in assessing interactions. We centered using *z*-score transformations.

⁶ Effects for those two traits are based on reflected scores to ease discussion, such that positive differences indicate faking toward the overall desired end of the scale (e.g., toward the “reason” end of IvR).

⁷ Available on request.

Table 1

Means, standard deviations, and alphas for trait measures under honest and faking conditions.

Trait	Honest condition (N = 150)			Faking condition								
	Mean	SD	Alpha	Nurse practitioner (n = 59)			Marketing manager (n = 41)			Computer programmer (n = 50)		
				Mean	SD	Alpha ^d	Mean	SD	Alpha ^d	Mean	SD	alpha ^d
<i>Personality^a</i>												
Extraversion	3.39	.57	.87	3.92	.46	.87	3.99	.71	.89	3.38	.67	.83
Agreeableness	2.72	.44	.74	3.27	.44	.65	3.00	.52	.79	2.94	.49	.76
Independence	2.67	.43	.74	2.59	.37	.67	2.52	.43	.84	2.90	.48	.69
Openness	2.97	.51	.77	3.74	.56	.78	3.76	.57	.77	3.42	.62	.76
Methodicalness	3.43	.56	.85	4.16	.38	.79	3.96	.45	.87	3.96	.58	.88
Industriousness	3.20	.46	.76	4.06	.40	.78	3.85	.57	.72	3.92	.54	.73
<i>El core^b</i>												
RecSlf	4.03	.77	.86	4.93	.58	.82	4.71	.78	.89	4.42	.69	.82
RegSlf	3.57	.81	.85	5.22	.58	.85	5.07	.80	.90	4.51	1.03	.91
RecOth	4.50	.65	.84	5.30	.50	.78	4.97	.69	.88	4.33	.80	.88
RegOth	4.29	.65	.83	5.40	.55	.86	5.08	.70	.88	4.44	.87	.88
NvExp	4.09	.74	.78	4.55	.59	.73	4.35	.76	.84	4.01	.68	.71
Emp	4.43	.81	.88	5.03	.75	.86	4.48	.85	.88	4.13	.87	.88
<i>El proximal outcomes^b</i>												
IvR	3.53	.69	.82	3.18	.80	.87	2.95	.69	.84	2.79	1.01	.91
CrTh	3.73	.73	.81	4.18	.58	.71	4.46	.64	.74	4.02	.83	.80
MRA	4.47	.67	.75	4.53	.60	.70	4.11	.70	.77	4.36	.82	.80
MotEm	4.59	.62	.79	5.63	.30	.64	5.46	.61	.88	5.35	.59	.82
Cognitive ability ^c	.40	.12										

RecSlf = Recognition of Emotion in the Self, RegSlf = Regulation of Emotion in the Self, RecOth = Recognition of Emotion in Others, RegOth = Regulation of Emotion in Others, NvExp = Nonverbal Emotional Expression, Emp = Empathy, IvR = Intuition versus Reason CrTh = Creative Thinking, MRA = Mood Redirected Attention, MotEm = Motivating Emotions.

^a Scale = 1–5.

^b Scale = 1–6.

^c Scale = 0–1.

^d Reliabilities of difference scores range from .46 to .84, with mean = .71 and median = .73.

Table 2Changes in R^2 from consecutive steps in regressing faking-minus-honest-score differences onto three main effects and their interactions (N = 150).

Scale	Opportunity ^a	Job type	g	Opp. × Job	Opp. × g	Job × g	Opp. × Job × g
<i>Personality</i>							
Extraversion	.22***	.14***	.00	.04**	.00	.04***	.00
Agreeableness	.28***	.07***	.03**	.01	.00	.01	.03**
Independence	.37***	.09***	.01	.03**	.00	.02	.01
Openness	.24***	.05***	.01	.00	.00	.03**	.01
Methodicalness	.45***	.02*	.04***	.00	.01	.01	.01
Industriousness	.34***	.01	.10***	.00	.01	.01	.01
<i>El Core</i>							
RecSlf	.41***	.08***	.01*	.00	.01*	.01	.00
RegSlf	.28***	.09***	.07***	.03**	.02**	.02	.01
RecOth	.27***	.22***	.01*	.02	.02**	.03***	.00
RegOth	.19***	.23***	.00	.05***	.00	.05***	.01
NvExp	.43***	.08***	.00	.02*	.00	.01	.01
Emp	.30***	.16***	.00	.01	.01	.01	.02*
<i>El proximal outcomes</i>							
IvR	.21***	.06***	.10	.02	.01	.00	.05***
CrTh	.38***	.03**	.00	.01	.01*	.02*	.02*
MRA	.23***	.04**	.03**	.04**	.00	.02*	.00
MotEm	.52***	.03**	.02***	.02**	.00	.01*	.00

*** $p < .01$.

** $p < .05$.

* $p < .10$, two-tailed.

