

Literature Review: Factors Influencing the Low Use of Long-Term Contraceptive Methods (LCMs) in Indonesia

Anggi Lestari¹, Dahliana², Siti Nurjanah³, Ermawati⁴, Selmiati⁵, Norvi Ipu⁶, Yeni Nurwati⁷, Sischa Widhiawati⁸, Rusdiya Handayani Sarah⁹, Herma¹⁰

¹Bachelor of Midwifery Program, Universitas Ngudi Waluyo, anggilestari864@gmail.com

²Bachelor of Midwifery Program, Universitas Ngudi Waluyo, dahliana1812@gmail.com

³Bachelor of Midwifery Program, Universitas Ngudi Waluyo, nur87249@gmail.com

⁴Bachelor of Midwifery Program, Universitas Ngudi Waluyo, erma.ydc@gmail.com

⁵Bachelor of Midwifery Program, Universitas Ngudi Waluyo, selmiaty654@gmail.com

⁶Bachelor of Midwifery Program, Universitas Ngudi Waluyo, novivivi612@gmail.com

⁷Bachelor of Midwifery Program, Universitas Ngudi Waluyo, yeni1302nurwati@gmail.com

⁸Bachelor of Midwifery Program, Universitas Ngudi Waluyo, sischaw10@gmail.com

⁹Bachelor of Midwifery Program, Universitas Ngudi Waluyo,
rusdiahandayanisarah4@gmail.com

¹⁰Bachelor of Midwifery Program, Universitas Ngudi Waluyo, hermaema9920@gmail.com

Email Correspondence: anggilestari864@gmail.com

Article Info	Abstract
Article History Submitted, 2025-11-02 Accepted, 2025-11-30 Published, 2025-12-31	In developing countries, high maternal mortality rates and unintended pregnancies remain a global public health problem. This is primarily influenced by the low use of contraception in the community. Based on the data above, every year many family planning participants still choose short-term contraceptive methods over Long-Term Contraceptive Methods (LCMs). This is caused by various factors such as the woman's age, length of marriage, education, parity (number of children), culture, religion, and gender differences. The purpose of this review is to identify factors that influence the low use of long-term contraceptive methods (LCMs) in Indonesia. This research method is a journal publication with a literature summary, article searches using a comparative study of computerized databases (Google Scholar and PubMed). Results: Adult age, higher education, working women, more than two children, good knowledge, supportive attitudes, husband's support/participation, high income, and urban residence influence couples of childbearing age in choosing long-term contraceptive methods (LCMs). Conclusion: Factors that influence the low use of long-term contraceptive methods (LCMs) in Indonesia are age, education, occupation, parity, knowledge, attitude, husband's participation/support, income/economic status and place of residence.
Keywords: Long-ter contraceptive methods length	

Introduction

In developing countries, high maternal mortality rates and unwanted pregnancies remain a global public health problem. This is primarily influenced by the low use of contraception in the community (Mare et al., 2022). Contraception aims to fulfill everyone's reproductive rights and can help reduce the risk of maternal and infant mortality. Contraception aims to regulate the timing, spacing, and number of pregnancies, prevent or minimize the possibility of pregnant women experiencing complications, and prevent death in women who experience complications during pregnancy, childbirth, and the postpartum period (Kemenkes RI, 2020).

The Indonesian government is striving to create a Family Planning program by continuing to socialize it to couples of childbearing age (PUS) to achieve the targets of the 2020-2024 National Medium-Term Development Plan (RPJMN), including increasing the use of contraception among couples of childbearing age (PUS). The unmet need for family planning services for couples of childbearing age (PUS) in Indonesia is still categorized as high. Over the past 4 years, unmet need has continued to decline, although there were fluctuations between 2017 and 2018. According to the 2015 National Survey, the unmet need position was 18.3%, the 2016-2018 RPJMK/SKAP survey fell to 15.8% in 2016, rose to 17.50% in 2017 and fell again to 12.4% in 2018 (BKKBN, 2024).

