

Analysis of factors associated with the selection of contraceptive methods among birth control acceptors in bandung regency

Lina Haryani¹, Sophia², Julina Maudy³
^{1,2,3} Jenderal Achmad Yani University, Indonesia

ARTICLE INFO

Article history:

Received Jan 30, 2023
Revised Feb 17, 2023
Accepted Feb 28, 2023

Keywords:

Contraception Methods
Characteristics
Contraception Acceptor

ABSTRACT

Population growth in Indonesia in the last 10 years has increased quite rapidly by 1.25 percent per year. In Indonesia, the majority of new family planning participants are dominated by family planning participants who use Non-Long-Term Contraceptive Methods amounting to 79.48% of all new family planning participants, while those using Long-Term Contraception Methods are only 20.51%. In this study there are only 2.8% of Non-Long-Term Contraceptive Methods users compared to 97.2% of Long-Term Contraception Methods users. The purpose of the study was to determine the relationship between knowledge, education, husband's support, parity, occupation, age and sources of information in the selection of contraceptive methods. The study was conducted on June 20 - July 20, 2022. The design of this study was descriptive correlational with a cross-sectional approach. The research sample was taken from 66 respondents from family planning acceptors using quota sampling technique. Univariate and bivariate analysis were performed with chi-squarepp statistical test. The results of the analysis showed that there was a relationship between the choice of contraceptive method, namely education ($p=0.03$), parity ($p=0.023$), husband's support ($p=0.031$), occupation ($p=0.046$), age ($p=0.015$), sources of information ($p = 0.022$), which is not related is knowledge (p value = 0.068). It is recommended that midwives can provide better information, improve contraceptive services, especially long-term contraceptive methods.

This is an open access article under the [CC BY-NC](#) license.



Corresponding Author:

Lina Haryani,
Midwifery Program,
Jenderal Achmad Yani University,
Jl. Terusan Jenderal Sudirman Cimahi
Email: lina.mids46@gmail.com

INTRODUCTION

Population growth in Indonesia in the last 10 years has increased rapidly by 1,25 percent per year. This can be seen from the total population in 2010 which amounted to 237,630,000 people, increasing rapidly to 270,200,000 people in 2020. (Badan Pusat Statistik, 2020).

The Program to reduce the rate of population growth is the Family Planing Program, which has been successfully implemented since 1970. The Family Planning Program is one of the programs to evercome population problems, which is an integrated part of achieving national development

programs and aims to participate in creating economic, spiritual, social and cultural welfare. Family Planning essentially aims to increase the concern and participation of the community through maturation of marriage age, birth control, welfare of women's reproductive health and fostering family resilience which will contribute to increasing family welfare in order to realize a happy and prosperous small family. (Andria Zulfa, 2016).

Contraception is a way of avoiding/ preventing pregnancy is a result of a meeting between ovum and sperm cell. Based on the meaning and purpose of contraception, those who need contraception are couples who are actively having sex and both have normal fertility but do not want pregnancy. Contraceptive methods are divided into long-term contraceptive methods (MKJP) and non-MKJK such as IUD, AKBK, MOW and MOP, while non-MKJP are contraceptive methods that are used temporarily. Including: pills and injections (BKKBN, 2017).

BKKBN data in 2017 in Indonesia the majority of new family planning participants were dominated by family planning participants who used Non-MKJP at 79.48% of all new family planning participants, while those who used the Long-Term Contraceptive Method (MKJP) were only 20.51%. Active family planning participants are dominated by family planning participants who use Non-Method of Long-Term Contraception (Non-MKJP) at 74% of all active family planning participants, while those who use the Long-Term Contraceptive Method (MKJP) are only 26%. (BKKBN, 2017).

According to the West Java Health Office 2018, injectable family planning users (51.94%), pills (24.72%), condoms (1.81%), IUDs (11.81%), implants (6.24%), MOW (2.77%) and MOP (0.71%). Data from the West Java Health Office in 2018 obtained acceptor data in Bandung Regency, namely, Injectable family planning users (54.4%), pills (19.2%), condoms (1.3%), MOW (3.2%), MOP (0.7%), IUD (16.3%), implants (4.9%).

