



Elderly School in DKI Jakarta: Promoting Robust Elderly Health by Adopting the Lifelong Learning Concept

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Abstract. An aging population has occurred in DKI Jakarta Province, as data show the elderly population has exceeded 10% of the total population since 2020. Human aging occurs naturally, leading to declines in organ function and functional capacity. Innovative health promotion efforts are needed to effectively maintain the independence of the elderly and keep them healthy. The "Elderly School" (Sekolah Lansia/SL) is the intended innovation, initiated by Indonesia Ramah Lansia (IRL) and implemented as policy by the BKKBN, the leading sector in population. This study aims to evaluate the robustness of the elderly health promotion program implemented through the SMART Elderly School in DKI Jakarta since 2022. A mixed-method approach (quantitative and qualitative) was used to assess the implementation of the SMART Elderly School program, describe the characteristics of the elderly school participants in DKI Jakarta, and measure the quality of life of the elderly. The research population consisted of 129 elderly individuals who met the inclusion criteria. Data collection utilized questionnaires and the WHOQOL instrument to measure the quality of life of the elderly. Qualitative data were obtained through document studies, in-depth interviews, and participant observation. Qualitative data validation applied source and method triangulation techniques. Univariate quantitative data analysis was used to describe the characteristics and quality of life of the elderly. Qualitative data analysis used content analysis of in-depth interview transcripts and field notes. The results showed that the quality of life of the elderly school participants was in the high and very high categories, with characteristics varying across education, age, sex, marital status, and medical history over the past 2 (two) years. The implementation of the SMART Elderly School program in DKI Jakarta, as a robust elderly health promotion effort that adopts the concept of lifelong learning, is proven effective in maintaining the quality of life of the elderly.

Keywords: SMART Elderly; Elderly School; Health Promotion

1. Introduction

The elderly population in Indonesia continues to increase. In 2024, the number of elderly people reached 29 million, or 12% of the total population. This number is projected to continue increasing, reaching 19.9% by 2045 (BPS, 2024). Naturally, the elderly experience a decline in capacity, which can reduce their independence and quality of life. Therefore, the Government established the 2020-2024 National Medium-Term Development Plan (RPJMN), which includes policies for the elderly by strengthening social protection and ensuring the fulfillment of basic rights and inclusivity. Elderly welfare is also reinforced by the Regulation of the President of the Republic of Indonesia Number 88 of 2021 on the National Strategy on Aging, which emphasizes the elderly's right to lifelong education services as one of its pillars.

The Elderly School is an effort to promote robust elderly health by implementing the 7 (seven) dimensions of robust elderly (spiritual, emotional, social, intellectual, physical, vocational, and environmental). It was first organized by *Indonesia Ramah Lansia* (IRL) Yogyakarta. The evaluation results of its implementation in elderly communities in rural Yogyakarta indicated that the elderly school can improve the quality of life of the elderly (Endah, 2021). This good practice was subsequently adopted by the National Population and Family Planning Board (BKKBN) into a national program within the Elderly Family Development (BKL) units across Indonesia.

The function of BKKBN in the Special Capital Region (DKI) of Jakarta Province is carried out by the Department of Empowerment, Child Protection, and Population Control (PPAPP). The first elderly school in DKI Jakarta was organized by Universitas Respati Indonesia (URINDO) in 2019, using the SMART acronym (*Sehat, Mandiri, Aktif, Produktif, dan Bermartabat* - Healthy, Independent, Active, Productive, and Dignified). Its curriculum was developed according to the needs of urban communities with heterogeneous characteristics. The elderly population in DKI Jakarta was recorded at 951,557 people or about 11.7% of the total population (BPS DKI, 2024), spread across 5 administrative regions and the *Kepulauan Seribu* in 267 sub-districts. The elderly population in DKI Jakarta is dominated by the young elderly (60–69 years old) at 71% and the middle-to-advanced elderly (70 years old and above) at 29% (Open Data DKI, 2024).

