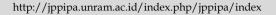


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Utilization of Online Referral for National Health Insurance Patient Services in Indonesia: A Scoping Review

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Abstract: The evolution of the outpatient referral system for BPJSK participants has transitioned from a manual-based system to an online-based approach. The present discourse examines the use of online referrals in patient care under NHI programme in Indonesia. The literature search conducted in this systematic review adheres to the PRISMA methodology and utilises the Google Scholar and PubMed databases. Using online referral in the context of NHI patients is a topic of interest. A total of six papers underwent a systematic evaluation. The assessment of the utilization of online referrals was conducted by evaluating patient satisfaction and the effectiveness of NHI project. The satisfaction of NHI patients concerning time certainty, referral certainty, waiting time, service access, service quality, service process, and service system is influenced by the utilization of online referrals. The practicality of the online referral strategy can be assessed through its impact on programme understanding, targeting precision, goal achievement, and tangible changes. The urgency of online referrals could be more persuasive. In order to enhance the efficiency of waiting time, it is imperative to implement supportive measures, such as the utilization of online queues and streamlining the process of online referrals in primary healthcare settings and hospitals.

Keywords: Effectiveness; National health insurance; Online referral; Patient satisfaction

Introduction

The National Health Insurance Programme is a comprehensive social security initiative that provides coverage for healthcare expenses through regular contributions made by individuals or contributions subsidised by the government and directed towards insurance providers. The project ensures comprehensive individual health care, encompassing promotive, preventative, curative, and rehabilitative measures. These services include the provision of pharmaceuticals, medical materials, lodging, and ambulances. The delivery of these benefits is through the utilization of managed care strategies (Kemenkes RI, 2019).

Implementing NHI programme involves four primary stakeholders, including Participants, the Health Social Security Organizing Agency (BPJS), Health Facilities, and the Government in its role as a regulator and supervisor. There is a relationship between age, gender, family size, knowledge, perceived needs,

expectations, and the appearance of JKN-KIS products with the participation in the National Health Insurance (Napitupulu et al., 2023). According to the National Social Security Council (2014), BPJSK collaborates with public and private health facilities to establish a comprehensive network of healthcare facilities. The primary objective of this collaboration is to ensure the provision of healthcare services to JKN Participants and their families (Dewan Jaminan Sosial Nasional, 2014).

The introduction and execution of the NHI programme have resulted in significant transformations within the healthcare sector. In Indonesia, it is mandatory for patients enrolled in the NHI programme to attend primary care facilities and seek medical advice from healthcare professionals. If the health issue remains unresolved, providing additional human resources and infrastructure becomes imperative. In such circumstances, it is customary for the patient to be directed to a specialized healthcare facility, such as a type D hospital, and then, if necessary, to a type C

hospital (Deloitte Indonesia, 2019). The health service referral system is a component of the NHI programme, which governs the allocation of tasks and responsibilities for health services in a mutually beneficial manner, both vertically and horizontally. This system is mandated for adherence by participants of health insurance and all healthcare facilities, as stated in the Regulation of the Minister of Health of the Republic of Indonesia in 2012. The NHI patient referral system encounters issues that necessitate addressing, mostly the requirement for enhanced financial assistance and participation (Setiawati & Nurrizka, 2019).

A prior investigation revealed that 19.3% of transactions were not compliant with the referral order, primarily involving cases of malignant illnesses. According to Handayani et al. (2021), with the rise of malignant ailments, there is also a growing incidence of chronic diseases, augmenting the demand for healthcare services and posing a concurrent challenge for primary care providers. According to Peurois et al. (2022), implementing a well-structured primary care system can decrease healthcare expenditures and enhance service satisfaction. Referral systems may encompass two types: multilevel referral and self-referral. Previous research has demonstrated that self-referral can enhance the range of healthcare providers available to healthcare users (Da Ros et al., 2022). Additionally, it has been found to mitigate treatment delays, enhance patient satisfaction, and optimise resource utilization efficiency (Alshareef et al., 2023).

