

Original article

Intention to have no children and its relation to mental health: a case study of personality and coping traits of married couples, registering at Bangrak District Office

Pichaya Wattanavitukul^a, Chutima Roomruangwong^{b,*}

^aProgram in Mental Health, Department of Psychiatry, Faculty of Medicine, Chulalongkorn University, Bangkok, Thailand

^bDepartment of Psychiatry, Faculty of Medicine, Chulalongkorn University, Bangkok, Thailand

Background: Modern families tend to have fewer children, planning to have no children has seen more and more. There are pieces of evidence that many families planned to have no children even the family's economic status has improved.

Objectives: To examine the prevalence of intention to have no children among those who come to get marriage registration at Bangrak District Office, Bangkok Metropolis, and association between intention to have no children and personality and coping.

Methods: The cross-sectional descriptive study was conducted in males and females who come to get marriage registration at Bangrak District Office, Bangkok Metropolis. The data were collected by questionnaires including demographic data questionnaire, the Maudsley Personality Inventory (MPI), and Coping Questionnaire. The characteristics of the subjects were presented as frequency and percentage. Inferential statistics were analyzed by Chi-square, *t* - test, and logistic regression.

Results: There were 380 subjects (male 186, female 194) with a mean age of 33.14 ± 6.0 years. The prevalence of intention to have no children was found 13.7%. Personality-Scale E was found significantly associated with intention to have no children, in which the subjects with introverted personality tend to have higher intention to have no children than those with extraverted personality. Also, those with the intention to have no children have significantly lower in problem focus coping (dimension - seek to belong), while having significantly higher in avoidance coping, avoidance coping (dimension - keep to self), and avoidance coping (dimension - behavioral disengagement).

Conclusion: Personality and coping plays an important role in influencing individuals' intention to have or have no children.

Keywords: Intention to have no children, voluntary childlessness, personality, coping.

In the current social situation, the population structure of Thailand has changed markedly. Modern families tend to have fewer children, planning to have no children has seen more and more. The number of the elderly has been increasing while the birth-rate of children has been decreasing. Data from the National Office of Statistics showed that the number of births during 1963 - 1983 is higher than a million people in

1 year,⁽¹⁾ whereas the latest data in 2019, the number of births dropped to 618,193 people in 1 year.⁽²⁾ The child population (aged 0 – 14) tends to continually decline. From the 1980 data, the proportion of child population was 38.3% while in 2010, it decreased to only 19.2%. It is estimated that in the next 20 years (2040), the proportion of the child population will be only 16.0%.⁽³⁾ In recent years, many women aged 15 - 49 years have fewer children. In 1964, the average number of children per a woman was 6.3 people. But in 2014, the average number of children per a woman dropped to just 1.6 people. And it is expected that if the situation continues like this the average number of children per a woman will be only 1.3 people in 2040.⁽³⁾

*Correspondence to: Pichaya Wattanavitukul, Department of Psychiatry, Faculty of Medicine, Chulalongkorn University, Bangkok 10330, Thailand.

E-mail: rain.wattan@gmail.com

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Considering the birth-rate that has been decreasing steadily in rural and urban area, it is found in the urban society or those who live in Bangkok; whereas, the urban population has a lower birth-rate contrary to the economic status of the family which increases rapidly. From the data of 2010, the birth of the child population in Bangkok is the region with the lowest birth-rate of 9.5 per 1,000 population while the average income is 325,911 baht per person. Contrary to the population of children in the central province of the country, which has the highest birth-rate at 17.7 per 1,000 population while the average income is 25,728 baht per person. This situation reflects the fragile factor from having no children while the family's economic status has improved.⁽⁴⁾

From the study of the pattern and current situations of desire for children among 15,661 married women in Thailand, it is found that most married women do not want to have children in the future up to 81.2%. Therefore, only 18.8% of married women wish to have children in the future.⁽⁵⁾ It is found that in married women who do not want to have children, the important attitude is that they need an independent and simple life. There are also concerns about economic conditions that affect the care of children as well as negative influences of the societies affecting family building.⁽⁴⁾ Having no children therefore gives a positive result, helping to increase independence, reduce stress, and reduce accountability and financial concerns. But on the contrary, there are studies on the negative outcomes of having no children, found that those who have children are happier and feel more socially acceptable than those without children while having no children leads to feelings of failure and disappointment including feelings of loneliness, separation from society, deteriorated health and high risk of depression.⁽⁶⁻⁸⁾

