Personality and Abusive Supervision: A Study on Leadership in the Healthcare Industry in China

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Abstract—Relationship between abusive supervision supervisors' personality dimensions (measured with the Big-Five Personality Inventory) were examined with data obtained from subordinate-supervisor dyads from 59 Healthcare Centers for Community located in the north of China. Results of correlation analysis revealed that supervisors' neuroticism was positively (r = .40, p<.01), whereas extraversion (r = -.28, p<.05), agreeableness (r = -.62, p<.01) and conscientiousness (r = -.45, p<.01) were negatively related to abusive supervision. Results of regression analysis revealed that agreeableness was negatively (B = -.52, p<.01) and neuroticism (β = .27, p<.10) was positively related to abusive supervision, whereas extraversion ($\beta = .13$, ns) and conscientiousness ($\beta = -.06$, ns) were unrelated to abusive supervision (when statistically controlling for demographics and other Big-Five personality dimensions). Implications for future investigation and for leadership practice are discussed.

Keywords-personality; abusive supervision; leadership; healthcare industry

I. Introduction

Consistent with the definition of leadership as the ability to influence a group of individuals toward the achievement of shared goals [1], much of the leadership research has focused on leader behaviors that engender positive employee work attitudes and behaviors that promote leaders and, ultimately, organizational effectiveness [1, 2]. Although anecdotal evidence suggests that leaders sometimes use their power to mistreat subordinates and do not always engage in motivationally oriented behaviors, it is only recently that this phenomenon has been systematically studied [2]. In one of the recent researches, the dark or destructive side of supervisory behaviors was termed abusive supervision (AS) [3].

Abusive supervision refers to "subordinates perceptions of the extent to which their supervisors engage in sustained display of hostile verbal and non-verbal behaviors excluding physical contact" [4]. Examples of such behaviors include aggressive, intimidating, public ridiculing or humiliating, scapegoating subordinates. Although AS constitutes a low base-rate phenomenon, there are many empirical evidences linking abusive supervision to leadership dysfunction, such as subordinates' job dissatisfaction and turnover, low affective organizational commitment, low team and organizational performance [4-6]. However, most of these researches were conducted in the United States, it is necessary to do more AS

studies elsewhere in the world [3]. In response to this calling, we conducted this study based on Chinese leaders to examine AS and its antecedents and consequences in China.

Although much is now known about the outcomes of abusive supervision, there is a paucity of research on its antecedents [2, 3]. Hence, we devoted our research into understanding the antecedents of AS. In general, researchers think that there are usually two kinds of antecedents of leadership behaviors, the situational variables and the individual variables [7]. Personality is an individual- and supervisor-level factor that influences abusive supervisory behaviors and has been recommended as an important future research direction [4]. We accepted leader's personality traits (measured with the Big-Five Personality Inventory) as the antecedents of abusive supervisory behaviors based on the Personality-Performance model [8], and examined the relationship between personality and AS.

We investigated AS on leadership in the healthcare industry in China with samples (59 directors and 162 subordinates) from 59 Healthcare Centers for Community (HCC) in the north of China. We expected this study can provide insights for management practice in the healthcare industry in China. Firstly, practical evidence suggests that leadership and management in the healthcare industry in China be enhanced imminently in terms of the dissatisfied employees and clients (paints and their relatives) [9]; Secondly, research suggested that leadership in Chinese hospitals may be one of the most important factors caused the employees and clients' dissatisfaction [10]; Thirdly, HCC is a new healthcare model in China and will be one of the core healthcare solutions for residents living in large cities (for example Beijing) in the near future, and is currently being promoted vigorously by the Chinese government. Additionally, this study should broaden our understanding of AS theoretically since there is very few (if not none) documented studies based on Chinese managerial context in the literature.

II. LITERATURE REVIEW AND HYPOTHESIS

A. The Big-Five Model of Personality and Leadership Behaviors

In the past 10 years, there has been a revival of interest in the role that personality plays in leadership emergence and effectiveness [3, 8]. Much of this renewed interest can be



attributed to improvement in terms of the conceptualization and measurement of personality, the most notable is the development of the Big-Five model of personality. The Five Factor model conceptualizes personality as clusters of traits that are organized within five dimensions: neuroticism (describing someone who is anxious, hostile, impulsive, stressed); agreeableness (describing someone who is altruistic, trusting, kind and cooperative); openness to experience (imaginative, curious, artistic, insightful); extraversion (active, assertive, energetic and outgoing); and conscientiousness (dependable, responsible, dutiful and determined).

