

Family-Work Conflict and Successful Aging at Work of Employees in Manufacturing Enterprises in North China

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Purpose: Successful aging at work is a new idea for enterprises to develop and utilize older employees under the background of population aging. However, there is a lack of research on the effect of family-work conflict on successful aging at work. This study explored how family-work conflict affective successful aging at work through the mediating roles of occupational future time perspective and the moderating role of flexible work arrangements perception.

Methods: In study 1 (scenario-based experiment, N=107) recruited full-time employees working through the Credamo platform as experimental subjects, tested the causal relationship between family-work conflict and successful aging at work. In study 2 (questionnaire survey, N=349), questionnaires were distributed to large manufacturing enterprises in North China, and a two-wave time-lagged survey design was used to test the full model.

Results: The results show that family-work conflict has a negative impact on successful aging at work; occupational future time perspective plays a mediating role in the relationship between family-work conflict and successful aging at work; flexible work arrangements perception moderated the mediating path via occupational future time perspective, and the indirect effect of occupational future time perspective decreased when flexible work arrangements perception increased.

Discussion: This study enriches the research on the relationship between family-work conflict and successful aging at work in theory, and has important guiding significance for enterprises to build an inclusive and aging human resource management system in practice.

Keywords: family-work conflict, successful aging at work, occupational future time perspective, flexible work arrangements perception

Introduction

Population aging is an important issue in the 21st century. At present, the developed countries and some developing countries in the world have successively completed the transformation of population reproduction types from high birth rate and high mortality to low birth rate and low mortality.¹ The improvement of medical level leads to the continuous extension of the average life expectancy of the population and the continuous decline of the fertility rate, which makes the aging of the world's population continue to deepen, and the proportion of elderly workers in the working population continues to expand.² Compared with developed countries, China has entered the aging stage late, but in recent years, the aging of the labor force has entered the fast lane, and 56.2% of enterprises have shown an aging trend of employees, of which 19.6% of enterprises have an obvious aging trend of employees.³ In the face of the future development trend of youth labor shortage and labor aging, how to retain, develop and manage the elderly human resources has become an important issue in theory and practice.¹ In recent years, the concept of successful aging at work (SAW) has opened up a new research perspective and has attracted the attention of the academic community.⁴ SAW is broadly understood as that older employees can still show good work results in the process of getting older. Exploring the influencing factors and implementation mechanism of SAW is of great practical significance for fully developing the human resources of the elderly and promoting the sustainable development of enterprises.⁵

The existing research mainly discusses the antecedents of SAW from the field of work (such as emotional labor, perceived organizational support, training and learning, etc.).^{5,6} Scholars such as Cheung found that older employees who take deep behavior in emotional labor are more likely to achieve SAW, because deep behavior helps older employees better adapt to work tasks and generate positive work experience. In addition, care and recognition from the organization can help older employees achieve SAW by meeting the emotional needs of older employees, promoting their career growth and meeting their interpersonal needs, while more training and learning opportunities help older employees optimize their work ability and improve work adaptability, thus showing good work results, etc.⁴ However, few studies have explored the impact of areas other than work on SAW. For older employees, in addition to the work area, they are also affected by the family area. Especially in the Chinese context, affected by the “family culture”, older employees play more family roles than younger employees.⁷ They face a more complex family environment and are known as “sandwiched” work caregivers.⁸ Multiple family roles cost older employees a lot of time and energy, so that his normal performance of his job responsibilities will also be affected, increasing the rate of absenteeism and early retirement intention,⁹ and even forcing older employees to make career-damaging decisions.¹⁰ Therefore, family-work conflict (FWC) can better reflect the realistic dilemma of SAW in the Chinese context. It is more urgent to explore the influence mechanism of FWC on SAW of older employees and provide corresponding improvement suggestions.

Cubrich and other scholars believe that the process and degree of older employees’ occupational future time perspective (OFTP) have an important predictive effect on SAW,¹¹ and FWC may affect the OFTP.¹² In view of this, this study introduces the OFTP in order to explain the process more clearly. In other words, when older employees think they can put more time and energy into their work, they will improve themselves and show higher work ability, that is, to achieve SAW. In addition, the aging human resource management system may also affect the realization of SAW, because the role of situational factors will strengthen or weaken the individual’s behavioral differences.¹³ If flexible work is provided for older employees, the development of corresponding work plans according to individual needs may alleviate the adverse effects of FWC and promote older employees to have a broader OFTP. Of course, in order to avoid the uncertainty and difference of the effect of the flexible work arrangements by the organization on individuals, only when employees realize the flexible work arrangements, the f arrangements will play its due role.¹⁴ Therefore, this study chooses flexible work arrangements perception (FWAP) as the boundary condition to explore the marginal effect of FWC on SAW. Based on the above, we construct the following conceptual model, as shown in Figure 1.