^a Opportunity = scale score obtained under the honest condition.

opportunity and g are significant in two cases (12.5%): RegSlf and RecOth. Corresponding effect sizes show that faking upward by higher-g participants, consistent with H5, is more pronounced in those with greater opportunity. Interactions between job type and g, as per H6, emerged in four cases (25%). For example, higher-g participants faked especially lower on Extraversion for programmer and higher on Openness for manager. Three-way interactions, as per H7, are evident for two traits (12.5%): Agreeableness and IvR. In each instance, faking specific to a given job was pronounced in those both high on g and extreme on the given trait.

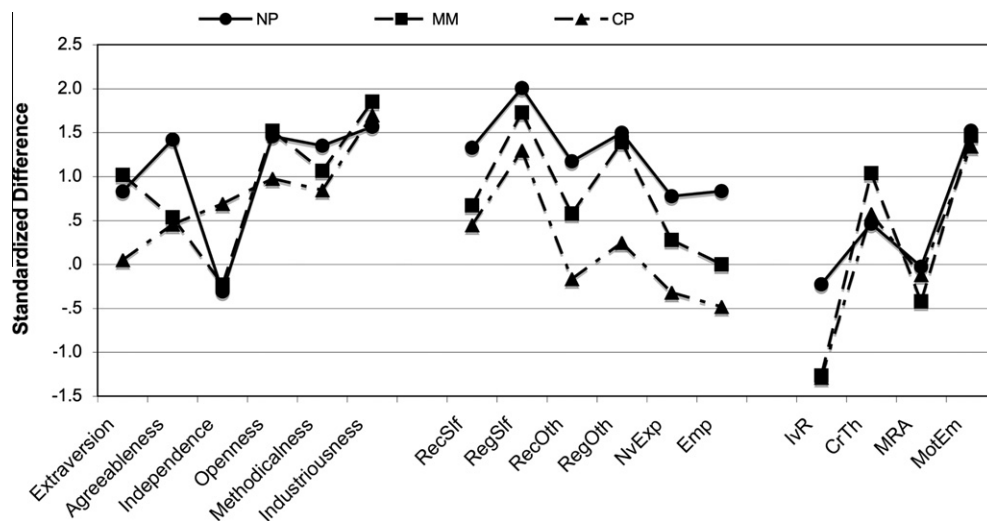
3.4. Combined effects

Table 4 presents standardized differences for combined effects. The three left columns show faking per job under high-likelihood conditions (i.e., high g, high opportunity) and the three right columns, under low-likelihood conditions (low g, low opportunity). Averaging across jobs, effect sizes for the high-likelihood participants (mean $d = 1.56$) are triple those for the low-likelihood participants (mean $d = .52$). Using only job-relevant traits, the ratio is 3.6:1 (i.e., mean $d = 1.94$ versus .53).

Table 3Mean standardized differences (*ds*) for all participants and under main effect conditions for faking opportunity, job type, and cognitive ability.