Indonesian health profile data in 2021 shows that the prevalence rate of Fertile Age Couples (PUS) participating in family planning in Indonesia is 57.4% of which, some active family planning participants use the type of contraception used by injections 59.9%, pills

Corresponding author:

Anggi Lestari

Anggilestari864@gmail.com

The 2nd International Conference on Health, Faculty of Health, Vol 2 No 1 2025

Universitas Ngudi Waluyo

15.8%, implants 10%, IUD/IUD 8.0%, MOW 4.2%, condoms 1.8%, MOP 0.2%, MAL 0.1%. It becomes clear that short-term methods still dominate, especially injections at 59.9%. In contrast, long-term methods such as implants (10%) and IUDs (8.0%) are still relatively low. Based on the data above, every year many family planning participants still choose short-term contraceptive methods over Long-Term Contraceptive Methods (LMPs). However, in terms of effectiveness in controlling pregnancy, LMPs are lower than LMPs (Kemenkes RI, 2022). A 2020 research study in Jordan found that among the factors contributing to the low use of LMPs were women's age, length of marriage, education, parity (number of children), culture, religion, and gender differences, which influence long-term contraceptive use. Women still bear the burden of using contraception compared to men, who rarely use contraception. This is due to a lack of knowledge about contraceptive procedures in men (Al-Husban et al., 2022).

In line with a 2021 research study in Ethiopia, factors influencing long-term contraceptive use include religion, education, knowledge, and attitudes of women and husbands regarding contraception (Mare et al., 2022). Similar determinants are also relevant in the Indonesian context, where limitations in knowledge, misconceptions about side effects, low partner support, cultural beliefs, and unequal access to reproductive health services contribute to low MKJP utilization. Based on the above background, the purpose of this literature review is to determine the impact of LMPs on contraceptive use review. This is to look at the factors that influence the low use of long-term contraceptive methods (MKJP) in Indonesia.

Methods

The method used in this study is a literature review. The articles included in this study are those that discuss factors influencing the low utilization of long-term contraceptive methods (MKJP) in Indonesia. The literature search was conducted for the period 2020 to 2025, using electronic databases such as Google Scholar and PubMed. Article retrieval, scanning, and screening were carried out independently by the researcher following the inclusion criteria, which consist of studies discussing Long-Term Contraceptive Methods (MKJP), published between 2020 and 2025, articles from 2017-2022. The research locations were limited to Indonesia, and the articles reviewed were published in Indonesian or English with free full-text access. The initial database search identified 1,024 articles. After filtering based on titles, abstracts, and research methods, 142 articles were selected for further retrieval and independent review according to the inclusion and exclusion criteria. The exclusion criteria consisted of articles published before 2020, studies conducted outside Indonesia, paid or inaccessible full-text articles, and articles that did not meet the inclusion requirements. Additional screening was then conducted to obtain accurate and comprehensive references related to factors influencing the utilization of long-term contraceptive methods (MKJP), resulting in 32 articles undergoing critical appraisal. From these, 11 articles published between 2020 and 2025 were selected for the final review.

Results and Discussion

Eleven articles that met the inclusion criteria were identified and presented in tabular form can be seen in Table 1. to make it easier for readers to understand. Factors that influence the use of long-term contraceptive methods (LCMs) includes:

Table 1. Jurnal Analysis Result

No	Citation	Method	Sample	Results
1	Determinants of Long-Acting Contraceptive Use among Reproductive-Age Couples in Tanjung Karang Public Health Center, Mataram City, West Nusa Tenggara (Aryati, Wirawan, Sari, & Sawitri, 2018)	Cross-sectional	169 couples of childbearing age (84 non-coastal areas, 85 coastal areas)	Factors influencing MKJP use include husband's support, residence (non-coastal), and higher income. Continued husband's support is necessary to increase MKJP coverage
2	Factors Influencing the Use of Long-Term Contraceptive Methods (LTM) in	Non-reactive (unobtrusiv)	171 respondents	Factors that influence the use of MKJP include age, education level, occupation, source of family planning services, and residential area.