In 2022, the DKI Jakarta PPAPP Department conducted training on managerial capacity building and pedagogical competence for human resources from 5 (five) PPAPP sub-departments to organize elderly schools in BKL. The follow-up to this training was the establishment of 6 (six) elderly schools (abbreviated as SL) across 5 (five) regions of DKI and the Thousand Islands. The names of these elderly schools are: i) SL Cempaka at BKL Central Jakarta, ii) SL Nirmala at BKL North Jakarta, iii) SL Anggrek Merah at BKL Kalideres, West Jakarta, iv) SL Fatmawati at BKL Fatmawati, South Jakarta, v) SL Mahira Kirana at BKL East Jakarta, and vi) SL Kakap Merah at BKL Thousand Islands.

By 2024, the implementation of SL in BKL across the 5 regions of DKI will have been running for 18 months. Therefore, an evaluation from various perspectives is necessary to assess achievements, identify implementation obstacles, improve management, enhance operations, and develop the curriculum for future elderly health promotion programs and innovations, particularly in DKI Jakarta. This evaluation of elderly school implementation in DKI Jakarta aims to strengthen sustainable age-friendly health promotion, thereby supporting Sustainable Development Goals (SDGs) 3 of ensuring healthy lives and promoting well-being for all at all ages.

2. Methods

This study employs quantitative and qualitative approaches using an evaluative design that adopts the Context-Input-Process-Product (CIPP) model developed by Stufflebeam (1960). The research locus was at the Elderly Schools in 6 regions of DKI Jakarta: South, North, East, West, Central, and Thousand Islands, conducted from May to July 2024. The research sample consisted of 129 elderly school participants who met the inclusion criteria and were selected from a total population of 148 members, all of whom were healthy, willing to be research subjects, and had participated in learning for 1 year.

The research instrument used the WHOQOL-BREF to measure the quality of life of the elderly. The management of the elderly school operation was evaluated qualitatively by reviewing the legal basis for operation, curriculum, infrastructure (including budget), facilitators, and participant attendance in accordance with the provisions. Univariate data analysis was used to describe the characteristics of the elderly school participants and their quality-of-life scores. Qualitative data analysis used content analysis. Data validity was ensured through source and method triangulation.