Meta-analytic results indicated that controlling for the other Big-Five traits, extraversion and openness to experience are most strongly related to general leadership effectiveness, while conscientiousness and extraversion are most strongly related to leader emergence [11]. Neuroticism and agreeableness have been found to be only weakly related to leadership [11]. But, the results are not consistent and some researches have found different results. In studies of personality and transformational leadership, agreeableness was most strongly related to transformational leadership, while conscientiousness was unrelated, controlling for the other traits [12]. In particular, agreeableness was most strongly correlated (r=.28, p<.05) with the idealized influence dimension of transformational leadership, the dimension is comprised of ethical content. Aother research also found that agreeableness was positively related to transformational leadership [13]. A review of personality and leadership found that across multiple studies, extraversion (positively) and neuroticism (negatively) were consistently related to the charisma of transformational leadership — a dimension containing idealized influence. Agreeableness and openness to experience were also positively related to charismatic leadership [14]. Taken together, although results about the relationship between personality traits and leadership behaviors are variable, researchers in general agree that personality is an effective predictor of leadership behaviors.

B. Hypothesis

We propose that Big-Five personality dimensions that may be related to AS are neuroticism, extraversion, agreeableness, and conscientiousness. We develop our hypothesis based on rational and research evidences as following.

People who are in high neuroticism experience greater anger, frustration, and impulsiveness compared with their counterparts in low neuroticism [15]. Research revealed that neurotic leaders are thin-skinned and hostile [13], neuroticism is negatively related to the charisma— a dimension of transformational leadership that contains ethical components [14]. Therefore, it is reasonable that neuroticism is positively related to unethical leadership behaviors, such as abusive supervision, which is an unethical dimension of leadership [2]. Consequently, we believe that leaders in high neuroticism will abuse their subordinates more often than low-neuroticism leaders and provide the following hypothesis.

H1: Neuroticism is positively related to AS when controlling for other personality dimensions and control variables.

It has been shown that extraversion is negatively related to the charismatic leadership— a leadership dimension that contains ethical components [14], and AS is an unethical dimension of leadership [2]. So, it is reasonable to argue that leaders with high-extraversion may be more abusive supervisory behaviors. On the other hand, high-extraversion people tend to be active, assertive, energetic and outgoing [15], and active, energetic and outgoing leaders (i.e. highextraversion leaders) may interact more with subordinates, which in turn may arises more disagreement. If leaders can not control their assertive characteristics appropriately when facing disagreement, subordinates will have no choice but to make a concession or to keep silent. In the long run, it may harm subordinates and these leaders may be perceived as pococurante, aggressive and even abuse of power by subordinates. These arguments lead us to propose the following hypothesis.

H2: extraversion is positively related to AS when controlling for control variables and other personality dimensions.

Individuals who are low in agreeableness might be perceived as argumentative, hostile, and conflictive [15]. In practice, high agreeable person is kind and concerns about others. By definition, abusive supervisors are not kind and altruistic, they are, on the contrary, more likely to behave abusively toward subordinates. Moreover, agreeableness was most strongly correlated with the idealized influence dimension which is comprised of ethical content [13], and researchers thought that AS is unethical [2]. So, we believe that agreeable supervisors will not abuse subordinates, and suggest the following hypothesis:

H3: agreeableness is negatively related to AS when controlling for control variables and other personality dimensions.

Highly conscientious individuals exercise self-control, carefully plan, and are well organized and reliable [15], as well as responsible and dependable [8]. In a realistic point of view, these qualities are opposite to AS, because abusive supervisors are often impulsive, voluntary and less thinking of the results of their abusive behaviors. Hence, it is less likely that agreeable supervisors abuse subordinates, and we propose the following hypothesis:

H4: conscientiousness is negatively related to AS when controlling for control variables and other personality dimensions.

III. METHOD

A. Sample and Procedure

Respondents were employees of these HCCs. Separate questionnaires were developed and distributed to supervisors (the director or deputy director of the HCC) and subordinates, respectively. Sixty-seven supervisor questionnaires were handed out in a leadership training class hold for HCC directors by the Health Bureau of the city, one of the authors of present paper (lecturer of the class) was on site to answer any questions raised by the participants and to collect the questionnaires

before the class starts. Sixty-three director questionnaires were returned (response rate 94%).