From the results of preliminary studies conducted at Lina Agustina primary health care, in March 2022 which was carried out randomly, out of 12 birth control acceptors, only 1 used IUD contraception, while the others were 10 people who used injectable birth control, 1 person's pill. The injectables contraceptive method is in high demand by acceptors with parity >1, the pill is in demand by acceptors with parity 1. The reasons for those who do not use the IUD include fear during insertion, the cost is more expensive, and not getting permission from the partner. Others said they just followed the advice of their mothers and friends who mostly chose injectable family planning methods. They also revealed that they had heard stories from family and friends that contraceptives that are inserted into the body can rust and can move to other areas of the body, in this case the IUD.

This study aims to determine the relationship between knowledge, education, husband's support, parity, occupation, age and information sources in the selection of contraceptive methods at Lina Agustina primary health care in Bandung Regency period June - July 2022.

RESEARCH METHOD

This type of research uses correlational descriptive. According to Sugiyono (2017), correlational research is a type of research with problem characteristics in the form of a correlational relationship between two or more variables. In this study, the authors used a cross-sectional design, which is a type of research that emphasizes the time of measurement/observation of independent and dependent variable data at one time, that is, they are only observed once.

The population in this study were all family planning acceptors who came to PMB Lina Agustina, SST. The sample in this study were all KB acceptors who attended PMB Lina Agustina, SST as many as 66 people in June - July 2022. The sampling technique used accidental sampling. Data analysis techniques using univariate and bivariate analysis using chi square

RESULTS AND DISCUSSIONS

Relationship between Knowledge and Contraceptive Methods Selection

Table 1. Frequency Distribution of Knowledge and Selection of Contraceptive Methods

Knowledge	Contraceptive Methods Selection				Total		p value
	Non Long Term		Long-Term		n	%	
	n	%	n	%			
Good	2	3,0	0	0,0	2	100	1,00
Less	59	92,2	5	7,8	64	100	
Total	61	92,4	5	7,6	66	100	

Table 1 shows that out of 66 respondents (100%), respondents with sufficient knowledge (92.2%) prefer the Non-Long-Term Contraceptive Method. After statistical testing, the p-value (0.681) ($p < 0.05$) was obtained, so there was no relationship between knowledge and the selection of contraceptive method.

Knowledge is the result of human sensing or the result of a person's knowing of object through the senses he has, by itself at the time of sensing so as to produce knowledge is greatly influenced by the intensity of attention and perception of the objects most of a person's knowledge is obtained through the sense of hearing (ears) and the sense of sight (eyes) (Notoadmojo, 2010).

This study is in line with research conducted by Dewi Astuti at Pratama Sartika Clinic Bandar Lampung in 2015 which shows that the statistical test results obtained p-value = 0.221, which means that there is no relationship between knowledge and selection of injectable contraceptive methods. While the same opinion with this study was conveyed by Nurfaidah, et al (2013) who said that based on the results of the analysis with the chi square test showed a value of $p = 0.436$ ($p > 0.05$), which means that there is no significant relationship between the level of knowledge and the selection of the type of contraception used in couples of childbearing age.

Relationship between Education and Contraceptive Methods Selection

Table 2. Frequency Distribution of Education and Contraceptive Methods Selection

Education	Contraceptive Methods Selection				Total		p value
	Non Long Term		Long-Term		n	%	
	n	%	n	%			
Low	37	56,1	0	0,0	37	100	0,013
High	24	36,4	5	7,6	29	100	
Total	61	92,4	5	7,6	66	100	

Based on table 2 shows that out of 66 respondents (100%), respondents with low education (elementary-middle school) as many as 37 people (56.1%) prefer Non-Long-Term Contraceptive Methods. After statistical testing, the p-value = 0.013 ($p < 0.05$) was obtained, so there is a relationship between education and the selection of contraceptive method.

