

The Influence of Empathy on the Communication Ability of Psychological Monitor: The Mediation of Interpersonal Trust

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Abstract. The purpose of this paper is to explore the present situation of empathy and communication ability of psychological monitor and the correlation between them, as well as the mediation of interpersonal trust on empathy and communication ability. To provide scientific basis for improving the communication ability of psychological monitor. Used interpersonal response indicator scale, supportive communication ability scale and interpersonal trust scale, 346 psychological monitors and 352 non-psychological monitors were investigated with anonymous questionnaire, and the data were statistically analyzed. There were significant differences in empathy, communication ability and interpersonal trust between psychological monitor and non-psychological monitor ($P < 0.001$), and the average value of psychological monitor was higher than that of non-psychological monitor. There was a significant positive correlation between empathy, communication ability and interpersonal trust of psychological monitor, and empathy and trust could positively predict the communication ability of psychological monitor (β values were 0.29, 0.30, $P < 0.001$, respectively). The mediation of interpersonal trust between empathy and communication ability was significant (total effect value 0.26, direct effect value 0.23, indirect effect value 0.03; $P < 0.001$). Empathy can affect the communication ability of psychological monitor to a certain extent, and indirectly affect the communication ability through the mediation of interpersonal trust.

Keywords: Psychological monitor; empathy; Communication skills; interpersonal trust.

1. Introduction

Psychological monitors are the most basic part of College Students' psychological crisis intervention and rapid response mechanism. They are also mental health service teams with the same value as peer counseling. Since their establishment in 2004, psychological monitors have become indispensable psychological service personnel in college mental health work. According to the Blue Paper on the Work of Psychological monitors, the research on the work of Psychological monitors are mainly focuses on three aspects: responsibility, selection and training. However, these contents are mainly based on the basic abilities and psychological counseling skills possessed by the Psychological monitors, among which good communication skills are the important basic skills for the Psychological monitors to communicate with peers and carry out psychological work in various classes. Emotion and trust are the important factors affecting the communication of psychological monitors.

Communication skills are defined in the field of psychology as the process of communication between people in society, that is, the process of transmitting information, communicating ideas and communicating emotions between people. Man is the sum of social relations. Communication can promote the communication between people and understand each other's life. It is also an important manifestation of building a modern harmonious society. College students, as the future pillar of society, will encounter many psychological problems in this growth stage. If they cannot communicate in time, they healthy growth will be directly or indirectly affected. If they lack good communication, the effectiveness of psychological health work will be reduced and the improvement of psychological crisis intervention mechanism in Colleges and universities will lag behind. The research of communication ability mainly starts with the structure, influencing factors and training of communication ability. Communication ability mainly includes cognitive skills (empathy, social expectation, cognitive complexity, sensitivity to relationship criteria, situational knowledge, self-monitoring) and behavioral skills (mutual involvement, mutual management,

behavioral flexibility, listening, social style) [9]. Interpersonal communication barriers are mainly caused by family background, growth experience, personal cognitive bias, inappropriate attribution, personality deficits and so on. Empathy is the main intervention factor in the training of communication ability enhancement. Studies have shown that empathy can effectively promote and enhance personal communication ability, and has a positive predictive effect on communication ability [11].

Empathy, based on aesthetics and philosophy, originated from the German word "Einführung", has been translated into resonance, empathy, sympathy, compassion and so on in China. Empathy has been deeply studied in the fields of development, society, cognitive neuroscience and other sciences, especially in the field of counseling and clinical psychology, after a century of controversy among the major schools abroad, and a lot of research and long-term intensive discussions have been carried out. Eisenberg and Strayer (1987) argue that empathy stems from the understanding of other people's emotional state, the emotional response similar to what others experienced or will experience at that time, and a psychological process in which people adopt other people's viewpoints and feel other people's emotions [2]. Its research shows that empathy can promote the self-expression and self-exploration of the help-seekers, to achieve more self-understanding and more in-depth communication between the two sides of counseling, and have a positive impact on the counseling relationship [3]. It can also improve the quality of interpersonal relationship, ease the relationship between the medical staff and patients, prevent and reduce the aggressive behavior of secondary vocational school students [4-6]. Davis found that in the process of interpersonal communication, opinions adoption in empathy was positively correlated with social sensitivity and interpersonal trust of other people's inclination, but negatively correlated with shyness, loneliness and poor social ability [7].

