

## Sociocultural and Economic Factors Influencing JKN Participation: A Cross-Sectional Study in Bajoe, Indonesia

Muhammad Rizki Ashari<sup>1</sup>, Arwan<sup>2</sup>, Sadli Syam<sup>3</sup>

<sup>1,2,3</sup>Universitas Tadulako, Indonesia

Correspondent: [Aiiyrizki@yahoo.com](mailto:Aiiyrizki@yahoo.com)<sup>1</sup>

Received : August 28, 2024

Accepted : October 19, 2024

Published : October 31, 2024

Citation: Ashari, M, R., Arwan., Syam, S. (2024). Sociocultural and Economic Factors Influencing JKN Participation: A Cross-Sectional Study in Bajoe, Indonesia. *Medicor: Journal of Health Informatics and Health Policy*, 2(4), 245-258.

<https://doi.org/10.61978/medicor.v2i4.709>

**ABSTRACT:** The implementation of the Jaminan Kesehatan Nasional (JKN) program in Indonesia seeks to achieve Universal Health Coverage by ensuring equitable access to health services for all citizens. Despite this aim, disparities in participation persist, particularly in rural and coastal regions. This study aimed to analyze the factors influencing community participation in the JKN program within the working area of Bajoe Community Health Center, Bone Regency. A cross sectional quantitative approach was used to survey 291 respondents selected through purposive sampling. Structured questionnaires were administered to assess demographic characteristics and the influence of five key variables: knowledge, trust, income, health condition, and family support. Data were analyzed using univariate and bivariate (Chi square) statistical techniques. Results revealed that knowledge, trust in the JKN system, income level, and family support had statistically significant associations with program participation ( $p < 0.05$ ). Specifically, individuals with better knowledge, higher trust, greater income, and supportive families were more likely to be enrolled. Conversely, perceived or actual health status showed no significant correlation with participation. These findings suggest that proactive enrollment behavior is influenced more by informational, economic, and social dynamics than by immediate health needs. The study concludes that increasing JKN participation requires multi-dimensional strategies, including culturally tailored public education, institutional trust building, improved subsidy access for low income households, and family centered outreach. These interventions are essential to bridge participation gaps and strengthen the national health insurance framework.

**Keywords:** National Health Insurance, JKN, Participation, Health Literacy, Public Trust, Family Support, Indonesia.



This is an open access article under the CC-BY 4.0 license

## INTRODUCTION

National health insurance schemes are globally recognized as critical instruments for achieving Universal Health Coverage (UHC), which seeks to ensure that all individuals and communities receive the health services they need without suffering financial hardship. Countries worldwide

have transitioned from voluntary to compulsory health insurance systems, particularly by evolving from community based models into national programs that mandate participation. This strategic shift has enhanced access to healthcare services and provided substantial financial protection to the general population (Couturier et al., 2022; Kigume & Maluka, 2021). Health insurance systems are globally acknowledged as a means to achieve Universal Health Coverage (UHC), ensuring that people can access needed services without financial barriers. While many countries have successfully transitioned to compulsory national health insurance, challenges remain in rural and underserved areas. Communities often face economic hardship, limited health facilities, and cultural norms that influence healthcare-seeking behavior (Muhlis, 2022).

Indonesia introduced Jaminan Kesehatan Nasional (JKN) in 2014, managed by BPJS Kesehatan, as a step toward UHC. The program unified fragmented schemes into a centralized system and has since expanded to serve diverse groups. Despite progress, resistance initially arose due to concerns about service quality and administrative inefficiency (Nugroho et al., 2023). In response, various reforms were implemented to improve institutional transparency, service delivery, and public awareness. These efforts have gradually fostered increased public trust and broader program uptake (Muhlis, 2022). Despite progress, regional disparities in enrollment persist, with urban areas displaying higher participation rates compared to rural and coastal communities such as Bajoe in Bone Regency.

The region of Bajoe presents a microcosm of the broader challenges facing Indonesia's efforts to implement equitable healthcare access. Located in a coastal area of Bone Regency, South Sulawesi, Bajoe is characterized by a relatively low rate of JKN enrollment despite national mandates. According to the Bone District Health Office, by the end of 2023, JKN coverage in the region had only reached approximately 78% of the population well below the national target of 95%. This shortfall is attributed to several factors, including limited public knowledge of the program, economic hardship, cultural attitudes towards health services, and a general mistrust of public institutions. These issues underscore the necessity of localized studies to better understand the context specific determinants of health insurance participation.