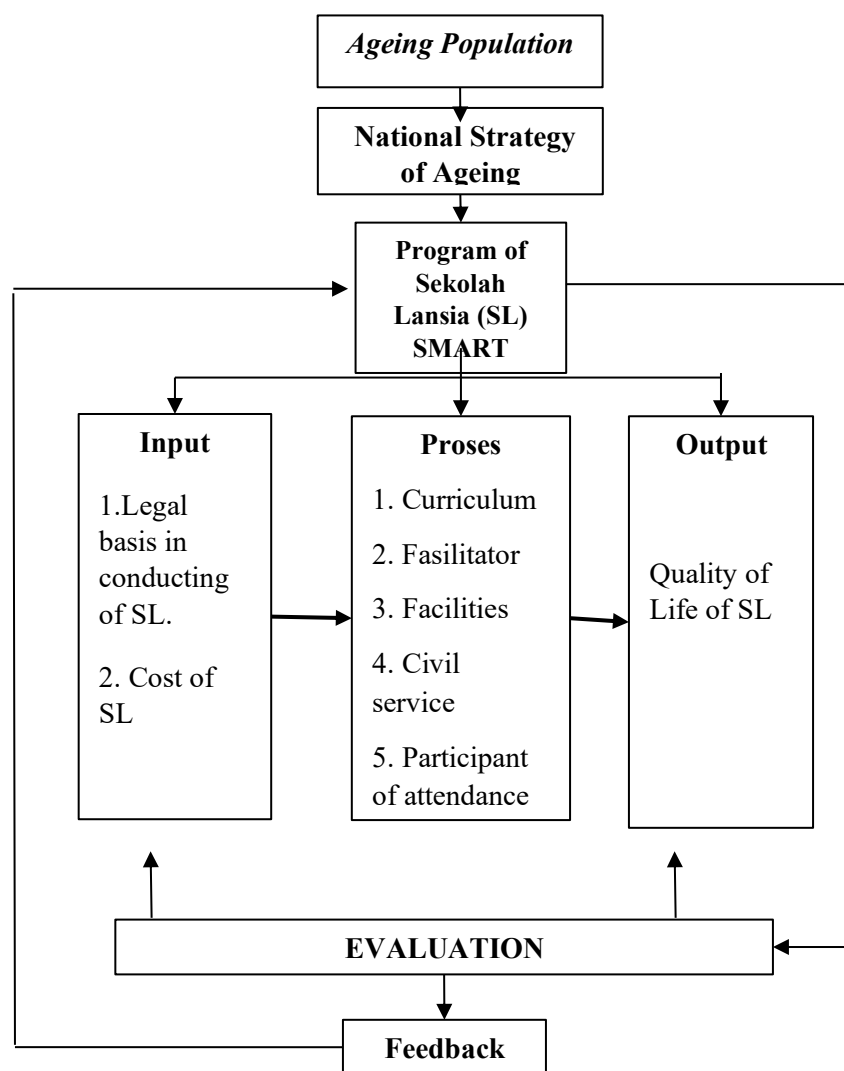


Figure 1. Conceptual Framework

The conceptual framework of the research can be described as follows:

Context: Aging Population -> SMART Elderly School Program

Input:

1. Legal basis for SL operation
2. Elderly school funding

Process:

1. Curriculum
2. Facilitators
3. Infrastructure

4. Governance (*Tata Pamong*)

5. Participant attendance

Output: Quality of Life of the Elderly

Evaluation & Feedback: National Strategy on Aging (*Stranas Kelanjutusiaan*)

3. Results and Discussion

The elderly policy whose implementation was reviewed is Presidential Regulation No. 88 of 2021 concerning the National Strategy on Aging (*Stranas Kelanjutusiaan*), which consists of 5 pillars: 1) social protection, 2) improvement of health status, 3) increasing public awareness, 4) strengthening institutions and caregivers, 5) fulfillment of elderly rights. Lifelong education is part of the first pillar and is manifested in the SMART Elderly School Program.

The elderly school is a health promotion model for robust elderly that adopts the concept of lifelong learning. It takes the form of an informal educational institution with 3 (three) learning stages: basic, intermediate, and advanced, which are termed Standard One (S1), Standard Two (S2), and Standard Three (S3). The study period spans 6 to 12 months, as agreed between management and participants. Beginning from planning, implementation, through to the results/benefits for the elderly, the data can be explained as follows:

3.1. Input Component

An assessment of the input components, consisting of the legal basis for operation and funding variables through document study, interviews, and observations, yielded data regarding the legality of the elderly schools in the 6 regions of DKI Jakarta, as shown in the following table:

Table 1. Profile of SMART Elderly Schools in DKI Jakarta

N o	Region	Name of SMART SL	Decree (SK) of Establishment	School Location	Number of Participants
1	South Jakarta	Fatmawati	Decree of the Head of Pondok Labu Sub-district No. 184 of 2022, Nov 1, 2022	RPTRA Pinang Pola	31 people
2	East Jakarta	Mahira Kirana	Decree of the Head of Cakung Sub-district, Nov 4, 2022	RPTRA Caktim Tersenyum	26 people
3	Central Jakarta	Cempaka	Decree of the Head of Cempaka Putih Sub- district No. 77 of 2022, Oct 31, 2022	RPTRA Matahari	28 people
4	West Jakarta	Anggrek Merah	Decree of the Head of Kalideres Sub-district No. 42/LS/VIII/2023, Aug 24, 2023	RPTRA Kalideres	16 people
5	North Jakarta	Nirmala	Decree of the Head of Sunter Jaya Sub-district	RPTRA Nirmala	29 people

