九州大学学術情報リポジトリ
Kyushu University Institutional Repository

The Health Service and Nursing Education in Indonesia

Setyowati
Faculty of Nursing, University of Indonesia : Staff academic, manager of research and development

https://doi.org/10.15017/17939

出版情報：九州大学アジア総合政策センター紀要. 5, pp.199-208, 2010-06-30. 九州大学アジア総合政策センター
バージョン：
権利関係：

The Health Service and Nursing Education in Indonesia[1]

SETYOWATI
(Staff academic and manager of research and development, Faculty of Nursing, University of Indonesia)

Abstract

Nursing is one of the most demanding professions in healthcare, nurses with their knowledge can develop their clinical skills. Nurses in Indonesia face some problems in the health services. High population, high maternal and neonatal mortality rates are most issue in the health services in Indonesia. The government provides through improving nursing education to cover urgent health care necessity. The nursing education system consists of diploma, bachelor, master, specialist and doctor that conducted by higher education institution. Since 1998, Indonesia began to prepare nurses to overseas, Indonesian nurses have migrated to the Middle East and throughout the developed world. There are some short training courses to prepare nurses and health worker who want to work overseas. Since the Economic Partnership Agreement (EPA) was concluded, there are hundreds of Indonesian nurses and care workers who now work in Japan. This paper discusses care services in Indonesia and nursing profession with their preparation to work internationally.

Key words : Indonesian nurses, preparation program, health care services

1. Introduction

Nursing is one of the most demanding professions in healthcare. In many countries nursing is developing more and more into a challenging profession with a good career perspective. Their roles as health care collaborators, teachers, clinical specialists and researchers will continue to expand. As professionals, nurses will be challenged to meet the needs of patients so that personalized care, informed education and humanistic research remain the hallmark of health care services.

Nurses can be considered as the gatekeepers of service quality. They are the backbone of the hospital and the care of thousands of patients is in their hands. It is expected that the quality of health service provided to patients can be improved through the quality of nurses, graduated from higher education.

With greater professional responsibilities and opportunities for clinical specialization, administration, education and research, nursing would become a worthy, unique and challenging career to pursue, instead of just becoming a nurse because it is easy to get a job in this profession. As more highly educated nurses are recruited, appropriately compensated and acknowledged by doctors, it will be for the benefit of quality provided to patients and the image and socio-economic status of the nursing professionals will improve (Weston, 2006).

In another hand, most of the world populations change to the high population in elderly with some consequences of it. The senior groups are growing and their population is getting bigger. In some of the developed countries, around 20% to 25% of the population are elderly. Japanese is the oldest population in the world. Many of Japanese elder than 100 years old can be seen. Good health services, better welfare and decreasing newborn rate have supported this condition.

As the grass roots of health services, nursing profession are also responsible to this condition,

1 This paper has been presented at the international seminar, "After Accepting Indonesian Care Workers in Japanese Society: Discussing Their Problems and Solutions" hosted by Kyushu University Asia Center in Fukuoka City on 23 May 2009. The author wishes to express her sincere appreciation to the Japan Society for the Promotion of Science (JSPS) and Kyushu University. The JSPS grant for Bi-national Joint Research between Japan and Indonesia, and Kyushu University's fund called "Kyushu University Interdisciplinary Programs in Education and Projects in Research Development" made possible her trip to Japan and her presentation at the international seminar.

nurses with their knowledge must not only develop the clinical skills to manage serious diseases, but also how to prevent the diseases. By improving their skill and knowledge, they can provide a holistic nursing care that in turn will improve health services to the whole population.

This paper will discuss about how the situation of health care services in Indonesia and nursing profession with their preparation to be able to work internationally.

2. Healthcare Service Program in Indonesia

Indonesia is the largest archipelago in the world. It consists of five major islands and about 30 smaller groups. The total number of islands is 17,508, of which only about 3,000 are inhabited[2]. More than half of the population is living in Java. This geographical characteristic is the base of the cultural diversity of the country. The Indonesian government decided to implement a policy to professionalize healthcare with the motto: Healthy Indonesia 2010. There are four paramount objectives in this national strategy: Health-oriented national development, Professionalism, Community managed healthcare, and decentralization.

