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The Relationship between Perceived Social Support and Work Engagement among Kindergarten Teachers in Xizang

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Abstract:
The engagement of kindergarten teachers in their work significantly impacts the physical and psychological well-being of young children and the long-term development of preschool education. This study utilized a questionnaire survey with convenience sampling to select 846 kindergarten teachers from the Xizang region as research subjects. Measurements were conducted using the Social Support Scale, Professional Identity Scale, and Psychological Capital Scale. The findings reveal that the work engagement of kindergarten teachers in this sample was above the medium overall level. Significant differences in social support perception, occupational identity, psychological capital, and work engagement were found based on individual background characteristics and the characteristics of the institutions where they worked. There were significant positive correlations between social support, occupational identity, psychological capital, and work engagement among kindergarten teachers. Social support had a positive predictive effect on work engagement, while occupational identity and psychological capital played a mediating role between social support and work engagement. To enhance the work engagement of kindergarten teachers, it is recommended to strengthen the mechanisms for ensuring social support, to create organizational environments that foster teachers' psychological capital, and to enhance their sense of occupational identity.

Keywords:
Kindergarten Teachers, Social support, Professional Identity, Psychological Capital, Work Engagement

1. Introduction

In recent years, under the caring guidance of the Central Committee of the Communist Party and the State Council, and with the correct leadership of the Party Committee and Government of the Xizang Autonomous Region, preschool education in Xizang has entered a period of rapid development. Efforts and investments have been continually increasing, leading to significant improvements in operational conditions, more rational structural layouts, a substantial rise in the prevalence of preschool education, continuous enhancements in management levels, and an expansion in the scale of operations. By 2021, there were a total of 2,199 kindergartens in the region, serving 150,934 children and employing 9,159 staff members, including 7,886 full-time teachers—a 5.1-fold increase compared to 2011. Amidst this expansion in the number of teachers and scale of operations, ensuring synchronous growth in quality and scale, and maximizing the impact of preschool

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education, has become a focal point of current research. It is well-known that kindergarten teachers, as organizers, implementers, and coordinators of preschool education, are vital to the sector, bearing the crucial responsibility of promoting the harmonious development of children's minds and bodies and guiding parents in scientific child-rearing. The effectiveness of preschool education heavily relies on the active engagement of kindergarten teachers. Their work engagement not only directly affects their professional development but also has a significant impact on the psychological and physical growth of children and the long-term development of preschool education.

Work engagement, as opposed to job burnout, is defined as a positive, work-related state of mind characterized by vigor, dedication, and absorption.[1] It manifests in three dimensions: maintaining high energy levels during work, wholehearted involvement in work without fear of challenges, and being fully focused and engrossed in work activities, often losing track of time.[2] Research indicates that work engagement significantly predicts job satisfaction[3], work performance[4], retention intentions[5], and creativity[6] among employees. Although the importance of work engagement has been widely acknowledged in academic circles, most studies have focused on corporate employees, civil servants, nurses, and university faculty, making their findings not directly applicable to kindergarten teachers. Therefore, it is necessary to delve into the work engagement of kindergarten teachers and its influencing factors to provide a theoretical and practical basis for effective policy interventions.

Social support refers to the help and protection an individual receives from others.[7] It can be subdivided into objective support, subjective support, and the utilization of support. Objective support refers to material assistance and social relationships, while subjective support refers to emotional help. The utilization of support refers to the level at which an individual actively seeks assistance.[8] Social exchange theory suggests that any assistance received from a social network can be reciprocated through social activities, especially reflected in organizational commitment, work cognition, and performance.[9] When organizations offer benefits to employees, employees reciprocate by engaging in their work and improving work performance to help achieve organizational goals.[10] Schaufeli et al. combined work engagement with the "demand-resources" model, demonstrating that job resources like social support and performance feedback could predict work engagement.[11] In addition, numerous empirical studies have demonstrated that social support can significantly predict employees' work engagement. For example, Norbeck (1985) revealed through experimental methods a strong relationship between high levels of social support and higher work achievement, organizational loyalty, and work engagement[12]. Beehr et al. (2000) explored this relationship across various professional backgrounds and conducted cross-validation, confirming that the level of social support can significantly and positively predict an individual's work engagement[13]. In China, Zeng Lianping, in examining the relationship between work-family balance, social support, and work engagement among teachers, also found that social support had a significant positive predictive effect on work engagement[14]. Based on this, the present study proposes the hypothesis H1: **Social support significantly predicts work engagement among kindergarten teachers.**

The concept of psychological capital was first introduced in the research of economist Goldsmith (1997) [15], where it is defined as "a positive psychological state that individuals exhibit during their growth and development." Luthans (2004) further divided psychological capital into four dimensions: self-efficacy, opti-

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mism, hope, and resilience [16]. Existing studies have shown that an individual's level of psychological capital is influenced by social support from family members, leaders, colleagues, and friends. Those who receive more subjective and objective support from these sources tend to have higher levels of psychological capital compared to those who receive less support [17]. Additionally, Zhen Yueqiao (2021) [18] and Zhang Wenlong (2020) [19] have both found a significant positive correlation between social support and psychological capital.