This is in line with researcher Anita, et al (2014), at the Damau Health Center, Talaud Regency, which states that there is a relationship between education and the selection of contraception, from education it shows that respondents with higher education levels (11%) choose more Long-Term Contraceptive Methods compared to respondents with basic education level (7%). The results of statistical analysis of the value of $\rho = 0.000$ ($\rho < 0.05$) means that there is a relationship between education level and contraceptive selection. The relationship between education and mindset, perceptions and behavior of the community is very significant, in the sense that the higher the level of education will result in a low birth rate because education will influence negative perceptions of the value of children and will suppress the existence of large families.

Education is a process of change and improvement of knowledge, knowledge patterns, mindset and community behavior. The dynamics of various aspects of the education process will be continuous and sustainable so that people are able to accept invasive ideas rationally and responsibly. A person's education affects daily behavior, people with high education do not necessarily use effective family planning (BKKBN, 2012).

Parity Relationship with Contraceptive Methods Selection

Table 3. Frequency Distribution of Parity Relationship and Contraceptive Methods Selection

Parity	Contraceptive Methods Selection				Total	p value	
	Non Long Term		Long-Term				
	n	%	n	%	n	%	
Multiparous	27	84,4	5	15,6	32	100	0,023
Primiparous	34	100	0	0,0	34	100	
Total	51	92,4	5	7,6	66	100	

Based on table 3 it shows that out of 66 respondents (100%), 34 primiparous respondents (51.5%) prefer the Non-Long-Term Contraceptive Methods. After statistical testing, the p-value = $0.053 > 0.05$, so there is no relationship between parity and the selection of contraceptive method.

The results of this study are in accordance with the results of Angoi's research (2012) in Semarang which states that there is a significant relationship between parity (number of children) with the selection of contraceptive from the study it appears that there is not always a relationship between parity and the selection of family planning methods. This can be influenced by the characteristics and number of respondents from each study.

This research is in line with the results of research by Dahliana (2013) entitled the relationship between maternal parity and family economic status with the use of injectable contraceptives at the Citra primary health care Palembang in 2013 with the results of the chi-square statistical test with p value = 0.004, meaning that there is a significant relationship between parity and the use of injectable contraceptive. The age of mothers who have enough children in the reproductive age of 20-35 years, so in choosing the method of contraception tends to spacing or delaying birth, not to stop pregnancy so choose injectable contraceptives

Relationship between Husband Support and Contraceptive Method Selection

Table 4. Frequency Distribution of Relationships between Husband Support and Contraceptive Methods Selection

Husband Support	Contraceptive Methods Selection				Total	p value	
	Non Long Term		Long-Term				
	n	%	n	%	n	%	
Not in favor	37	100	0	0,0	37	100	0,013
Support	24	82,8	5	17,2	29	100	
Total	61	92,4	5	7,6	66	100	

Based on table 4, shows that of the 66 respondents (100%), 37 respondents (56.1%) who did not get husband support preferred the Non-Contraceptive method. After statistical testing, p -value = 0.031 < 0.05, so there is a relationship between husband's support and contraceptive method selection.

The results of this study are also in accordance with the research of Ndola Prata, Suzanne Bell, Ashley Fraser, Adelaide Carvolho, Isilda Neves, Benjamin Nieto Andrade (2017), stating that from the research that has been conducted, the results show that p 0.000 (0.000 < 0.05) which means there is a relationship between husband support and modern contraceptives in Lauda, Angola from the journal title Partner Support For Family Planning and Modern Contraceptive Use In Lauda, Angola.

Employment Relationship with Contraceptive Methods Selection

Table 5. Frequency Distribution of Employment Relationships and Contraceptive Methods Selection

Jobs	Contraceptive Methods Selection				Total	p value	
	Non Long Term		Long-Term				
	n	%	n	%	n	%	
Not Working	42	97,7	1	2,3	43	100	0,046
Work	19	82,6	4	17,4	23	100	
Total	61	92,4	5	7,6	66	100	

Based on table 5 shows that of the 66 respondents (100%), there were 42 people (63.6%) who did not work preferring the Non-Long-Term Contraceptive Methods. After the statistical test was obtained p -value = 0.046 > 0.05, it can be concluded that there is a relationship between work and the selection of contraceptive method.