The Health Services Utilization Model (Andersen) provides a framework to understand participation in health insurance. It categorizes determinants as predisposing (e.g., age, gender, education), enabling (e.g., income, information access), and need factors (e.g., perceived or actual health status) (Alesane & Anang, 2018; Odusola et al., 2016). In Bajoe, these structural and cultural determinants interact, shaping community choices about JKN enrollment.

Furthermore, socio cultural influences profoundly shape health behavior in communities like Bajoe. In such settings, family structures and traditional beliefs often determine health seeking decisions. Misconceptions about the relevance of health insurance, skepticism towards formal medical institutions, and a preference for traditional healing methods can all act as deterrents to enrollment (Adebayo et al., 2015; Duku, 2018). Gender norms also play a significant role, with women in patriarchal societies often lacking autonomy in health related decisions and thus being underrepresented among insurance participants (Akokuwebe & Idemudia, 2022; Minyihun et al.,

2019). These realities highlight the need for culturally sensitive policy interventions and inclusive health education campaigns that consider the socio cultural fabric of the target population.

Disparities in JKN participation are also geographically distributed. Provinces with greater economic development and urban infrastructure tend to show higher enrollment rates and better healthcare utilization. Conversely, rural and low income regions face persistent challenges due to poor transportation networks, limited healthcare facilities, and a lack of targeted information dissemination (Shewamene et al., 2021). In these areas, even when subsidies are provided, administrative hurdles such as the absence of national identification cards or formal addresses can inhibit access to benefits (Muhlis, 2022). This inequality in access and outcomes calls for more granular, context driven strategies to bridge the participation gap.

Another crucial determinant of JKN enrollment is public perception. People's trust in the effectiveness and fairness of the healthcare system significantly influences their willingness to participate. Negative perceptions rooted in previous negative experiences, hearsay, or administrative delays can erode confidence in the system, thereby reducing enrollment rates (Muhlis, 2022). Conversely, positive user experiences, transparent communication, and efficient service delivery can build public trust and encourage participation (Couturier et al., 2022). Outreach programs that address local misconceptions and provide clear, accurate information about the benefits and processes of JKN can be instrumental in shaping favorable public opinion (Nyande et al., 2022).

Applying Andersen's model to the Indonesian context offers a nuanced understanding of the interplay between individual characteristics, community dynamics, and systemic structures in influencing health service utilization. In Bajoe, the convergence of enabling and predisposing factors with unique socio cultural influences necessitates an integrated approach to policy and program development. Government and local stakeholders must not only address economic and logistical barriers but also consider behavioral and perceptual dimensions of healthcare access.

In light of these challenges and complexities, this study aims to analyze the specific factors influencing community participation in the JKN program in the working area of Bajoe Community Health Center. The focus lies on examining the roles of knowledge, trust in the JKN system, income levels, health conditions, and family support in shaping enrollment decisions. By identifying these variables and their interrelations, the research seeks to contribute evidence based recommendations for enhancing JKN participation at the local level. The novelty of this study lies in its contextual sensitivity and integration of socio cultural perspectives, providing insights that are essential for the design of inclusive and effective health policies in Indonesia.

## **METHOD**

This study applied a quantitative cross-sectional design to analyze associations between independent variables and JKN participation at a single time point. The design was chosen for its practicality in capturing population health trends in resource-limited settings (Nour-Eldein et al.,

## Sociocultural and Economic Factors Influencing JKN Participation: A Cross-Sectional Study in Bajoe, Indonesia

Ashari, Arwan, and Syam

---

2014). While useful for identifying associations, it cannot establish causality and is vulnerable to selection bias if sampling is not representative (Moreno-Fernández & Matute, 2020; Parsons et al., 2021).

The study was conducted in December 2023 in the service area of UPTD Puskesmas Bajoe, located in Tanete Riattang Timur Subdistrict, Bone Regency, South Sulawesi Province, Indonesia. The selection of this site was based on its low JKN participation rates, making it an appropriate setting for exploring the underlying factors affecting insurance enrollment.

The study population comprised heads of households or adult members ( $\geq 18$  years) in the Bajoe Health Center service area. Based on administrative records, the target population was 1,202 individuals. Using Slovin's formula (5% margin of error), the required sample was 291 respondents.

Purposive sampling was used with inclusion criteria: aged  $\geq 18$  years, residing at least six months in Bajoe, and willingness to participate. This method was chosen to ensure respondents were relevant to the study objectives. Although purposive sampling risks selection bias and limits generalizability (Gustavson et al., 2019; Naderifar et al., 2017), it was justified because the study targeted specific determinants of JKN participation in a localized rural population.