	Women of Childbearing Age in East Java Province (Triyanto & Indriani, 2018)			
3	Analysis of Determinants Related to the Selection of Contraceptive Devices by KB Acceptors at PMB Tuti Gambut, Banjar Regency, South Kalimantan (Mirawati, Nuriaty, & Wulandatika, 2018)	Cross- sectional	75 respondents	The determining factor related to the selection of MKJP is age.
4	Factors Associated with the Use of Long-Term Contraceptive Methods among Active KB Acceptors in Pesisir Selatan District, Pesisir Barat Regency in 2018 (Yanti, Aryastuti, & Nurhayati, 2019)	Cross- sectional	125 respondents	Associated factors: age, education, knowledge, number of children, and husband's support. Health workers' attitudes were not associated with the use of MKJP.
5	Factors Associated with the Use of Long-Term Contraceptive Methods in Women of Childbearing Age (Suryanti, 2019)	Cross- sectional	95 women of childbearing age	Influencing factors: knowledge about MKJP, age, and husband's participation.
6	Factors Influencing Women of Childbearing Age (PUS) in Choosing Long-Term Contraceptive Methods (MKJP) at the Mayor Umar Damanik Community Health Center, South Tanjungbalai District, Tanjungbalai City (Rismawati et al., 2020)	Cross- sectional	95 respondents	Factors that influence the choice of MKJP are knowledge and attitude.

7	Factors Associated with the Use of Long-Term Contraceptive Methods (LMPs) among Active KB Participants in Mekar Wangi Village, Tanah Sareal District in 2019 (Lubis, Rachmania, & Prastia, 2020)	Cross-sectional	110 respondents	Factors that influence the use of MKJP are husband's support for the use of contraceptives
8	Determinants of Long-Acting and Permanent Methods (LAPMs) of Contraception Use in Jambi Province, Indonesia (Hardiani et al., 2020)	Non-reactive (secondary data)	849 fertile age couples are active KB participants	Determining factors: woman's age, education level, parity, age difference between children, knowledge, economic conditions, and place of residence.
9	Determinants of the Selection of Long-Term Contraceptive Methods (LMPs) at Sungai Jingah Community Health Center (Ilmi, Qariati, & Hidayati, 2021)	Cross-sectional	70 respondents	One of the factors that influences the choice of MKJP is husband's support.
10	Determinants of Long-Term Contraceptive Method Use in Indonesia (2017 SDKI Analysis) (Khatimah, Astuti, & Yuliani, 2022)	Non-reactive (secondary data)	19,522 women of childbearing age (15–49 years)	Factors related to the use of MKJP: age, parity, occupation, family planning costs, and decision making.
11	Long-Term Contraceptive Method Use among Married Women of Reproductive Age: Cross Sectional Study in South Sumatra (Idris et al., 2022)	Non-reactive (secondary data)	686 women of childbearing age (15–49 years)	Related factors: number of health worker visits, number of living children, and mother's occupation.

Age

Triyanto & Indriani (2018), Mirawati et al (2018), Yanti et al (2019), Suryanti (2019), Hardiani et al (2020), and Khatimah et al (Khatimah et al., 2022) found a significant relationship between age and choice of long-term contraceptive method. Women aged ≥ 35 years were 3.37 times more likely to use this contraceptive method (Khatimah et al., 2022). Research by Triyanto & Indriani (2018) found that women aged > 30 years used IUD contraception more often than women aged < 30 years. This is in line with research by Zendeudel et al (2020) which stated that older women preferred IUDs as an effective long-term method, especially to avoid pregnancy. Women aged 25-35 years were the most likely to use long-term contraception (Suryanti, 2019). Increasing age certainly increases the likelihood of choosing long-term contraception (Mirawati, 2018) due to greater levels of mental maturity (Khatimah et al., 2022). Women/couples of childbearing age will increasingly limit their births

and be in the phase of terminating pregnancies (Kungu et al., 2020). Additional evidence from other studies further strengthens this pattern. A 2021 study in Ethiopia found that older women had higher awareness of the effectiveness of long-term methods and were more motivated to avoid future pregnancies compared to younger women. Similarly, research in Kenya (Ngumbau et al., 2025) reported that women above 30 years prefer long-term contraception due to increased concerns about health risks associated with repeated pregnancies, as well as greater stability in family size. Meanwhile, a study in Bangladesh found that younger women tend to choose short-term methods because they still desire additional children, whereas older women shift toward MKJP as fertility intentions decrease (Moon, 2025).