The proper execution of referrals necessitates adherence to established protocols, encompassing initiating referrals, accepting referrals, responding to referrals, receiving responses to referrals, overseeing patient care during ambulance transportation, and handling referrals for extraordinary cases (Hartini et al., 2016). The fundamental objective of the tiered referral system is to enhance collaboration among healthcare facilities and bolster the effectiveness of primary care services. The objective to be attained is the successful execution of measures to ensure quality and cost management. The referral process presents challenges, namely, patients' requests for hospital referrals and the substantial volume of referred patients. Consequently, primary care providers must enhance communication with hospitals to improve effectiveness and efficiency (Ratnasari, 2018). Concerning this matter, there exists a commendable level of comprehension among primary care officers. Nevertheless there were complaints regarding the failure to refer patients to primary care despite their stable condition upon referral to the hospital. According to Petersen et al. (2019), the World Health Organization (WHO) underscores the need for a two-way referral process. This process involves referring patients from primary care to secondary care when a higher level of care is necessary and referring patients from secondary care back to primary care when it is deemed suitable to satisfy the patient's needs.

According to the World Health Organization (2015), the critical attributes of medical referrals encompass the following elements: collaboration between healthcare establishments, adherence to established referral criteria, availability of comprehensive resources such as transportation and communication, utilization of complete referral forms, establishment of pre-referral communication with the receiving facility, and provisions for subsequent referral back to the original facility. The documentation and communication of referrals are also crucial, as emphasised by (Ratnasari, 2018)

The structure of the referral system is widely seen as inadequate due to the need for coordination between sending health facilities and referral recipients (Primasari, 2015). Implementing the outpatient referral system for participants of BPJSK has evolved from a manual-based system to an online-based (Wulandari et al., 2022). The online referral system is a digitalisation process that operates on a tiered structure. Its purpose is to offer the community or participants convenient and reliable access to hospital services. This system considers factors such as distance, capacity, and competition of the referral hospital, all of which are adjusted to meet the patient's specific medical needs. The objective is to enhance administrative services rendered at healthcare establishments. In the current pandemic, online referral systems and telemedicine have emerged as viable methods for service delivery. The implementation of this approach has been observed numerous private clinics: however. implementation at the health center level could be improved by various problems, including inadequate infrastructure, limited human resources, and insufficient budget allocation (Hariyani et al., 2022). Health services might give rise to additional inefficiencies due to the suboptimal functioning of the referral system. Primary health care facilities (FKTPs) tend to refer patients excessively and in a manner that is not commensurate to their actual need for referral to advanced referral health (FKRTLs). As a consequence, experiences financial losses due to its excessive expenditure. In the context of FKRTLs, it is worth noting that a progressive payment mechanism is implemented. One contributing factor to the inefficiency of referrals is the extended waiting time for health services. This delay in accessing care can escalate healthcare expenses, as patients may request referrals to more optimal services. Consequently, this situation can impose an additional financial burden on the Indonesian National Health

Insurance System (INHIS) (Kurnianingtyas et al., 2021). Hence, it is imperative to consistently assess the implementation of the tiered referral system in various regions of Indonesia to ensure the ongoing enhancement of healthcare quality. The authors of this systematic study express their interest in examining the utilization of online referrals for patient care within the context of NHI in Indonesia, as indicated by the abovementioned concerns.

Method

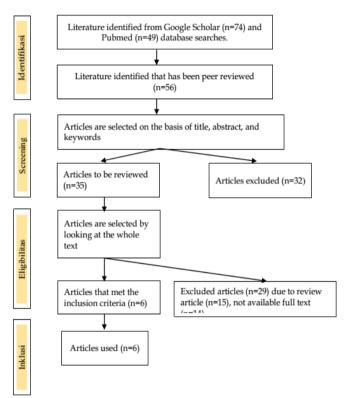


Figure 1. Preferred literature reporting for systematic review based on PRISMA flow diagram 2019