No	Region	Name of SMART SL	Decree (SK) of Establishment	School Location	Number of Participants
6	Thousand Islands	Kakap Merah	No. 112 of 2022, Oct 31, 2022 Decree of the Head of Untung Jawa Sub-district No. 35 of 2022, Oct 28, 2022	RPTRA Amterdam	16 people
Total First batch participants (S1 level) as research subjects					148 people

Based on the data in Table 1, the 6 Elderly Schools in DKI Jakarta were organized in accordance with the Decree (SK) on the Establishment of BKL Elderly Schools issued by the local sub-district heads (*lurah*). This indicates that the Guidelines for Organizing Elderly Schools issued by the Directorate of Family Development for the Elderly and Vulnerable of BKKBN in 2021 have been well socialized and implemented.

Meanwhile, the variable of elderly school funding, studied through interviews with the 6 heads of the elderly schools, revealed that the local government (in this case, the sub-district office where the SL is held) does not provide an operational budget for the schools. Confirmation with the sub-district heads validated the school principals' statements, noting that the principle of independence is emphasized in the management of the Elderly Schools. Consequently, each SMART SL finances its operational needs in its own way, such as by setting up a voluntary contribution box for participants.

3.2. Process Component

There are 5 variables in the process component: 1) Curriculum, 2) Facilitators, 3) Infrastructure, 4) Governance, and 5) Participant attendance. All these variables were examined through document reviews and observations, with the 6 school principals serving as key informants.

3.2.1. Curriculum

The curriculum represents a set of plans and arrangements regarding objectives, materials, methods, and evaluations used as guidelines for learning implementation in the Elderly School. The school principals used the subjects recommended in the BKKBN guidebook, with the names, sequence of subjects, and time allocation as follows:

Table 2. Distribution of Subjects at the S1 Level (Standard One)

No	Subject Name	Time Allocation
1	Aging Process	120 minutes
2	13 Geriatric Syndromes	120 minutes
3	Balanced Nutrition for the Elderly	120 minutes
4	Hypertension Disease	120 minutes
5	Fall Prevention	120 minutes
6	Emergency Response (Overcoming Choking)	120 minutes
7	Elderly Gymnastics	120 minutes
8	Effective Communication	120 minutes
9	Mental Health	120 minutes
10	Yoga for Elderly Health	120 minutes

No	Subject Name	Time Allocation
11	Dental and Oral Health for the Elderly	120 minutes
12	Hobby Development 1	120 minutes

The choice of method for delivering learning materials was left to the facilitators brought in by the school principals. Based on observations, the materials given to participants consisted of health knowledge for the elderly, packed in simple language so that it could be easily understood by the elderly with varied characteristics.

3.2.2. Facilitators / Teachers

The summary of interviews with the 6 elderly school principals regarding the facilitators brought in as teachers can be narrated as follows:

"Teachers at the Elderly School are not required to hold a specific academic degree level, but rather anyone who is competent in the field corresponding to the subject and capable of transferring their life experiences that are beneficial for the daily lives of the elderly."

A document study on elderly school facilitators in DKI Jakarta showed data that each elderly school collaborates with universities in Jakarta. Several lecturers serve as facilitators, including those from Universitas Indonesia, Universitas Yarsi, URINDO, and Universitas YAI, as well as practitioners from public health centers (*Puskesmas*) and hospitals.

3.2.3. Infrastructure

Based on observations, the Elderly Schools in the 6 regions of DKI Jakarta are held at the RPTRA (Child-Friendly Public Space) in their respective sub-districts. They utilize standard infrastructure, including an open building with rooms (used as classrooms), a library, an open sports area, toilets, benches for group learning, and an LCD projector for teaching. School names and venues have been detailed in Table 1.