To achieve these objectives, human resources have to be in balance. As a typical developing country, the problems are countless. The present economic recession is perceptible in all sectors of society. In the future perspective of Indonesia, education and healthcare are the pillars for a better existence. Unfortunately this is not yet the case. With a population of over 220 million people[3], in 2003, 17.4% still living below the poverty line[4], while more than 50% were poor and marginally poor families, healthcare is on a low level. Indicators for this are the maternal and infant mortality rates. The maternal mortality rate was 307 out of 100,000 childbirths and the infant mortality rate are 29.97 deaths/1,000 live births[5].

As mentioned above, Indonesia is a developing country with populations more than 220 millions that encounter health problem some with other Asian countries. This condition results in government to be provided Health Care Services to Indonesian community to serve community health care. Therefore, the Indonesian government provides nurses through nursing education to cover urgent health care necessity. In 1993 (the latest available figures), there were 62 nurses and 20 midwives and 13 physicians per 100,000 of the population in Indonesia (WHO 2006).

Prior to the Asian economic crisis, health statistics had improved as the economy strengthened. The average life expectancy at birth increased from 41 years in 1960 to 64 years in 2000, while the infant mortality rate fell from 160 deaths per 1000 live births in 1960 to 41 in 2000 and 29.97 deaths/1,000 live births in 2009 (World Bank Group 2001, CIA World Factbook 2009). The maternal mortality rate was 390 per 100,000 births in 1994, and decreased to 307 out of 100,000 childbirths in 2009 (ANT - LKBN ANTARA. Indonesia CIA World Factbook 2009).

Diseases endemic in Indonesia include dengue hemorrhagic fever, malaria, typhoid, cholera, tuberculosis and other infectious diseases. Although figures are not readily available, their incidence is increasing. Health department officials have described how tropical diseases such as leptospirosis (spread by rat and cat faeces) are increasing, particularly after major flooding in the wet season. Nurses in Indonesia not only face problems of caring for patients with tropical diseases and their families, but have had to become adept at providing care in a system which is beset with difficulties such as shortage of supplies, few disposable items and inadequate resources.

2 Indonesian Naval Hydro-Oceanographic Office, Jakarta 2004.
3 CIA, The World Factbook 2002.
4 Susenas, 2004.
5 CIA World Factbook, 2009.

Moreover, it has negatively affected education and training of nurses. As a result, there is a lack of qualified health care personnel. It can be considered a dilemma that in general nurses are functioning merely as the helper of the medical doctor whose status towers far above the status of the nurse. This lack of status is due to the low level of education of the majority of nurses. One could speak of mismanagement because of the inefficient execution of tasks between doctors and nurses. Doctors could make time for more complicated medical cure if nurses were allowed to provide the care they are trained for (Universitas Indonesia, 2005).

This is in line with findings in other countries. Knaus, Draper, Wagner and Zimmerman (1986) and Baggs *et al*. (1999) have demonstrated that frequent, effective nurse-doctor communication is linked to patient survival in intensive care units. Dysfunctional nurse-doctor communication is linked to medication errors (Kohn *et al*, 2000), patient injuries (Page, 2004) and patient deaths (Tammelleo, 2001, 2002). Furthermore, the lack of status is due to the professional medical culture with its own ethical norms and code of behavior, which goes along with the position (Peursen, 1997) and to the Indonesian culture with its high power distance (Hofstede, 1994).

Healthcare in Indonesia is not an isolated system, but integrated in a national financial and political system, a development such as decentralization is applicable to sectors in society such as education and healthcare. Decentralization aims at delegation of responsibilities and tasks that previously were under centralized control. The local governments can only exercise these tasks if also the necessary budget is decentralized. This process, changing from centralization to decentralization also applies to healthcare and local governments are made responsible for the organization of healthcare in their area.