Socioemotional Selection Theory

The theory of socioemotional selection theory is a theory based on social motivation throughout the life cycle.¹⁵ Traditional gerontology theories such as activity theory and detachment theory mainly explain the difference between “disease” and “normal” aging but cannot explain the difference between “general” and “successful” aging.¹⁶ At the same time, these theories are rarely applied to organizational behavior research, socioemotional selection theory is more widely used in organizational behavior research, which plays an important role in understanding the successful aging of older employees.¹¹ In essence, SAW reflects whether older employees can effectively overcome the related losses caused by age growth (such

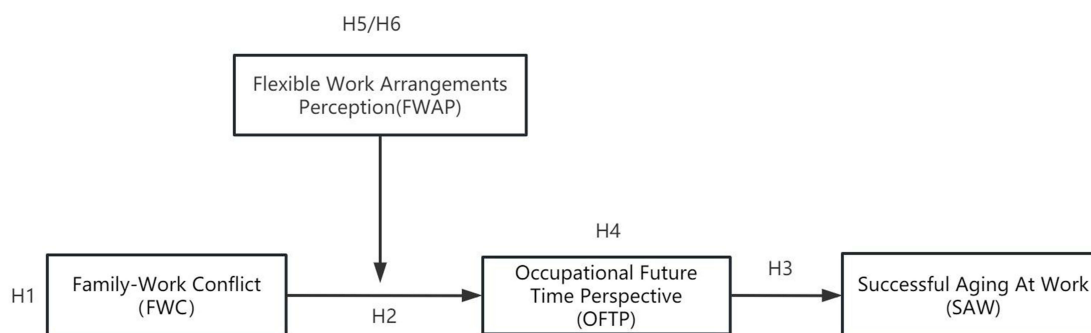


Figure 1 Conceptual model.

as poor adaptability, weakened memory, etc.). The socioemotional selection theory provides such a standard, that is, under what circumstances older employees can effectively overcome related losses.¹⁷ This theory assumes that older employees' perception of the remaining time of their careers leads to changes in two major categories of goals: knowledge acquisition goals and emotional goals. When the time horizon is considered open, the highest-priority goals at the goal level for older employees tend to focus on long-term knowledge acquisition (eg, acquiring new knowledge and skills to improve resilience). When the time frame is considered to be limited, the highest priority goal in the goal hierarchy of older employees is often the recent emotional goal (eg, the acquisition of family emotions).¹¹ When older employees perceive that the remaining time of their careers is still open, it is possible to achieve SAW. Therefore, this study also uses the socioemotional selection theory as the theoretical basis for exploring the impact mechanism of SAW.

Hypothesis

FWC and SAW

The successful aging is derived from gerontology, which means that in the process of aging, the functions of the elderly show no decline or only little decline. Traditional research only divides the elderly into two categories: disease and normal, but ignores the large differences in normal elderly. Therefore, in 1987, Rowe and Kahn proposed to further divide the normal aging into two categories: usual aging and successful aging.¹⁸ Since then, more and more scholars began to engage in the study of successful aging. Abraham and other scholars have extended this concept to organizations, that is, SAW, opening up a new analytical perspective for the aging of labor in organizations.¹⁹ Scholars have expounded the connotation of SAW from different perspectives.^{20,21} For example, from the perspective of maintenance, the connotation of SAW is reflected in the ability to successfully maintain their own health level, maintain high work motivation and high adaptability.²² From a comparative perspective, the connotation of SAW is reflected in the fact that compared with other older employees of the same age group, they can show a higher level of work.²³ However, due to the difficulty of measurement from a comparative perspective, empirical research often uses a maintenance perspective. In view of this, this study defines SAW as that older employees can still successfully maintain their own health level, maintain higher work motivation and higher adaptability.

FWC refers to the role conflict that occurs when there are incompatible needs in both the family domain and the work domain, that is, the individual's participation in the work role becomes more difficult due to the participation of the family role.²⁴ Studies have found that FWC can trigger individual psychological and physiological overload and overload feeling, and then produce a series of negative effects.²⁵ The interference of family roles will cause individuals to have anti-work attitudes and withdrawal behaviors, reduce employees' work enthusiasm and work participation, and increase the turnover rate.²⁵ Compared with young employees, older employees are expected to assume more family roles, which is particularly evident in China with a strong family concept.²⁶ Compared with young employees, high FWC has a more significant impact on the work field of older employees, because family roles have higher subjective priorities for older employees.^{27,28} Because according to the theory of socioemotional selection theory, as they grow older, older employees will shrink their social networks and pay more attention to their important people (such as family members). Compared with young employees, older employees have more emotionally connected social networks, give higher priority to their family needs, and pay less attention to the field of work. Therefore, we believe that FWC is not only negatively correlated with SAW, but also has a causal relationship. This paper proposes the following hypothesis:

H1: FWC is negatively related to the SAW of older employees.