As an important personal resource, psychological capital plays a crucial role in building good interpersonal relationships and effectively motivating employees. It helps employees maintain a positive mental state at work, which further enhances their work engagement. Luthans and Sweetman (2010) argued that the role of psychological capital lies in replenishing work resources lost while striving to meet work standards, thus boosting employees' work engagement [20]. A large body of empirical research indicates a significant correlation between psychological capital and work engagement, or that psychological capital can significantly and positively predict employees' work engagement. For example, studies by Xie Ying and Mao Jinping (2013) and Lu Xiang (2014) revealed a significant positive linear relationship between work engagement and psychological capital among primary and secondary school teachers [21][22]. Moreover, Yang Muxian's research on kindergarten teachers in S City found that teachers' psychological capital significantly influenced their work engagement [23]. Therefore, the higher a teacher's level of psychological capital, the more engaged they tend to be in their work. Based on this, the present study proposes the hypothesis H2: **Psychological capital mediates the relationship between social support and work engagement among kindergarten teachers.**

The concept of occupational identity originated from social identity theory. It refers to an individual's relatively stable attitude toward a specific profession, encompassing the perception of one's professional role and responsibilities. This includes the attitudes, beliefs, and standards associated with the profession (Skorikov & Vondracek, 1998) [24]. In terms of defining teacher occupational identity, domestic scholars view it as the overall perception and attitude toward the teaching profession that teachers form throughout their careers. It manifests in the degree of enjoyment, engagement, and the positive attitude and desire to sustain the teaching profession [25]. Occupational identity, as a positive evaluation of one's work, is a psychological manifestation shaped by both external and internal factors. Several studies have concluded that the level of social support is a key variable when examining the external influences on psychological well-being [26]. Social support serves as an external guarantee for enhancing teachers' occupational identity [27], with individuals who have stronger social support systems generally demonstrating better overall quality and greater work engagement [28]. A supportive work environment contributes to improved teacher health, job satisfaction, and occupational identity while reducing burnout [29][30]. Both psychological and professional support from colleagues, as well as practical support from organizations and leadership, significantly influence teachers' occupational identity [31]. Thus, social support is a key factor influencing teachers' occupational identity.

As frontline workers in early childhood education, kindergarten teachers not only receive psychological support from family members, children, and parents but also benefit from tangible assistance provided by educational authorities and school leaders. These multiple forms of support can significantly impact teachers' occupational identity [32]. In research on the relationship between occupational identity and work engagement, multiple studies have shown that occupational identity is an effective predictor of work engagement [33]

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[34][35]. Furthermore, from the perspective of Organismic Integration Theory, occupational identity reflects the extent to which kindergarten teachers internalize work norms, achieve person-job fit, and satisfy relational needs. This suggests that, on one hand, occupational identity creates conditions for enhancing teachers' work engagement, fostering more proactive engagement. On the other hand, it also motivates kindergarten teachers to consciously increase the time and energy they dedicate to their work [36]. Based on these insights, this study proposes the hypothesis H3: **Occupational identity mediates the relationship between social support and work engagement among kindergarten teachers.**

The three research hypotheses outlined above form the framework for this study (as shown in Figure 1). Through an investigation into the mechanisms by which social support, psychological capital, and occupational identity influence work engagement, the study aims to systematically explore the underlying factors driving kindergarten teachers' work engagement. This research seeks to expand the theoretical paradigm for studying the factors influencing work engagement among kindergarten teachers and provide a new perspective on strategies to enhance their work engagement.