In 1991, the Indonesian government devolved responsibility to the provinces for managing local health issues by initiating a program of hospital autonomy, called '*Unit Swadana*'. Although the government still owns, supervises and controls the hospitals, those with *Swadana* status are given some control over the portion of their total revenues that comes from the fees they collect at the facility. Government pays the salaries of the employees, which about 60% of the total budget, but the hospitals depend on their own revenue.

There are two modes of health care in Indonesia, namely, public and private. The state funds hospitals and primary health care clinics, and private hospitals and clinics are run by private companies and individuals and occasionally by Islamic and Christian organizations. Sometimes state hospitals build private wings to generate profits to support public facilities which deliver health care to the poor.

There are over 1000 hospitals in Indonesia, and about 34% of them are private. A small group of Indonesians with high incomes can afford to travel overseas for expensive health care, while the middle class access to private and public health facilities of varying quality (International Development Program of Australian Universities and Colleges, 1994).

In 1993, the World Bank suggested that public provision for health care of the poor was inadequate and maintained that the government subsidized the health of the richest 10% up to three times more than health services for the poor. Following monetary crisis, aid packages from the International Monetary Fund (IMF) and the World Bank have included safety net provisions for the poorest, including free health care. Under this scheme, known as "*Jaringan Pengaman Sosial Bidang Kesehatan*" (JPSBK), hospitals and community health facilities provide not only free medical, nursing and hospital care, but also any supplies needed for treatment. However, this scheme is available only the poorest, while those who are not so poor still have to pay.

3. Hospital Care System in Indonesia

Quality of care in private hospitals varies. While some are better resourced than public hospitals, as small private hospitals may not be able to access staff, including medical specialists, this may not give the same level of care. Public hospitals are administered by the Ministry of Health or, in some cases, by local authorities at city or provincial level. Hospitals are classified according to number of beds and the specialist services available. Class A and B are major referral and teaching hospitals, and district hospitals are either Class C (100–400 beds) or D (25–100 beds). Class C hospitals offer some specialist services and are teaching hospitals, while doctors in Class D hospitals are general practitioners (Shields, 1999).

Hospitals and health care facilities operate on 'user pay' system and some now provide free health care under the JPSBK scheme. Usually, however, patients are charged for admission. This entitles them to a bed, nursing care, food and sometimes medical care (in some hospitals this is an added charge). All equipment, drugs, dressings, intravenous fluid, tubing, blood and other necessities have to be bought at either the hospital pharmacy or from chemist shops. There are charges for all community health services, according to type and level of service. General practitioners and medical and specialists can be accessed privately. Hospitals have different classes of wards, and admission charges vary. Most government employees receive private health insurance as part of their remuneration, as do many who work for private companies and businesses. However, there is a large proportion of the population for whom health insurance is unavailable. Many are ineligible for free health services available for the very poor, but are unable to contribute to health insurance schemes. Therefore, they may not be able to afford anything but the most basic health care.

In Indonesian culture, the distance of power is considerable (Hofstede, 1980). This is also visible in the system of Indonesian hospitals, where patients are divided in 4 classes. VIP class for wealthy people that can afford their own private room and suite for their family during the period they are in hospital. Still Indonesian people, who are ill and can afford it, will go abroad, where healthcare quality is better than in their own country.

Class I patients from upper middle class stay in a room with 2 beds. Class II patients from lower middle classes stay in a room with 2–4 beds. Class III patients stay in a ward with 4–6 beds and have to accept that in most cases treatment is not optimum. The different classes of hospitals and wards reflect class divisions within Indonesian society. By paying the basic rate, poor family will be able to access bed in a large ward with nursing care. Extra nursing can be paid for, but family members must stay to ensure that care is given. In the highest class of ward, the patient will be accommodated in a private room with bathroom, television, refrigerator and beds for family. The standards of nursing care vary greatly from place to place and are dependent on the type of hospital, nurses' educational levels and the general philosophy of the institution.