Interpersonal Trust refers to a generalized expectation of the verbal commitment and reliability of written or oral statements established by individuals in the process of interpersonal interaction [12]. As a social signaling mechanism, Shinnishi's research finds that trust level among members of virtual team can directly affect the realization of good communication among teams, thus further affecting team effectiveness [13]. Zhou Kun found that doctor-patient communication had a significant impact on patients' trust level by analyzing patients' trust in the hospital and its related influencing factors. Di Xiaobo's trust-based construction projects in the implementation phase of the effectiveness of communication test contract trust, capacity trust, goodwill trust and communication effectiveness is positively correlated, trust has a promoting role in communication [15]. Therefore, interpersonal trust can predict communication ability positively.

To sum up, previous studies have explored the relationship between empathy and communication ability, but few studies have explored the internal mechanism of empathy, interpersonal trust and communication ability. Through the quantitative analysis of empathy, communication ability and interpersonal trust, this study provides practical data support and enlightenment for the improvement of self-accomplishment and corresponding working conditions of psychological committee members of school mental health service workers.

2. Object and Method

2.1 Objects

346 college psychological monitors were selected, including 101 freshmen, 122 sophomores and 123 juniors; 147 boys (42.49%) and 199 girls (57.51%). There were 352 non-psychological members, 124 freshmen (35.2%), 120 sophomores (34.1%), 108 juniors (30.7%), 151 boys (42.9%) and 201 girls (57.1%).

2.2 Research Tools

2.2.1 Empathy Scale

The Chinese version of interpersonal response scale [16] (Interpersonal Reactivity index-C) revised by Zhang Fengfeng and others was selected. The scale includes 22 items. According to the specific definition of empathy, it can be divided into four dimensions: viewpoint selection (PT), imagination (FS), empathic concern (EC) and personal sadness (PD). The former two can be combined into cognitive empathy, and the latter two can be combined into emotional empathy. The internal consistency of the scale was 0.75 and the half-split reliability was 0.73 by using Likert five-grade scoring method and repeated tests. The Cronbach's coefficient of the scale in this study was 0.78.

2.2.2 Communication Competence Scale

Whetten D A and Cameron K S were used to compile the Supportive Communication Scale (Supportive Communication Scale) to measure interpersonal communication competence. There are 20 items in the scale, which are divided into three dimensions: tutoring and counseling (6 items), providing effective negative feedback (6 items) and supporting communication (8 items). Likert five-level scoring method was used in the scale. From "very disagreement" to "very agreement" scored 1-5 points respectively. The higher the score, the stronger the communication ability. The scale has good reliability and validity, with internal consistency coefficient of 0.78 and split-half reliability coefficient of 0.77. The Cronbach's coefficient of the scale in this study was 0.84.

2.2.3 Trust Scale

Using the Trust Scale (18) developed by Rempel and Holmes, there are 18 items involving three connotations of trust: predictability, reliability and trust. The scale used Likert seven-grade scoring method, 1 indicated total disagreement, 7 indicated total agreement. The total score of the scale ranged from 18 to 126 (low to high trust). The internal consistency of the scale was 0.81, and the Cronbach's coefficient of the scale in this study was 0.84.

2.3 Statistical Analysis

SPSS 23.0 was used for data statistics and analysis. Since the percentage Bootstrap method for bias correction is more effective than the traditional Sobel test [19], this study uses this method to estimate 95% confidence interval of mediation effect by extracting 5000 Bootstrap samples, and uses the SPSS macro program Process compiled by Hayes to test the difference significance of mediation effect of interpersonal trust [20].

3. Research Results

3.1 Difference Analysis

According to the statistical analysis of the data in Table 1, there are significant differences in empathy, interpersonal trust and communication ability between psychological monitors and non-psychological monitors ($P < 0.001$), and the average value of psychological monitors is higher than that of non-psychological monitors. The empathy, interpersonal trust and communication abilities of the psychological monitors were at the middle level ($M + SD = 74.33 + 9.98$; $M + SD = 82.50 + 13.69$; $M + SD = 73.60 + 13.69$).

Table 1. Difference analysis between psychological monitors and non-psychological monitors (n = 346)

variable	Variable type	M	SD	T value
Empathy	psychological monitors	74.33	9.98	2.95***
	non-psychological monitors	72.14	9.62	
interpersonal trust	psychological monitors	82.50	13.69	3.75***
	non-psychological monitors	78.74	12.86	
communication skills	psychological monitors	73.60	7.84	7.41***
	non-psychological monitors	69.16	7.96	

According to the data statistics and analysis of Table 2, the average value of empathy among female psychological monitors is generally higher than that of male psychological monitors, but their communication ability is lower than that of male psychological monitors, and the communication ability of psychological monitors is significantly different in gender ($P < 0.05$).