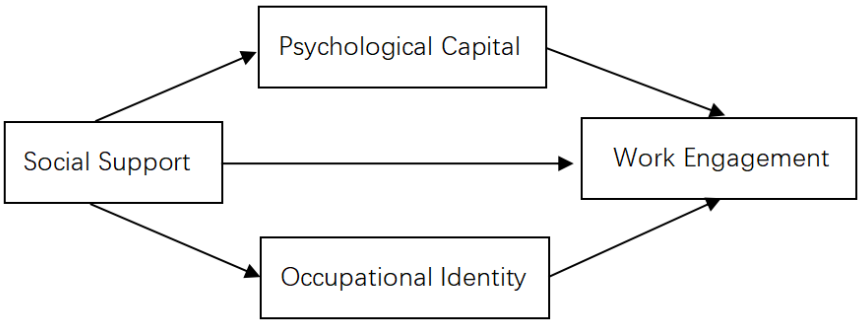


Figure 1: Research Framework

2. Research Design

2.1 Study Participants

A total of 986 questionnaires were collected by commissioning the educational administrative departments across various cities in Tibet to distribute paper questionnaires and send electronic questionnaires through WeChat. After eliminating invalid responses, the final sample for the study consisted of 846 valid respondents.

2.2 Research Instruments

2.2.1 Social Support Rating Scale

The Chinese version of the Social Support Rating Scale (SSRS) developed by Xiao Shuiyuan was used as a research tool. The predictive efficacy of the Social Support Scale is widely recognized and has been adopted by several domestic researchers such as Cheng Xiulan, Li Zhihua, and Yao Ruosong. The scale consists of 10 items across three dimensions: objective support (items 1-3), subjective support (items 4-7), and the utilization of support (items 8-10). Utilizing a Likert 4-point scoring method, the total score is the sum of all 10

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items, with higher scores indicating greater perceived social support.

2.2.2 Psychological Capital Questionnaire

The Psychological Capital Questionnaire developed by Luthans, translated and revised by Li Chaoping (2008), was used, encompassing four dimensions: self-efficacy, hope, optimism, and resilience. Index terms were appropriately modified to make them suitable for use among teachers. Scoring also used the Likert 4-point scale, with annotations indicating a proximity to the psychological capital level. The subscales are comprised of self-efficacy (items 1-6), optimism (items 6-12), resilience (items 13-18), and hope (items 19-24). The Cronbach's Alpha coefficient for the psychological capital scale in this test was 0.96, with internal consistency coefficients for each dimension ranging from 0.853 to 0.902.

2.2.3 Occupational Identity Scale

The Teacher Occupational Identity Scale developed by Wei Shuhua was used, which includes four dimensions across 18 items: role value (items 1-6), professional behavior tendency (items 7-11), professional values (items 12-15), and sense of professional belonging (items 16-18). Again, using the Likert 4-point scoring method, the total score is the sum of all 18 items, with higher scores indicating a higher level of individual occupational identity. The Cronbach's Alpha coefficient for this scale was 0.952, with internal consistency coefficients ranging from 0.725 to 0.917.

2.2.4 Kindergarten Teachers' Work Engagement Scale

The study utilized an adapted version of the Utrecht Work Engagement Scale (UWES-17), originally developed by Schaufeli and the Utrecht research team, as the research instrument. Items 1-6 represent the "Vigor" dimension, items 7-11 represent the "Dedication" dimension, and items 12-17 correspond to the "Absorption" dimension. Chinese scholars, including Zhang Yiwen, have tested the Chinese version of the UWES, and confirmatory factor analysis (CFA) results demonstrated the validity of the three-dimensional model of the UWES. For this study, slight adaptations were made: the target respondents were changed to kindergarten teachers, and the work-related content was modified to align with kindergarten educational activities (e.g., two items such as, "When working at a kindergarten, I feel highly motivated"). The Likert 4-point scale was employed, with the total score derived from the sum of all 17 items. Higher scores indicate greater work engagement. The reliability test results showed that the Cronbach's Alpha coefficient for the work engagement scale was 0.956, with internal consistency coefficients for each dimension ranging from 0.846 to 0.910. Additionally, the Cronbach's Alpha coefficient for the social support scale was 0.663. The fit indices for the four-dimensional model of the work engagement scale were as follows: 2/df = 2.58, RMSEA = 0.079, CFI = 0.941, TFI = 0.923, and SRMR = 0.037, all of which fall within acceptable ranges, indicating good model fit.

2.3 Data Processing

The data in this study were analyzed primarily through SPSS 26 statistical software, which included reliability analysis (Cronbach's Alpha), descriptive analysis, correlation analysis, difference analysis, and regression analysis. Confirmatory factor analysis was conducted using Mplus 8.3.

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2.4 Common Method Bias Test

As this study relies on questionnaires for data collection, with the same raters providing responses, potential common method variance (CMV) could seriously confound the results and lead to misleading conclusions. Therefore, a test for common method bias was necessary. After data compilation, Harman's single-factor test was conducted. The results showed that eight factors with eigenvalues greater than 1 were identified before rotation, with the first factor explaining 28.88% of the variance, which does not meet the 40% threshold. Therefore, common method bias does not pose a significant threat to the validity of the study's findings.