The literature search conducted in this systematic review adheres to the PRISMA (Preferred Reporting Items for Systematic Reviews and Meta-Analysis) methodology. The literature search utilised two critical databases, Google Scholar and Pubmed, with the most recent search conducted on August 22, 2023. The inclusion criteria for the present systematic review encompass the following the articles that have been published within the preceding four-year period, specifically from 2019 to 2023, research studies that both quantitative employ and qualitative methodologies, studies conducted within geographical boundaries of Indonesia, and articles that are accessible in their entirety, including the complete text. The exclusion criteria employed in this systematic review consist of two components: firstly, titles and abstracts that are deemed irrelevant, and secondly, publications that are not accessible in their entirety in full-text format. The search was conducted using boolean operators to identify relevant publications. The keywords "Online Referral Utilization" AND "JKN Patient" were used. Duplicate articles were excluded, and the selection process focused on titles and research related to using online referrals by JKN patients. Only some articles were included in the analysis due to their lack of relevance to using online patient referrals within the context of the JKN system.

Result and Discussion

Six articles were systematically reviewed, which were both qualitative and quantitative studies. All six studies were conducted in different parts of Indonesia. There has been a notable increase in the membership count of BPJSK. In May 2023, official records indicated that the total number of registered participants in the NHI programme amounted to 255.89 million individuals. The need to maintain a balance between the expansion of health services for participants of the National Health Insurance Programme and the effectiveness of these services, which include the utilization of online referrals, has been highlighted by (Putri & Frinaldi, 2020).

The digitalization of tiered referrals provided to patients, known as online referrals, aims to enhance ease and ensure reliability for individuals seeking healthcare services at the hospital. Efficiency and professionalism of referral system are needed to support innovation (Srimayarti et al., 2023). According to Rianta (2022), the implementation of the online referral system commenced in October 2018. This system is facilitated through a Primary Care BPJS Kesehatan application, which can be accessed on the pcare.bpjs-kesehatan.go.id webpage. Primary care providers will generate an electronic referral letter tailored to the hospital's busy schedule, taking into account the individuals enrolled within the system. Subsequently, the referral letter will be provided to the patient. Efficient and effective health services can significantly cut patient waiting times by eliminating the need for manual hospital visits and registration for examination referrals. Utama (2022) states that implementing an online referral system can reduce patient registration delays.

According to (Tampubolon et al., 2020), the level of patient satisfaction with the use of the online referral system is affected by various factors, including the certainty of time, certainty of referral, waiting time, access to services, quality of services, processes involved in the provision of services, and the overall service systems in place. The predictability of the appointment time with a specialist at the hospital and the minimal

waiting time for service impact patient satisfaction. The study by (Zikusooka et al., 2022) demonstrates that satisfaction with reduced waiting times influences service quality. The level of certainty associated with the referral process significantly impacts patient happiness. When primary healthcare providers can provide accurate and well-timed referrals, it leads to a satisfactory experience for patients. On the other hand, if the appropriateness of referral is particular, it will positively impact patient satisfaction. According to (Tampubolon et al., 2020), patients may encounter recurring referrals, which might harm the overall quality of treatment. Service quality serves as an evaluative measure of patient satisfaction. The five SERVQUAL characteristics, tangible, responsiveness, dependability, assurance, and empathy, define the quality of online referral services. If the necessary infrastructure for online referrals is present, it will enhance patient satisfaction regarding actual outcomes. As (N. R. Putri et al., 2022) identified, the responsiveness feature encompasses several vital components. components include minimizing patient waiting times, delivering services promptly, prioritizing the provision of explanations by officers, demonstrating genuine interest in addressing concerns, and consistently offering assistance when required. Patient satisfaction is influenced by the level of response demonstrated by healthcare staff. Reliability refers to the degree of alignment between the services rendered and the specific requirements intermittently. The satisfaction of referred participants is influenced by the adequacy of specialist doctor schedule information provided via the online referral application at the hospital (Muchsam & Mareta, 2015). The assurance component pertains to providing trustworthy and non-discriminatory JKN directly impacting referred patients' services, satisfaction levels. The focus of health workers on the patients they serve, known as the empathy element, has been found to impact the satisfaction levels of referred patients (Dewi et al., 2022).