In line with World Health Organization objectives for primary health care (World Health Organization 1978), Indonesia has an extensive primary health care system. Each sub district has at least one community health center, or *Pusat Kesehatan Masyarakat* (PUSKESMAS), which is linked to a series of sub-centers called "*PUSKESMAS pembantu*" and community-level health stations called "*Pos Pelayanan Terpadu*" (POSYANDU). Nurses and midwives staff of these centers, providing a range of services including family planning, immunization, maternal and child health care and preventive services. One POSYANDU is provided for every 100 children under 5 years old. While the primary health care system works well, remote areas are often disadvantaged in comparison with larger centers, although the government tries to address this issue by making rural government service mandatory for doctors before they can work as private

practitioners in areas of their choice.

4. Nursing Services

Nurses can be considered as the gatekeepers of service quality. They are the backbone of hospital care and in their hands lay the care of thousands of patients.

Nursing is one of the most demanding and exacting professions. In many countries nursing is developing more and more into a challenging profession with a good career perspective. Their roles as health care collaborators, teachers, clinical specialists and researchers will continue to expand. As professionals, nurses will be challenged to meet the needs of patients so that personalized care, informed education and humanistic research remain the hallmark of health care services. Nurses are an important part of the Indonesian health care system. However, the low level of basic nursing education is a problem. There are different levels of nursing education namely

- SPK nurses from the nursing school (high school level) are the biggest group of mostly senior nurses with much experience, but little theoretical knowledge. Because of their limited theoretical knowledge, they often are not aware about the limits of the nursing profession.
- D3 nurses from nursing academy are very experienced, they have good skills, and some theoretical knowledge that is aimed at the practice, the "how" of action and intervention. The study is 3 years, and theory and practice go hand in hand.
- Bachelor nurses (S1) are divided in to 2 types. The A program are students following 4 year theory and 1year clinical practice. The theoretical part is aimed at critical thinking, and the "why" of action and intervention and at aspects of management. The B program are D3 students who continue with their bachelor. These nurses have already sufficient practical skills and with the theory added, all become qualified professional nurses.
- Master degree nurses (S2) are Bachelor nurses who obtained masters degree in nursing. They mostly work as nurse educators, only a few of them work as manager in the hospital.

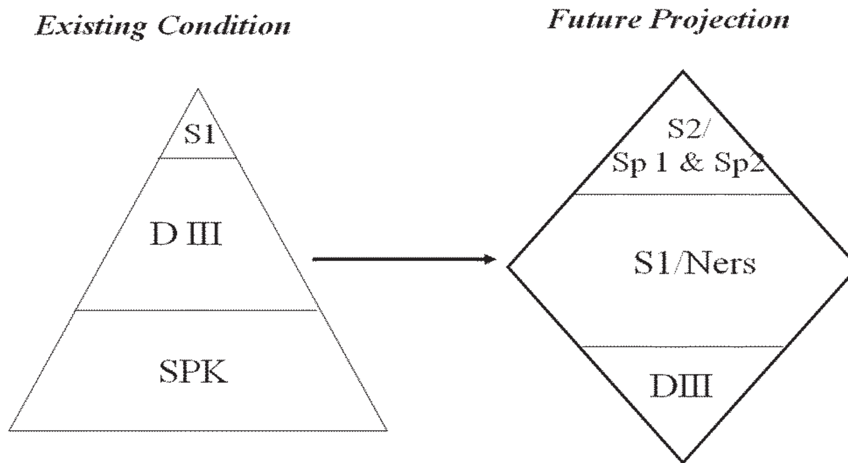
The nursing education system is based on the Law on National Education System No 20/2003 higher educations consist of diploma, bachelor, master, specialist and doctor should be done by higher education institutions. Higher education types are academy, polytechnic, institute or university. Their main activities include three functions (education, research, and public service). Based on the Law, the bachelor nursing education program curriculum is divided in to academic stage and professional stage.

The postgraduate program in nursing/magister program consists of leadership and management in nursing and nursing specialist program such as maternity nursing, community nursing, medical and surgical nursing, psychiatric nursing and pediatric nursing.