3. Research Results

3.1 Current State of Work Engagement Among Kindergarten Teachers

In this study, the score for each dimension of the work engagement scale represents the mean of the items within that dimension, while the overall score for work engagement is the mean of all items on the scale. Higher scores indicate higher levels of work engagement. Using one-sample T-tests with the test value set at 2.5 (the theoretical mean), positive t-values that reach significance indicate that the dimension scores are significantly higher than the theoretical mean. Conversely, negative t-values that reach significance indicate that the dimension scores are significantly lower than the theoretical mean.

Table 2: Work input of kindergarten teachers in the sample(*N=342*)

Work Engagement	M±SD	T (test Value=2.5)	Min	Max	quartiles		
					25%	50%	75%
Energy	3.09±0.56	30.82***	1.33	4.00	2.83	3.00	3.50
Dedication	3.00±0.54	37.47***	1.00	4.00	2.49	3.00	3.60
Focus	3.30±0.54	29.89***	1.17	4.00	2.83	3.00	3.33
Score	3.12±0.51	34.80***	1.71	4.00	2.82	3.00	3.47

Note: *P＜0.05，**P＜0.01，***P＜0.001

From Table 2, it is evident that the overall mean score for work engagement among kindergarten teachers is 3.12±0.51, which is slightly above the median critical value of 2.5. For the three dimensions of work engagement, scores are also marginally above the median critical value of 2.5. The results of the one-sample T-tests show that the work engagement and its dimensions are all significantly higher than the theoretical mean of 2.5. The mean scores for the dimensions are absorption (3.30±0.54), vigor (3.09±0.56), and dedication (3.00±0.54). Looking at the distribution of work engagement scores across dimensions among the kindergarten teachers in the sample, over 75% score above the median critical value in vigor and absorption, while nearly 25% score below the median critical value in dedication. In terms of the self-rated mean scores for each dimension of work engagement, the highest scores were for absorption, followed by vigor, and the lowest scores were for dedication. Therefore, it can be observed that, within this sample, kindergarten teachers' overall work engagement is moderately high. These teachers predominantly demonstrate energy and focus in their work, although their level of dedication appears somewhat lacking. This suggests considerable room for improvement in the

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future.

3.2 Status and Variance Analysis of Social Support, Occupational Identity, and Work Engagement Among Kindergarten Teachers

3.2.1 Variance Analysis of Social Support, Occupational Identity, and Work Engagement Among Kindergarten Teachers by Gender

This study conducted independent sample T-tests to examine the differences in social support, occupational identity, psychological capital, and work engagement among kindergarten teachers of different genders. As shown in Table 3, there are significant gender differences in work engagement (P<0.05), and marginal significant differences in psychological capital (P<0.1), but no significant differences were observed in perceptions of social support and occupational identity (P>0.05). Male teachers scored significantly higher than female teachers in both psychological capital (P<0.1) and work engagement (P<0.05).

Table 3: Analysis of differences in various variables among kindergarten teachers of different genders(*M*±*SD*)

	Social Support	Occupational Identity	Psychological Capital	Work Engagement
Male（72）	39.56±8.35	3.25±0.492	3.17±0.398	3.21±0.389
Female（774）	40.99±8.76	3.30±0.565	3.07±0.480	3.07±0.480
t	-1.39	-0.77	1.75^{+}	2.11*

3.2.2 Variance Analysis of Social Support, Professional Identity, and Work Engagement Among Kindergarten Teachers of Different Ethnicities

The study applied independent sample T-tests to investigate the differences in social support, occupational identity, psychological capital, and work engagement among kindergarten teachers from different ethnic backgrounds. According to Table 3, significant differences were found between teachers of different ethnicities in terms of social support, psychological capital, and work engagement (P<0.01), with no significant differences in the perception of social support and occupational identity (P>0.05). Kindergarten teachers from minority ethnic groups scored significantly higher than those from the Han ethnic group in social support, psychological capital, and work engagement (P<0.01).