Table 1. Characteristics of Systematically Reviewed Studies							
Lead author (year	Research title	Origin of the	Type of study	Summary of findings			
of publication)		research					
Fiqih Zetrita et al. (2019)	Effectiveness of Online Referral for Outpatients in the National Health Insurance Programme (JKN) in Solok City	Solok		The efficacy of online referrals within the national health insurance scheme in Solok City remains suboptimal. Participants in the study reported encountering several hurdles and expressing complaints. These include experiencing lengthy waiting times during the referral procedure, encountering difficulties in obtaining evident referrals from FKRTL, and instances when referred patients did not align with the specific diseases they were experiencing. At FKRTL, there have been reports of extended waiting times due to the high volume of referred participants.			
Elmina Tampubolon et al. (2020)	Analysis of Factors Associated with the Level of Patient Satisfaction with Online Referral for BPJS Outpatients at Adventist Hospital Medan in 2018	Medan	Quantitative	There exists a noteworthy correlation between certainty and certainty. There is a notable correlation between time certainty, referral certainty, waiting time, service access, service quality, service process, and service system, and the level of satisfaction experienced by patients who avail themselves of online referral services.			
Hela Ayu et al. (2021)	Analysis of Factors Associated with User Satisfaction with Online Referral System for BPJS Health Participants in Semarang City	Semarang	Quantitative	The level of satisfaction among respondents was found to be 54%, which can be attributed to suboptimal administrative efficiency and the limited usefulness of the online referral system in mitigating waits. The factors associated with user satisfaction about deploying the online referral system for BPJS participants in Semarang City are performance expectancy, effort expectancy, facilitating conditions, and information quality.			
Putu Wuri et al. (2021)	The regional and referral compliance	Jakarta		19.3% of the transactions observed in the study were non-compliant with the designated			

Lead author (year of publication)	Research title	Origin of the research	Type of study	Summary of findings
	of online healthcare systems by Indonesia National Health Insurance agency and health- seeking behavior in Indonesia			referral sequence. The recommended referral process was predominantly adhered to those patients diagnosed with malignant illnesses. Additionally, our findings indicate that males who regard themselves as in good health are less inclined to utilize health services than women. Moreover, an observed inclination towards alternative treatment contributes to the overall increase in health-seeking behaviour. Additionally, the inclination to seek health information on social media platforms has been found to augment the frequency of health-seeking activity further. The presence of health-related content on social media platforms has positively influenced individuals' propensity to seek health services more frequently.
Johannes et al. (2022)	Analysis of the effect of the level of satisfaction of public service synergy management efforts and the status of online BPJS referral users on customer satisfaction	Tapanuli Utara	Quantitative	The primary objective of this study is to examine the impact of satisfaction levels, attempts to manage public service synergies, and the status of BPJS online referral users on customer satisfaction at the Sipultak Health Centre. The findings indicate a significant impact on the level of satisfaction (pValue = 0.000), management efforts in enhancing service quality (pValue = 0.000), the synergistic effect on public services (pValue = 0.000), the influence of user status (BPJS customer membership) (pValue = 0.000), BPJS service quality (pValue = 0.000), and customer fees (pValue = 0.008). The factor that exhibits the highest level of dominance is the quality of BPJS service, as indicated by an odds ratio of
Tanti Wulandari et al. (2022)	Online Referral System for Outpatients of BPJS Health Participants at RSUD Sheikh Yusuf, Gowa Regency	Gowa	Quantitative	24.885. The online referral system in the input area offers convenience to patients utilizing BPJS health services and healthcare professionals. The challenges encountered within the referral system encompass errors related to the First-Level Health Facilities (FKTP), patient errors, network problems, and discrepancies in poly and diagnostic. Within the process category, there exist some hurdles that hinder effective communication. These obstacles primarily arise from the need for more transparent and efficient communication between officers and patients and the inadequate communication between referring facilities and the recipients of referrals. The output category includes generating problem-solving strategies to address challenges and impediments encountered inside the referral system.