This study is in line with the results of research by Awalia, et al (2013) entitled factors associated with the behavior of choosing the type of hormonal contraception in Kemurang Wetan Village, Tanjung District, Brebes Regency in 2013 which obtained the results of statistical test obtained a value of P -Value = 0.231 (P -Value > 0.05), this indicates that H_0 is accepted, meaning that there is no significant relationship between work and the behavior of choosing the type of contraception in Kemurang Wetan Village, Tanjung District, Brebes Regency.

The type of a person's work will determine the lifestyle and habits of each individual so that in this case work has a fairly important role and is closely related to a person's thinking and the decisions a person makes in determining the type of contraception he uses. The relationship between the use of Long-Term-Contraceptive Methods and employment status can be caused because working family planning acceptors who work have the opportunity to obtain information, either from work colleagues or from other media so that the opportunity to use Long-Term-Contraceptive Methods is greater. The results of this study say that family planning acceptors who work have a 4.737 times chance of using Long-Term-Contraceptive Methods compared to family planning acceptors who do not work (Anggraeni, 2015).

Relationship between Age and Selection of Contraceptive Methods

Table 6. Frequency Distribution of Age and Contraceptive Methods Selection

Age	Contraceptive Methods Selection				Total	p value	
	Non Long Term		Long-Term				
	n	%	n	%	n	%	
< 20 years	3	100	0	0,0	3	100	0,015
20-35 years	45	97,8	1	2,2	46	100	
> 35 years	13	76,5	4	23,5	17	100	
Total	61	92,4	5	7,6	66	100	

Based on table 6 it shows that out of 66 respondents (100%), there are 45 people (68.2%) aged 21-35 years who prefer the Non-Long-Term Contraceptive Methods. After the statistical test was obtained p-value = 0.027 < 0.05, it can be concluded that there is a relationship between age and the selection of contraceptive method.

This study is in line with the results of the results by Awalia, et al (2013) entitled factors associated with hormonal contraceptive selection behavior in Kemurang Wetan Village, Tanjung Subdistrict, Brebes Regency in 2013 which obtained statistical test results obtained a P-Value = 0.000.

As stated by Marikar, et al (2015) at the Tuminting Health Center in Manado City, there is a significant relationship between age and contraceptives selection. As stated by the research of Musdalifah et al (2013) that maternal age has a significant effect on the use of modern contraceptives. The relationship between the selection of contraceptive method and age shows an inverted U-model relationship, the older the woman of childbearing age, the more she uses contraception until the age of 30-34 years. This is in line with what the researchers did that the age of a woman affects the selection of contraceptive method.

Age is an index of a person's development. The age of the Individual is calculated from the time of birth, the more age, the level of maturity and strength of a person will be more mature in thinking and working (Nurhayati and Mariyam, 2013). A person's age affects the type of contraception chosen, age over 20 years is a period of spacing pregnancy or preventing pregnancy so that their choices are more likely to use contraception (Maula, Aminatul, 2014).

Relationship between Information Source and Contraceptive Method Selection

Table 7. Frequency Distribution of Relationships between Information Sources and Contraceptive Methods Selection

Source Information	Contraceptive Methods Selection				Total	p value	
	Non Long Term		Long-Term				
	n	%	n	%	n	%	
Non-Health Workers	7	70,0	3	30,0	10	100	0,022
Health Workers	54	96,4	2	3,6	56	100	
Total	61	92,4	5	7,6	66	100	

Based on table 7 it shows that of the 66 respondents (100%), there were 54 people (81.8%) who get their source of information from Health Workers preferring Non-Long-Term Contraceptive Methods. After statistical tests was obtained p-value = 0.024 < 0.05, it can be concluded that there is a relationship between age and the selection of contraceptive methods.