Mediating Role of OFTP

OFTP is the embodiment of future time perspective in the organization. It is another core concept of socioemotional selection theory. It reflects the individual's view on the rest of his future career.²⁹

FWC may have an impact on the OFTP of older employees, because the commitment of family roles will occupy the individual's working time and energy.³⁰ Especially in the Chinese context, in order to maintain the stability of family roles, older employees with multiple roles have to devote more energy and time to solving family problems and assuming family responsibilities. On the one hand, with the arrival of future retirement time, they will have a more negative view

of their career. Think that the remaining time of their own career less,³¹ on the other hand, in order to meet the needs of family roles, they will consider placing part of family affairs at work time to complete, further squeezing out work time. As this situation occurs many times and even becomes the norm, the future time perspective of the profession also decreases. Therefore, put forward the hypothesis:

H2:FWC is negatively related to the OFTP.

Further, according to the theory of socioemotional selection theory, the individual's view of the future will affect the individual's behavior. The openness and limitation of the future will prompt the individual to choose to continue to improve themselves or choose other value pursuits.³² Older employees with high OFTP believe that their occupation future is open, and they can gain more time and opportunities in their future careers, which helps older employees to think positively about their future careers and make it easier to achieve SAW.³³ On the contrary, older employees with low OFTP think that the remaining time of their career is limited, and the motivation to further learn new knowledge and skills will not be willing to continue to invest time and energy to make up for the loss caused by the decline in ability, resulting in weakened work maintenance ability and hindering the realization of SAW.

H3:OFTP is positively related to the SAW of older employees.

Therefore, combined with the previous discussion, we believe that OFTP plays a mediating role in the relationship between FWC and SAW. Therefore, the following hypothesis is proposed:

H4:OFTP mediates the relationship between FWC and SAW of older employees.

Moderating Role of FWAP

The perception of flexible work refers to the individual's perception of flexible working hours and workplaces, which is reflected in the flexibility of the workplace and the flexibility of the workplace. Its flexible work arrangement provides individuals with the leverage to effectively manage family roles and work roles, which is conducive to alleviating the negative impact of individual FWC.³⁴

According to the theory of socioemotional selection theory, the goal choice of older employees depends on their perception of the rest of their career. The commitment of family roles occupies the time and energy invested by older employees in their work, resulting in a decline in OFTP. Therefore, if the perception of older employees that their working hours can be extended, or can be used flexibly, it may help to alleviate the decline in OFTP due to FWC.²⁹ The degree of FWAP will allow older employees to think about the extent to which they can flexibly arrange their working hours and locations. This internalized perception process will effectively improve the psychological cognition of older employees. Therefore, when the FWAP is high, older employees will have a certain decision to complete the work task,^{35,36} The loss of time due to FWC and the decline in OFTP during this process are likely to slow down. On the contrary, when older employees perceive that they can arrange their working time and place flexibly to a lesser extent, this rigid way of working may further aggravate the reduction of OFTP caused by FWC. Therefore, the hypothesis is put forward:

H5:FWAP moderates the negatively relationship between FWC and OFTP, such relationship will be weaker when FWAP is high rather than when it is low.

Based on H4 and H5, we further propose a moderated mediation model. Specifically, OFTP mediates the effect of FWC on the SAW. And the size of the mediating effect depends on the level of job flexibility perception. In the context of higher FWAP, older employees can arrange their working hours and workplaces more freely,^{37,38} which largely alleviates the negative impact of FWC on OFTP, and contributes to the realization of SAW, thus promoting the realization of SAW of older employees. In the context of low FWAP, older employees are unable to flexibly arrange working hours

and workplaces, amplifying the negative impact of FWC on OFTP, which in turn affects the realization of SAW. Therefore, this paper proposes:

H6: FWAP moderates the indirect relationship between FWC and SAW via OFTP, such that the indirect relationship will be weaker when FWAP is high rather than when it is low.

Research Approach

This study tested the hypothesis through two empirical studies, one is scenario experiments and the other is field survey. In study 1, a situational experiment has been designed to examine the causal relationship between FWC and SAW, which is a method with high internal validity and can be used to test causal conclusions.³⁹ After that, in order to ensure the external validity of the research results, in study 2, a two-wave and time-lagged field study has been designed, this study examined the full conceptual model,⁴⁰ including the mediating role of OFTP and the mediating role of FWAP. The research results of different methods are combined to ensure the validity and generalization of the research results.