In recent years, there have been many studies trying to understand the reasons for an increase in the number of people deciding to have no children, found to be a result of many common factors whether from internal factors such as attitudes towards having children that having a child is independent, have a desire to live life without worrying, today's society has many problems, fear of danger to children or misconduct and the fear that it is not able to teach children to be good people. There are also external factors such as further education, low income, unemployment problems, job security, having a difficult living condition, concerns about childcare costs, advertisement campaign for a variety of methods of

contraception, and nowadays, having no children are more accepted in society and tends to expand more and more as well.⁽⁹⁾

In Thailand, the demographic situation makes the relevant agencies and academics reflect the fact that young people who are ready but choose not to have children as a result of studying a lot, studying hard and taking a long time to study, high expense cost, hard work until having no time, waiting till be more ready, the distance between home and work is an obstacle resulting in having less time with family, lack of childcare because of work and have the burden of looking after elderly parents, etc. It can be seen that this problem is currently studied in demographic, economic, and social factors but there is still no research that studies this problem in psychological factors which will show more perspectives on mental health term, in order to further the research in medical science. There has never been a study of the personality and intention to have no children with this measurements before. Moreover, the significant positive result of having no children from literature reviews was help in increasing freedom and reducing stress. The researcher, then, choose to study relation with the coping strategies which is the processes of responding to thoughts and behaviors when faced with stress, problems or changes, to deal with those problems in a balanced way, both physically, mentally and socially. The objective of this study was to investigate the intention to have no children and association with personality and coping by studying in those who come to get marriage registration at the Bangrak District Office, Bangkok Metropolis, since it is the area with the highest marriage registration in Bangkok. The researchers foresaw that the study would help to understand factors that are more relevant in mental health.

Materials and methods

Sample collections

This study was a cross-sectional descriptive study. The sample was males and females aged 18 years and over who come to get marriage registration at Bangrak District Office, Bangkok Metropolis. Data was collected for 6 months. The subjects were selected from Thai Couples, both husband and wife, collecting data from only those willing to subjects in the research which may be both spouses or just whomever voluntarily. Sample size was calculated by Yamane's formula, " $n = N / (1 + Ne^2)$ ".

The results in the calculated sample size were 372 subjects. And to prevent errors that may occur from missing data, the researcher therefore increased the sample size to 380 people.

This study was approved by the Institutional Review Board (IRB), the Faculty of Medicine, Chulalongkorn University (COA no. 732/2019). All subjects were informed of the objectives and methods of this study and signed consent forms to participate in the study.

Measurements

Demographic data questionnaire: consists of gender, time of marriage, number of children, age, religion, living conditions, level of education, occupation, income, income adequacy, rating work secure, accommodation, parents' marital status, burden of elderly parents, intention to have children, and attitudes towards having children.

The maudslay personality inventory (MPI): is a standardized test created by Eysenck HJ. This measurements classify personality types into 4 traits as follows: 1) Introversion is the characteristics of being quiet and separating from others; 2) Extraversion is the characteristics of people who like to socialize, have many friends, want to have someone to talk with, like seeking excitement, and expresses emotions and feelings openly; 3) Stability is the characteristics of being able to control emotions well, not easily excited, and calm; 4) Neuroticism is a characteristics that emotion can change easily, frustrated, worried, unhappy feeling, anxious for everything that happens. This personality test is a self-rating scale consisting of 48 questions, used to assess 2 personality dimensions which is personality scale 1: behavioral (Scale E - extraversion), if scale E > 24 in total will have extraverted personality trait, if scale E ≤ 24 in total will have introverted personality trait and personality scale 2: emotional state (Scale N – neuroticism), if scale N > 24 will have a neurotic personality trait and of scale N ≤ 24 will have a stable personality trait. In which each scale is independent of one another, ranging from 0 - 48 points. From the scores, including 2 scale, are used to classify personality types into 4 categories according to the criteria of the MPI personality test as follows: 1) Extravert-Stable; 2) Extravert-Neurotic; 3) Introvert-Stable; and, 4) Introvert-Neurotic.

