

Research on the Impact and Countermeasures of the Three Child Policy on the Career Planning of Nurses who Have Given Birth to One Child

Qian Lv¹, Na Zhang², Ziyi Li³, Shali Wu^{4,*}, Yifang Zhu^{5,*}

¹Hunan Normal University, Changsha, 410081, China

²Tangdu Hospital, Air Force Military Medical University, Xi'an 710038, China

³Shaanxi University of Chinese Medicine, 712046, China

⁴The First Hospital Affiliated with Hunan Normal University (Hunan Provincial People's Hospital, Changsha, 410005, China)

⁵Tangdu Hospital, Air Force Military Medical University, Xi'an 710038, China

* Corresponding author: Shali Wu (Email: wsl787@163.com), Yifang Zhu (Email: wjtm1981@163.com)

Abstract: To understand the current status of nursing career planning and explore the influencing factors of the three child policy on the career planning of nurses who have given birth to one child, in order to provide a basis for the management of nursing human resources. Method: Cluster sampling was used to select 515 clinical nurses from a tertiary hospital in Xi'an from August 2021 to September 2022 as the research subjects. A general information questionnaire and a career status evaluation scale were used for the questionnaire survey. The result of the nurse career status evaluation scale was (81.84 ± 15.16) points. There were differences in scores for education level, hospital attributes, job position, nursing years, per capita annual income of the family, whether they had given birth, age of the first child, working time during pregnancy, and planned years of continuing nursing work after giving birth to three children (all $P < 0.05$). The age of the first child and the planned duration of nursing work after giving birth to a third child are the main influencing factors for the career planning of nurses. Conclusion: The three child policy has had a significant impact on the career status of nurses and the allocation of nursing human resources. It is recommended that nursing managers take targeted intervention measures to promote the development of nursing teams.

Keywords: Three child policy; Career planning for nurses; Influencing factors; human resources.

1. Object and Method

1.1. Object

Using convenience sampling method, 515 nurses from a tertiary hospital in Xi'an from August 2021 to September 2022 were selected for a questionnaire survey. 515 questionnaires were successfully distributed and 515 were collected, with a 100% effective response rate.

Inclusion criteria: ① Registered nurses; ② Married; ③ Has already given birth to one child; ④ Voluntarily participate in this survey.

Exclusion criteria: ① Internship, regular training, and further training nurses; ② Nurses who are unwilling to participate in the survey; ③ Suffering from serious physical and mental illnesses.

1.2. Research Tools

1.2.1. General Information Survey Form

This includes department, professional title, education level, gender, age, position, nursing years, per capita annual income of the family, marital status, type of family living together, age of the first child, willingness to have a second child, willingness to have a third child, working hours during pregnancy, night shifts during pregnancy, and planned nursing years.

1.2.2. Career Status Evaluation Scale

Developed by Tong Tian et al.^[1] in the enterprise and widely used by Lin Shangping et al.^[2] among nursing staff, the internal consistency coefficient of the scale is good, with a retest reliability of 0.82 and validity of 0.83, which can be

used to evaluate the career status of nurses. This scale consists of 23 items and four dimensions: occupational identity, occupational satisfaction, organizational commitment, and turnover intention. This scale adopts the Likert five point scoring method, where "1 represents disagreement, 2 represents comparative disagreement; 3 represents uncertainty, 4 represents comparative agreement, and 5 represents agreement". The four items are reverse scored, with a total score of 23-115 points. The higher the score, the more comprehensive and planned the career planning.

1.3. Research Methods

1.3.1. Questionnaire survey method

After obtaining the consent of the survey hospital, an electronic questionnaire was distributed using QuestionStar in the research contact group of our hospital, explaining the purpose of this study. With the help of the nursing department staff, a unified guidance language was used to fill out the questionnaire. After 24 hours, the questionnaire was completed and collected. All questionnaires were voluntarily filled out by nurses anonymously. After the questionnaire collection was completed, the researchers personally checked and screened, and a total of 515 valid questionnaires were collected.