The dependent variable was participation in the JKN program (yes or no). The independent variables included: (1) level of knowledge about JKN, (2) trust in the JKN system, (3) income level, (4) health condition, and (5) family support. These variables were chosen based on Andersen's Health Services Utilization Model, which underscores the significance of predisposing, enabling, and need based factors in healthcare decisions.

Data were collected using a structured questionnaire comprising validated items that measure the aforementioned variables and respondent characteristics. The questionnaire was pre tested to ensure reliability and validity. Secondary data from the local BPJS office and the health center's administrative records were also reviewed to support the primary findings.

Analysis was conducted in two phases:

- **Univariate analysis:** Employed to describe the frequency and percentage distributions of respondents' characteristics and each variable.
- **Bivariate analysis:** Conducted using the Chi square test to assess the association between independent variables and JKN participation. This test is commonly used in public health studies to evaluate relationships between categorical variables (Kasu et al., 2021). Logistic regression may be considered for future studies to adjust for confounding variables and better understand predictors of JKN participation (Masters & Reither, 2019).

The study obtained ethical clearance and official permission from the Bajoe Community Health Center and the Bone District Health Office. Informed consent was obtained from each participant after explaining the study's objectives, procedures, and their rights to confidentiality and voluntary participation.

---

## RESULT AND DISCUSSION

Most respondents were in the productive age group of 30–44 years (43.6%), followed by younger adults aged 18–29 (35.1%). Only a small proportion were  $\geq 60$  years (5.5%). This age structure indicates that health insurance decisions are shaped largely by economically active individuals who tend to engage in household decision-making. Younger adults may be more adaptable to health reforms, whereas older adults face mobility and outreach challenges (Kino & Kawachi, 2019; Park et al., 2022).

**Table 1. Distribution of Respondents by Age**

Age (Years)	Frequency (n)	Percentage (%)
18–29	102	35.1
30–44	127	43.6
45–59	46	15.8
$\geq 60$	16	5.5
<b>Total</b>	<b>291</b>	<b>100.0</b>

Women constituted a larger share of respondents (59.5%). This reflects gendered household dynamics, as women are often more available during surveys and play key roles in domestic health decisions. However, limited financial autonomy in some cases may restrict their enrollment choices (Barnes & Hanoch, 2017).

**Table 2. Distribution of Respondents by Gender**

Gender	Frequency (n)	Percentage (%)
Male	118	40.5
Female	173	59.5
<b>Total</b>	<b>291</b>	<b>100.0</b>

About two-thirds of respondents (63.2%) were enrolled in JKN, while more than one-third were not. This suggests that significant gaps remain toward the national coverage target of 95%. Prior studies show such gaps often intersect with socioeconomic and cultural determinants (Edward et al., 2020).

**Table 3. Distribution of Respondents by JKN Participation**

JKN Participation	Frequency (n)	Percentage (%)
Yes	184	63.2
No	107	36.8
<b>Total</b>	<b>291</b>	<b>100.0</b>

### Knowledge and JKN Participation

Table 4 shows a statistically significant relationship between knowledge levels and JKN participation ( $p = 0.001$ ). Among respondents with good knowledge, 172 (80.0%) were participants, whereas among those with poor knowledge, only 12 (15.8%) were enrolled. This supports existing findings that health literacy positively correlates with insurance enrollment (Housten et al., 2016). Individuals with higher literacy levels are more capable of navigating the technical aspects of the insurance process, understanding benefits, and making informed decisions (Politi et al., 2020). Effective communication strategies, including localized workshops and community based outreach, are essential to boost enrollment in such populations (Mahmood et al., 2018).

**Table 4. Relationship between Knowledge and JKN Participation**

Knowledge Level	Participating (n)	Not Participating (n)	Total (n)	<i>p-value</i>
Good	172	43	215	0.001
Poor	12	64	76	

### Trust in the JKN System

As reflected in Table 5, there is a strong association between trust in the JKN system and program participation ( $p = 0.000$ ). Of those who reported high trust in the system, 148 (83.6%) were participants, compared to only 36 (31.6%) among those with low trust. Trust is multifaceted, involving belief in institutional transparency, service quality, and fairness in administration (Baroudi et al., 2022; Sadeghi, 2024). When communities perceive service delivery to be equitable and trustworthy, their willingness to engage with national health programs increases significantly (Kalajahi et al., 2022). Conversely, negative service experiences or lack of procedural clarity can lead to skepticism and resistance (Panda, 2023).