After the class, with the assistance of the survey coordinator (an employee in the training department of the Health Bureau), we obtained a list of the immediate subordinates (IM) of the 63 directors. We removed the director with less than 2 IMs and 59 directors were kept. Then, we randomly selected 3-4 IMs per supervisor (for supervisor with less than 4 IMs, we selected all his/her IMs), and 212 subordinates were selected in total, representing a subordinate-supervisor ratio of 3.6: 1. Survey packets that contained the questionnaire, a prestamped envelope and a cover letter were sent to these 212 IMs. The cover letter explained the survey purpose and assured the confidentiality of their responses. We also used a code that was explained to IMs to match their responses to the right supervisor. The IMs were suggested that the completed survey returned to us directly with the prestamped envelope. We received 171 subordinate questionnaires among which 162 were effective questionnaire covered all 59 directors. So, the final returned rate of the questionnaires was 88% and 76% for supervisors and IMs, respectively. The detailed demographics of the 59 supervisors and the 162 IMs are listed in Table I.

TABLE I. PROFILE OF BOTH SAMPLES

Variables		Supervisor	r (n=59)	Subordinate(n=162)		
		Frequency	%	Frequency	%	
Sex	Male	25	42.4	63	38.9	
	Female	34	57.6	99	61.1	
Age	≦30	3	5.1	21	13.0	
	31-40	39	66.1	71	43.8	
	41-50	14	23.7	41	25.3	
	≧51	3	5.1	29	17.9	
Edu.	No college	18	30.5	58	35.8	
	Bachelor	23	39.0	68	42.0	
	MS. & PHD	18	30.5	36	22.2	
Tenure	≦5 years	ns	ns	19	11.7	
	6-10	ns	ns	37	22.8	
	11-15	ns	ns	59	36.4	
	≧16	ns	ns	47	29.0	

B. Measures

Abusive supervision. As described in the literature [2, 5-6], we used an adapted 10-item version of the original 15-item scale [4] to measure subordinates' perceptions of the extent to which their supervisor abused his or her authority. Response options ranged from 1 = (I can not remember him/her ever using this behavior with me) to 5 = (He/she uses this behavior very often with me). Sample items include "My director expresses anger at me when he/she is mad for another reason," "My director blames me to save himself/herself embarrassment," and "My director tells me my thoughts or feelings are stupid." The scale's alpha reliability in this study is .85. Item scores were summed to form the total scores for AS.

Neuroticism, extraversion, agreeableness and conscientiousness. These variables were assessed with the respective 12-item subscale from Costa and McCrae's NEO Five-Factor Inventory (Form S) [15]. Costa and McCrae have provided extensive support for this instrument's reliability and validity. Illustrative items are "I often feel inferior to others" (Neuroticism), "I often feel as if I'm bursting with energy" (Extraversion), "I try to be courteous to everyone I meet" (Agreeableness) and "I am not a very methodical person" (Conscientiousness). Response options ranged from 1 = strongly disagree to 5 = strongly agree, and item scores were summed to form the total scores for each Big Five dimension.

Control variables. Consistent with prior research [2], we had the supervisor's demographics as the control variables. Three items in supervisor questionnaire were used to measure director's demographic characteristics of gender (male = 0, female = 1), age at last birthday, and level of education (some or no college = 1, bachelor = 2, and master or PHD = 3) respectively. We controlled these demographic variables in the regression analysis that examined the hypothesis, because these characteristics have been shown to be potential factors influencing AS [2, 16-18].

C. Data analysis

In this study, we used two data analysis approaches to test our hypothesis. First, we used correlation to test the relationship between the independent and control variables and the dependent variable, which gave us primary insight of the hypothesis. Second, we used regression to test the hypothesis by controlling the other independent variables. Regression analysis helps us to understand which among the independent variables are related to the dependent variable (AS in this study), and to explore the forms of these relationships [19]. Additionally, item and scale analysis were performed to confirm the reliability of the questionnaires.

IV. RESULTS

A. Descriptive Statistic and Intercorrelations

II shows the descriptive statistics intercorrelations for the study variables. The measures displayed generally acceptable levels of internal consistency with alpha coefficients ranged from .66 to .86. Consistent with literatures [2-3, 18], abusive supervision was a low base rate with an average score 1.68 in our study, but AS correlated significantly with the four independents. In details, AS was positively related to supervisors' neuroticism (r = .40, p<.01), and was negatively related to extraversion (r = -.28, p<.05), agreeableness (r = -.62, p<.01) and conscientiousness (r = -.45, p<.01). Results suggested that our study had sufficient sensitivity to detect the predicted relationships, and in principle our hypothesis were supported by the results except for H2.