1.4. Statistical analysis methods

Statistical analysis was conducted using SPSS 22.0. Quantitative data are described using mean \pm standard deviation, sample mean comparison is conducted using t-test and analysis of variance, and multivariate stepwise regression analysis is used for multivariate analysis.

Table 1. Comparison of Career Status of Nurses with Different Demographic Characteristics (N=515)

project	group	Example count	Composition ratio (%)	Career status score	F/t value	P
Department	internal medicine	155	30.1%	80.57 ± 15.88	1.588	0.125
	surgery	117	22.72%	80.68 ± 15.14		
	Obstetrics and Gynecology	8	2.14%	81.36 ± 17.39		
	Pediatrics	31	6.02%	86.23 ± 10.79		
	ICU	39	7.57%	80.15 ± 15.69		
	operating room	32	6.21%	79.28 ± 14.27		
	Emergency department	29	5.63%	82.28 ± 16.22		
	outpatient service	15	2.91%	90.13 ± 11.46		
	other	86	16.7%	84.33 ± 15.16		
Professional title	nurse	83	16.12%	78.76 ± 15.83	8.066	<0.001
	Nurse	366	71.07%	81.38 ± 15.24		
	Supervisor Nurse	66	12.82%	88.29 ± 11.93		
	Deputy Chief Nurse or above	0	0%			
educational background	junior college	117	22.72%	82.62 ± 15.85	0.242	0.785
	undergraduate course	392	76.12%	81.64 ± 15.00		
	Graduate or above	6	1.17%	79.83 ± 13.47		
Gender	male	6	1.17%	76.33 ± 21.70	-0.895	0.371
	female	509	98.83%	81.91 ± 15.09		
Age (years)	20-25	30	5.83%	79.33 ± 17.37	5.667	<0.001
	26-30	185	35.92%	79.40 ± 15.21		
	31-35	213	41.36%	81.69 ± 15.82		
	36-40	76	14.76%	87.78 ± 12.46		
	41-45	11	2.14%	91.64 ± 8.31		
position	nurse	496	96.31%	81.46 ± 15.18	-1.404	0.161
	Nurse head	19	3.69%	91.84 ± 10.87		
	<2	10	1.94%	88.11 ± 14.30		
	2-5	111	21.55%	76.23 ± 16.49		
	6-10	219	42.52%	80.91 ± 15.22		
	11-20	171	33.20%	86.04 ± 12.91		
Nursing age	> 21	4	0.78%	94.50 ± 5.26	7.089	<0.001
	<3	118	22.91%	79.51 ± 15.83		
	3-5	60	11.65%	78.17 ± 14.61		
	5-7	160	31.07%	79.84 ± 14.76		
	7-10	69	13.40%	83.00 ± 16.32		
marital status	≥ 10	108	20.97%	88.67 ± 12.35	1.181	0.308
	unmarried	59	11.46%	79.25 ± 16.31		
	married	449	87.18%	82.12 ± 14.97		
	other	7	1.36%	85.86 ± 17.33		
Category of family members living together	spouse	81	15.73%	79.25 ± 16.31	5.371	<0.001
	Couples and Children	130	25.24%	82.12 ± 14.97		
	Couples and Parents	35	6.8%	85.86 ± 17.33		
	Husband and wife, children, and parents	269	52.23%	81.84 ± 15.16		
Have you given birth	yes	398	77.28%	82.85 ± 14.66	2.804	0.005
	no	117	22.72%	78.41 ± 16.35		
Age of first child (years)	<1	140	27.18%	77.63 ± 16.28	6.487	<0.001
	1-3	44	8.54%	78.80 ± 16.01		
	3-6	135	26.21%	81.92 ± 14.59		
	6-12	68	13.20%	86.96 ± 12.27		
	≥ 13	128	24.85%	84.70 ± 14.30		
Working hours during pregnancy	Full rest	30	5.83%	75.80 ± 22.44	2.717	0.044
	Rest for the first three months	43	8.35%	81.60 ± 14.28		
	Half day working day	46	8.93%	78.65 ± 16.13		
	Persist in working normally	396	76.89%	82.70 ± 14.36		
Night shift during pregnancy	Not working night shifts throughout pregnancy	161	31.26%	79.73 ± 16.58	1.688	0.173
	According to national regulations	159	30.87%	82.97 ± 14.32		
	Not up in the first three months	21	4.08%	84.62 ± 14.92		
	Based on Kori's manpower situation	174	33.79%	82.44 ± 14.46		
Plan to continue nursing work after giving birth to three children	1 year or less	63	12.23%	73.08 ± 16.10	15.330	<0.001
	2-3 years	47	9.13%	71.21 ± 12.48		
	4-6 years	49	9.51%	79.57 ± 13.35		
	7-10 years	22	4.27%	85.59 ± 13.71		
	11 years or longer	121	23.5%	87.65 ± 13.38		
	Not planning to have a third child	213	41.36%	83.62 ± 14.64		