Study I Situational Experiment

Participants, Procedures, and Measures

The situational experiment was implemented through the online platform Credamo. In study 1, 107 participants with work experience were recruited online. Before the experiment, this study clearly pointed out to all participants that the experiment was conducted for academic purposes. All the information provided by the participants will be strictly confidential. Participants can voluntarily participate and get a small amount of compensation, and the study ensures the quality of the experiment by setting quality control questions. In this experiment, a two-scene design was used, and all participants were randomly assigned to one of two conditions: high versus low levels of FWC. Participants read one of the following situations as manipulation of different levels of FWC:

Scenario 1 (high-level FWC condition): Today is the working day, you plan to go to another city for business. However, this morning, you received a message from your child's teacher asking you to come to school immediately. Therefore, you have to delay the departure time.

Scenario 2 (low-level FWC condition): Today is the weekend, you plan to learn a new job skill as usual. However, you suddenly received a text message from your child's teacher to attend the parents' meeting. Therefore, you have to press the pause button to attend the parents' meeting.

Next, the participants answered the following scale questions and measured the relevant variables. Considering the participants' native language, this study employed translation-back translation procedure by Masuda⁴¹ to ensure the semantic equivalence of the questions. The FWC was measured by Carlson's scale⁴² and Likert seven-point scale scoring method, a total of six items, sample items such as "family responsibility time takes up my work time" ($\alpha = 0.914$). SAW was measured by a scale developed by scholar Taneva.⁴³ The Likert seven-point scale scoring method is used. The example items are as follows: "In the above cases, I can actively participate in organizational training and update my work skills" ($\alpha = 0.901$). In addition, participants were also asked to fill in demographic information (age, gender, education). After eliminating the samples that the quality control item test was not up to standard and incomplete, 98 subjects were finally obtained. The average age of the participants was 48.28 years old ($SD = 5.702$), including 57 males (58.16%) and 41 females (41.84%). 40.82% had HSSC and 42.86% had bachelor's degree.

Result

Through the independent sample *t* test, it is found that our manipulation test of FWC is established. Because the analysis results show that there is a significant difference between high-level of FWC ($M = 4.99$, $SD = 0.931$) and low-level of FWC ($M = 3.01$, $SD = 1.01$), $t(98) = 10.070$, $p < 0.001$, Cohen's $d = 2.036$. Therefore, the manipulation of FWC in this experiment is successful. Another independent sample *t*-test is an analysis and comparison of the realization of SAW in two situations. The results showed that SAW ($M = 4.29$, $SD = 0.84$) in high-level of FWC situations was significantly lower than SAW ($M = 5.76$, $SD = 0.82$) in low-level of FWC situations, $t(98) = 8.761$, $p < 0.001$, Cohen's $d = 1.770$, H1 was supported, which supported the causal relationship between FWC and SAW.

Study 2 Field Study

Research Sample and Data Collection

We choose a large manufacturing enterprise in North China, which is private and has a scale of more than 3000 people. The reason for choosing the enterprise is that the employees of the enterprise are seriously aging, and the average age of the workers in the enterprise is about 47 years old, which is targeted. In this study, the age node of older employees is selected as 45 years old and above, because the World Health Organization defines employees aged 45 years and above as “older worker”. In addition, the study found that the physical condition of employees over the age of 45 began to decline significantly, and employee behavior and performance will change from the age of 45.⁴⁴

We first contacted the company’s human resources manager to understand the purpose of our research and obtained their permission. We are committed to sharing our research results in exchange for non-interference in data collection. We announced an informed consent form, which stipulates that our survey is conducted for academic purposes, participants can participate voluntarily, and the responses to all participants will be strictly confidential before formal data collection. After this process, we put the paper questionnaire in an envelope and distribute it to each participant with a unique code. After completion, they were asked to put the questionnaire in an envelope and return it to our research team.

In order to minimize the impact of CMV, we used two time periods to collect questionnaires, selected T1 and T2 two time points, two data collection intervals of two months, a total of 400 questionnaires were distributed, and the two-stage questionnaire matching was carried out through the five-bit matching after the mobile phone tail number. In the two time periods, the T1 time period collects information on FWC, FWAP and control variables; the T2 time period collects information on variables related to OFTP and SAW. During the T1 period, 400 questionnaires were distributed and 363 valid questionnaires were recovered. During the T2 period, questionnaires were distributed to valid visitors during the T1 period, and a total of 357 valid questionnaires were recovered. After matching the mobile phone tail number, 349 valid questionnaires were finally collected.