Trait	All (<i>N</i> = 150)	Opportunity		Job			Cognitive ability	
		Lower half (<i>ns</i> = 68–88)	Upper half (<i>ns</i> = 62–82)	Nurse (<i>n</i> = 59)	Mktg Mgr (<i>n</i> = 41)	Cmptr Prgmr (<i>n</i> = 50)	Low (<i>n</i> = 75)	High (<i>n</i> = 75)
<i>Personality</i>								
Extraversion	.65	1.10	.20	.83 ^b	1.02 ^b	.05	.64	.66
Agreeableness	.81	1.26	.30	1.42	.54	.45	.59	1.04
Independence	.02	.67	–.51	–.31	–.23 ^b	.69	–.15	.19
Openness	1.32	1.80	.84	1.46	1.52 ^b	.98	1.19	1.45
Methodicalness	1.08	1.53	.53	1.35 ^b	1.06	.85 ^b	.84	1.31
Industriousness	1.65	2.28	.95	1.57 ^b	1.85 ^b	1.70 ^b	1.34	1.97
<i>El core</i>								
RecSlf	.87	1.40	.36	1.33 ^b	.67 ^b	.45	.86	.87
RegSlf	1.70	2.24	1.17	2.01 ^b	1.73 ^b	1.30	1.43	1.98
RecOth	.59	1.02	.09	1.17 ^b	.58 ^b	–.17	.43	.75
RegOth	1.07	1.55	.57	1.50 ^b	1.39 ^b	.25	.92	1.22
NvExp	.30	.90	–.31	.78	.28	–.32	.26	.33
Emp	.19	.70	–.31	.84 ^b	.00 ^b	–.48	.18	.20
<i>El proximal outcomes</i>								
IvR (reversed)	.79	.34	1.23	.23	1.26	1.29 ^b	.44	1.13
CrTh	.65	1.20	.12	.46	1.04 ^b	.57 ^b	.57	.72
MRA (reversed)	.17	.14	.62	.03 ^b	.42	.12	.02	.32
MotEm	1.45	2.17	.86	1.52	1.46	1.34	1.16	1.75
Mean for all traits ^a	.83	1.27	.56	1.05	.94	.69	.69	.99
Mean for job-relevant traits				1.21	1.00	1.15		

Positive values indicate higher traits scores under faking conditions; negative values indicate lower scores under faking conditions.

^a Based on absolute values.^b Job-relevant trait (i.e., mean SME desirability rating ≥ 1.0).**Fig. 1.** Plot of standardized differences (indicative of faking) for all traits in the nurse practitioner (NP), marketing manager (MM), and computer programmer (CP) jobs.

4. Discussion

The overall mean $d = .83$, averaging across all participants and conditions, approaches that reported in similar instructed faking studies. Faking varies predictably, however, by job type and trait job-relevance, and increases when test-takers are higher on g and lower on the trait under honest conditions. Isolating respondents with greater opportunity to fake yielded mean effect sizes 60% larger (i.e., mean $d = 1.35$) than the overall mean. Opportunity to fake, of increasing theoretical importance (e.g., Tett & Simonet, 2011), warrants closer attention in faking research. Consistent with prior research, test takers in the current study, on average, were able to fake 26% better on job-related traits. Previous estimates of faking based on generic applicant instructions (e.g., “fake good on your ideal job”) or averaging across all traits regardless of job-relevance understate the faking problem, where selection decisions are based on job-relevant trait scores.

Researchers are urged to consider trait job-relevance in future faking studies.

Consistent with understanding faking as a cognitively demanding task, higher- g participants faked 20% more than did all participants combined. It has been argued that, if g contributes to the criterion validity of self-report measures via faking, then faking may be desirable (e.g., Morgeson et al., 2007). Such inferences warrant scrutiny. In addition to high g , faking also requires low honest-condition scores, and motivation, which, in selection settings, may be conferred by dishonesty, narcissism, Machiavellianism, and similarly troubling qualities (e.g., Greenberger, Lessard, Chen, & Farruggia, 2008; Snell et al., 1999). So, with the possibly welcome expression of g in faking comes a set of less welcome attributes adding risk beyond that present simply by hiring those low on the desired trait. Identifying able fakers is a worthy goal toward improving assessment of job-relevant traits under conditions where faking is likely.