Table 4: Analysis of social support, Occupational identity, work engagement and differences among kindergarten teachers of different ethnic groups(*M*±*SD*)

	Social Support	Occupational Identity	Psychological Capital	Work Engagement
minority（651）	41.84±8.57	3.29±0.47	3.10±0.48	3.17±0.49
Han nationality（195）	37.61±8.49	3.32±0.48	3.00±0.46	2.92±0.57
t	6.10***	-0.71	2.44*	5.54***

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3.2.3 Variance Analysis of Social Support, Occupational Identity, and Work Engagement Among Kindergarten Teachers by Mode of Entry

This study utilized one-way Analysis of Variance (ANOVA) and Least Significant Difference (LSD) post-hoc tests to explore the differences in social support, occupational identity, psychological capital, and work engagement among kindergarten teachers according to their mode of entry. Table 4 indicates significant differences in social support, psychological capital, and work engagement among teachers from different modes of entry, with marginal significance noted in occupational identity. In terms of social support, teachers who transitioned to kindergarten positions from other posts demonstrated significantly higher levels compared to those who entered through public recruitment exams for government positions and direct applications (including talent introduction) ($P<0.001$). Teachers assigned to kindergartens upon graduation exhibited significantly higher social support than those entering through direct application (including talent introduction), with no significant differences observed between teachers in county and village kindergartens ($P>0.05$), or between those who entered through public recruitment exams and direct assignment after graduation. Regarding psychological capital, teachers who entered through public recruitment exams, graduation assignments, and transitions from primary and secondary school teaching positions showed significantly higher levels than those entering through direct application (including talent introduction) ($P<0.01$), with no significant differences among the former groups ($P>0.05$). In terms of work engagement, teachers who entered through public recruitment exams, graduation assignments, and transitions from primary and secondary school teaching scored significantly higher than those entering through direct application (including talent introduction) ($P<0.01$) ($P<0.001$). Additionally, teachers entering through transitions from other teaching posts exhibited significantly higher work engagement than those entering through public recruitment exams.

Table 7: Variance Analysis of Social Support, Occupational Identity, and Work Engagement Among Kindergarten Teachers by Mode of Entry

	Social Support	Occupational Identity	Psychological Capital	Work Engagement
Public recruitment examination	40.51±8.79	3.26±0.58	3.10±0.45	3.09±0.51
Graduation Assignment	41.85±8.81	3.33±0.62	3.06±0.47	3.17±0.51
Transfer	43.25±8.01	3.4±0.53	3.11±0.57	3.28±0.52
Application (including talent introduction)	38.85±8.64	3.29±0.41	2.93±0.43	2.94±0.45
F	6.16***	2.19+	4.72**	10.16***
post hoc test (LSD)	3>1;2,3>4	1<3	1,2,3>4	3>1; 1,2>4

3.2.4 Variance Analysis of Social Support, Professional Identity, and Work Engagement Among Kindergarten Teachers Based on Institutional Type

This study used independent sample T-tests to assess the differences in social support, occupational identity,

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psychological capital, and work engagement among kindergarten teachers based on the nature of the institution. As indicated in Table 8, there are significant differences in occupational identity among teachers from different institutional types (P<0.01), but no significant differences were found in social support, psychological capital, or work engagement (P>0.05). Teachers from public kindergartens showed significantly higher occupational identity than those from private kindergartens (P<0.01).

Table 8: Variance Analysis of Social Support, Occupational Identity, and Work Engagement Among Kindergarten Teachers by Institutional Type (M±SD)

	Social Support	Occupational Identity	Psychological Capital	Work Engagement
Public kindergarten (720)	40.91±8.93	3.32±0.544	3.08±0.487	3.12±0.506
Private kindergarten (126)	40.62±7.57	3.15±0.621	3.02±0.390	3.05±0.532
t	0.385	2.85**	1.34	1.40

3.4 Correlation Analysis of Social Support, Occupational Identity, Psychological Capital, and Work Engagement Among Kindergarten Teachers

In this study, Pearson correlation coefficients were computed to examine the relationships between the total scores of social support, occupational identity, psychological capital, and work engagement. The correlation matrix presented in Table 9 illustrates these relationships. The results reveal significant positive correlations between each pair of variables (P<0.01). Specifically, the correlation between psychological capital and work engagement was the highest, followed by the correlation between occupational identity and psychological capital.

Table 9: Descriptive Results and Correlation Matrix for Social Support, Occupational Identity, Psychological Capital, and Work Engagement

	M±SD	1	2	3	4
Social Support	40.86±8.73	1			
Professional Identity	59.29±10.06	0.216**	1		
Psychological Capital	73.80±11.39	0.302**	0.585**	1	
Work Engagement	49.67±8.19	0.403**	0.449**	0.630**	1

3.5 The Mediating Role of Occupational Identity and Psychological Capital Between Social Support and Work Engagement Among Kindergarten Teachers