Coping questionnaire: was developed and improved the questions to suit the working-age subjects by Rodchanapornpun D.⁽¹⁰⁾ from the evaluation of Khotcharat S.⁽¹¹⁾ based on the theory of stress and the coping methods of Lazarus RS, *et al.*⁽¹²⁾ and coping strategies developed by Carver CS, *et al.*⁽¹³⁾ and used the method of analyzing psycho-dimensions structure of coping scale by Cook & Heppner, 1997 as a reference framework. This assessment was reported internal consistency with Cronbach's alpha coefficient was 0.89. The total of 54 questions consist of 3 main dimensions and the 17 sub-dimensions as follows:

1. Problem focused coping: has 8 dimensions which are; 1.1) Active coping and planning; 1.2) Work hard and achieve; 1.3) Suppression of competing activities; 1.4) Restraint coping; 1.5) Positive reinterpretation; 1.6) Acceptance; 1.7) Relaxation; and, 1.8) Seek to belong

2. Social support seeking coping: has 2 dimensions which are: 2.1) Seeking instrumental social support; and, 2.2) Seeking emotional social support.

3. Avoidance coping: has 7 dimensions which are; 3.1) Denial; 3.2) Behavioral disengagement; 3.3) Mental disengagement; 3.4) Keep to self; 3.5) Self blame; 3.6) Worry; and, 3.7) Focus on venting of emotion.

Statistical analysis

The data of this study were analyzed by using IBM SPSS Statistics version 22. The subjects' demographic data were presented by frequency and percentage mean ± standard deviation (SD). Inferential statistics were analyzed by Chi-square, *t* - test, and logistic regression. A *P*- value of less than 0.05 was considered statistically significant.

Results

Socio-demographic characteristics

The total subjects who gave their consents and completed questionnaires were 380. The mean age of the subjects was 33.14 (SD = 6.0), most are 30 - 39 years 61.7%. The subjects were 51.1% female and 48.9% male, most of them were first-time married 94.5% and have never had children before 82.4%. Most subjects had intention to have children 86.3%, only 13.7% have intention not to have children. The demographic data of the subjects in this study (Table 1).

Table 1. Participants' characteristics and study variables (n = 380).

Characteristics	N	%	Characteristics/variables	N	%
Age (year) (Mean = 33.1, SD = 6.0) (Min 20, Max 55)			Income (Mean = 54,814.16, SD = 82,334.42) (Min = 00.00, Max = 1,000,000)		
< 30 years	97	25.6	< 25,000 baht /month	104	28.2
30 – 39 years	234	61.7	25,000 - 50,000 baht /month	145	39.3
≥ 40 years	48	12.7	50,001 - 75,000 baht /month	42	11.4
Gender			75,001 – 100,000 baht /month	47	12.7
Male	186	48.9	> 100,000 /month	31	8.4
Female	194	51.1	Parents' marital status		
Time of marriage			Married	238	62.6
First	359	94.5	Separated/ divorced	56	14.7
Second	20	5.25	Widow	69	18.2
Third	1	0.25	Both dead	17	4.5
Have children			Having Burden of parents care		
No	313	82.4	No	152	40
Yes	67	17.6	Yes	228	60
Religious			Intention to have children		
Buddhist	353	92.9	Intention to have children/ not decide yet	328	86.3
Christ	21	5.5	Intention to have no children	52	13.7
Islam	3	0.8	Personality type		
Others	3	0.8	Extravert-Stable	170	44.7
Education			Extravert-Sensitive	79	20.8
Primary School	1	0.3	Introverted-Stable	72	19.0
Middle School	11	2.9	Introverted-Sensitive	59	15.5
High school	35	9.2	Problem focused coping		
Vocational school	13	3.4	High	265	69.7
Graduated	214	56.5	Moderate	115	30.3
Higher than graduated	105	27.7	Social support seeking coping		
Occupation			High	116	30.5
Government officer/state enterprise	42	11.1	Moderate	239	62.9
Professional	42	11.1	Low	25	6.6
Officer in private office	188	49.5	Avoidance coping		
Freelance/labor	16	4.2	High	26	6.8
Housewife	10	2.6	Moderate	258	67.9
Own business	53	13.9	Low	96	25.3
Others	29	7.6			