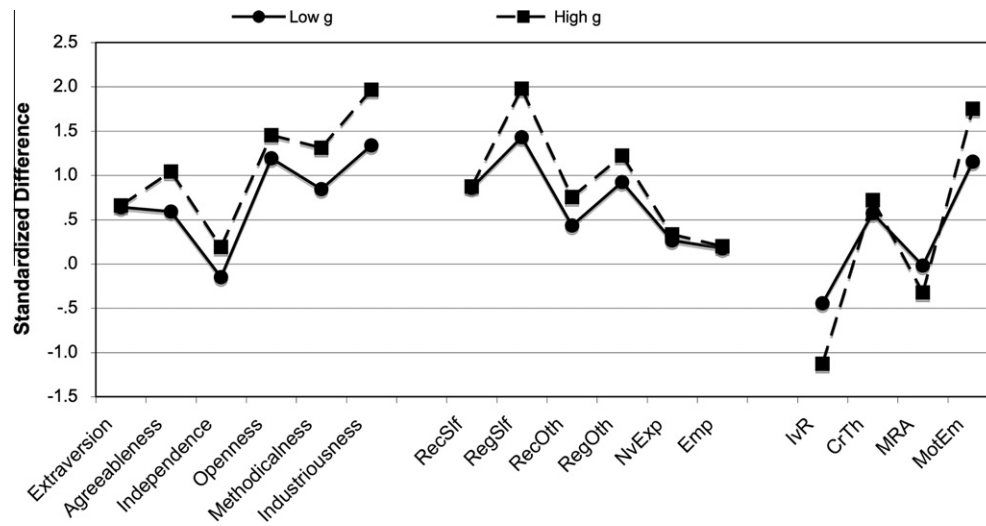


Fig. 2. Plot of standardized differences (indicative of faking) for all traits, based on participants high versus low on cognitive ability (*g*).

Table 4

Standardized differences showing combined effects of opportunity, cognitive ability, job type, and job-relevance.

Trait	High likelihood = High opportunity, High <i>g</i>			Low likelihood = Low opportunity, Low <i>g</i>		
	Nurse (<i>n</i> = 10–19)	Marketing Manager (<i>n</i> = 6–15)	Computer Programmer (<i>n</i> = 9–18)	Nurse (<i>n</i> = 11–19)	Marketing Manager (<i>n</i> = 4–15)	Computer Programmer (<i>n</i> = 7–18)
<i>Personality</i>						
Extraversion	1.65 ^b	1.56 ^b	.35	.31 ^b	.44 ^b	-.33
Agreeableness	1.78	1.42	1.14	.37	-.08	.30
Independence	.20	.37 ^b	1.52	-.58	-.78 ^b	-.44
Openness	2.23	2.46 ^b	1.67	1.13	1.05 ^b	.59
Methodicalness	1.92 ^b	1.80	1.72 ^b	.81 ^b	.36	.31 ^b
Industriousness	3.15 ^b	2.70 ^b	2.76 ^b	.96 ^b	.40 ^b	.62 ^b
<i>EI core</i>						
RecSlf	1.81 ^b	1.53 ^b	1.17	.73 ^b	.08 ^b	-.12
RegSlf	2.64 ^b	3.03 ^b	2.04	1.08 ^b	1.41 ^b	.66
RecOth	2.39 ^b	1.65 ^b	.12	.71 ^b	-.15 ^b	-.68
RegOth	2.54 ^b	2.17 ^b	.33	.89 ^b	.51 ^b	.07
NvExp	1.30	1.27	.09	.07	-.41	-.50
Emp	1.29 ^b	.71 ^b	.04	.08 ^b	-.45 ^b	-.06
<i>EI proximal outcomes</i>						
IvR [*]	-.97	-1.93	-2.24 ^b	.59	-.65	-1.02 ^b
CrTh	1.06	2.18 ^b	1.12 ^b	.11	.38 ^b	.35 ^b
MRA [*]	-.80 ^b	-.67	-.48	.62 ^b	-.36	.54
MotEm	2.63 ^b	2.17 ^b	2.29 ^b	.68 ^b	.67 ^b	.62 ^b
Mean for all traits ^a	1.77	1.73	1.19	.61	.51	.45
Mean for job-relevant traits	1.92	1.87	2.03	.69	.32	.58

^{*} High opportunity = high honest score; all others are low honest scores

^a Based on absolute values.

^b Job-relevant trait (i.e., mean SME desirability rating ≥ 1.0).

Interactions among the three variables were less frequent than main effects but well above chance levels. Notably, 10 of the 12 significant two-way interactions involved job type, underscoring the importance of job relevance in the faking process. That the mean effect size under high-likelihood conditions approached four times that under least-likelihood conditions suggests that faking can vary substantially among individuals. Factors expected to affect faking excluded from consideration here (because faking instructions rendered them irrelevant) include motivational traits (e.g., ambition, Machiavellianism). Our results suggest that such factors are likely to have stronger impact in test-takers high in opportunity and ability to fake and on job-relevant traits. These are matters for further research.

Meta-analytic findings suggest that actual job applicants, on average, fake about half as high as those instructed to fake (Tett

et al., 2005), leading us to estimate that bright applicants low on job-relevant traits (under honest conditions) will fake upward by around one standard deviation, on average (i.e., $1.94/2$). If motivational factors (e.g., ambition) operating in true selection settings can account for individual differences in faking around this mean, it is not difficult to see how test takers high in opportunity and *g*, who are predisposed and/or extrinsically induced to fake, might elevate their scores to hireable levels. To the degree faking undermines selection decisions, it is this type of applicant – one low on desirable, job-relevant traits, who is also bright and motivated to fake – that presents the real challenge to organizations seeking to hire good-fit workers and to faking researchers aiming to better understand and manage faking. Averaging across all conditions obscures the problem of faking; considering the joint impact of distinct factors clarifies it.