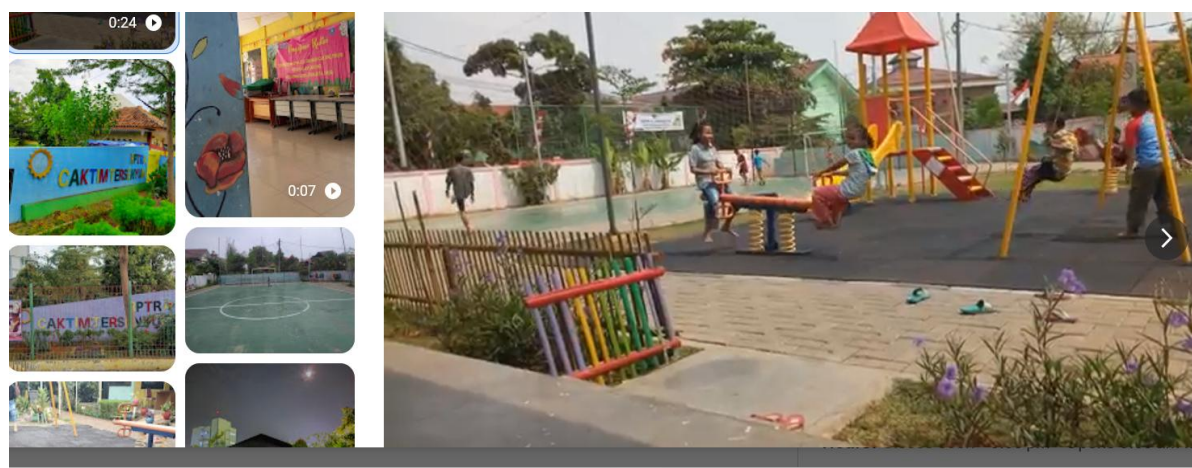


Figure 2. RPTRA Cakung Timur Tersenyum(East Cakung 'smiles')

The RPTRA shown in the image represents the other 5 RPTRAs in DKI Jakarta, as they are built and managed in accordance with standards set by the Provincial Government of DKI Jakarta. All of them are in very good condition and ideal for learning.

3.2.4. Governance (*Tata Pamong*)

The organizational structure running the elderly school is referred to as governance, which describes managerial functions consisting of: planning, budgeting, execution, evaluation, and follow-up. According to the structure set out in the Sub-district Head's Decree on the establishment of the elderly school, the governance consists of a Principal, a Secretary, and a Treasurer.

In-depth interviews with the managers regarding their main duties and functions (*Tupoksi*) can be described as follows:

"We are all volunteers; we do not receive a salary. There are no clearly written, specific duties. It simply states that we are responsible for running the school for the elderly. That's why we just learn to work together – the principal, secretary, and treasurer all help each other manage schedules, find willing facilitators, prepare attendance sheets, and communicate with RPTRA staff and participants in the event of schedule changes. The standard rules are already written in the guidebook."

Based on observations during classes, their statements were confirmed: the management of the elderly school is driven by a spirit of community service. The proportion of elderly school managers is dominated by women who come from health cadres or community empowerment activists.

3.2.5. Attendance of Participants / Students

The requirement for minimum attendance within 1 standard (stage), consisting of 12 meetings, is communicated to the participants at the beginning of the school year, which is a minimum of 80%. A document study regarding the number of participant attendances and their characteristics is presented in the tables below:

Table 4. Frequency Distribution of Elderly School Participants' Characteristics

Demographic Variable	Frequency (n)	Percentage (%)
Sex		
Male	14	10.9
Female	115	89.1
Total	129	100
Age		
60–70 years old	100	77.5
71–80 years old	28	21.7
> 80 years old	1	0.8
Total	129	100
Marital Status		
Married	74	57.4
Widow	49	38.0
Widower	6	4.7
Total	129	100
Education		
No Schooling	14	10.9
Elementary School (SD)	26	20.2
Junior High School (SMP)	16	12.4
Senior High School (SMA/SMK)	55	42.6
Diploma	4	3.1