Education

Triyanto & Indriani (2018), Yanti et al (2019), and Haridani et al (2020) found a significant association between education and the choice of long-term contraceptive methods. Women with higher education (high school and college) were 3.284 times more likely to use long-term contraceptive methods than women with lower education (elementary and junior high school) (Yanti et al., 2019). This is because more educated women have greater access to information about the benefits of long-term contraceptive methods (Hardiani et al., 2020)

Work

Triyanto & Indriani (2018), Khatimah et al (2022), and Idris et al (2022) found a significant association between employment and choice of long-term contraceptive method (MJP). Working women were 2.77 times more likely to use MJP than unemployed women (Idris et al., 2022). This is because working women tend to choose to delay or limit pregnancy due to career advancement (Khatimah et al., 2022).

Parity

Yanti et al (2019), Haridani et al (2020), and Khatimah et al (2022) found a significant relationship between parity (number of children) and the choice of long-term contraceptive methods (MWJP). Haridani et al (2020) study stated that 3 out of 4 women who use implants and IUDs choose not to have more children due to the number of children they already have. The more children in a family, the greater the likelihood of using long-term contraceptive methods because couples will begin to limit the number of children, or even stop having children (Khatimah et al., 2022).

Knowledge

Yanti et al (2019), Suryati et al (2019), and Hardiani et al (2020) found a significant relationship between knowledge and the choice of long-term contraceptive methods (MWJP). Knowledge is one of the factors underlying acceptors in using long-term contraception (Dewi et al., 2022). Mothers' knowledge about MWJP will form the basis for their behavior and perceptions. Correct knowledge will increase interest in using MWJP (Rismawati et al., 2020). Women with good knowledge are 4.038 times more likely to use MWJP contraception than those with less knowledge (Yanti et al., 2019). Women with good knowledge have the intention and awareness to use safe and high-quality contraceptives, according to their physical condition, which can minimize side effects (Setyorini et al., 2022). Rismawati et al (2020) and Khatimah et al (2022) found a significant relationship between attitude and choice of MKJP. Attitude is one factor that can change a person's behavior (Dewi et al., 2022). Respondents' attitudes are influenced by various factors, both internal and external. Personal experiences, the influence of others, culture, and mass media will provide good references for the use of MKJP (Rismawati et al., 2020). Respondents with a positive outlook will tend to have a positive attitude towards choosing to use MKJP (Dewi et al., 2022).

Husband's Participation/Husband's Support

Aryati et al (2018), Yanti et al (2019), Suryanti et al (2019), Lubis et al (2020), and Ilmi et al (2021) found a significant relationship between husband's support and the choice of long-term contraceptive methods. Husband's support significantly influences the choice of long-term contraception. Women who receive husband's support are 4.575 times more likely to use long-term contraceptive methods than women who receive less support from their husbands (Yanti et al., 2019). Research by Aryati et al (2018) found that the main barrier to IUD and implant use is a lack of husband's support. Husband's participation can be either directly by becoming a family planning acceptor or indirectly by providing support to his wife in using contraception and making joint decisions in choosing long-term contraception (Suryanti, 2019).

Income/Economic Status

Aryati et al (2018), Triyanto & Indriani (2018), Haridani et al (2020), and Khatimah et al (2022) found a significant relationship between income/economy and the choice of MKJP.

Attitude

Respondents with higher incomes were 2.47 times more likely to choose long-term contraception than those with lower incomes (Aryati et al., 2018). Women with higher economic status have better access to and information about contraception (Kungu et al., 2020). This is in line with research by Hardiani et al (2020) that found IUD use was more common among respondents with higher incomes. This is because cost is a key consideration when

choosing a long-term contraceptive method. Most women who use long-term contraceptive methods report higher costs for insertion compared to cheaper short-term contraceptive methods. This, of course, places a greater burden on respondents with lower incomes (Khatimah et al., 2022).