5. Conclusions

Consistent with expectations, faking effects were (a) around .83 standard deviations, averaging across all participants and traits; (b) 60% greater in those scoring low under honest conditions; (c) 26% greater on job-relevant traits; and (d) 20% greater in those high on g. Combining all three effects yields a “perfect storm” faking estimate of around two standard deviations for those honestly low on job-relevant traits and high on g. Faking is even greater on some trait-job combinations, reaching three standard deviations under “perfect storm” conditions (e.g., Industriousness in the nurse position; Table 4).

Given that faking in actual applicants is around half that reported in directed faking studies (Tett et al., 2005), we estimate “perfect storm” faking effects in selection settings to fall between $d = 1.0$ and 1.5 . Notably, these estimates do not apply to all applicants, on average, but rather to those posing the greatest risks due to faking, namely, those low on job-relevant traits yet bright enough to appear well-suited to the job. Such individuals pose four challenges in hiring. First, they are opposite on targeted traits to what the organization is looking for. Second, they keep higher-fitting applicants from being hired. Third, motivation to fake can come from dishonesty, Machiavellianism, and other selfish qualities, which, as traits, may be expected to find counterproductive expression on the job. Finally, because these individuals are better able to “beat the test,” they may be especially likely to get away with negative work behaviors once hired. Targeting this particular type of applicant, studies of the faking process and corresponding methods of dealing with the faking problem may advance more quickly. Faking motivation in true selection conditions is an especially worthy target for future research in conjunction with the variables targeted here (cf. Tett & Simonet, 2011).

Appendix A. Supplementary data

Supplementary data associated with this article can be found, in the online version, at [doi:10.1016/j.paid.2011.10.017](https://doi.org/10.1016/j.paid.2011.10.017).