In terms of demographics, the number of males was 205 (58.74%) and the number of females was 144 (41.26%); 72 (20.63%) were 45–50 years old, 195 (55.87%) were 51–55 years old, 69 (19.77%) were 56–60 years old, and 13 (3.72%) were 61 years old and above; the education level of most participants was concentrated on HSSC and below, with a total of 261 (74.79%); there were 46 ordinary employees (13.18%), 300 grassroots and middle managers (85.96%), and 3 senior managers (0.9%). From the working years of the participants, most of them are mainly concentrated in the 21–40 years, including 184 participants (52.72%) in the 21–30 years and 109 participants (31.23%) in the 31–40 years.

Measures

FWC

To measure FWC, the author adopts the scale of Carlson,⁴² which contains nine items. The items include “the time of family responsibility takes up my work time” and so on. Cronbach’s α was 0.926.

OFTP

To measure OFTP, the author adopts the scale of Zacher,⁴⁵ which contains six items. The items include “the time of family responsibility takes up my work time” and so on. Cronbach’s α was 0.920.

SAW

To measure SAW, the author adopts the scale of Taneva,⁴³ which contains 20 items. The items include “I will actively participate in organizational training, has updated my work skills” and so on. Cronbach’s α was 0.932.

FWAP

To measure FWAP, the author adopts the scale of Hornung,⁴⁶ which contains four items. The items include “I can use my own equipment to work at home or other places outside the office” and so on. Cronbach’s α was 0.951.

Control Variables

The author takes gender, age, education, working years and job level as control variables. The classification criteria were

(1 = male; 2 = female); age (1 = 46–50 years old, 2 = 51–55 years old, 3 = 56–60 years old, 4 = 61 years old and above); education background (1 = HSSC; 2 = Bachelor degree; 3 = master's degree; 4 = MS / Phil and PhD); experience (1 = 11–20 years, 2 = 21–30 years, 3 = 31–40 years, 4 = 41 years and above); positions (1 = ordinary employees, 2 = grassroots managers, 3 = middle managers, 4 = senior managers). In previous studies, these demographic variables are related to the behavior of older employees, so these variables are used as control variables. In order to more accurately study the influence mechanism of FWC on SAW.

Results

Common Method Variance

According to Richardson's suggestion,⁴⁷ we use the ULMC (Unmeasured Latent Method Construct) method to test common method biases. Firstly, the data items used are put on a common factor for model fitting. The fitting results are $\chi^2/df = 10.976$, CFI = 0.553, TLI = 0.521, RMSEA = 0.169, SRMR = 0.146, and the fitting situation is not ideal, indicating that the common method deviation is not serious. Then, before the common method factor is put into the four-factor model, the fitting results are $\chi^2/df = 2.722$, CFI = 0.924, TLI = 0.917, RMSEA = 0.070, SRMR = 0.041. After adding the common method factor to the four-factor model, the fitting results are $\chi^2/df = 2.659$, CFI = 0.929, TLI = 0.920, RMSEA = 0.069, SRMR = 0.043. It can be found that the fitting results have not been greatly improved, indicating that the common method bias of this study is not serious.

Confirmatory Factor Analysis

We use the maximum likelihood method to evaluate the discriminant validity of CFA model parameters. The test results are shown in Table 1. The results showed that $\chi^2 = 1165.047$, $df = 428$, $\chi^2/df = 2.722$, CFI = 0.924, TLI = 0.917, RMSEA = 0.070, SRMR = 0.041, indicating that the four-factor model had good validity.

Table 2 shows the correlation between variables. We can find that there is a significant negative correlation between FWC and OFTP ($r = -0.135$, $p < 0.01$), SAW ($r = -0.236$, $p < 0.01$), and the results preliminarily support the hypothesis.

Results for Direct and Indirect Effect

In Table 3, FWC was negatively correlated with SAW ($\beta = -0.225$, $p < 0.001$), and H1 was supported. FWC has a significant negative impact on OFTP ($\beta = -0.158$, $p < 0.001$), and H2 is supported; OFTP has a significant positive impact on SAW ($\beta = 0.295$, $p < 0.001$), and H3 is supported. In addition, the author tested the mediating effect by Monte Carlo method. By constructing a structural equation model, 1000 Bootstrapping samples were extracted to verify the mediating role of OFTP between FWC and SAW. The test results are shown the BC 95% CI $[-0.083, -0.015]$, and the confidence interval did not contain zero, indicating that the mediation effect exists, H4 is supported.