According to a study by Hela et al. (2021), respondents' satisfaction level was found to be 54%. This relatively low percentage can be attributed to the need for further enhancements in administrative efficiency and the effectiveness of the online referral system in

eliminating lineups, as highlighted by (Ramadhan et al., 2021). The efficacy of the JKN programme is seen through the community's adoption of the programme (Freeman et al., 2008). The concept of programme effectiveness pertains to evaluating programme

outcomes as determined by scholarly investigations. These investigations focus on various dimensions of programme effectiveness within an organization, namely: 1) Comprehension of the programme, which refers to the extent to which the community can grasp the activities associated with the programme; 2) Appropriate targeting, which pertains to the degree to desired outcomes are accomplished materialise; 3) Timeliness, which assesses the program's ability to influence the efficient utilization of time during service implementation; 4) Attainment of objectives, which is gauged by the successful realization of programme goals; and 5) Tangible transformation, which is measured by the program's capacity to generate meaningful effects and bring about actual change within the community (Anis et al., 2021). Programme effectiveness is necessary to create future training programs focusing on knowledge, awareness, and action to achieve sustainability (Eliyawati et al., 2023). This can be influenced by community behavior factors and can also be caused by the not vet maximally in the implementation of the related sectors programme (Rany et al., 2022). Programme effectiveness is also affected by communication and collaboration skills frm related sectors (Walid et al., 2021).

The attainment of service effectiveness is a desired outcome for all types of organizations and agencies, regardless of their commercial or governmental nature. The primary objective is to fulfil customers' or the community's needs and expectations. In this discussion, the emphasis is placed on digital-based services (Sellang et al., 2019).

Patients and healthcare workers are the primary stakeholders in comprehending the online referral initiative. Healthcare professionals possess a deeper comprehension of the online referral programme due to their socialization within the BPJSK system. The general populace needs to possess a comprehensive understanding. According to a study by Putri et al. (2020), individuals who use online referral services have a greater comprehension of procedural modifications when sent to a hospital.

The utilization of web referrals is precisely aligned with the objective. According to (Kariema et al., 2020), individuals enrolled in the JKN programme experience enhanced predictability regarding service duration by accessing healthcare facilities that are geographically close and possess the necessary expertise. However, congestion of patients persists at the referral hospital due to lengthy waiting times.

The utilization of online referrals needs more timeliness due to existing difficulties in internet connectivity and patient grievances over inefficiency in time management. The referral process continues to result in extended waiting periods for patients. In certain instances, hospital personnel may find it necessary to verify referral information with primary healthcare providers. However, the only means of communication available is a single device, as no dedicated 24-hour contact number is accessible (Wulandari et al., 2022).

The referral system is designed to facilitate the delivery of high-quality, efficient, and cost-effective healthcare services, hence enabling the attainment of healthcare objectives while minimising financial burden. An online referral system facilitates coordinating, monitoring, and evaluating regular referrals across healthcare facilities, hospitals, governmental entities. The presence of internet connectivity in primary healthcare settings hinders the implementation of online referral systems, necessitating the reliance on manual referral processes by healthcare professionals. A subset of patients continue to seek referrals for conditions that can be effectively managed and resolved within the realm of primary healthcare (Rianta, 2022).

Implementing an online referral system is a necessary policy for healthcare institutions that collaborate with BPJSK. According to Muchsam et al. (2015), healthcare personnel experience a notable effect regarding the expeditiousness of the referral procedure. Adopting online referrals undergoes significant transformations that enhance the quality administrative services provided at healthcare facilities. Online referrals involve transferring patients from primary healthcare facilities to hospitals, facilitated through digital documentation. The data derived by P-Care in primary healthcare directly links with the hospital, facilitating the analysis of potential patient data. Using an online referral system offers the advantage of being paperless, reducing the likelihood of potential hurdles arising from patients needing to bring a physical copy of their reference letter.

Conclusion

The utilization of online referrals impacts the level of patient service satisfaction within the JKN healthcare system. The utilization discussed pertains to various factors, including time certainty, referral certainty, waiting time, service access, service quality, service procedure, and service system acquired. The practicality of the online referral strategy can be assessed based on its effectiveness in programme understanding, precision of targeting, attainment of goals, and generation of tangible changes. The potential for enhanced timeliness of online referrals may be more persuasive since patients continue to have limited waiting times. It is imperative to implement supportive measures to optimize waiting

time, including utilizing online queues and streamlining the process of online referrals in primary healthcare and hospital settings. The extensive digitalization of patient administration services inside the JKN system is anticipated to enhance accessibility to services.