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The study employed the bias-corrected percentile Bootstrap method for testing mediation effects, as recommended by Wen Zhonglin and Ye Baojuan (2014) [37]. The relationship between kindergarten teachers' perceived social support, occupational identity, psychological capital, and work engagement was examined using SPSS Process 3.5 macro, Model 4. A total of 5,000 samples were randomly resampled from the original data using a repeated random replacement method. These samples were used to fit the model and generate 5,000 estimates of the mediation effect, creating an approximate distribution. The average mediation path was calculated, and the effect values were ranked by magnitude. The 2.5th and 97.5th percentiles were used to estimate the 95% confidence interval for the mediation effect. If the 95% confidence interval for the path coefficients did not include 0, it indicated a significant mediation effect [38]. The results (see Table 19) revealed that perceived social support significantly and positively predicted work engagement ($\beta = 0.22, t = 8.26, p < 0.001$). Overall, social support significantly predicted work engagement ($\beta = 0.38, t = 12.39, p < 0.001$). Social support also directly and positively predicted psychological capital ($\beta = 0.30, t = 9.13, p < 0.001$) and occupational identity ($\beta = 0.20, t = 5.96, p < 0.001$). Furthermore, psychological capital significantly predicted work engagement ($\beta = 0.48, t = 14.91, p < 0.001$), and occupational identity significantly predicted work engagement ($\beta = 0.11, t = 3.68, p < 0.001$).

Table 11: Mediation Model of Social Perception and Work Engagement Among Kindergarten Teachers (N=342)

Variables	Psychological Capital		Occupational Identity		Work Engagement	
	β	t	β	t	β	t
Control Variables						
Gender	-0.05	-1.68+	0.04	1.05	-0.06	-2.31*
Tenure at Current Kindergarten	0.19	4.11***	0.04	0.92	0.16	4.24***
Independent Variables						
Social Support	0.30	9.13***	0.20	5.96***	0.22	8.26***
Psychological Capital					0.48	14.91***
Professional Identity					0.11	3.68***
R^2	0.141		0.070		0.479	
F	27.5***		12.55***		109.88	

The percentile bootstrap method with bias correction for testing mediation indicates that the 95% confidence intervals for the mediation paths do not include zero, signifying that the mediation effects in the model are significant. This suggests that the roles of occupational identity and psychological capital are significantly partial mediators in the relationship between kindergarten teachers' perceived social support and their work engagement. Mediation effects account for 44.7% of the total effect, meaning that on the one hand, perceived social support directly predicts work engagement, and on the other hand, it predicts work engagement indirectly through occupational identity and psychological capital.

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Table 12: Direct Effects, Indirect Effects, and Total Effects (Standardized) of the Hypothetical Model

Effect	Path	Coefficient	95%Confidence Interval		Proportion of Total Effect
			Lower	Upper	
Total Effect（c）	Social Support → Work Engagement	0.38	0.30	0.42	—
Direct Effect (c')	Social Support → Work Engagement	0.21	0.05	0.26	55.3%
Indirect Effect(a*b)	Social Support → Psychological Capital → Work Engagement	0.14	0.11	0.18	36.8%
	Social Support → Occupational Identity → Work Engagement	0.03	0.01	0.04	7.9%

4. Discussion and Recommendations

4.1 Discussion

4.1.1 Overall Work Engagement Among Kindergarten Teachers

The findings of this study indicate that the work engagement among kindergarten teachers is above average. This aligns with conclusions drawn by Fan Mingli and Liu Jia[39], reflecting the positive effects of the national emphasis on preschool education development in recent years. When examining the dimensions of work engagement, absorption scored the highest, followed by vigor, and dedication scored the lowest. This suggests that kindergarten teachers in the Xizang region are serious and energetic about their work but lack in the willingness to sacrifice their own time for the education and routine tasks of kindergartens. The majority of the sample, 85.1%, are from public kindergartens, highlighting the substantial educational resources and special care policies provided by the state to Xizang in the spread of preschool education.

4.1.2 Variations in Social Support, Professional Identity, Psychological Capital, and Work Engagement Among Kindergarten Teachers Based on Demographic Characteristics

This study discovered significant differences in psychological capital and work engagement between male and female teachers. This could be due to gender differences in work style, the burden of work and family, and the psychological resilience faced in completing tasks. Women, who balance family duties with professional responsibilities, may consume more psychological energy, resulting in lower psychological capital among male teachers[40][41]. Work engagement differences can be attributed to the distinct social roles and divisions of labor between genders, with female teachers often taking on more specific family duties, which consumes part of their work energy. In contrast, male teachers, focusing on providing for the family, may invest more in their work for greater income and social status[42][43].