Table 1 Results of the Confirmatory Factor Analysis (N=349)

Model	χ^2	df	χ^2/df	CFI	TLI	RMSEA	SRMR
Four-factor model: FWC, OFTP, SAW, FWAP	1165.047	428	2.722	0.924	0.917	0.070	0.041
Three-factor model: FWC, OFTP, SAW+FWAP	2601.851	431	6.036	0.776	0.758	0.120	0.095
Two-factor model: FWC, OFTP+SAW+FWAP	3494.729	433	8.071	0.684	0.661	0.142	0.115
One-factor model: FWC+OFTP+SAW+FWAP	4763.779	434	10.976	0.553	0.521	0.169	0.146

Notes: χ^2 , normal-theory weighted least-squares Chi square; TLI, Tucker–Lewis fit index; CFI, the comparative fit index; RMSEA, the root-mean square error of approximation; SRMR, the standardized root-mean-square residual.

Abbreviations: FWC, family-work conflict; OFTP, occupational future time perspective; FWAP, flexible work arrangements perception; SAW, successful aging at work.

Table 2 Mean, SD, Correlations, and Reliability (N=349)

Variables	1	2	3	4	5	6	7	8	9
1. Gender	—								
2. Age	−0.067	—							
3. Education	0.034	0.012	—						
4. Experience	−0.013	0.033	0.029	—					
5. Positions	−0.048	−0.020	0.058	0.098	—				
6. FWC	0.030	0.005	0.013	0.014	−0.011	0.926			
7. OFTP	0.033	−0.049	−0.053	−0.110*	−0.041	−0.135**	0.920		
8. SAW	−0.044	−0.014	0.031	−0.059	−0.062	−0.236**	0.374**	0.932	
9. FWAP	0.009	0.022	0.012	0.019	0.005	0.134*	−0.152**	−0.209*	0.951
M.	1.413	2.065	1.889	2.178	2.287	2.063	2.114	2.223	4.091
S.D.	0.493	0.742	0.862	0.684	0.698	1.021	1.092	0.977	0.914

Notes: * $p < 0.05$, ** $p < 0.01$. The bold values indicated the Cronbach's alpha.

Abbreviations: FWC, family-work conflict; OFTP, occupational future time perspective; FWAP, flexible work arrangements perception; SAW, successful aging at work.

Table 3 Mediation Analysis Results (N=349)

Model paths	Estimate	SE	BC 95% CI	
			Lower	Upper
Direct effect				
FWC→OFTP	−0.158	0.0374	−0.176	−0.084
FWC→SAW	−0.167	0.0416	−0.202	−0.097
OFTP→SAW	0.295	0.0752	0.113	0.293
Total effect				
FWC→SAW	−0.225	0.0634	−0.195	−0.104
Indirect effect				
FWC→OFTP→SAW	−0.058	0.0121	−0.083	−0.015

Abbreviations: FWC, family-work conflict; OFTP, occupational future time perspective; SAW, successful aging at work.

Moderation Analysis

Hypothesis 5 predicts that the perception of FWAP has a moderating effect on the relationship between FWC and OFTP. The results (Table 4) showed that the interaction between FWAP and FWC was positively correlated with OFTP ($\beta = 0.183$, $p < 0.001$), indicating that FWAP had a positive moderating effect on the above relationship. Specifically, as shown in Figure 2, increasing the mean value of FWAP by one standard deviation represents high FWAP, and reducing

Table 4 Moderated Mediation Model Results (N=349)

Variable	FWAP (W)					
	FWC (X)		x		OFTP (Y)	
	β	SE	T	P	BC 95% CI	
					Lower	Upper
Constant	2.217	0.441	5.027	0.0000	1.752	2.238
FWC	−0.163	0.055	2.963	0.0017	−0.164	−0.067
FWAP	−0.149	0.054	2.759	0.0035	−0.108	−0.052
Interaction	0.183	0.059	3.101	0.0002	0.077	0.153

Abbreviations: FWC, family-work conflict; OFTP, occupational future time perspective; FWAP, flexible work arrangements perception.

one standard deviation represents low FWAP. It can be seen from Figure 2 that the negative impact of FWC on OFTP is weakened and H5 is supported by older employees with high elastic work perception.

Testing the Moderated Mediation Effects

Hypothesis 6 proposes that the FWAP weakens the mediating role of OFTP between FWC and SAW of older employees. Mplus8.0 software was used to conduct 5000 Bootstrap samplings to obtain the analysis results in Table 5. Under the premise of high level of FWAP, the indirect effect of FWC on SAW through OFTP is low. The point estimation value is -0.214 , and the 95% unbiased confidence interval is $[-0.219, -0.133]$, excluding zero, and the indirect effect is significant; under the premise of low level of FWAP, the indirect effect of FWC on SAW through OFTP is higher. The point estimation value is -0.297 , and the 95% unbiased confidence interval is $[-0.258, -0.174]$. It can be seen that the analysis result interval does not contain 0, and the indirect effect of the analysis is significant; in addition, the indirect effect of high and low levels of FWAP was significantly different, the effect value was 0.054 , BC95% CI was $[0.015, 0.102]$, and H6 was supported.