2. Results

2.1. Comparison of Career Status of Nurses with Different Demographic Characteristics

The age range of 515 nurses participating in this study was between 23 and 44 years old, with an average age of (31.61 ± 3.97) years. They worked for (9.33 ± 4.69) years and had an average annual income of (6.37 ± 571) yuan per capita. Among them, 77.28% of nurses had given birth, 58.64% of nurses were willing to have a second child, and 10.29% of nurses were willing to have a third child. The univariate analysis of nurse career status based on different demographic characteristics shows that there are differences (all $P < 0.05$) in the scores of nurse career status, including professional title, age, nursing years, per capita annual income of the family, type of family living together, whether they have given birth, age of the first child, working time during pregnancy, and planned length of nursing work. However, there are differences (all $P < 0.05$) in the scores of nurse career status, such as department, education level, gender, position, and marital status. There was no statistically significant difference in the career status scores of night shift nurses during pregnancy ($P > 0.05$), as shown in Table 1.

2.2. Overall status of nursing professional career and scores in various dimensions

The total score of the career status evaluation of 515 nurses surveyed in this survey is (81.84 ± 15.16), which is generally at a moderate level. The scores of each dimension are ranked in descending order: career, organizational commitment, career attitude, and career satisfaction. Among them, the willingness to stay has the highest score and the occupational satisfaction score rate is the lowest, as shown in Table 2.

2.3. Results of multiple linear regression analysis on the influencing factors of the three child policy on the professional career status of nurses

Using the career status score of nurses as the dependent variable and statistically significant demographic characteristics of nurses as the independent variable, introducing level $\alpha = 0.05$, excluding levels $\alpha = 0.10$, an equation was introduced for multiple regression analysis, and the research results showed that the age of the first child and the planned time of continuing nursing work after giving birth to the third child were the most important influencing factors on the career status of nurses. The results are detailed in Table 3.

Table 2. Overall and Dimension Scores of the Nurse Professional Career Evaluation Scale (N=515)

dimension	Number of entries	Total score	Score range	Result of percentage conversion	sort
Professional attitude	8	28.84 ± 6.40	5-40	72.1	3
Career satisfaction	5	15.81 ± 4.72	5-25	63.24	4
organizational commitment	9	32.60 ± 6.538	5-45	72.44	2
Resignation intention	1	4.59 ± 0.86	1-5	91.8	1
Career total score	23	81.84 ± 15.16	23-115	71.16	/

Table 3. Multiple stepwise regression analysis of influencing factors on the professional career status of nurses

constant	regression coefficient	Standard error	Standardized regression coefficients	T-value	P
constant	66.235	1.966		33.686	<0.001
First Birth Age	1.760	0.411	0.178	4.285	<0.001
Plan to continue nursing work after giving birth to three children	2.390	0.348	0.286	6.873	<0.001