Table 2. gender differences in empathy, interpersonal trust and communication ability of psychological committee members (n=346)

variable	Variable type	M	SD	T value
Empathy	male	73.31	9.89	-1.65
	female	75.09	10.00	
interpersonal trust	male	81.76	13.64	-0.87
	female	83.06	13.73	
communication skills	male	73.86	8.49	0.53*
	female	73.40	7.34	

Note: * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$.

3.2 Relevance Analysis

According to Table 3, there is a significant positive correlation among the three variables of empathy, interpersonal trust and communication ability ($r = 0.144$, $P < 0.01$; $r = 0.334$, $P < 0.01$; $r = 0.337$, $P < 0.01$), and the correlation coefficient between interpersonal trust and communication ability is higher.

Table 3. Correlation analysis among empathy, interpersonal trust and communication ability of psychological monitors (n = 346)

	Empathy	interpersonal trust	communication skills
Empathy	1		
interpersonal trust	0.144**	1	
communication skills	0.334**	0.337**	1

Note: * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, Same as below.

The results of Table 4 show that there are significant positive correlations among the three variables of empathy, interpersonal trust and communicative competence ($r = 0.144$, $P < 0.01$; $r = 0.334$, $P < 0.01$; $r = 0.337$, $P < 0.01$); but predictability, reliance, trust, tutoring and counseling, supportive communication and personal distress are negatively correlated ($r = -0.214$, $P < 0.01$; $R = -0.251$, $P < 0.01$). 01; $r = -0.214$, $P < 0.01$; $r = -0.207$, $P < 0.01$; $r = -0.137$, $P < 0.01$) all variables have statistical significance. It shows that the higher the empathy and interpersonal trust, the stronger the communication ability.

Table 4. Correlation analysis among empathy, interpersonal trust and communication ability of psychological monitors (n = 346)

	1	2	3	4	5	6	7	8	9	10
1	1									
2	.370**	1								
3	.410**	.467**	1							
4	-.031	.053	.123*	1						
5	.207**	.251**	.236**	-.214**	1					
6	.135*	.208**	.145**	-.251**	.501**	1				
7	.149**	.271**	.174**	-.214**	.469**	.662**	1			
8	.413**	.261**	.226**	-.207**	.297**	.219**	.191**	1		
9	.279**	.118*	.143**	-0.025	.186**	.099	.075	.456**	1	
10	.461**	.281**	.279**	-.137*	.343**	.296**	.237**	.471**	.368**	1

Note: * P < 0.05, ** P < 0.01, *** P < 0.001. 1 Viewpoint Selection 2 Empathy 3 Imagination 4 Pain 5 Predictable 6 Dependency 7 Trust 8 Tutoring and Consulting 9 Negative Feedback 10 Supportive Communication.

3.3 Analysis of Mediating Effect of Interpersonal Trust on Empathy and Communication Ability

The results of Tables 3 and 4 show that empathy, interpersonal trust and communication ability of psychological monitors interact with each other to meet the requirements of mediation effect test. Therefore, taking gender as the control variable, regression analysis was carried out on all variables first, and then the mediation effect analysis was done. Regression analysis showed that empathy could positively predict interpersonal trust and communication ability (beta = 0.29, t = 5.96; beta = 0.30, t = 6.02); interpersonal trust could also positively predict communication ability (beta = 0.33, t = 6.58), as shown in Table 5. Empathy has a significant direct effect on communication ability, and interpersonal trust plays a part of mediating role between empathy and communication ability.

Table 5. Regression Analysis of Empathy, Interpersonal Trust and Communication Ability of Psychological monitors

Outcome variable	Regression Equation	Integral Fitting Index				Significance of regression coefficient	
		Prediction variable	R	R ²	F	ρ	β
interpersonal trust	Empathy	0.334	0.112	43.26	<0.001	0.33	6.58***
communication skills	Empathy	0.444	0.197	42.00	<0.001	0.29	5.96***
	interpersonal trust					0.30	6.02***

Note: Variables in the model are brought into the regression equation after be standardized.

The mediating effect of interpersonal trust on empathy and interpersonal communication ability is shown in Table 6. The 95% confidence interval of Bootstrap for the total effect of empathy on communication competence (0.26) does not contain 0 value. The 95% confidence interval of Bootstrap for the direct effect of empathy on communication competence (0.23) does not contain 0 value. In addition, the 95% confidence interval of Bootstrap for the indirect effect of empathy on communication competence (0.03) does not contain 0 value.