Demographic Variable	Frequency (n)	Percentage (%)
Bachelor's Degree (Sarjana)	13	10.1
Postgraduate Degree	1	0.8
<i>Total</i>	<i>129</i>	<i>100</i>

Medical History	Frequency (n)	Percentage (%)
No history of illness	52	40.3
1-2 Illnesses	68	52.7
Three Illnesses	9	7.0
Total	129	100

The reported Elderly School participants met the minimum 80% attendance requirement, as confirmed during the evaluation. Of the initial 148 registered elderly individuals, the number decreased to 129 by the end of the program. Thus, the number of participants decreased by 19, possibly due to inactivity, illness, or death, preventing them from meeting the attendance requirements.

3.3. Output Component

The quality of life of the elderly was measured using the WHOQOL-BREF instrument among 129 elderly school participants who met the criteria, serving as the research sample. The measurement results are shown in the table below:

Table 5. Frequency Distribution of Quality of Life of Elderly School Participants

Quality of Life	Frequency (n)	Percentage (%)
High	95	73.6
Very High	34	26.4
Total	129	100

The data in Table 5 on the quality of life of the elderly school participants indicate that no elderly individual fell into the poor/low-quality-of-life category. A total of 73.6% possessed a high quality of life, and the remaining 26.4% enjoyed a very high quality of life.

3.4. Discussion

The discussion of the research results focuses on 3 (three points: first, elderly policies in Indonesia. Second, the health promotion program for robust elderly is packed into the SMART Elderly School. Third, the impact on the elderly in the community who attend the elderly school, as well as the community involved in its operation.

First, Indonesia has built an elderly policy framework through 2 (two primary legal instruments: Law No. 13 of 1998 as a historical foundation, and Presidential Regulation (Perpres) No. 88 of 2021 as a more comprehensive and adaptive strategy for contemporary challenges. Law No. 13 of 1998 laid the foundation for social protection and welfare guarantees, focusing on the elderly as beneficiaries. However, its scope was limited to basic social and health aspects and had not yet adopted a comprehensive human rights perspective.

Perpres No. 88 of 2021 expanded this scope into a comprehensive strategy with 5 (five) pillars: health, environment, institutional, individual capacity, and rights. It adopts a human

rights-based approach, aligning with the global agenda for healthy aging and the Madrid International Plan of Action on Aging (MIPAA). Perpres No. 88 of 2021 significantly accommodates and extends the spirit of Law No. 13 of 1998, while simultaneously aligning Indonesia with the global commitment to the United Nations (UN) Decade of Healthy Aging and MIPAA (2002). Nevertheless, an amendment to Law No. 13 of 1998 is still required to establish a stronger, more binding legal framework.

Second, the SMART Elderly School in DKI Jakarta serves as an implementation of elderly policies that promote health by adopting a lifelong learning approach. This means the elderly are conditioned to learn without age limits. Using the word "school" provides a positive label, helping the elderly remain active, acquire new knowledge, learn skills, and practice technological products needed in modern life that did not exist in their past.

The seven dimensions of robust elderly / seven dimensions of wellness (ICAA, 2013), which consist of spiritual, emotional, social, intellectual, physical, vocational, and environmental dimensions, are practiced in every meeting through 8 learning steps (Guidelines for Organizing Elderly Schools in BKL, BKKBN 2021). In Malang, East Java, the elderly school is called *Sekolah Masa Keemasan Lansia* (SMK) / Elderly Golden Age School (EGAS). The research by Iswari et al. (2022) in the urban and rural areas of Malang found that SMK was used to increase the entrepreneurial capacity of the elderly by producing goods and services that were marketed via digital platforms, following lessons from facilitators at the Elderly School.

Third, the impact on the community/participants of the elderly school in DKI Jakarta includes the finding that the elderly's quality of life was high/good at 73.6% and very high/very good at 26.4%, after 1 (satu) year of following lessons with a minimum 80% attendance rate. No elderly individuals were found to have a low quality of life. Learning in the elderly school can also reduce the risk of loneliness among the elderly.