Discussion

Direct Effect of FWC on SAW

This study uses the method of situational experiment to verify the negative causal relationship between FWC and SAW, and the results support H1. The results are consistent with the predictions of Cheung et al.⁷ Previous studies have found that,^{4,6} there are differences in the realization of SAW under different cultural values, so it is necessary to explore the causes of SAW under specific cultural backgrounds. Compared with the literature on SAW in Western culture, there are fewer similar research results in Chinese culture.^{7,48} Influenced by Confucianism, family has special significance for Chinese employees. FWC is considered to be common among older employees in China, and it is the most significant and consistent factor affecting the behavior of older employees in China.⁴⁹ Obligations in the family field will make it difficult to comply with responsibilities at work, consuming the time and energy of older employees, thereby reducing the ability of older employees to work and adapt, and affecting the realization of SAW.⁵⁰ The results not only expand the literature that explores the antecedents of SAW in a specific cultural context, but also emphasize the perception of the harmful effects of FWC in the workplace, and enlighten other East Asian countries affected by Confucianism, such as Singapore and South Korea.

Mediating Role of OFTP

This study suggests that the OFTP is a potential mechanism for linking FWC and SAW. This finding supports H2, H3, and H4. Although previous studies have not tested this mediating relationship, the findings of this study can be supported

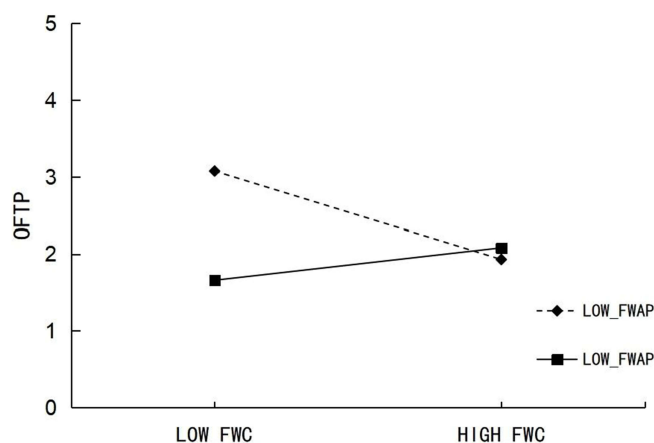


Figure 2 The moderating role of FWAP between FWC and OFTP.

Abbreviations: FWC, family-work conflict; OFTP, occupational future time perspective.

Table 5 Moderated Mediation Results

Moderator Variable	Estimate	SE	BC 95% CI	
			Lower	Upper
High FWAP (mean + 1 SD)	−0.214	0.035	−0.219	−0.133
Low FWAP (mean + 1 SD)	−0.297	0.037	−0.258	−0.174
High vs low	0.083	0.015	0.015	0.102

Note: N = 349.

Abbreviation: FWAP, flexible work arrangements perception.

by many previous studies. For example, Henry et al proposed the need to pay attention to the impact of FWC on OFTP,¹² Alcover et al found that,⁸ family Care-Work Interference affects the willingness of older employees to continue working or retire through the OFTP.^{51,52} Based on the socioemotional selection theory, the OFTP of older employees will affect the choice of future goals.¹¹ When the OFTP is higher, older employees are more motivated to work and set a long-term goal to acquire knowledge and create value,² the motivation and work goal enables them to achieve SAW. FWC reduces this motivation and goal setting, which in turn affects the achievement of SAW.⁵³ The results of this study not only echo the ideas of Henry et al¹² enrich the relevant research on career time perspective but also make up for the mechanism of FWC on SAW, which has important constructive significance.

Moderating Role of FWAP

The third purpose of this study is to examine FWAP as a moderator between FWC and OFTP. The results support H5 and H6. This study suggests that flexible work arrangements are particularly important contextual resources for older employees, because older employees have more family obligations, and older employees should be more in need of flexible work arrangements.³⁴ Consistent with the expected research,⁵⁴ the Socioemotional selection theory believes that the behavioral motivation of older employees changes with the change of resources. The flexible work system provides such resources and plays an important role in improving employee engagement and reducing turnover rate.⁵⁵ This study further expands the role of flexible working system, and finds that flexible working system is not only conducive to improving the engagement of older employees, but also helps to alleviate the negative impact of FWC. FWAP buffers the negative correlation between FWC and OFTP. Flexible work arrangements help to improve the behavior of older employees,⁵⁶ increase the willingness to stay in the organization,⁵⁷ the organization to adopt flexible work arrangements for older employees is more conducive to improving the OFTP. In addition, FWAP buffers the indirect impact of FWC on SAW through the OFTP, indicating that flexible work enables older employees to adapt to the workplace while supporting them to set new goals and achieve these goals. The research results further deepen the understanding of the effect of flexible work arrangements.⁵¹ Companies that meet the needs of these older employees through dedicated flexibility practices have an advantage in ensuring motivation, performance, and ability to work. The findings echo the call for the importance of providing supportive climate for older employees.⁵⁸