**Table 5. Relationship between Trust in JKN and Participation**

Trust Level	Participating (n)	Not Participating (n)	Total (n)	<i>p-value</i>
High	148	29	177	0.000
Low	36	78	114	

### Income Level and Participation

According to Table 6, income level significantly influenced JKN participation ( $p = 0.004$ ). Of those earning above the minimum wage (UMK), 57 (87.7%) were participants, while only 127 (56.2%) of those earning below or equal to UMK enrolled. This disparity underscores the impact of socioeconomic status on healthcare decisions. Lower income households may prioritize daily survival over long term health investment (Vardanjani et al., 2020; Zohar et al., 2022). Additionally, many may not be aware of available subsidies or may face administrative obstacles that hinder their

enrollment (Ward et al., 2015). Countries with universal systems like Australia's Medicare model highlight how combining public funding with accessible structures can mitigate these income based gaps (Amara et al., 2022).

**Table 6. Relationship between Income and JKN Participation**

Income Level	Participating (n)	Not Participating (n)	Total (n)	<i>p-value</i>
Above Minimum Wage (UMK)	57	8	65	0.004
Below/At UMK	127	99	226	

### Family Support

Table 7 indicates a statistically significant relationship between family support and JKN participation ( $p = 0.002$ ). Among those with supportive families, 179 (75.5%) were participants, while only 5 (9.3%) of those without support enrolled. This aligns with literature emphasizing the role of familial dynamics in health behaviors, especially within collectivist cultures like Indonesia's (Khanal et al., 2022). Families often serve as key influencers, particularly when decisions involve shared financial commitments or intergenerational discussions. Tailored interventions targeting family units rather than individuals may therefore be more effective in increasing participation.

**Table 7. Relationship between Family Support and JKN Participation**

Family Support	Participating (n)	Not Participating (n)	Total (n)	<i>p-value</i>
Supportive	179	58	237	0.002
Not Supportive	5	49	54	

### Health Condition

As shown in Table 8, the analysis revealed no statistically significant association between perceived health condition and JKN participation ( $p = 0.082$ ). Interestingly, even respondents who reported being in good health chose to enroll, while some with poor health did not. This reflects a complex interplay between perceived risk, past health experiences, and behavioral motivations (Shahin & Hussien, 2020). Some individuals may view insurance as a safeguard regardless of current health, driven by social cues or administrative requirements (Gantiva et al., 2021). Others may postpone enrollment due to disbelief in personal vulnerability or due to barriers like cost and complex procedures.

**Table 8. Relationship between Health Condition and JKN Participation**

Health Condition	Participating (n)	Not Participating (n)	Total (n)	<i>p-value</i>
Good	174	103	277	0.082
Poor	10	4	14	

In conclusion, the bivariate analysis confirms that knowledge, trust, income level, and family support significantly affect JKN participation, while perceived health status does not show a significant direct effect. These findings underscore the need for multifaceted strategies incorporating educational, institutional, economic, and cultural dimensions to enhance participation in national health insurance programs.

This study confirmed that knowledge, trust, income, and family support are significant determinants of JKN participation, whereas health status was not. Using Andersen's Health Services Utilization Model, the findings demonstrate that enabling and predisposing factors outweigh need-based factors in shaping enrollment decisions. This highlights the multidimensional nature of healthcare choices in rural and coastal Indonesia.

Knowledge strongly influenced JKN participation, consistent with studies showing that higher health literacy facilitates navigation of insurance systems (Park et al., 2022; Politi et al., 2020). In Bajoe, limited awareness of program benefits contributes to lower coverage. Tailored health education using local languages, trusted community channels, and simple messaging is essential to reduce informational barriers (Mahmood et al., 2018; Yego et al., 2023).

Trust emerged as a decisive factor. Respondents with greater confidence in JKN's fairness and service quality were significantly more likely to participate. This echoes findings from Baroudi et al. (2022), which emphasized transparency and reliability as trust drivers. In Bajoe, anecdotal dissatisfaction and administrative delays risk eroding confidence. Strengthening service quality, responsiveness, and patient-centered care can build the institutional trust necessary for sustained participation. In Bajoe, the presence of anecdotal dissatisfaction or procedural delays could erode public confidence. Therefore, health providers and BPJS Kesehatan must ensure service reliability and facilitate interpersonal trust building through patient centered care and responsive feedback systems (El-Sayed et al., 2018).

Income was also shown to influence JKN participation significantly. Individuals with earnings above the regional minimum wage were more likely to allocate part of their resources to insurance premiums. This reinforces prior conclusions that financial stability enables proactive health planning (Hanson et al., 2022; Zohar et al., 2022). Nonetheless, this also underscores a persistent inequity: low income households may perceive JKN premiums as unaffordable despite being eligible for subsidies. Literature recommends simplifying the subsidy enrollment process and expanding awareness about financial assistance options to address this barrier (Cho et al., 2019; Nandi et al., 2021). Equally, the involvement of local governments in identifying and enrolling vulnerable populations could improve equity in access.