Table 6. Analysis of Intermediate Effects among Empathy, Interpersonal Trust and Communication Ability of Psychological monitors

	Effect value	Boot standard error	lower limit of Boot CI	Upper limit of Boot CI	t
Total effect	0.26	0.04	0.184	0.341	6.57***
Direct effect	0.23	0.04	0.154	0.305	5.97***
Indirect effect	0.03	0.013	0.001	0.063	

Note: *p<0.05, **p<0.01, ***p<0.001.

4. Discussion

4.1 The Status of Empathy, Interpersonal Trust and Communication Ability of Psychological Monitors

The results show that the empathy, interpersonal trust and communication abilities of psychological monitors are generally at the middle level, and the overall score of psychologists is higher than that of non-psychologists. There is a significant difference between the two groups, which shows that psychologists are more competent in their duties.

The empathy of male psychologists was lower than that of female psychologists, which was similar to the results of Jia Liru and Song Mi's research [23-24]. However, there is no significant difference in empathy between the members of the psychological Committee. The psychological monitors are strictly screened and evaluated before being promoted to the post. In the later period, they also carried out some theoretical and practical skills training for their professional skills. Therefore, the empathy of the psychological Committee was in line with the general level, and there was not much difference between the psychological Committee of men and women.

In terms of interpersonal trust, the average score of male psychological monitors was lower than that of female psychological monitors, and the results were consistent with those of Shi Xiangyun, but the total average score of interpersonal trust was higher than that of Shi Xiangyun (75.89 ± 10.48) [25]. Because the psychological monitor is still a college student, the main task is to study and research, less interference by bad information from the outside world, more simple in the circle of communication, coupled with the role of the psychological monitor, will make them more sincere in the face of classmates.

The communication ability of psychological monitors is not only higher than that of girls, but also has significant gender differences, which is consistent with the conclusions of Yang Cailin and Ren et al. [26-27] Compared with the results of the research, the communication ability of psychological committee members is higher than that of their research sample groups ($64.36 + 3.58$). For this reason, the special duties of psychological monitors will enable them to take on some class responsibilities and obligations voluntarily, communicate with class members, and find emotional problems and psychological changes in the same time. Therefore, professional and careful communication skills are essential. They have better communication skills than the general college students. As for gender differences, boys and others tend to be rational in the process of communication. Compared with girls, they pay more attention to factors such as time, occasion and so on. They can handle others' talk rationally and identify key information quickly and accurately.

4.2 Interpersonal Trust Mediates the Relationship between Empathy and Communication Ability of Psychological Monitors

This study explored the mediating role of interpersonal trust in empathy and communication competence and their relationship. The results showed that empathy could significantly predict the communication competence of psychological monitors, which is consistent with previous research results [22]. That is to say, empathy is an important factor in good communication competence. The higher the level of empathy, the stronger the communication competence, and thus promote the harmony of interpersonal relationships. At the same time, the study also found that interpersonal trust plays a part of mediating role between empathy and communication ability, that is, empathy affects communication ability by influencing interpersonal trust. Furthermore, it confirms and broadens the depth and breadth of the influencing factors of psychological monitors' communication ability, which has certain inspiration and practical significance for improving the communication ability of psychological monitors.

5. Inspiration

The research data show that empathy has the most significant impact on communication ability ($\beta = 0.33$). As the core role of communication ability, psychological monitors should first help

others, help themselves and improve self-cultivation by improving self-cognitive skills. Firstly, relevant departments such as colleges and universities can regularly train psychological members in interpersonal communication skills to enhance their self-management, self-awareness and lay a positive psychological quality of humanistic care.

Combining theory with practice, the platform of group counseling and interpersonal trust cultivation should be developed to promote interpersonal trust between psychological monitors and their classmates. Through gradually cultivating, experiencing, absorbing and internalizing perception in the process of communication, cultivating and creating skills learning methods by changing cognitive and communication tendencies, to tap the potential of psychological quality of psychological monitors. In addition, at the same time, paying attention to the psychological monitors in the process of communication and some professional skills training in communication consultation.