The study also found that minority ethnic group teachers scored significantly higher than Han Chinese teachers in social support, psychological capital, and work engagement. One reason for this could be cultural differences that influence how teachers experience work-related stress and perceive the need for social support. Han teachers, especially those who come from outside the region, may experience a lack of social support due to separation from family, which contributes to lower perceived social support and consequently

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lower psychological capital. In terms of work engagement, minority ethnic teachers, who are the dominant workforce in kindergartens in Tibet, tend to have more enthusiasm and dedication to their work, which leads to higher work engagement. Since these teachers are from the local region, they are better suited to and adapted for frontline educational work, further enhancing their engagement.

The study also found that teachers who entered kindergartens through a graduate distribution program reported significantly higher social support and work engagement compared to those who entered via job applications (including recruitment). This could be explained by the fact that, based on available data, since 2006, associate degree graduates and since 2007, bachelor's degree graduates have no longer been assigned to kindergartens in Area A [44]. Teachers who entered through this distribution program have at least 13 years of teaching experience. Generally, teachers with over 10 years of professional experience are considered mature, having accumulated rich, individualized teaching experience and knowledge.[45] They are more likely to be respected by parents, which leads to higher levels of psychological capital. They also have extensive interpersonal networks and are more proactive in seeking support when facing difficulties[46], thus increasing their sense of social support. Additionally, this study found that teachers entering kindergartens through public recruitment exams or graduate distribution programs have significantly higher psychological capital than those who applied (including those recruited externally). One possible reason is that applicants to kindergartens, whether recruited from outside the region or hired by private kindergartens, may face higher professional expectations, leading to psychological gaps and frustration when these expectations are not met. Moreover, separation from family may further reduce their psychological capital. Teachers working in private kindergartens may face pressure from performance evaluations and the working environment, leading to higher work demands and lower psychological capital scores.

The study also found that teachers in public kindergartens have significantly higher professional identity than those in private kindergartens. This could be due to differences in benefits, working conditions, school culture, and faculty development between public and private kindergartens. In particular, the government's recent efforts to develop inclusive kindergartens have resulted in better facilities and salaries in public kindergartens compared to private ones. As a result, teachers in public kindergartens tend to exhibit stronger professional identity.

4.1.3 The Role of Professional Identity and Psychological Capital Between Social Support Perception and Work Engagement

(1) The Positive Predictive Role of Social Support Perception on Work Engagement

This study found that the sense of social support among kindergarten teachers significantly and positively predicts their work engagement, thus confirming Hypothesis H2. This result is largely consistent with the findings of Guo Liping et al. (2020) [47]. It suggests that enhancing kindergarten teachers' sense of social support is one of the key ways to increase their work engagement. One possible explanation for this is rooted in social exchange theory. According to this theory, when individuals receive material and emotional support from social organizations, they feel a sense of satisfaction. In return, based on the principle of reciprocity, individuals are more likely to engage in behaviors that contribute to the organization, without overly focusing on personal gains or losses, which in turn increases their work engagement [48]. Furthermore, strong social

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support helps to expand the work resources available to kindergarten teachers. This not only facilitates their professional development but also heightens their awareness of work demands, ultimately leading to a greater level of work engagement [49]. When kindergarten teachers receive significant social support from various sources—such as leaders, colleagues, and family members—they are likely to feel more confident and hopeful. This boosts their sense of self-worth and self-efficacy, prompting them to exhibit more voluntary behaviors. They become less focused on personal gain or loss and are more inclined to leverage their potential to complete organizational tasks. Ultimately, they are more willing to invest additional time and effort into their work in early childhood education.

(2) The Mediating Role of Occupational Identity Between Social Support Perception and Work Engagement

This study found that professional identity partially mediates the relationship between social support and work engagement. The mediating effect accounts for 7.9% of the total effect, indicating that social support directly predicts kindergarten teachers' work engagement, while also influencing it indirectly through professional identity. This result confirms Hypothesis H3. The primary reason for this could be as follows: First, in educational activities, leadership support for teachers is mainly reflected in training opportunities, promotions, and rewards related to professional titles. Colleague support typically manifests in sharing teaching resources and opportunities for professional advancement, while student support is reflected in classroom feedback and learning outcomes. Parental support is often expressed through cooperation with teachers to facilitate the teaching process. All these forms of support positively affect teachers' emotions, prompting them to take their work more seriously and boosting their sense of self-worth. As teachers experience more support, they are more likely to recognize the value of their work and invest greater effort and practical engagement, ultimately enhancing their professional identity. Social support theory helps explain this phenomenon, suggesting that individuals with greater social support are better able to maintain their professional identity, as external support provides psychological security [50]. Second, teachers tend to believe that professional identity is tied to their passion for the profession, and this passion nurtures a strong sense of professional identity. As a result, teachers exhibit higher levels of enthusiasm, energy, and a willingness to exert effort in their work, which contributes to their work engagement in terms of vitality [51]. The higher the teachers' professional identity, the more seriously they approach their work, often reaching a state of deep immersion, and consequently, they tend to invest at higher levels. From a sociological perspective, this phenomenon occurs because kindergarten teachers view their profession as meaningful and valuable, motivating them to dedicate more focus and energy to their work [52].