This research is in line with that conducted by Yunita Marlina (2013) which stated that mothers who get information about contraception more from health workers (midwives/doctors). Based on Darwani's research (2012) entitled factors associated with the selection of contraceptives intrauterine by family planning acceptors in the Working Area of the Saree Health Center in Aceh Besar Regency, it shows that there is relationship between information and the selection of intrauterine contraceptives by family planning acceptors. The results of research conducted by Anita entitled factors that influencing women about the selection of contraceptive methods in the Tangan-Tangan Rayek Settlement, Tangan-Tangan District, Southwest Aceh District also show that there is an influence of information on the selection of family planning methods.

Sources of information are all things that can be used by someone to find out about new things and provide a cognitive basis for the formation of a person's attitude. Sources of information were obtained from community leaders, health workers, mass media, and families who have an important role for couples of childbearing age in contraceptive use (Rachmayani, 2015).

CONCLUSION

Most of the respondents preferred the Non-Long-Term Contraceptive Methods as many as 61 respondents (92.4%). The majority of respondents had sufficient knowledge as many as 64 respondents (97%), respondents with low education as many as 37 respondents (56.1%), 34 respondents (51.5%) were primiparous, the majority of respondents did not work as many as 43 respondents (65.3 %), the majority of respondents did not get husband support to choose the family planning method as many as 37 respondents (56.1%), most of the respondents were in the age range of 21-35 years as many as 46 respondents (69.7%) and most of the respondents got information sources from Health Workers as many as 56 respondents (84.8%).

There is no relationship between knowledge and the selection of contraceptive method. There is a significant relationship between education and the selection of contraceptive method, there is a significant relationship between parity and the selection of contraceptive method, there is a significant relationship between husband's support in choosing a contraceptive method, there is a significant relationship between work and the selection of contraceptive method, there is a significant relationship between age with the selection of contraceptive method, there is a significant relationship between information sources and the selection of contraceptive method.

Reference

- Andria Zulfa, 2016. *Pengaruh Pertumbuhan Penduduk dan Pertumbuhan Ekonomi terhadap Tingkat Pengangguran di Kota Lhokseumawe*. Jurnal visioner & strategis.
- Ayunda, S. S. (2013). *Faktor - Faktor yang Berhubungan Dengan Pemilihan Metode Kontrasepsi Oleh PUS Di Desa Peunyerat Kecamatan Banda Raya Banda Aceh*. Diakses pada tanggal 10 Mei 2022
- BKKBN. 2015. *Keluarga Berencana dan Kontrasepsi*. Cetakan ke- 5. Jakarta: Pustaka Sinar Harapan
- Badan Pusat Statistik. (2020). *Berita Resmi Statistik Hasil Sensus Penduduk 2020*. Bps.Go.Id, 27, 1-52. <https://papua.bps.go.id/pressrelease/2018/05/07/336/indeks-pembangunan-manusia-provinsi-papua-tahun-2017.html>
- Dahlia. (2013). *Hubungan Antara Paritas Dan Status Ekonomi Keluarga Dengan Pemakaian Kontrasepsi Suntik Di Rumah Bersalin Citra Palembang Tahun 2013*. Diakses pada tanggal 30 Juli 2016, pukul 21.00 WIB, diakses tanggal 18 mei 2022
- Dalimawaty, K. (2021). Faktor yang Mempengaruhi Minat Ibu Menggunakan KB IUD di Puskesmas Binjai Estate. *Jurnal Ilmiah Kebidanan Indonesia*, 4(4), 519. <https://journals.stikim.ac.id/index.php/jiki/article/view/727>
- Fitriya A, Wina R, Tika N. 2019. *Faktor-Faktor Yang Berhubungan Dengan Penggunaan Metode Kontrasepsi Jangka Panjang (Mkjp) Pada Peserta Kb Aktif Di Kelurahan Mekar Wangi Kecamatan Tanah Sareal Tahun 2019*. Vol. 3 No. 3, Juni 2020(Rosidah, 2020)