Research by Resty et al. (2023) in East Jakarta discovered that the loneliness index in the elderly school was the lowest at 29.61, compared to the elderly in private nursing homes (34.76), state nursing homes (39.96), BKL (36.97%), and the general community (3.66%). The high quality of life among the SMART Elderly School participants in DKI is due to their conditioning to be active and to practice a healthy lifestyle. Research by Romauli et al. (2025) in North Jakarta found that daily physical activity was associated with better health status and quality of life among the elderly. Participants engaged in moderate levels of physical activity, and their quality of life was categorized as fair to good. A statistically significant correlation was found between physical activity and quality of life ($p < 0.05$), with moderate physical activity showing the highest odds ratio (OR = 3.600).

A positive impact was also observed among elderly health cadres in DKI Jakarta; qualitative research data showed that managing the SMART Elderly School increased their insights and their ability to collaborate with various institutions, including universities.

Conclusions

Presidential Regulation No. 88 of 2021 concerning the National Strategy on Aging can be executed through a simple program in DKI Jakarta, namely the SMART Elderly School, by providing stimuli (HR training) from the Government and optimizing available resources (RPTRA). The SMART Elderly School in DKI Jakarta, as a form of health promotion for a robust elderly population, successfully encourages elderly people to remain active through a curriculum that fosters interaction and relationships among learners. The quality of life of the

elderly is high/good and very high/very good. The SMART Elderly School in DKI Jakarta has become an effective medium for campaigning for the rights of the elderly in society.

Conflicts of Interest

The authors declare no conflict of interest.

References

- Badan Kependudukan dan Keluarga Berencana Nasional (BKKBN). 2020. Lansia sehat, aktif, dan bermartabat. [Online] Available from: <https://www.bkkbn.go.id/berita-lansia-sehat-aktif-dan-bermartabat> [Accessed: 27 Juli 2023]
- Badan Pusat Statistik (BPS). (2022). Angka Harapan Hidup (AHH) Menurut Provinsi dan Jenis Kelamin (Tahun), 2020-2022 [Online] Available from: <https://www.bps.go.id/indicator/40/501/1/angka-harapan-hidup-ahh-menurut-provinsi-dan-jenis-kelamin.html> [Accessed: 27 Juli 2023]
- Badan Pusat Statistik (BPS). (2022). Statistik Lanjut Usia Tahun 2022. [Online] Available from: <https://www.bps.go.id/publication/2022/12/27/3752f1d1d9b41aa69be4c65c/statistik-penduduk-lanjut-usia-2022.html> [Accessed: 28 Juli 2023]
- Bappenas. 2020. Rencana Pembangunan Jangka Menengah Nasional 2020-2024. Jakarta : Kementerian PPN.
- Depkes RI. (2013). Gambaran Kesehatan Lanjut Usia di Indonesia, Buletin Lansia, Pusat Data dan Informasi. Jakarta : Kemenkes RI.
- Depkes RI. 1992. Pedoman Penggolongan dan Diagnosis Gangguan Jiwa III (PPDGJ-III). Jakarta : Direktorat Kesehatan Jiwa Depkes RI.
- Depkes RI. 1998. Pedoman Penggolongan dan Diagnosis Gangguan Jiwa III (PPDGJ-III). Jakarta : Direktorat Kesehatan Jiwa Depkes RI.
- Dinas Sosial DKI Jakarta dalam BPS. (2021). Jumlah Penyandang Masalah Kesejahteraan Sosial (PMKS) Menurut Jenis dan Kabupaten/Kota Administrasi Tahun 2019-2021. [Online] Available from: <https://jakarta.bps.go.id/indicator/27/615/1/jumlah-penyandang-masalah-kesejahteraan-sosial-pmks-menurut-jenis-dan-kabupaten-kota-administrasi-.html> [Accessed: 27 Juli 2023]
- Ghufron, M. dan Risnawati, N.R. (2014). Teori - Teori Psikologi. Yogyakarta: ArRuzz Media.
- Heryanah. (2015) Aging Population dan Bonus Demografi Kedua di Indonesia. Jurnal Populasi, Vol.23, Nomor 2, Tahun 2015, hal.1-16.
- Iswari Hariastuti, Muhammad Dawam, Sri Sugiharti, Tri Suratmi, Dwi Endah Kurniasih, Dwi Budiningsari (2024), Elderly Golden Age School (EGAS): a strategy to promote health and prosperity of the elderly in Indonesia.
- Jakarta Open Data. (2020): Data Jumlah Penduduk Lanjut Usia Berdasarkan Jenis Kelamin Per Kelurahan Tahun 2020 [Online] Available from: <https://data.jakarta.go.id/dataset/jumlah-penduduk-lansia-provinsi-dki-jakarta/resource/44be29ca3837b570e6ed887d0fca3539> [Accessed: 28 Juli 2023]
- Jakarta Open Data. (2020): Data Jumlah Warga Binaan Sosial (WBS) Dinas Sosial Provinsi DKI Jakarta Tahun 2020 [Online] Available from: <https://data.jakarta.go.id/dataset/data-jumlah-warga-binaan-sosial-wbs-dinas-sosial-provinsi-dki-jakarta-tahun-2020/resource/e8bf2e58-d8be-4f85-9a5d-6dce48351809> [Accessed: 28 Juli 2023]