(3) The Mediating Role of Psychological Capital Between Social Support Perception and Work Engagement

The mediation effect test results indicate that psychological capital partially mediates the relationship between social support and work engagement, with the mediation effect accounting for 36.8% of the total effect. This finding is consistent with the research conclusions of Cheng Xiulan (2019) and colleagues [53]. Specifically, social support directly positively predicts the vitality aspect of kindergarten teachers' work engagement, while it also predicts work engagement through psychological capital. Thus, Hypothesis H4 is confirmed.

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The primary reason for this could be explained by the Job Demand-Resources Model theory, which suggests that social support promotes individual growth and development, serving as a tool to achieve work goals. As a job resource, it has intrinsic motivational potential, fostering high levels of work engagement among employees [54]. High levels of social support create a relaxed and harmonious work environment for kindergarten teachers. When teachers receive ample support from their supervisors and colleagues, they feel more energized, mentally refreshed, and motivated to dedicate themselves to their work without easily experiencing fatigue. They become more focused on their tasks and are more willing to contribute their abilities to the organization's development.According to Maslow's Hierarchy of Needs, individuals seek higher-level needs once lower-level needs are satisfied. Social support helps fulfill kindergarten teachers' needs for belonging and love (the third level) as well as their need for respect (the fourth level). Meanwhile, the optimism, resilience, hope, and self-efficacy aspects of psychological capital correspond to the fifth level of self-actualization. Therefore, individuals with higher levels of social support tend to have higher levels of psychological capital, which in turn leads to greater work engagement. In conclusion, social support for kindergarten teachers influences their work engagement through psychological capital.

4.2 Recommendations

4.2.1 Enhancing the Mechanism of Social Support for Kindergarten Teachers

Social support is one of the key avenues for enhancing work engagement among kindergarten teachers. To better improve the sense of social support for kindergarten teachers, we can focus on the following three strategies. First, we can establish professional development communities for kindergarten teachers, fostering a collaborative and supportive work atmosphere. By creating a social support network between colleagues and leaders, teachers can access more channels of social support and subjectively feel greater support in their work. Second, it is important to strengthen post-service training for teachers, providing support for their professional development. This will help enhance their professional capabilities and self-efficacy, allowing them to better recognize and appreciate the social support they receive. Third, kindergarten teachers should actively expand their social networks. When facing difficulties in work or life, they should seek support and help from friends and family, thereby increasing their sense of social support and ultimately improving their work engagement.

4.2.2 Creating an Organizational Environment that Fosters Psychological Capital Among Kindergarten Teachers

A positive organizational environment is a critical condition for cultivating the psychological capital of kindergarten teachers. Therefore, kindergarten administrators should focus on creating a supportive organizational atmosphere that fosters cooperation and mutual assistance, enhancing teachers' sense of professional well-being. This will enable teachers to carry out their duties in a harmonious, collaborative, and win-win environment. Additionally, relevant authorities should regularly organize training sessions or seminars focused on the mental health of kindergarten teachers. These initiatives would help teachers develop psychological regulation skills, allowing them to maintain qualities such as optimism, resilience, hope, and high self-efficacy, as well as a positive and optimistic life attitude. In turn, this will encourage teachers to actively engage in the various tasks within the kindergarten setting.

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4.2.3 Enhancing Kindergarten Teachers' Professional Identity

Professional identity is one of the key factors influencing the work engagement of kindergarten teachers. There are three main approaches to enhancing the professional identity of kindergarten teachers: At the individual level, it is important to cultivate a correct professional value system, clearly understanding one's responsibilities, mission, and unique value as a kindergarten teacher. Teachers should embrace values of dedication and education and put them into practice. At the organizational level, kindergartens should provide adequate humanistic care for teachers, emphasize post-service learning, and support teachers' professional growth and development. This will help teachers feel the care and warmth of the organization, thereby strengthening their sense of professional belonging and self-worth. At the societal level, we should recognize the important role of kindergarten teachers as the initiators of lifelong education and early childhood education. This involves leading the transformation of traditional views on preschool education and challenging the notion of kindergarten teachers as mere caretakers. By doing so, we can enhance the professional identity of kindergarten teachers.

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