Residence

Aryati et al (2018), Triyanto & Indriani (2018), and Haridani et al (2020) found that there was a relationship which means between residence and MKJP selection. Women who reside in the area. Urban women are 4.26 times more likely to use MKJP than women living in rural areas (Hardiani et al., 2020). This is because women of childbearing age living in urban areas have greater access to education, information, and easier access to health services (Triyanto & Indriani, 2018).

Conclusion and Suggestion

Based on the results of the literature review, the researchers concluded that the low use of long-term contraceptive methods (LCMs) in Indonesia is influenced by multiple interconnected factors. The most influential factors identified across the reviewed studies include age, educational level, occupation, parity, knowledge, attitudes toward contraception, husband's participation and support, economic status, and place of residence. Among these, the strongest determinants consistently reported in the literature are women's knowledge and attitudes toward LCMs, partner support, and educational level. These key factors play a crucial role in shaping women's decisions to adopt long-term contraceptive methods.

References

- Al-Husban, N., Kaadan, D., Foudeh, J., Ghazi, T., Sijari, Y., & Maaita, M. (2022). Factors affecting the use of long term and permanent contraceptive methods: a Facebook-focused cross-sectional study. *BMC Women's Health*, 22(1), 204. <https://doi.org/10.1186/s12905-022-01784-0>
- Aryati, W., Wirawan, D., Kartika Sari, K. A., & Sawitri, A. (2018). Determinants of long-acting contraceptives use among reproductive-age couples in Tanjung Karang Public Health Centre Mataram City, West Nusa Tenggara. *Public Health and Preventive Medicine Archive Journal*, 6, 1. <https://doi.org/10.15562/phpma.v6i1.3>
- BKKBN. (2024). *INDONESIAN POPULATION REPORT 2024*.
- Dewi, T., Noor, M., Armanza, F., Aditya, R., & Rosida, L. (2022). Literature Review: Hubungan Pengetahuan dan Sikap dengan Penggunaan Metode Kontrasepsi Jangka Panjang (MKJP). *Homeostasis*, 5, 445. <https://doi.org/10.20527/ht.v5i2.6295>
- Hardiani, H., Hastuti, D., Islakhiyah, I., & Junaidi, J. (2020). Determinants of Long-Acting and Permanent Methods (LAPMS) of contraception use in Jambi Province , Indonesia. *Jurnal Perspektif Pembiayaan Dan Pembangunan Daerah*, 8(4), 353–368. <https://doi.org/10.22437/ppd.v8i4.10701>
- Idris, H., Sari, I., & Heru, H. (2022). Long-Term Contraceptive Method Use among Married Women of Reproductive Age: Cross Sectional Study in South Sumatra. *Open Access Macedonian Journal of Medical Sciences*, 10, 998–1003. <https://doi.org/10.3889/oamjms.2022.9273>
- Ilmi, M. B., Qariati, N. I., & Hidayati, R. (2021). Determinan Pemilihan Penggunaan Metode Kontrasepsi Jangka Panjang (MKJP) di Puskesmas Sungai Jingah. *Jurnal Akademika Baiturrahim Jambi*, 10(1), 94–100. <https://doi.org/10.36565/jab.v10i1.288>
- Kemenkes RI. (2020). *Pedoman Pelayanan Kontrasepsi dan Keluarga Berencana*. Kementerian Kesehatan Republik Indonesia.
- Kemenkes RI. (2022). *Profil Kesehatan 2021*.
- Khatimah, H., Astuti, Y. L., & Yuliani, V. (2022). Determinan Penggunaan Metode Kontrasepsi Jangka Panjang di Indonesia (Analisis SDKI 2017). *INSOLOGI: Jurnal Sains Dan Teknologi*, 1(2), 117–126. <https://doi.org/10.55123/insologi.v1i2.249>
- Kungu, W., Khasakhala, A., & Alfred, A. (2020). Open Peer Review Trends and factors associated with long-acting reversible contraception in Kenya [version 1; peer review: 1 approved] v1. *F1000Research*, 9(382).
- Lubis, F. A., Rachmania, W., & Prastia, ika N. (2020). FAKTOR-FAKTOR YANG BERHUBUNGAN DENGAN PENGGUNAAN METODE KONTRASEPSI JANGKA PANJANG (MKJP) PADA PESERTA KB AKTIF DI KELURAHAN MEKAR WANGI KECAMATAN TANAH SAREAL TAHUN 2019. *PROMOTOR Jurnal Mahasiswa Kesehatan Masyarakat*, 3(3).