In 2003, there were 8 nurses and 8 midwives per 100.000 people in Indonesia.[6] Of all nurses in hospitals and specialized government hospitals, 74% are from SPK (*Sekolah Perawat Kesehatan*), 23% from DIII level (*Sarjana Muda Keperawatan*), 2.75% bachelor of nursing/Sarjana Keperawatan (S1), and master and doctor in nursing (*Magister keperawatan* and *Doktor Keperawatan* (S2 and S3) (University of Indonesia (2005). From 630 nursing academy institution in Indonesia, around 20,000–23,000 diploma nurses graduated per year (Sugiharto, 2005).

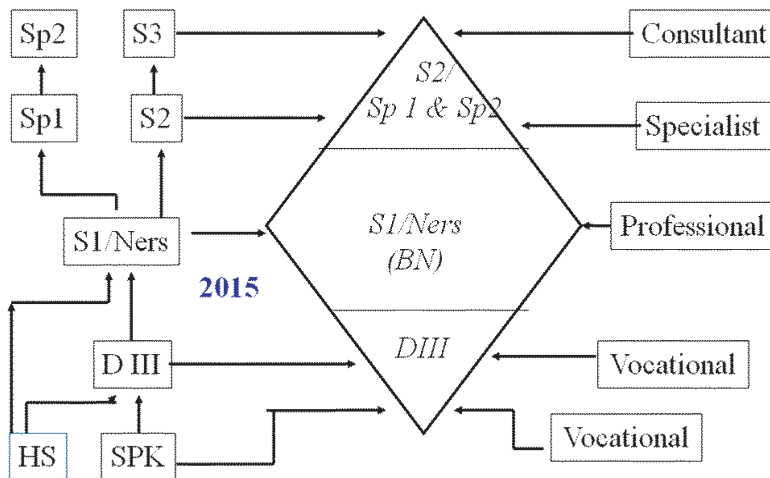
The Indonesian government is dedicated to improving the standard and level of nursing education and, since 1998 many school courses have been converted to diploma level. This confirmed with the plan of Indonesian Nurses Association (INA) and shown in the diagram shown in

6 World health statistics- WHO-SIS 2008.



(Source) Hamid A.Y.S., 2009

Figure 1



(Source) Hamid A.Y.S., 2009

Figure 2. Future Direction in Nursing Education

Figure 1.

Until recently, there was no accreditation of courses, little standardization of curricula and no benchmarking or competency assessment to ensure a safe level of practice amongst those who graduate as nurses. Unfortunately, no central registration for nurses exists; consequently, there are no standardization levels of competence and ability, and no way of correlating education with practice standards. The Indonesian government and Indonesian Nurses' Union are working towards rectifying this.

There are no national standards for D3, S1 and clinical practice, as guidelines for the development of the nursing profession and the empowerment of nurses. In order to solve those problems, INA propose to the Indonesian government and parlement to ratify the Nursing Law as basic rules of the national standardization level of nursing competencies, ability and education

system for nurses in Indonesia. INA has planned the career path for nurses shown in **Figure 2.**

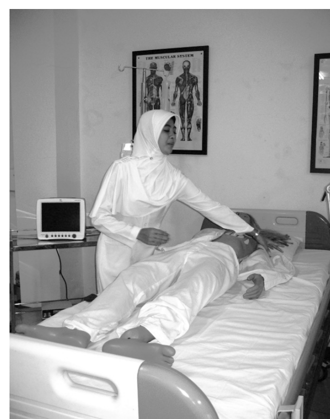
5. Nursing Short Courses Training and In-Service Education in Indonesia

There are some problems that exist in Indonesia nursing profession and education namely:

- There is a serious shortfall (by international standards) of qualified nurses in Indonesia with estimated 50 nurses per 100,000 of the population.
- The majority of nurses (60%) are educated up to high school level only, and 39% have a diploma, and 1% are graduates; these latter two groups move education soon after completing their training. This means that the majority of direct clinical care delivered by the least qualified nurses. There appears to be little differentiation between clinical roles for the different levels of education.
- No central registration of nurses exists. This means that it is impossible to regulate the profession, to enforce quality standards and to ensure accord between level of training and clinical activities undertaken.
- Many nurses do not have a formal job description. It means that professional and competence boundaries may be exceeded, especially where there is pressure on services and limited resources.
- Like all government employees, nurses are required to have an annual Individual Performance Appraisal (IPA) as a mechanism. The structure and framework of these IPAs various greatly, and may affect nurses' understanding of their skill levels and development needs.