Personality

In Table 1, this study found that most subjects were extravert-stable personality type 44.7%, next was extravert-neurotic personality type 20.8%, introvert-stable personality type 19.0% and introvert-neurotic personality type 15.5%.

The personality trait that significantly associated with the intention to have no children was Scale E. It means that subjects with introverted personality tend to have no children higher than one with extraverted personality. And there was no significant difference between those who had intention to have no children and those who had intention to have children or not decide yet in 4 personality types (Table 2).

Coping

In Table 1, this study found that most subjects used problem focused coping strategies at high level 69.7% and at moderate level 30.3%, used social support seeking coping strategies at moderate level 62.9%, high level 30.5% and 6.6% at low level, and used avoidance coping strategies at moderate level 67.9%, low level at 25.3% and high level at 6.8%.

According to Table 3, intention to have no children was significantly lower in problem focused coping (domain - seek to belong) and avoidance coping (domain - behavioral disengagement), and significant higher in avoidance coping and avoidance coping (domain - keep to self).

Table 2. Personality of the two comparison groups and association among personality and intention to have no children (n = 380).

Study variables	Intention to have children / not decide yet (n = 328)		Intention to have no children (n = 52)		χ^2	P - value
	N	%	N	%		
Scale E					4.935	0.026*
Extravert	222	89.2	27	10.8		
Introvert	106	80.9	25	19.1		
Scale N					0.935	0.334
Stable	212	87.6	30	12.4		
Neurotic	116	84.1	22	15.9		
Personality type					5.401	0.145
Extravert-Stable	153	90.0	17	10.0		
Extravert-Neurotic	69	87.3	10	12.7		
Introvert-Stable	59	81.9	13	18.1		
Introvert-Neurotic	47	79.7	12	20.3		

* $P < 0.05$, ** $P < 0.01$

Table 3. Comparison of mean coping scores between subjects with intention to have children or not decide yet and subjects with intention to have no children. (n = 380).

Study variables	Intention to have children/ not decide yet (n = 328)		Intention to have no children (n = 52)		t	P - value
	Mean	SD	Mean	SD		
Problem focused coping	3.9	0.0	3.8	0.1	0.886	0.376
Active coping and planning	4.0	0.0	4.0	0.5	0.504	0.616
Work hard and achieve	4.0	0.0	4.0	0.1	-0.149	0.882
Suppression of competing activities	3.3	0.0	3.3	0.1	-0.093	0.926
Restraint coping	3.7	0.0	3.7	0.1	-0.302	0.763
Positive reinterpretation	4.2	0.0	4.1	0.1	1.792	0.077
Acceptance	3.9	0.0	3.9	0.1	-0.209	0.835
Relaxation	3.9	0.0	3.9	0.1	0.989	0.326
Seek to belong	4.0	0.0	3.8	0.1	2.262	0.027*
Social support seeking coping	3.4	0.0	3.4	0.1	-0.499	0.618
Seeking instrumental social support	3.4	0.0	3.5	0.1	-1.203	0.233
Seeking emotional social support	3.3	0.0	3.2	0.1	0.449	0.655
Avoidance coping	2.7	0.0	2.9	0.1	-2.426	0.016*
Denial	2.4	0.0	2.6	0.1	-1.827	0.072
Behavioral disengagement	2.3	0.0	2.6	0.1	-2.779	0.007**
Mental disengagement	3.2	0.1	3.2	0.1	-0.664	0.509
Keep to self	2.9	0.0	3.2	0.1	-2.152	0.035*
Self blame	2.5	0.1	2.7	0.1	-1.680	0.098
Worry	2.7	0.1	2.9	0.1	-1.911	0.057
Focus on venting of emotion	3.0	0.0	3.1	0.1	-1.180	0.243

* $P < 0.05$, ** $P < 0.01$

Table 4. Logistic regression analysis for predicting intention to have no children.