Family support also played a critical role, consistent with theories on collectivist cultures where health decisions are often made jointly. Respondents with family encouragement were more likely



to register for JKN, reaffirming the value of familial influence on health behavior. Consequently, integrating family dynamics into public health strategies could amplify outreach effectiveness. For instance, local health centers might organize family oriented informational events and empower community figures to champion JKN participation (Ataguba, 2021; Fisher et al., 2020).

Interestingly, perceived or actual health condition did not significantly influence participation. This contradicts some assumptions that individuals only seek insurance when ill. Instead, it suggests a rising awareness of the importance of proactive health planning, potentially driven by policy mandates or family obligations (Bronfman et al., 2021). However, public campaigns should still emphasize the value of enrolling when healthy to mitigate unexpected future risks.

Strategically, to improve JKN uptake, community level engagement must be intensified. Establishing local health committees can promote accountability and culturally responsive programming (Fisher et al., 2020). Likewise, hosting health fairs and involving local champions in advocacy can further boost trust and normalize participation (Twum et al., 2023).

Policy recommendations include simplifying enrollment procedures, particularly for marginalized groups such as informal workers and rural residents. Additionally, partnerships between health facilities and community organizations could foster deeper integration of JKN messaging into daily social interactions (Shrime et al., 2015).

This study used a cross-sectional design, limiting causal inference. Purposive sampling may introduce selection bias and restrict generalizability beyond Bajoe. Responses were self-reported and may be subject to recall or social desirability bias. Future research should employ longitudinal or probability-based sampling and incorporate qualitative approaches to capture deeper sociocultural insights.

In conclusion, increasing JKN participation requires multi-dimensional approaches that simultaneously address individual knowledge gaps, build systemic trust, accommodate economic realities, and leverage family and community networks. By operationalizing these insights into local health policies and outreach strategies, Indonesia can move closer to achieving Universal Health Coverage, particularly in underserved regions like Bajoe.

## **CONCLUSION**

This study found that JKN participation in Bajoe is significantly influenced by knowledge, trust in the system, income level, and family support, while health status was not a determining factor. These results indicate that informational, social, and economic dynamics play a stronger role than immediate health needs in shaping enrollment decisions.

To strengthen participation, local governments, BPJS Kesehatan, and community health centers should prioritize culturally tailored health education, improve subsidy access for low-income households, and adopt family-centered outreach strategies. Building institutional trust through transparent and reliable service delivery is equally essential to sustain enrollment.

Future studies should apply longitudinal or mixed-method designs to explore causal relationships and capture deeper sociocultural dynamics. Such research would provide stronger evidence for designing inclusive, context-sensitive policies that support Indonesia's progress toward Universal Health Coverage.

## REFERENCE

- Adebayo, E. F., Uthman, O. A., Wiysonge, C. S., Stern, E., Lamont, K., & Ataguba, J. E. (2015). A Systematic Review of Factors That Affect Uptake of Community-Based Health Insurance in Low-Income and Middle-Income Countries. *BMC Health Services Research*, 15(1). <https://doi.org/10.1186/s12913-015-1179-3>
- Akokuwebe, M. E., & Idemudia, E. S. (2022). A Comparative Cross-Sectional Study of the Prevalence and Determinants of Health Insurance Coverage in Nigeria and South Africa: A Multi-Country Analysis of Demographic Health Surveys. *International Journal of Environmental Research and Public Health*, 19(3), 1766. <https://doi.org/10.3390/ijerph19031766>
- Alesane, A., & Anang, B. T. (2018). Uptake of Health Insurance by the Rural Poor in Ghana: Determinants and Implications for Policy. *Pan African Medical Journal*, 31. <https://doi.org/10.11604/pamj.2018.31.124.16265>
- Amara, P. S., Platt, J., Raj, M., & Nong, P. (2022). Learning About COVID-19: Sources of Information, Public Trust, and Contact Tracing During the Pandemic. *BMC Public Health*, 22(1). <https://doi.org/10.1186/s12889-022-13731-7>
- Ataguba, J. E. (2021). The Impact of Financing Health Services on Income Inequality in an Unequal Society: The Case of South Africa. *Applied Health Economics and Health Policy*, 19(5), 721–733. <https://doi.org/10.1007/s40258-021-00643-7>
- Barnes, A. J., & Hanoch, Y. (2017). Knowledge and Understanding of Health Insurance: Challenges and Remedies. *Israel Journal of Health Policy Research*, 6(1). <https://doi.org/10.1186/s13584-017-0163-2>
- Baroudi, M., Goicolea, I., Hurtig, A., & Sebastián, M. S. (2022). Social Factors Associated With Trust in the Health System in Northern Sweden: A Cross-Sectional Study. *BMC Public Health*, 22(1). <https://doi.org/10.1186/s12889-022-13332-4>
- Bronfman, N. C., Repetto, P., Córdón, P., Castañeda, J. V., & Cisternas, P. C. (2021). Gender Differences on Psychosocial Factors Affecting COVID-19 Preventive Behaviors. *Sustainability*, 13(11), 6148. <https://doi.org/10.3390/su13116148>