Since 1998, Indonesia began to prepare to nurses to overseas, and conduct the lecture in English with American or Australian-based curricula. Indonesian nurses have migrated to the Middle East and throughout the developed world. The nurses export business influenced the rapid growth of nursing schools in Indonesia. Many groups profited from nurse migration business.

In order to resolve those problems some activities have been done beside the improvement of formal nursing education. There are some short training to prepare nurses and health workers who want to work overseas. Some institution conduct the program professionally by working with other institutions abroad and their graduates get a double degree. These graduates can work as registered nurses in the where they study. This program is quite expensive with long preparation in resources and infrastructure. Another program that mostly run by the private business is a short training program for nurses. The



(Photos) Indonesian nurses (mostly bachelor nurses) attending the preparation course to be sent to Saudi Arabia (Photos were taken in the Amri Foundation Bekasi, West Java in 2008).

Indonesia Manpower Department also prepares training programs for caregivers.

Since the Economic Partnership Agreement (EPA) between the governments of Indonesia and Japan, some nurses and caregivers are now working in Japan. Other nurses and nurse students in Indonesia are influenced with this situation. Students have a will to go to work to Japan when they finish studying. As shown in the research conducted by Hapsari and other scholars in 2008 at one public university in Jogjakarta Indonesia, 28% of all nurse students wishes to work abroad and 56% of them chosen Japan as the country they wish to go. The main reason that they want to go to Japan is high salary (57.3%). Another consideration that they concerned is the life style and religion in Japan (Hapsari, 2009).

In the EPA between Japan and Indonesia, some problems have identified such as the training system of Indonesian nurses to pass the national nursing board examination in Japan, the work environment for Indonesian nurses at the hospital and elderly home, the improvement of nursing skills versus career development, and recognition of the differentiation of social culture especially in the religion ritual (for example. using scarf among Moslem women, schedule to pray to God). It also need to explore how can we minimize the influences of the health services in Indonesian hospitals after some professional nurses left to Japan.

The INA and the Japanese Nursing Association (JNA) are expected to work together in preparing nurses before they work to Japan. They will develop the international standardized training center with high quality- clinical teaching learning as in Japanese health services. A good schem appropriate for both countries needed to meet this goal. In order to implement EPA successfully, the both governments have to take into account of serious preparations (physical, psychological, knowledge, skill, attitude as well as information needed) for nurse candidates and guide them how to work in Japan.

6. Conclusion

Nursing is one of the most demanding and exacting professions. It is an important part of the Indonesian health care system. For that reason, the Indonesian government is dedicated to improving the standard and level of nursing education and, since 1998 many school courses have been converted to diploma level. Nurses can be considered as the gatekeepers of service quality. They are the backbone of hospital care and in their hands lay the care of thousands of patients.

Since 1998, Indonesia began to prepare her nurses to overseas, and conduct the lecture in English with American or Australian-based curricula. The nurses export business influenced the rapid growth of nursing schools in Indonesia. Many groups have profited from nurse migration business. Then years later (in 2008), the Economic Partnership Agreement (EPA) between the governments of Indonesia and Japan came to be effective, and hundreds of Indonesian nurse and caregiver (certified care worker) candidates are now working in Japan, in accordance with a provision of the EPA. Both governments have to take account of serious preparations (physical, psychological, knowledge, skill, attitude as well as information needed) for Indonesian candidates, and guide them how to work in Japan.

References

Aiken, L.H., Smith, H.L. and Lake, E.T., 1994, "Lower Medicare mortality among a set of hospitals known for good nursing care", *Med Care*, 32(8): 771–787.