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L.A; played a role in searching scientific literature and drafting the article. S.P.J and F.A; played a role in guiding and providing input in drafting the article.

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Conflicts of Interest

The authors declare no conflict of interest.

References

- Alshareef, N., Cozad, M., Macauda, M., Ostermann, J., & Thigpen, C. (2023). Patient attitudes and beliefs associated with self-referral to physical therapy for musculoskeletal complaints: a qualitative study. BMC Health Services Research, 23(1), 1–11. https://doi.org/10.1186/s12913-022-08989-x
- Anis, I., Usman, J., & Arfah, S. R. (2021). Efektivitas Program Pelayanan Kolaborasi Administrasi Kependudukan di Dinas Kependudukan dan Pencatatan Sipil Kabupaten Gowa. *E-Journal UNIMUS*, 2, 3, 1105–1116. Retrieved from https://journal.unismuh.ac.id/index.php/kimap/article/view/5429
- Da Ros, A., Paci, M., Buonandi, E., Rosiello, L., Moretti, S., & Barchielli, C. (2022). Physiotherapy as part of primary health care, Italy. *Bulletin of the World Health Organization*, 100(11), 669–675. https://doi.org/10.2471/BLT.22.288339
- Deloitte Indonesia. (2019). Memastikan Keberlangsungan JKN-KIS untuk Masyarakat Indonesia. *Deloitte Indonesia Perspectives, September*. Retrieved from https://www2.deloitte.com/content/dam/Deloit te/id/Documents/about-deloitte/id-about-dipedition-1-chapter-1-id-sep2019.pdf
- Dewan Jaminan Sosial Nasional. (2014). *Seri Buku Saku -* 4: *Paham JKN Jaminan Kesehatan Nasional*. Retrieved from https://library.fes.de/pdffiles/bueros/indonesien/11205.pdf
- Dewi, S., Nadapdap, T. P., & Januariana, N. E. (2022). Pengaruh mutu pelayanan kesehatan terhadap kepuasan pasien peserta JKN/KIS di Puskesmas

- Gunung Tua Kecamatan Padang Bolak. *Jurnal Kesmas Prima Indonesia*, 6(2), 1–9. https://doi.org/10.34012/jkpi.v6i2.2991
- Eliyawati, E., Widodo, A., Kaniawati, I., & Fujii, H. (2023). Effectiveness of Teacher Training on Environmental Education: Challenges and Strategy for Future Training Program. *Jurnal Penelitian Pendidikan IPA*, 9(8), 6056–6066. https://doi.org/10.29303/jppipa.v9i8.3153
- Freeman, J. D., Kadiyala, S., Bell, J. F., & Martin, D. P. (2008). The causal effect of health insurance on utilization and outcomes in adults: A systematic review of us studies. *Medical Care*, 46(10), 1023–1032.
 - https://doi.org/10.1097/MLR.0b013e318185c913
- Handayani, P. W., Dartanto, T., Moeis, F. R., Pinem, A. A., Azzahro, F., Hidayanto, A. N., Denny, & Ayuningtyas, D. (2021). The Regional And Referral Compliance Of Online Healthcare Systems By Indonesia National Health Insurance Agency And Health-Seeking Behavior In Indonesia. *Heliyon*, 7(9), e08068.
- https://doi.org/10.1016/j.heliyon.2021.e08068
 Hariyani, N., Shanbhag, N., Wijayati, E. W., Prananta, A. W., Setyowati, D., & Palupi, R. (2022). Teledentistry and online referral system in Indonesian primary health care center during the COVID-19 pandemic: A narrative review. *Journal of International Society of Preventive & Community Dentistry*, 12(4), 385. https://doi.org/10.4103/jispcd.JISPCD
- Hartini, Arso, S. P., & Sriatmi, A. (2016). Analisis pelayanan rujukan pasien BPJS di RSUD Chatib Quzwain Kabupaten Sarolangun Provinsi Jambi. *Jurnal Kesehatan Masyarakat*, 4(4), 49–59. Retrieved from
 - https://ejournal3.undip.ac.id/index.php/jkm/article/view/13940
- Kariema, I. H. El, Siyoto, S., & Wardani, R. (2020). Pendaftaran Pasien Rawat Jalan Dengan Sistem Online di Pusat Pelayanan Kesehatan. Retrieved from https://stradapress.org/index.php/ebook/catalog/download/15/13/48-1?inline=1
- Kemenkes RI. (2019). Buku Panduan Jaminan Kesehatan Nasional (JKN) Bagi Populasi Kunci. Retrieved from https://siha.kemkes.go.id/portal/files_upload/B UKU_PANDUAN_JKN_BAGI_POPULASI_KUN CI_2016.pdf
- Kurnianingtyas, D., Santosa, B., Siswanto, N., & Pham, D. T. (2021). Reforming premium amount in the Indonesian National Health Insurance System program using system dynamics. *Cogent Engineering*, 8(1), 1–34. https://doi.org/10.1080/23311916.2021.1938368
- Muchsam, Y., & Mareta, F. (2015). Analisis Pengaruh