- Mare, K. U., Abrha, E., Yesuf, E. M., Aychiluhm, S. B., Tadesse, A. W., Leyto, S. M., Sabo, K. G., Mulaw, G. F., Mohammed, O. A., & Ebrahim, O. A. (2022). Factors affecting utilization of long-acting reversible contraceptives among sexually active reproductive-age women in the pastoral community of Northeast Ethiopia: A community-based cross-sectional study. *Women's Health*, 18, 17455057221116514. <https://doi.org/10.1177/17455057221116514>
- Mirawati, M. (2018). ANALISIS DETERMINAN YANG BERHUBUNGAN DENGAN PEMILIHAN ALAT KONTRASEPSI OLEH AKSEPTOR KB DI PMB TUTI GAMBUT KABUPATEN BANJARKALIMANTAN SELATAN. *Journal of Midwifery and Reproduction*, 2, 31. <https://doi.org/10.35747/jmr.v2i1.321>
- Moon, M. P. (2025). Contraceptive behaviors and media influence among women in Bangladesh: exploring the effects of age and education. *Frontiers in Global Women's Health*, 6, 1492105. <https://doi.org/10.3389/fgwh.2025.1492105>
- Ngumbau, N. M., Kimonge, D., Dettinger, J. C., Abuna, F., Odhiambo, B., Gómez, L., Wagner, A. D., Marwa, M. M., Watoyi, S., Nzove, E., Pintye, J., Baeten, J. M., Kinuthia, J., John-Stewart, G., & Mugo, C. (2025). Cofactors of earlier uptake of modern postpartum family planning methods in Kenya. *PLOS Global Public Health*, 5(6), e0004353. <https://doi.org/10.1371/journal.pgph.0004353>
- Rismawati, R., Asriwati, A., Sibero, J., & J. Hadi, A. (2020). Faktor Yang Mempengaruhi Wanita PUS Terhadap Pemilihan Metode Kontrasepsi Jangka Panjang (MKJP) Di Puskesmas Mayor Umar Damanik Kecamatan Tanjungbalai Selatan Kota Tanjungbalai. *Media Publikasi Promosi Kesehatan Indonesia (MPPKI)*, 3, 100–105. <https://doi.org/10.56338/mppki.v3i2.1078>
- Setyorini, C., Lieskusumastuti, A. D., & Hanifah, L. (2022). Factors Influencing the Use of Long-Term Contraceptive Methods (LCM): A Scoping Review. *Journal of Health Research*, 5(1), 132–146.
- Suryanti, Y. (2019). FAKTO- FAKTOR YANG BERHUBUNGAN DENGAN PENGGUNAAN Factors Related to the Use of Long-Term Contraception Method in Fertilizer Age Women Yuli Suryanti. *Jambura*, 1(1), 20–29.
- Triyanto, L., & Indriani, D. (2018). Faktor yang mempengaruhi penggunaan jenis metode kontrasepsi jangka panjang (mkjp) pada wanita menikah usia subur di provinsi jawa timur. *The Indonesian Journal of Public Health*, 13(2), 244–255. <https://doi.org/10.20473/ijph.v113i1.2018.244-255>
- Yanti, D. E., Aryastuti, N., & Nurhayati. (2019). Faktor yang Berhubungan dengan ... (Dhiny Easter Y , Nurul Aryastuti , Nurhayati). *Jurnal Dunia Kesmas*, 8(April 2018), 62–72.
- Zendehdel, M., Jahanfar, S., Hamzehgardeshi, Z., & Fooladi, E. (2020). An Investigation into Long-acting Reversible Contraception: Use, Awareness, and Associated Factors. *European Journal of Environment and Public Health*, 4. <https://doi.org/10.29333/ejeph/7837>