Aiken, L.H., Sochalski, J. and Lake, E.T., 1997, "Studying outcomes of organizational change in health services", *Med Care*, 35 (suppl): NS6-NS18.

ANT - LKBN ANTARA, Indonesia, "Maternal Mortality Rate in Indonesia Remains High" (retrieved on 15 December 2009 from http://www.highbeam.com/doc/1G1-133742879.html).

Ameijde, L. van, 2006, *Empowerment of Indonesian nurses, from doctors' helpers to professionals in healthcare*, Semarang (Indonesia).

Arford, P.H., 2005, "Nurse-Physician Communication:

An Organizational Accountability", *Nurs Econ*. 23(2): 72-77 (retrieved on 5 June 2006 from http://www.medscape.com/viewarticle/502806_6).

Baggs, J.G., Schmitt, M., Mushlin, A.I., Mitchell, P.H., Eldredge, D.H., Oakes, D., & Hutson, A.D., 1999, "Association between nurse-physician collaboration and Patient outcomes in three intensive care units", *Critical Care Medicine, 27*(9): 1991–98.

Bailey, J.T., Steffen, S.M. & Grout, J. W., 1980, "The stress audit: identifying stressors of ICU nursing", *Journal of Nursing Education*, Vol. 19, No. 6: 15–25.

Bird, A. in Hyland, Deirdre, 2002, "An Exploration of the Relationship between Patient Autonomy and Patient Advocacy: implications for nursing practice", *Nursing Ethics*, 9(5).

Bossert, Thomas *et a.l*, 1997, *Hospital autonomy in Indonesia*, Harvard School of Public Health.

Cheng, Shou-Hsia, Yang, Ming-chin & Chian, Tung-liang, 2003, "Patient satisfaction with and recommendation of a hospital: effects of interpersonal and technical aspects of hospital care", *International Journal for Quality in Health care*, Vol.15, 4: 345–55

CIA, The World Factbook, 2002, Statistik Indonesia (retrieved on 18 January 2010, from https://www.cia.gov/library/publications/the-world-factbook/geos/id.html).

CIA, The World Factbook, 2009 (retrieved on 28 March, 2009 from https://www.cia.gov/library/publications/the-world-factbook/index.html).

Cleary, P.D. and McNeil, B.J., 1988, "Patient satisfaction as an indicator of quality care", *Inquiry*, 25: 25–36.

Fagin L. and Garelick A. 2004, "The doctor-nurse relationship", *Advances in Psychiatric Treatment*, Vol. 10: 277–86.

Fulton, Y., 1997, in Hyland, Deirdre, 2002, "An Exploration of the Relationship between Patient Autonomy and Patient Advocacy: implications for nursing practice", *Nursing Ethics*, 9(5).

Haddad, A. M., 1991, "The nurse/physician relationship and ethical decision making", *AORN Journal,* 53(1): 151–56.

Hamid A.Y.S., 2009, "Indonesian nurses on the move in response IJEPA: Required policy reform and the role of nurses association", presented at The 1st International Workshop on Demographic Change and International Labor Migration Project in Tokyo on 15–16 January 2009.

Hagedorn *et al*., 1997, "A model for empowerment of nursing in Iran" (retrieved on 6 May 2006 from http://www.biomedcentral.com/1472-6963/5/24).

Hapsari, Elsi Dwi, Yunita Sari, Naoki Nakazono, Hiroya Matsuo and Achir Yani Syuhaimie Hamid, 2009, *Issue Seputar Bekerja sebagai Perawat di Jepang* (Unpublished).

Hofstede, Geert, 1980, *Culture's Consequences: International differences in work-related values*, Beverly Hills, CA: Sage.

Hofstede, Geert, 1994, *Cultures and Organizations, software of the mind, intercultural cooperation and its importance for survival*, Harper Collins Business.

Indonesian Naval Hydro-Oceanographic Office, Jakarta, 2004 (retrieved on 18 January 2010 from http://rudiwp.wordpress.com/2008/03/07/indonesia-indonesia).