- Kepahaman Sistem Rujukan Online Peserta BPJS Terhadap Kepuasan Pelayanan BPJS. *International Journal of Occupational Medicine and Environmental Health*, 28(6), 985–998. Retrieved from https://journal.uii.ac.id/snimed/article/view/13 851
- Napitupulu, A., Ginting, C. N., & Nasution, A. N. (2023). Characteristics and Perceptions of the Community Regarding National Health Insurance in the Participation. *Jurnal Penelitian Pendidikan IPA*, 9(10), 8518–8525. https://doi.org/10.29303/jppipa.v9i10.4621
- Petersen, L., & Gaylard, M. (2019). Strategies to strengthen referral from primary care to secondary care in low- and middle-income countries. In *World Health Organization* (Vol. 1, Issue September). Retrieved from https://iris.who.int/handle/10665/325734
- Peurois, M., Chopin, M., Texier-Legendre, G., Angoulvant, C., Bellanger, W., Bègue, C., & Ramond-Roquin, A. (2022). To which non-physician health professionals do French general practitioners refer their patients to and what factors are associated with these referrals? Secondary analysis of the French national cross-sectional ECOGEN study. *BMC Health Services Research*, 22(1), 1–13. https://doi.org/10.1186/s12913-021-07285-4
- Primasari, K. L. (2015). Analisis Sistem Rujukan Jaminan Kesehatan Nasional RSUD. Dr. Adjidarmo Kabupaten Lebak Analysis of National Health Insurance Referral System in Public Hospital dr. Adjidarmo Lebak. *Jurnal Administrasi Rumah Sakit Indonesia*, 1(2), 79–87. Retrieved from https://journal.fkm.ui.ac.id/arsi/article/view/21 73
- Putri, F. Z., & Frinaldi, A. (2020). Efektivitas Rujukan Online Bagi Pasien Rawat Jalan Dalam Program Jaminan Kesehatan Nasional (Jkn) Di Kota Solok. *Jurnal Manajemen Dan Ilmu Administrasi Publik* (*JMIAP*), 1(4), 28–38. https://doi.org/10.24036/jmiap.v1i4.76
- Putri, N. R., Guspianto, G., & Hubaybah, H. (2022). Pengaruh Persepsi Mutu Pelayanan Terhadap Tingkat Kepuasan Pasien di Puskesmas Sungai Tutung Tahun 2022. *Jurnal Kesmas Jambi*, 6(2), 7–16. https://doi.org/10.22437/jkmj.v6i2.19920
- Ramadhan, H. A., Arso, S. P., & Nandini, N. (2021).