- Cho, H. E., Wang, L., Chen, J., Liu, M., Kuo, C., & Chung, K. C. (2019). Investigating the Causal Effect of Socioeconomic Status on Quality of Care Under a Universal Health Insurance System—A Marginal Structural Model Approach. *BMC Health Services Research*, 19(1). <https://doi.org/10.1186/s12913-019-4793-7>
- Couturier, V., Srivastava, S., Hidayat, B., & Allegri, M. D. (2022). Out-of-Pocket Expenditure and Patient Experience of Care Under-Indonesia's National Health Insurance: A Cross-sectional Facility-based Study in Six Provinces. *The International Journal of Health Planning and Management*, 37(S1), 79–100. <https://doi.org/10.1002/hpm.3543>
- Duku, S. K. O. (2018). Differences in the Determinants of Health Insurance Enrolment Among Working-Age Adults in Two Regions in Ghana. *BMC Health Services Research*, 18(1). <https://doi.org/10.1186/s12913-018-3192-9>
- Edward, J., Thompson, R., & Jaramillo, A. (2020). Availability of Health Insurance Literacy Resources Fails to Meet Consumer Needs in Rural, Appalachian Communities: Implications for State Medicaid Waivers. *The Journal of Rural Health*, 37(3), 526–536. <https://doi.org/10.1111/jrh.12485>
- El-Sayed, A. M., Vail, D., & Kruk, M. E. (2018). Ineffective Insurance in Lower and Middle Income Countries Is an Obstacle to Universal Health Coverage. *Journal of Global Health*, 8(2). <https://doi.org/10.7189/jogh.08.020402>
- Fisher, M., Freeman, T., Mackean, T., Friel, S., & Baum, F. (2020). Universal Health Coverage for Non-Communicable Diseases and Health Equity: Lessons From Australian Primary Healthcare. *International Journal of Health Policy and Management*. <https://doi.org/10.34172/ijhpm.2020.232>
- Gantiva, C., Jiménez-Leal, W., & Urriago-Rayó, J. (2021). Framing Messages to Deal With the COVID-19 Crisis: The Role of Loss/Gain Frames and Content. *Frontiers in Psychology*, 12. <https://doi.org/10.3389/fpsyg.2021.568212>
- Gustavson, K., Røysamb, E., & Borren, I. (2019). Preventing Bias From Selective Non-Response in Population-Based Survey Studies: Findings From a Monte Carlo Simulation Study. *BMC Medical Research Methodology*, 19(1). <https://doi.org/10.1186/s12874-019-0757-1>
- Hanson, B. L., Finley, K., Otto, J., & Ward, N. (2022). Role of Trusted Sources and Behavioral Beliefs in Promoting Mitigation Behaviors During the COVID-19 Pandemic: Survey Study. *Jmir Human Factors*, 9(3), e37454. <https://doi.org/10.2196/37454>
- Housten, A. J., Furtado, K., Kaphingst, K. A., Kebodeaux, C. S., McBride, T., Cusanno, B. R., & Politi, M. C. (2016). Stakeholders' Perceptions of Ways to Support Decisions About Health Insurance Marketplace Enrollment: A Qualitative Study. *BMC Health Services Research*, 16(1). <https://doi.org/10.1186/s12913-016-1890-8>