- Megawati, T., Febi, K., & Adisty, R. (2015). Hubungan Antara Faktor-Faktor Yang Mempengaruhi Penggunaan KB dengan Pengetahuan Tentang KB di Wilayah Kerja Puskesmas Kapitu Kecamatan Amurang Barat. *Pharmacoin Jurnal Ilmiah Farmasi*, 4(4). Diakses pada tanggal 15 Mei 2022
- Mi'rajah, N, Syahadatina Noor. M, Arifin, S, 2019. Hubungan Dukungan Tenaga Kesehatan Dan Akses Ke Puskesmas Dengan Pemakaian Metode Kontrasepsi Jangka Panjang. *Homeostasis*, Vol. 2 No. 1, April 2019: 113-120
- Notoatmodjo, 2017. *Ilmu Perilaku Kesehatan*. Jakarta : Rineka Cipta
- Notoatmodjo, 2018. *Metodologi Penelitian Kesehatan*. Jakarta : Rineka Cipta
- Ramadini, F., (2014). Hubungan Paritas Dengan Pemilihan Metode Kontrasepsi Jangka Panjang Di Desa Ngares Kecamatan Gedeg Kabupaten Mojokerto. *KTI D3 Kebidanan*. . Diakses pada tanggal 17 Mei 2022
- Riduwan. 2019. *Belajar mudah penelitian untuk guru-karyawan dan peneliti pemula*. Cetakan ke 11, Bandung : CV Alfabeta
- Rosidah, L. K. (2020). Pengaruh Tingkat Pendidikan Dan Usia Terhadap Penggunaan Metode Kontrasepsi Jangka Panjang Tahun 2018. *Jurnal Kebidanan*, 9(2), 108-114. <https://akbid-dharmahusada-kediri.e-journal.id/JKDH/index>
- Sari, Y. S. N. I., Abidin, U. W., & Ningsih, S. (2019). Faktor - Faktor Yang Berhubungan Dengan Minat Ibu Dalam Pemilihan Alat Kontrasepsi. *J-KESMAS: Jurnal Kesehatan Masyarakat*, 5(1), 46. <https://doi.org/10.35329/jkesmas.v5i1.308>
- SDKI, 2017. *Survei Demografi Kesehatan Indonesia 2017*. Kementerian Kesehatan Indonesia.
- Setiasih, S, Widjanarko, B, Istiarti, T, 2016. Analisis Faktor-faktor yang Mempengaruhi Pemilihan Metode Kontrasepsi Jangka Panjang (MKJP) pada Wanita Pasangan Usia Subur (PUS) di Kabupaten Kendal. *Jurnal Promosi Kesehatan Indonesia* Vol. 11 No. 2, 32-46
- Septyarum, A. (2014). Hubungan Pendidikan, Pengetahuan, Usia dan Dukungan suami dengan Pemilihan Kontrasepsi IUD di Desa Tanggan Gesi Sragen. *Sekolah Tinggi Ilmu Kesehatan Aisyiyah Yogyakarta*.
- Suharti. (2010). Hubungan Pengetahuan Dan Minat Akseptor IUD Dengan Sikap Akseptor Tentang Kunjungan Ulang Pasca Pemasangan IUD Di Puskesmas Jambon Kabupaten Ponorogo. Diakses pada tanggal 18 Mei 2022
- Trisanti I. *Faktor Determinasi Rendahnya Penggunaan Intra Uterin Device (Iud) Oleh Ibu Pasca Salin Di Bidan Praktik Mandirinor Asiyah, Kudus*. 1997;633.
- Yati N, Urwatil W, Sri Ningsih. 2019. Faktor - Faktor Yang Berhubungan Dengan Minat Ibu Dalam Pemilihan Alat Kontrasepsi Iud. *Jurnal Kesehatan Masyarakat* Vol. 5 No. 1, 47-59
- Yunita W, M.Taufik, Abduh R, 2015. Faktor-Faktor Yang Mempengaruhi Penggunaan Metode Kontrasepsi Jangka Panjang (MKJP) Pada Pasangan Usia Subur di Kabupaten Sambas. Universitas Muhammadiyah Pontianak
- Zallila N. 2017. Hubungan Tingkat Pendidikan Dan Status Bekerja Dengan Pemilihan Metode Kontrasepsi. Universitas Kristen Duta Wacana Yogyakarta. Diakses tanggal 20 Mei 2022