3. Discussion

3.1. Analysis of the Current Situation of Nurse Career Planning

The results of this study showed that the career status score of 515 nurses was (81.84 ± 15.16), which is at a moderate level, which is basically consistent with the research results of Cai Yuanyuan [3] on the career planning of 293 ICU nurses. This may be related to the late start and slow implementation of career courses in China, which has resulted in nurses having a low awareness of their own career planning. The score rate of occupational satisfaction dimension is the lowest, which is basically the same as the research results of Shang Linping et al. [2]. Among them, income, occupational reputation, and promotion have the lowest scores. A study [4]

shows that nurses after the three child policy have lower educational qualifications, further education, and promotion willingness compared to before the three child policy. The score rate of the retention intention dimension is the highest, which is basically consistent with the survey results of Tang Tingwei [5], that is, assuming that the organization will do its best to meet the needs of nurses, the longer the nurses continue to work, it is considered to be related to the nurses' desire to achieve self-worth through work. In a survey of 521 nurses in Henan Province, Wang Junmin et al. found that 80.99% of nurses had a willingness to resign, and some studies [7] showed that a sense of organizational fairness and support had an impact on the willingness of nurses to resign. This indicates that nursing managers should establish a fair and supportive organizational environment to strengthen the stability of the nursing team.

3.2. Analysis of the influencing factors of the three child policy on the career planning status of nurses

3.2.1. Emphasize the professional development of nurses who have given birth to their first child

The results of this study indicate that the age of the first child is the main influencing factor on the career status of nurses. The survey results show that the age of the first child is less than 1 year old, and the career status of nurses is (77.63 ± 16.28) points. The older the age, the better the career status. Considering that the 4-year period from birth to kindergarten for nurses to conceive the next generation will have a significant impact on their career, at this stage, due to physiological characteristics, nurses bear the primary responsibility of taking care of children; When the first child is between the ages of 3 and 6, nurses, as mothers, also hope to provide their children with more companionship. As a result, many opportunities to promote career development, such as promotion, scientific research, and studying abroad, are delayed or even abandoned. This is consistent with Tang Tingwei's [5] research on the career planning status of nurses, which suggests that cohabiting children are the main influencing factor of work family conflicts. Studies [8-9] have shown that nurses aged 33 to 40, as the backbone of nursing work, have a more urgent desire to have a third child due to having given birth to their first child and having the confidence to handle conflicts between work and family. After giving birth, many women choose to learn prenatal education and parenting related knowledge, but are unwilling or unable to allocate a certain amount of time to learn and update their professional knowledge. Therefore, it is crucial to attach importance to the professional development of nurses who have given birth to their first child.

3.2.2. Provide career planning education in advance for nurses who have given birth to three children

Career planning can promote nurses to form positive professional values, thereby influencing their beliefs and attitudes towards the nursing profession, and is conducive to cultivating nursing professionals in all aspects. This study shows that the length of time a nurse plans to continue nursing work after giving birth to a third child is the main influencing factor on their career status. The longer a nurse plans to continue nursing work after giving birth to a third child, the higher their career planning score. Among the 302 nurses who gave birth to three children in this study, 63 planned to continue working for "one year or less"; 47 plan to continue working for 2-3 years; 49 plan to continue working for 4-6 years; 22 plan to continue working for 7-10 years; 121 individuals plan to continue working for 11 years or longer, but there is currently relatively little research on this topic in China. It may be related to the heavy workload and high pressure of nurses, low job satisfaction, and a desire to spend more time cultivating children. Nurses during the pregnancy of their third child are not only prone to physical fatigue, but also prone to negative emotions such as irritability and depression. The involvement of their husbands has a positive impact on the psychological health of pregnant women [11-12]. In addition, a considerable number of professional women aspire to work in stable jobs after giving birth, and even directly withdraw from the workplace, so as not to worry about unexpected difficulties and competition [13]. Therefore, nursing managers should strengthen career planning education for nurses who give birth to three children, and take

multiple effective measures to minimize the impact of the three child policy on nursing human resources.

3.3. Suggestions

Improve nurse job satisfaction, enhance the quality of nursing work, and alleviate the impact of the three child policy on the career of nurses. Nursing managers should fully mobilize the work enthusiasm of nurses who have given birth to their first child and are younger in age, and guide them to have a clear understanding of their career development goals based on their different abilities; Regularly encourage them to join various development channels such as specialized nurses, scientific research, teaching, invention patents, etc., to minimize their development resistance and failure frequency as much as possible; Establish a reasonable incentive system and appropriately improve departmental welfare.