B. Hypothesis Tests

Table III presents the results of the regression analysis that was used to further examine the hypothesis, i.e. the main effect of supervisors' personality dimensions and their AS perceived by IMs.

Hypothesis 1 and 3 received support in that agreeableness was negatively ($\beta = .52$, p<.01) and neuroticism ($\beta = .27$, p<.10) was positively related to AS, whereas Hypothesis 2 and 4 were not supported as extraversion ($\beta = .13$, ns) and conscientiousness ($\beta = .06$, ns) were unrelated to AS (when statistically controlling for demographics and other Big-Five personality dimensions).

V. DISCUSSION

Abusive supervision is a serious problem for both employers and employees as well as their families, more attention should be paid to it by researchers [3]. This study conceptualized abusive supervision as a form of the dark side of leadership behaviors and investigated the individual-level antecedents of AS. Results of this study 1) provide further evidence showing that the personality traits are the antecedents of abusive supervision; 2) add to a growing literatures suggesting that dispositional variables explain leaders' leadership behaviors; 3) achieve a better understanding of AS in the healthcare industry in China. These contributions are essential and timely. This is because 1) previous AS research has concerned with the individual-level antecedents of AS, but very few studies were conducted in China especially in the healthcare industry; 2) researches on relationship between the Big-Five personality dimensions and AS were limited in the literature, and more investigation is needed to study this topic in depth [2, 3, 5]; 3) there are inconsistent research results with respect to the relationship between the Big-Five personality dimensions and AS [3]; 4) the results of this study may have implications for healthcare organizations and researchers regarding the directors (leaders) who have been selected in this research.

Meanwhile, this study has some limitations that need to be overcome in future work. The first is the main effect of neuroticism on AS is marginal significant even though the standardized beta coefficient is not low (.27). However, it may be acceptable considering the sample number of supervisor was only 59, and future research is encouraged to examine this relationship with more samples. Another limitation lies in the representation of the samples, i.e., the regional distribution of the samples was restricted. Future study should include samples from different regions. In addition, although many researches have used the measurement instrument of AS and the Big-Five personality Inventory, the alpha coefficient of agreeableness (.69) is slightly lower than the recommended point (.70). Therefore, instrument translating may be not good enough for the management of the research, taking cultural background differences (between China and foreign countries) into account [18]. It is necessary to develop measurement scales tailored according to Chinese cultures in the future. Finally, our results should be further tested and cautions should be taken when generalize the research results.

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MEANS, STANDARD DEVIATIONS, RELIABILITIES, AND INTERCORRELATIONS AMONG STUDY VARIABLES (N = 59) TABLE II.

	M	SD	1	2	3	4	5	6	7	8
1. Lsex	0.58	0.50								
2. Lage	39.05	6.69	25							
3. Ledu	2.00	0.79	.09	-75						
4. AS	1.68	0.48	15	.10	.08	(.85)				
5. Neuroticism	2.60	0.54	.04	01	.06	.40**	(.79)			
6. Extraversion	3.43	0.64	.07	17	.11	28*	66**	(.84)		
7. Agreeableness	3.33	0.41	.10	19	.05	62**	28*	.32*	(.69)	
8. Conscientiousness	3.83	0.60	.23	24	.08	45**	56**	.61**	.50**	(.86)

a. The alpha internal-consistency reliability coefficients appear in parentheses along the diagonal.

TABLE III. RESULTS OF REGRESSION ANALYSIS OF SUPERVISIORS' PERSONALITY DIMENSIONS ON ABUSIVE SUPERVISION (N = 59)

Independent Variables	Abusive supervision ^a				
STEP 1					
Gender (male = 0, female =1)	08				
Age	.29				
Education	.36 [†]				
\mathbb{R}^2	.11				
F (4, 54)	1.64				
STEP 2	,				
Neuroticism	.27 [†]				
Extraversion	.13				
Agreeableness	52**				
Conscientiousness	06				
R ²	.47				
F (8, 50)	5.59**				

a. Standardized beta coefficients.

b. * p<.05. ** p<.01

c. Lsex (male = 0, female = 1), Lage (age at the last birthday) and Ledu (no college = 1, bachelor = 2, master and PhD degree = 3) refer to the supervisor's sexual, age and educational level respectively.

b. † p<.10. ** p<.01