- Jakarta Open Data. (2020):Data Jumlah Penduduk Provinsi DKI Jakarta Berdasarkan Kelompok Usia dan Jenis Kelamin Tahun 2020 [Online] Available from: <https://data.jakarta.go.id/dataset/data-jumlah-penduduk-provinsi-dki-jakarta-berdasarkan-kelompok-usia-perkelurahan/resource/39b382ab7b3c2848c68af0ff0cfd04a2> [Accessed: 28 Juli 2023]
- Kaplan, H.I., Sadock, B.J. 1998. Ilmu Kedokteran Jiwa Darurat. Penerjemah (W.M. Roan). Jakarta: Widya Medika.
- Kemendes RI. Hasil Utama Riset Kesehatan Dasar (RISKESDAS). Badan Penelitian dan Pengembangan Kesehatan (2018). Jakarta
- Kementerian Kesehatan Indonesia 2020. Rencana Aksi Nasional 2020-2024 tentang Kesehatan Lansia . Jakarta : Kementerian Kesehatan.
- Peraturan Menteri Sosial (Permensos) Nomor 19 Tahun 2012. Tentang Pedoman Pelayanan Sosial Bagi Lanjut Usia. Jakarta : Kementrian Sosial
- Peraturan Presiden Nomor 88 Tahun 2021 Tentang Rencana Strategis Kelanjutusiaan 2019-2024.
- Romauli, Tri Budi W.Rahardjo, Tri Suratmi (2025). The Correlation Between Physical Activity And Quality of Life Among The Elderly In North Jakarta.
- UU No. 13 tahun 1998. Tentang Kesejahteraan Lanjut Usia. Jakarta: Peraturan Presiden Republik Indonesia.
- UU No.36 Tahun 2009. Tentang Kesehatan. Jakarta: Peraturan Presiden Republik Indonesia.
- UU No.52 Tahun 2009. Tentang Perkembangan Kependudukan dan Pembangunan Keluarga. Jakarta : Peraturan Presiden Republik Indonesia.
- World Health Organization (WHO). (2022). Aging and Health. [Online] Available from: <https://www.who.int/news-room/fact-sheets/detail/ageing-and-health> [Accessed: 28 Juli 2023]
- Worldbank. (2020) Rasio Jumlah Masyarakat Miskin [Online] Available from: <https://data.worldbank.org/country/indonesia?locale=id> [Accessed: 27 Juli 2023]

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