Implications

Pay attention to the problem of family work conflict. In view of the conclusion that FWC will have a negative impact on the successful aging of older employees at work, this suggests that business managers should pay full attention to the negative impact of FWC. Specifically, enterprises should regularly understand the family situation of older employees, listen to the opinions of the family members of older employees on the enterprise, and grasp the problems and needs faced by older employees, so that the family members of older employees can understand the care of the enterprise. In addition, regularly organize social activities to encourage family participation, such as parent-child outings, sports, etc., so that employees families can feel the care from the enterprise, and cultivate healthy and harmonious family work relationships.⁵⁹ In order to achieve the transformation of the family's work from opposition to support for older employees, the probability of family work conflicts is reduced from the source. In terms of management, we can also

learn from the suggestions of Hammer and other scholars.⁶⁰ Organizations can choose and train managers who can provide family support for employees, and provide targeted suggestions for alleviating FWC.

Improve the psychological cognition of older employees. In view of the conclusion that OFTP is an important intermediary mechanism to promote the successful aging of older employees, this suggests that enterprise managers should find ways to improve the OFTP of older employees. As an important psychological resource, the improvement of OFTP can be carried out from the following aspects: First, enterprises can hire external psychological counseling agencies to strengthen psychological counseling for older employees, help older employees find a balance between family roles and work roles, and alleviate the family pressure of older employees; secondly, it is necessary to provide practical family assistance programs and family counseling programs for older employees with young children. Finally, enterprises should also pay attention to the phenomenon of age discrimination in the organization, ensure that new and old employees are treated equally, have the same job opportunities and choice rights, release positive signals to older employees, encourage older employees to make a difference and set a learning example, promote older employees to be aggressive and achieve SAW.

Develop a flexible working arrangement. According to the conclusion that the FWAP is the boundary condition to alleviate the negative impact of FWC on OFTP, this suggests that enterprise managers can develop a flexible work arrangement system for older employees to help older employees reduce the negative impact of FWC. Older employees have rich knowledge and work experience. It is easy for them to complete their work tasks independently. Therefore, it is necessary to reduce the work constraints of older employees and provide older employees with flexible working hours and workplaces. At the same time, allowing older employees to leave the workplace without fixed time to punch cards and sit shifts is also an important manifestation of the company's construction of an aging work environment, which helps older employees have sufficient time and energy to deal with work and family affairs, and helps older employees achieve SAW.

Limitations and Future Research

This study adopts the combination of situational experiment and two-stage questionnaire survey to ensure the robustness of the research results as far as possible, but there are still some limitations. First of all, the data collection in Study 1 is mainly collected through third-party platforms. Although we have designed relevant quality control items, there are still some potential interference factors. Future research can adopt more rigorous research design to improve the accuracy of the experiment. Secondly, in the process of questionnaire collection, the samples of this study are from the same enterprise, so whether other industries and regions are also applicable to this conclusion still needs further discussion; thirdly, based on the theory of socioemotional selection theory, this study chooses OFTP as an intermediary mechanism to explain FWC. Although it is an important breakthrough in understanding the relationship between FWC and SAW, we believe that it is not enough to fully understand the potential mechanism of FWC and SAW. Future research can also provide more detailed insights into the potential mechanism from other theoretical perspectives or other intermediaries. Finally, longer-term longitudinal study designs are also needed in future studies, as the effects between variables may take more than 18 months to show different trajectories.⁵

Conclusions

To our knowledge, this is the first study to test the causal relationship between FWC and SAW. Consistent with our predictions, this study found that FWC has a negative causal relationship with SAW in a scenario experiment. In addition, through a field experiment, we revealed the mechanism of OFTP in the process of FWC and SAW, and found that FWAP can weaken the negative impact of FWC. Specifically, when older employees perceive higher flexible work, the negative impact of FWC on OFTP decreases, and the indirect impact of FWC on SAW decreases.

Data Sharing Statement

The original contributions presented in this study are included in the article material, further inquiries can be directed to the corresponding author.

Ethics Statement

The study was approved by the Human Research Ethics Committee of Zhongnan University of Economics and Law. All procedures performed in studies involving human participants were in accordance with the ethical standards and with the Helsinki Declaration and its later amendments or comparable ethical standards.

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Disclosure

The authors declare that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

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