 Analisis Faktor Faktor Yang Berhubungan
 Dengan User Satisfaction Terhadap Sistem
 Rujukan Online Pada Peserta Bpjs Kesehatan Di
 Kota Semarang. *Jurnal Kesehatan Masyarakat*(*Undip*), 9(3), 407-413.
 https://doi.org/10.14710/jkm.v9i3.29652

- Rany, N., Oktavia Dewi, & Herniwanti. (2022). Effectiveness of Media Modules on Triggering Community-Based Total Sanitation Programs (STBM). *Jurnal Penelitian Pendidikan IPA*, 8(5), 2470–2475. https://doi.org/10.29303/jppipa.v8i5.2354
- Ratnasari, D. (2018). Analisis Pelaksanaan Sistem Rujukan Berjenjang Bagi Peserta JKN di Puskesmas X Kota Surabaya. *Jurnal Administrasi Kesehatan Indonesia*, 5(2), 145. https://doi.org/10.20473/jaki.v5i2.2017.145-154
- Rianta, J., & Pratama, R. Y. (2022). Gambaran Pelaksanaan Sistem Rujukan Online Pasien BPJS di Puskesmas Pemuar. *Jurnal Perekam Medis dan Informasi Kesehatan*, 5(1), 28-32.
- Sellang, K., Ahmad, J., & Mustanir, A. (2019). *Strategi dalam peningkatan kualitas pelayanan publik. August,* 1–168. Retrieved from https://play.google.com/store/books/details/K amaruddin_Sellang_S_Sos_M_AP_STRATEGI_D ALAM PENIN?id=U06rDwAAQBAJ
- Setiawati, M. E., & Nurrizka, R. H. (2019). Evaluasi pelaksanaan sistem rujukan berjenjang dalam program jaminan kesehatan nasional. *Jurnal Kebijakan Kesehatan Indonesia: JKKI, 8*(1), 35-40. Retrieved from https://www.researchgate.net/profile/Rahmah-Nurrizka/publication/340828908_Artikel_Jurnal/links/5ea006884585150839f41758/Artikel-Jurnal.pdf
- Srimayarti, B. N., Leonard, D., Yasli, D. Z., & Handayuni, L. (2023). Artificial Insemination Pregnancy Program as a Type of Service and Level of Efficiency of Health Services. *Jurnal Penelitian Pendidikan IPA*, 9(7), 5242–5247. https://doi.org/10.29303/jppipa.v9i7.3964
- Tampubolon, E., Ginting, S., & Sitio, S. S. P. (2020).

 Analisis Faktor yang Berhubungan dengan Tingkat Kepuasan Pasien Rujuk Online pada Pasien Rawat Jalan BPJS di Rumah Sakit Advent Medan Tahun 2018. *Jurnal Kajian Kesehatan Masyarakat*, 1(2), 80-99. Retrieved from https://202.51.229.68/index.php/JK2M/article/view/786
- Utama, T., Andriati, R., & Ambarsari, F. (2022). Tinjauan Sistem Rujukan Online Pasien BPJS pada Masa Pandemi Covid-19 di Puskesmas Rengas Tahun 2021. EDU RMIK Jurnal Edukasi Rekam Medis Ilmu Kesehatan, 1(1), 64–73. Retrieved from https://openjournal.wdh.ac.id/index.php/MRHI/article/view/248
- Walid, A., Sasongko, R. N., Kristiawan, M., Kusumah, R. G. T., & Andaria, M. (2021). ICARE (Introduction, Connection, Application, Reflection, and Extension): Analysis of Effectiveness in Improving

- Student's Communication and Collaboration Ability. *Jurnal Penelitian Pendidikan IPA*, 7(3), 305–309. https://doi.org/10.29303/jppipa.v7i3.685
- Wulandari, T., Indar, I., Aripa, L., & Kurniawan K, R. N. (2022). Sistem Rujukan Online Pasien Rawat Jalan Peserta BPJS Kesehatan di RSUD Syekh Yusuf Gowa. *Jurnal Promotif Preventif*, 4(2), 100–106. https://doi.org/10.47650/jpp.v4i2.367
- Zikusooka, M., Hanna, R., Malaj, A., Ertem, M., & Elci, O. C. (2022). Factors affecting patient satisfaction in refugee health centers in Turkey. *PLoS ONE*, *17*(9), 1–14.

https://doi.org/10.1371/journal.pone.0274316