- Kalajahi, R. A., Saadati, M., Azami-Aghdash, S., Rezapour, R., Nouri, M., Derakhshani, N., & Dalal, K. (2022). Psychometric Properties of Public Trust in Covid-19 Control and Prevention Policies Questionnaire. *BMC Public Health*, 22(1). <https://doi.org/10.1186/s12889-022-14272-9>
- Kasu, T., Mungure, S., Menelik, G., & Mharakurwa, S. (2021). The Interactions of Public Health Organisational Leadership With Its Environment: A Case Study of the Sally Mugabe Central Hospital in Harare, Zimbabwe. *Medical Journal of Zambia*, 48(2), 85–93. <https://doi.org/10.55320/mjz.48.2.30>
- Khanal, A., GC, S., Panthee, S., Paudel, A., Ghimire, R., Neupane, G., Gaire, A., Sitaula, R., Bhattarai, S., Khadka, S., Khatri, B., Khanal, A., Panthee, B., Wasti, S. P., & Vijay, S. (2022). Fear, Risk Perception, and Engagement in Preventive Behaviors for COVID-19 During Nationwide Lockdown in Nepal. *Vaccines*, 11(1), 29. <https://doi.org/10.3390/vaccines11010029>
- Kigume, R., & Maluka, S. (2021). The Failure of Community-Based Health Insurance Schemes in Tanzania: Opening the Black Box of the Implementation Process. *BMC Health Services Research*, 21(1). <https://doi.org/10.1186/s12913-021-06643-6>
- Kino, S., & Kawachi, I. (2019). Can Health Literacy Boost Health Services Utilization in the Context of Expanded Access to Health Insurance? *Health Education & Behavior*, 47(1), 134–142. <https://doi.org/10.1177/1090198119875998>
- Mahmood, S. S., Hanifi, S. M. A., Mia, M. N., Chowdhury, A. H., Rahman, M., Iqbal, M., & Bhuiya, A. (2018). Who Enrols in Voluntary Micro Health Insurance Schemes in Low-Resource Settings? Experience From a Rural Area in Bangladesh. *Global Health Action*, 11(1), 1525039. <https://doi.org/10.1080/16549716.2018.1525039>
- Masters, R. K., & Reither, E. N. (2019). Accounting for Biases in Survey-Based Estimates of Population Attributable Fractions. *Population Health Metrics*, 17(1). <https://doi.org/10.1186/s12963-019-0196-6>
- Minyihun, A., Gebregziabher, M. G., & Gelaw, Y. A. (2019). Willingness to Pay for Community-Based Health Insurance and Associated Factors Among Rural Households of Bugna District, Northeast Ethiopia. *BMC Research Notes*, 12(1). <https://doi.org/10.1186/s13104-019-4091-9>
- Moreno-Fernández, M. M., & Matute, H. (2020). Biased Sampling and Causal Estimation of Health-Related Information: Laboratory-Based Experimental Research. *Journal of Medical Internet Research*, 22(7), e17502. <https://doi.org/10.2196/17502>
- Muhlis, A. N. A. (2022). Determinants of the National Health Insurance Uptake in Indonesia. *Jurnal Administrasi Kesehatan Indonesia*, 10(1), 111–121. <https://doi.org/10.20473/jaki.v10i1.2022.111-121>

## **Sociocultural and Economic Factors Influencing JKN Participation: A Cross-Sectional Study in Bajoe, Indonesia**

Ashari, Arwan, and Syam

---

- Naderifar, M., Goli, H., & ghaljaie, fereshteh. (2017). Snowball Sampling: A Purposeful Method of Sampling in Qualitative Research. *Strides in Development of Medical Education*, 14(3). <https://doi.org/10.5812/sdme.67670>
- Nandi, S. S., Lambe, U. P., Sarkar, K., Sawant, S., & Deshpande, J. M. (2021). A Rapid Point of Care CC16 Kit for Screening of Occupational Silica Dust Exposed Workers for Early Detection of Silicosis/Silico-Tuberculosis. *Scientific Reports*, 11(1). <https://doi.org/10.1038/s41598-021-02392-y>
- Nour-Eldein, H., Abdulmajeed, A., & Ismail, M. (2014). Research Publications in Medical Journals (1992-2013) by Family Medicine Authors—Suez Canal University-Egypt. *Journal of Family Medicine and Primary Care*, 3(4), 368. <https://doi.org/10.4103/2249-4863.148112>
- Nugroho, S. T., Ahsan, A., Kusuma, D., Irawaty, D. K., Amalia, N., & Hati, S. R. H. (2023). Income Disparity and Healthcare Utilization: Lessons From Indonesia's National Health Insurance Claim Data. *Asian Pacific Journal of Cancer Prevention*, 24(10), 3397–3402. <https://doi.org/10.31557/apjcp.2023.24.10.3397>
- Nyande, F. K., Ricks, E., Williams, M., & Jardien-Baboo, S. (2022). Socio-Cultural Barriers to the Delivery and Utilisation of Child Healthcare Services in Rural Ghana: A Qualitative Study. *BMC Health Services Research*, 22(1). <https://doi.org/10.1186/s12913-022-07660-9>
- Odusola, A. O., Stronks, K., Hendriks, M. E., Schultsz, C., Akande, T. M., Osibogun, A., Weert, H. v., & Haafkens, J. (2016). Enablers and Barriers for Implementing High-Quality Hypertension Care in a Rural Primary Care Setting in Nigeria: Perspectives of Primary Care Staff and Health Insurance Managers. *Global Health Action*, 9(1), 29041. <https://doi.org/10.3402/gha.v9.29041>
- Panda, S. (2023). Public Trust in Government Doctors and Hospitals in India. *International Journal of Social Economics*, 50(11), 1602–1617. <https://doi.org/10.1108/ijse-07-2022-0498>
- Park, S., Langellier, B. A., & Meyers, D. J. (2022). Association of Health Insurance Literacy With Enrollment in Traditional Medicare, Medicare Advantage, and Plan Characteristics Within Medicare Advantage. *Jama Network Open*, 5(2), e2146792. <https://doi.org/10.1001/jamanetworkopen.2021.46792>
- Parsons, S., Songco, A., Booth, C., & Fox, E. (2021). Emotional Information-Processing Correlates of Positive Mental Health in Adolescence: A Network Analysis Approach. *Cognition & Emotion*, 35(5), 956–969. <https://doi.org/10.1080/02699931.2021.1915752>
- Politi, M. C., Grant, R. L., George, N., Barker, A. R., James, A. S., Kuroki, L. M., McBride, T. D., Liu, J., & Goodwin, C. (2020). Improving Cancer Patients' Insurance Choices (I Can PIC): A Randomized Trial of a Personalized Health Insurance Decision Aid. *The Oncologist*, 25(7), 609–619. <https://doi.org/10.1634/theoncologist.2019-0703>