Characteristic/ study variables	Adjusted OR	95% CI	P - value
Age \geq 40 years	3.403	1.408 - 8.225	0.047*
Spouse age \geq 40 years	5.925	2.496 - 14.063	0.000**
Personal income 50,001 - 75,000 baht/month	2.974	1.165 - 7.596	0.051
High use of avoidance coping (dimension - keep to self)	2.520	1.213 - 5.239	0.012*

* $P < 0.05$, ** $P < 0.001$

Subjects age and spouse age \geq 40 are more likely to have intention to have children compare to those who are younger. Compared to those with income less than 25,000 and more than 75,000, people with income between 50,001 – 75,000 baht/month are about 3 times having intention to have children. Subjects with high use of avoidance coping (dimension – keep to self) are more likely to have intention to have children compare to those with medium and low use of avoidance coping (dimension – keep to self). (Table 4).

Discussion

This study is to examine the prevalence of intention to have no children among those who come to get marriage registration at Bangrak District Office, Bangkok Metropolis, and association between intention to have no children and personality and coping. The result shows as follows:

This study found that the prevalence of those who had intention to have no children was 13.7%, which was similar Isaraphakdi P, *et al.*⁽⁹⁾ that studied attitudes about marriage and having children among female and male volunteers, found that 14.1% did not want to have children.

In this study, most subjects showed extravert-stable personality consistent with the study of Maneerung N.⁽¹⁴⁾ which found that most subjects had extravert-stable personality type. Moreover, it is found that the personality trait that was related to the intention to have no children was behavior dimension, Scale E. In other word the subjects with introverted personality will have intention to have no children higher than those with extraverted personality, which was similar to Avison M, *et al.*⁽¹⁵⁾ who investigated the association between personality and childbearing motivation, with a focus of voluntary childlessness. They found 780 adults completed an online survey assessing the Big Five personality traits, the study found that compared to parents or those desiring children,

childless respondents scored significantly lower in Extraversion.

This study found that most subjects used problem focused coping at a high level of 69.7%. Similarly, the study of Sangthong S.⁽¹⁶⁾ which was found that the subjects used problem focused coping at high level by learning from the experiences to deal with the problem by looking at situations that positively cause stress, accepting the reality of situations that occurred and having better adaptability skills as they got older.

In this study, the subjects used social support seeking coping at a moderate level consistent with the study of Rojanapornpant D.⁽¹¹⁾ which was found that subjects used social support seeking coping at a moderate level. This coping strategy only helps reducing or alleviating the feelings, but the problem still exists since it has not been resolved. However, The finding of this study was different from that of Sangthong S, who found that the subjects used social support seeking coping at high level, since it helped facing stress or situation, by requesting a consultation from people who have experienced the same kind of stress or situation before to bring it as encouragement and build confidence to face various problems better.⁽¹⁷⁾

As for avoidance coping which indicates being unable to face problems or escaping from the problem, this study found that the subjects used avoidance coping at moderate level, which was similar Ninsanguandecha S.⁽¹⁷⁾ found that the subjects used avoidance coping at moderate level, but not consistent with study of Sangthong S.⁽¹⁶⁾ which found that the subjects used avoidance coping at low level by expressing anger or dissatisfaction just for their peace of mind, or using alcohol, sedatives or substance abuse to reduce their stress.

This study examined the association between coping and intention to have no children, it was found that using problem focused coping (dimension-see to belong) was negatively related with the intention to have no children in the subjects. Moreover, it was

found that avoidance coping had a positive relationship with the intention to have no children, significantly. The subjects who use avoidance coping at high level cannot face the problems that come to their life, therefore tend to have high intention to have no children. In addition, avoidance coping (dimension - keep to self) has a significant positive relationship with intention to have no children and can be a predictive factor of intention to have no children in those who come to get marriage registration with statistical significance at the level of 0.05. Moreover, avoidance coping (dimension - behavioral disengagement), had a positive relationship with the intention to have no children with statistical significance at the level of 0.01. Subjects who used avoidance coping both keeping to self and behavioral disengagement are likely to keep their feeling, thought and suffering with themselves when they face difficulties. They are also unlikely to engage in any problematic situation and to put much effort to solve the problem. Instead, they might prefer to put themselves away from difficulties. Then, it is possible that they might imagine that having children could bring a lot of problems. To protect themselves, they might think that it is better to have no children.