References

- [1]. Zhan Qi Sheng. Psychological committee member blue book [M]. Press, 2018.11.
- [2]. Wispe L. History of the concept of empathy. In Eisenberg N and Strayer J. Empathy and its development. New York: Cambridge University Press, 1987. 17-37.
- [3]. Xu Hui, Hou Zhijin, topaz. Empathy and sincerity: content analysis of three cases of different ages [J]. Chinese Journal of clinical psychology, 2011, 19 (02): 265-267+202.
- [4]. Itani O S, Inyang A E. The effects of empathy and listening of salespeople on relationship quality in the retail banking industry [J]. International Journal of Bank Marketing, 2015, 33 (6): 692-716.
- [5]. Liao Yantao, Xu Bijin, Liu Yongjuan. Application of empathy in nurse patient communication [J]. China health industry, 2017, 14 (07): 193-194.
- [6]. Xu Rongfang. Empathy training intervention on aggressive behavior of secondary vocational school students [D]. Master dissertation, 2018.
- [7]. Davis MH. Empathy a social psychological approach. Boulder: West View Press, 1996:1-21.
- [8]. John Adair (John Adair), Neil Thomas (Neil Thomas), Chen Xuejuan. Communication and expression [M]. Machinery Industry Press, 2006.
- [9]. Kathleen K.R. Interpersonal communication where minds meet [M]. Wadsworth Publishing Company Belmont, California. A Division of Wadsworth Inc. 1987.
- [10]. Liu Yuling. Research progress of interpersonal communication [J]. Modern communication, 2018 (09): 106 + 105.
- [11]. Nie Hongbin, Yin Shan Yan, Ren Lijun, Han Mengjiao, Zhu Siqi, Sun Xiaoyue, Wang Yiteng, Ji Xiao Ning. Experimental study on empathy training to improve junior middle school students' interpersonal relationship [J]. Chinese Journal of health psychology, 2018, 26 (09): 1398-1402.
- [12]. Rotter J B. A new scale for the measurement of interpersonal trust. [J]. Journal of Personality, 1967, 35 (4): 651-665.
- [13]. Shinnishi M, Higa K. An Empirical Analysis of Communication on Trust Building in Virtual Teams [J]. Journal of Service Science and Management, 2018, 11 (02): 278- 296. 278 – 296.
- [14]. Zhou Kun. Influencing factors of patient trust based on structural equation model [J]. Western Chinese Medicine, 2018, 31(08): 44-47.

- [15]. Di Xiao Bo. Trust based research on communication effectiveness in the implementation phase of construction projects [D]. [D]. master's thesis, 2013.
- [16]. Zhang Fengfeng, Dong Yi, Wang Kai, Zhan Zhiyu, Xie run Fang. Reliability and validity of the Chinese version of interpersonal response scale (IRI-C) [J]. Chinese Journal of clinical psychology, 2010, 18 (02): 155-157.
- [17]. Wei Tan, management skills development (Fifth Edition) [M]. Wang Lei, translated. China Press, 2004.
- [18]. Wang Xiangdong, Wang Xilin, Ma Hong. Mental health rating scale Handbook [M].: Chinese Journal of mental health, 1999:184-185.
- [19]. Fang Jie. Point estimation and interval estimation of the mediating effect: multiplicative cloth method, nonparametric Bootstrap and MCMC method [J]. Journal of psychology, 2012, 44 (10): 1408-1420.
- [20]. Hayes, A. F. (2012). PROCESS: A versatile computational tool for observed variable mediation, moderation, and conditional process modeling. Retrieved from [http:// is. muni. cz/ el/1423/podzim 2014/PSY704/50497615/hayes_2012_navod_process.pdf](http://is.muni.cz/el/1423/podzim2014/PSY704/50497615/hayes_2012_navod_process.pdf).
- [21]. L., long Li Rong. (2004). Statistical test and control method of common method bias. Exhibition. 2004 (6): 942-950.
- [22]. He Fangmin, Meng Fanjie, Liu Xi. Correlation study on empathy and communication ability of nursing postgraduate students [J]. Chinese nursing management, 2013, 13 (04): 60- 62.
- [23]. Jia Liru, Yu Chen, Yu Shaojie, Wu Jing Liang, Tian GUI Xiang. Relationship between different family rearing styles and empathy ability of college students [J]. Chinese Journal of health psychology, 2019, 27 (06): 910-914.
- [24]. song MI, Zhou Jingcheng, Ma Jiao, Li Qi, Zhou Jingpeng, Jia Yuan min, Ni Chun Ping. Correlation between empathy ability and perceived social support of military university students [J]. Chinese Journal of mental health, 2019, 33 (02): 149-152.
- [25]. Shi Xiangyun, Hao Huixin. Current situation and Countermeasures of interpersonal trust among medical college students [J]. Education and teaching forum, 2018 (51): 71-73.
- [26]. Yang Cailing, Shi, Shi Wen Jie. Research on interpersonal communication ability of college students [J]. Business report, 2016 (02): 158-160.
- [27]. Wang, HF, Hao Chunyan. The status and correlation of empathy and communication skills of undergraduate nursing students [J]. Health vocational education, 2016, 34 (16): 124-126.