- Sadeghi, S. (2024). Investigating the Detection of Undeclared Cyproheptadine in Weight Gain Herbal Supplements, Creajensing. *International Journal of Medical Toxicology and Forensic Medicine*, 14(02), 43922. <https://doi.org/10.32598/ijmtfm.v14i02.43922>
- Shahin, M. A. H., & Hussien, R. M. (2020). Risk Perception Regarding the COVID-19 Outbreak Among the General Population: A Comparative Middle East Survey. *Middle East Current Psychiatry*, 27(1). <https://doi.org/10.1186/s43045-020-00080-7>
- Shewamene, Z., Tiruneh, G., Abraha, A., Reshad, A., Terefe, M. M., Shimels, T., Lemlemu, E., Tilahun, D., Wondimtekahu, A., Argaw, M., Anno, A., Abebe, F., & Kiros, M. (2021). Barriers to Uptake of Community-Based Health Insurance in Sub-Saharan Africa: A Systematic Review. *Health Policy and Planning*, 36(10), 1705–1714. <https://doi.org/10.1093/heapol/czab080>
- Shrime, M. G., Verguet, S., Johansson, K. A., Desalegn, D., Jamison, D. T., & Kruk, M. E. (2015). Task-Sharing or Public Finance for the Expansion of Surgical Access in Rural Ethiopia: An Extended Cost-Effectiveness Analysis. *Health Policy and Planning*, 31(6), 706–716. <https://doi.org/10.1093/heapol/czv121>
- Twum, P., Yeboah, E. B., Agyei-Baffour, P., & Mensah, K. A. (2023). The Potency of a Free Maternal Healthcare Policy in Achieving Universal Health Coverage a Cross-Sectional Qualitative Study. *F1000research*, 12, 78. <https://doi.org/10.12688/f1000research.123492.1>
- Ward, P., Rokkas, P., Cenko, C., Pulvirenti, M., Dean, N. R., Carney, A. S., Brown, P., Calnan, M., & Meyer, S. B. (2015). A Qualitative Study of Patient (Dis)trust in Public and Private Hospitals: The Importance of Choice and Pragmatic Acceptance for Trust Considerations in South Australia. *BMC Health Services Research*, 15(1). <https://doi.org/10.1186/s12913-015-0967-0>
- Yego, N. K., Nkurunziza, J., & Kasozi, J. (2023). Predicting Health Insurance Uptake in Kenya Using Random Forest: An Analysis of Socio-Economic and Demographic Factors. *Plos One*, 18(11), e0294166. <https://doi.org/10.1371/journal.pone.0294166>
- Zohar, T., Negev, M., Sirkin, M., & Levine, H. (2022). Trust in COVID-19 Policy Among Public Health Professionals in Israel During the First Wave of the Pandemic: A Cross-Sectional Study. *Israel Journal of Health Policy Research*, 11(1). <https://doi.org/10.1186/s13584-022-00529-6>