Logistic regression analysis was showed that there were 4 factors predicting intention to have no children: presence in age ≥ 40 years, spouse age ≥ 40 years, personal income 50,001 – 75,000 baht, and avoidance coping (dimension - keep to self). These results were consistent with the study of Phuangprayong K.⁽¹⁸⁾ which found that age was significantly related to the need to have children in the future. The older age makes it feel like they could not raise their children until they grow up because they will get older while the child is still young. Similarly, Sinananwanich E.⁽¹⁹⁾ who found that both parents who were young at first married had more children than father and mother who were older at first married since those who were younger at first married had a longer period of fertility so the opportunity and desire for having children were greater than those who were older at first marriage. Also, this study found that sample group with income 50,001 - 75,000 baht per month had intention to have no children higher than those with lower and higher incomes with statistical significance at the level of 0.05, it can be explained that the sample group that has income 50,001 - 75,000 baht per month, had intention to have no children up to 31.4%. This sample group is the group that started to have higher incomes so they could plan the future to fulfill more happiness for oneself, both in life style and openness to experiences, therefore needs more time and freedom,

while their income still not enough to make plans for raising children, so they delay the need to have children first. In accordance with the studies of Rittirong J, *et al.*⁽²⁰⁾ who found that having a daycare can help parents go to work, thus improving the family's economic status which is an important factor that directly affects the decision to have children of the spouse. Therefore, today's society, it may be possible that women living in families with better economic status are more likely to need to have children and decide to have more children than families with lower economic status if they are able to find a quality and reliable childcare or daycare center. However, the result of this study was different from that of Phuangprayong K.⁽²¹⁾, which found that families with better economic status are able to have plans for the future, they can choose to do activities that interest them as well as having the opportunity to upgrade social status to increase wealth for oneself, having children to be raised therefore becomes an obstacle to happiness and personal desires.⁽⁵⁾ In contrast, Sinananwanich E.⁽¹⁹⁾ found that families with better economic status require fewer children than families with inferior economic status since families with better economic status will place greater importance on the quality of birth of children and not interested in having children as a laborer for the household. As for avoidance coping (dimension - keep to self), the result in this study showed that it can predict intention to have no children, the subjects with high-use of avoidance coping (dimension - keep to self) will keep the feelings, thoughts and suffering within themselves and avoid meeting others therefore tend to have high intention to have no children, but still no relevant research has been conducted on this issue.

There was some limitation in this study. This study was examined only in Bangrak District Office, Bangkok Metropolis, which could not represent the population of Bangkok or the whole country. Due to its title's meaning, couples in other districts or provinces tend to have marriage registration. Bangrak is a business concentrated and urbanized area with relatively high living expense. In further studies, the study should be conducted in subjects with the intention to have no children on voluntary childlessness, that means not including the subjects that could not have children, have infertility, or have had children before and also conducting a study on a greater number of subjects in order to get more information about various factors related to the intention to have no children in terms of mental health.

Conclusion

Personality and coping were associated with intention to have no children in those who come to get marriage registration at Bangrak District Office, Bangkok Metropolis. This study was found that the prevalence of those who had intention to have no children was 13.7%. The factors that were significantly associated with intention to have no children were personality-Scale E, problem focused coping (dimension - seek to belong), avoidance coping, avoidance coping (dimension - behavioral disengagement), avoidance coping (dimension - keep to self). In addition, this study found that these factors, namely, age \geq 40 years, spouse age \geq 40 years, personal income 50,001 – 75,000 baht, and avoidance coping (dimension - keep to self) could predict intention to have no children, significantly. This study would be beneficial for understanding the intention to have no children in term of mental health.

Conflict of interest

The authors, hereby, declare no conflict of interest.

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