The head nurse should be informed in advance of the nurse's plans to continue working in nursing after giving birth to a third child, and coordinate the smooth delivery of multiple nurses in a planned manner. Experts can be invited to offer career planning training courses in advance to increase the nurse's work enthusiasm, reduce their negative emotions, and prevent talent loss; During the period of giving birth to the third child, Kori may apply to the nursing department in advance for mobile nurses to help the nurses who plan to give birth to the third child successfully complete the production and continue to return to work. Nurses should regulate their emotions by communicating with their superiors and family members, striving to gain their husband's understanding, strengthening their career planning, and clearly positioning themselves in pursuit of their own values. They should face the difficulties under the three child policy with firm beliefs.

4. Summary

The career status of nurses under the three child policy is at a moderate level. Nurses themselves and nursing managers should promote mutual communication, take positive measures, and provide timely feedback on current development issues, in order to jointly improve the career status of nurses, promote personal and organizational development, and enhance the quality of clinical nursing work.

References

- [1] Li Yueru. Research on the Dilemma and Countermeasures of Women's Rights Protection under the Three Child Policy [J]. Heilongjiang Human Resources and Social Security, 2022 (07): 22-24.
- [2] Ji Penghui, Wang Yuhong, Dong Wei, Sun Panpan, Zhang Junxi, Jiang Lifang, Chai Jian. Research on the willingness and influencing factors of women of childbearing age to have a third child in some areas of Henan Province [J]. Chinese Journal of Reproductive Health, 2022, 33 (02): 109-113.
- [3] Tong Tian. Career Development and Planning [M] Beijing: Knowledge Publishing Du, 2006:5-6.
- [4] Shang Linping, Xu Jiajia. A survey and analysis of the career status and influencing factors of 339 nursing staff in Taiyuan City [J]. Chinese Journal of Nursing, 2010, 45 (8): 736-738.
- [5] Cai Yuanyuan, Li Le, Li Qianqian. A survey on the current status of career planning among 293 ICU nurses [J]. Chinese Nursing Management, 2016, 16 (1): 68-71.

- [6] Feng Xiaoling, Chen Junyi, Ge Yun. Analysis of the current situation and countermeasures of nursing career planning for family planning with three children [J]Modern Clinical Nursing, 2017,16 (07): 62-66.
- [7] Tang Tingwei A study on the current situation of work family conflict among clinical nurses and its impact on their career status [D]Nanchang University, 2015.
- [8] Wang Junmin, Ma Xuxu Analysis of Resignation Intention and Related Influencing Factors of in-service Nurses in Henan Province [J]Jiangsu Preventive Medicine, 2018,29 (01): 98-100.
- [9] Li Zhaoyang, Zhou Weijiao, Liu Congying, Zhang Jie, Gu Shui, Shang Shaomei, Wan Qiaoqin A study on the turnover intention of nurses in tertiary hospitals in Beijing and its relationship with organizational environment Journal of Nursing, 2018,33 (01): 46-49.
- [10] Chen Aixia, Zeng Jing, Zhang Yuping, Ma Hongli The impact of the three child policy on nursing human resources in a tertiary hospital Journal of Traditional Chinese Medicine Management, 2017,25 (23): 86-89.
- [11] Zhang Hui Analysis of New Career Challenges for Women under the Comprehensive Two Child Policy [J]. Labor Security World, 2016 (23): 28-29.
- [12] Duan Haiying Research progress on curriculum design for nurse career planning [J]General Nursing, 2016,14 (25): 2611-2614.
- [13] Ding Guilan, Zhai Ronghui, Wu Xia A qualitative study on the management experience of head nurses under the three child policy [J]Journal of Nursing, 2017,32 (13): 61-63.
- [14] Giurgescu C, Templin T N. Father Involvement and Psychological Well being of Pregnant Women [J] MCN Am J Matern Child Nurs, 2015,40 (6): 381-387.
- [15] Su Jinjin, Li Jie The impact and countermeasures of childbirth on the career development of professional women [J]China Human Resources Development, 2015 (05): 60-65.