Knaus, W.A., Draper, E.A., Wagner, D.P., & Zimmerman, J.E., 1986,. "An evaluation of outcomes from intensive care in major medical cen ters", *Annals of Internal Medicine*, 104, 410–418.

Lubis, M., 2000, *The Indonesian Dilemma*, Singapore: Graham Brash (Pte).

Ministry of Health/Ministry of Education, 2003, *Indonesia-Health Workforce and Services*, Jakarta: Ministry of Health/Ministry of Education.

Northouse, P and Northouse, L., 1992, *Health Communication: Strategies for Health Professionals*, Norwalk, CT: Appleton & Lange.

O'Reilly, Phillipa, 1993, Barriers to effective clinical decision making in nursing, (retrieved on 10 March 2006 from http://www.clininfo.health.nsw.gov.au/hospolic/stvincents).

Page, A., 2004, *Keeping Patients safe: Transforming the work environment of nurses*. Committee on the work environment for Nurses and Patient Safety, Institute of Medicine, Washington DC: National Academy Press.

Peursen, C.A. van, 1997, *cultuur in stroomversnelling*, Uitgeverij Ten Have.

Ponte Pat Reid, 2007, "The Power of Professional Nursing Practice: An Essential Element of Patient and Family Centered Care", *The Online Journal of Issues in Nursing* (Accessed on 29 March 2007).

Shannon, Sarah E. *et al*., 2002, "Patients, nurses and physicians have different views of quality of critical care", *Journal of Nursing Scholarships*, 34 (2): 173–79.

Shields, L. & Hartati, E., 2003, "Nursing and Healthcare in Indonesia, *Journal of advanced*

Nursing", Vol. 44 (2): 209–16.
Stein, L.I., 1967, in Fagin, L. & Garelick A., 2004, "The doctor-nurse relationship", *Archives of General Psychiatry*, 16: 699–703.
Stein, L.I., 1990, in Fagin, L. & Garelick A., 2004, "The doctor-nurse relationship", *The New England Journal of Medicine*, 322: 546–49.
Sugiharto, 2005, *Antisipasi Perencanaan Tenaga Kesehatan Guna Mendukung Indonesia Sehat 2010* (retrieved on 20 May 2009 from http://www.twnagakesehatan.or.id/artikel_detail 14-April 2009).
Susenas, 2004, (retrieved on 18 January 2010 from http://www.datastatistik-indonesia.com).
The World Bank Group, (retrieved on 18 January 2010 from http://web.worldbank.org/WBSITE/EXTERNAL/COUNTRIES/EASTASIAPACIFICEXT/INDONESIA).
Tammelleo, A.D., 2002,. "Nurses failed to advocate for their Patient", *Nursing Law's Regan Report,* Vol. 42(8), 2
World Health Organization, 1978, "International Conference on Primary Health Care", *Alma-Ata, USSR, 6–12 September 1978, Declaration of Alma-Ata*, (retrieved on 18 January 2010 from http://www.who.int/hpr/NPH/docs/declaration_almaata.pdf).
University of Indonesia, 2005, *Development of High Nursing Education and Specialisation in Indonesia, from Brain Drain to Brain Gain,* Round Table Conference October 2004, Bali, Jakarta: Faculty of Nursing, University of Indonesia.
World Health Organization, 2006, *The World Health Report 2006, Working together for Health, work-force statistic* (retrieved on 6 March 2007 from http://www.who.int/whr/2006/annex/06_ annex4_en.pdf).
World health statistics- WHO-SIS 2008. (retrieved on 6 March 2007 from http://apps.who.int/whosis/database/core/core_select_process.cfm?country=idn&indicators=healthpersonnel).
Weston, W. and Brown, J., 1996, "Dealing with common difficulties in learning and teaching the Patient-centred method", in Irving, P. and Dickson, D., 2004, "Empathy: towards a conceptual framework for health professionals", *International Journal of Health Care Quality Assurance*, Vol. 17, 4, pp.212–220.