References

- Bar-On, R. (1997). *The Bar-On Emotional Quotient Inventory (EQ-i): Technical manual*. Toronto, Canada: Multi-Health Systems.
- Christiansen, N. D., Burns, D. N., & Montgomery, G. E. (2005). Reconsidering forced-choice item formats for applicant personality assessment. *Human Performance*, 18, 267–307.
- Christiansen, N. D., Janovics, J. E., & Siers, B. P. (2010). Emotional intelligence in selection contexts: Measurement method, criterion-related validity, and vulnerability to response distortion. *International Journal of Selection and Assessment*, 18, 87–101.
- Day, A. L., & Carroll, S. A. (2008). Faking emotional intelligence (EI): Comparing response distortion on ability and trait-based EI measures. *Journal of Organizational Behavior*, 29, 761–784.
- Furnham, A. (1990). Faking personality questionnaires: Fabricating different profiles for different purposes. *Current Psychology*, 9, 46–56.
- Furnham, A. F. (1997). Knowing and faking one's Five-Factor personality score. *Journal of Personality Assessment*, 69, 229–243.
- Greenberger, E., Lessard, J., Chen, C., & Farruggia, S. P. (2008). Self-entitled college students: Contributions of personality, parenting, and motivational factors. *Journal of Youth and Adolescence*, 37, 1193–1204.
- Grubb, W. L., III, & McDaniel, M. A. (2007). The fakability of Bar-On's Emotional Quotient Inventory Short Form: Catch me if you can. *Human Performance*, 20, 43–59.
- Hemmati, T., Mills, J. F., & Kroner, D. G. (2004). The validity of the Bar-On emotional intelligence quotient in an offender population. *Personality and Individual Differences*, 37, 695–706.
- Hogan, R., & Nicholson, R. A. (1988). The meaning of personality test scores. *American Psychologist*, 43, 621–626.
- Hough, L. M. (1998). Effects of intentional distortion in personality measurement and evaluation of suggested palliatives. *Human Performance*, 11, 209–244.
- Hough, L. M., Eaton, N. K., Dunnette, M. D., Kamp, J. D., & McCloy, R. A. (1990). Criterion-related validities of personality constructs and the effect of response distortion on those validities. *Journal of Applied Psychology*, 75, 581–595.
- Jackson, D. N. (2004). *Personnel Assessment Form Manual*. Port Huron, MI: Sigma Assessment Systems.
- Jackson, D. N., Paunonen, S. V., & Tremblay, P. F. (2004). *Six-Factor Personality Questionnaire Manual*. Port Huron, MI: Sigma Assessment Systems.
- Komar, S., Brown, D. J., Komar, J. A., & Robie, C. (2008). Faking and the validity of conscientiousness: A Monte-Carlo investigation. *Journal of Applied Psychology*, 93, 140–154.
- Mahar, D., Coburn, B., Griffin, N., Hemeter, F., Potappel, C., Turton, M., et al. (2006). Stereotyping as a response strategy when faking personality questionnaires. *Personality and Individual Differences*, 40, 1375–1386.
- Mahar, D., Cologon, J., & Duck, J. (1995). Response strategies when faking personality questionnaires in a vocational selection setting. *Personality and Individual Differences*, 18, 605–609.
- McFarland, L. A., & Ryan, A. M. (2000). Variance in faking across noncognitive measures. *Journal of Applied Psychology*, 85, 869–879.
- Mesmer-Magnus, J., Viswesvaran, C., Deshpande, S., & Joseph, J. (2006). Social desirability: The role of over-claiming, self-esteem, and emotional intelligence. *Psychology Science*, 48, 336–356.
- Morgeson, F. P., Campion, M. A., Dipboye, R. L., Hollenbeck, J. R., Murphy, K., & Schmitt, N. (2007). Reconsidering use of personality tests in personnel selection contexts. *Personnel Psychology*, 60, 683–729.
- Nguyen, N. T., Biderman, M. D., & McDaniel, M. A. (2005). Effects of response instructions on faking a situational judgment test. *International Journal of Selection and Assessment*, 13, 250–260.
- Pauls, C. A., & Crost, N. W. (2005). Cognitive ability and self-reported efficacy of self-presentation predict faking on personality measures. *Journal of Individual Differences*, 26, 194–206.
- Petrides, K. V., & Furnham, A. (2003). Trait emotional intelligence. Behavioral validation in two studies of emotion recognition and reactivity to mood induction. *European Journal of Personality*, 17, 29–57.
- Raymark, P. H., & Tafero, T. L. (2009). Individual differences in the ability to fake on personality measures. *Human Performance*, 22, 86–103.
- Rosse, J. G., Stecher, M. D., Miller, J. L., & Levin, R. A. (1998). The impact of response distortion on preemployment personality testing and hiring decisions. *Journal of Applied Psychology*, 83, 634–644.
- Salovey, P., & Mayer, J. D. (1990). Emotional intelligence. *Imagination, Cognition, and Personality*, 9, 185–211.
- Snell, A., Snyder, E. J., & Lueke, S. B. (1999). Towards a theory of applicant faking: Integrating studies of deception.
- Tett, R. P., & Christiansen, N. D. (2007). Personality tests at the crossroads: A response to Morgeson, Campion, Dipboye, Hollenbeck, Murphy, and Schmitt (2007). *Personnel Psychology*, 60, 967–993.
- Tett, R. P., Fox, K. E., & Wang, A. (2005). Development and validation of a self-report measure of emotional intelligence as a multidimensional trait domain. *Personality and Social Psychology Bulletin*, 31, 859–888.
- Tett, R. P., & Simonet, D. (2011). Faking in personality assessment: A “multisaturation” perspective on faking as performance. *Human Performance*, 24, 302–321.
- Van Rooy, D. L., & Viswesvaran, C. (2004). Emotional intelligence. A meta-analytic investigation of predictive validity and nomological net. *Journal of Vocational Behavior*, 65, 71–95.
- Vasilopoulos, N. L., & Cucina, J. M. (2006). Faking on noncognitive measures: The interaction of cognitive ability and test characteristics. In R. L. Griffith & M. H. Peterson (Eds.), *A closer examination of applicant faking behavior* (pp. 305–331). Greenwich, CT: Information Age.
- Velicer, W. F., & Weiner, B. J. (1975). Effects of sophistication and faking sets on the Eysenck Personality Inventory. *Psychological Reports*, 37, 71–73.
- Viswesvaran, C., & Ones, D. S. (1999). Meta-analyses of fakability estimates: Implications for personality measurement. *Educational and Psychological Measurement*, 59, 197–210.