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## **The arrangement of medical records in implementation of Telemedicine in Hospitals**

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**Abstract.** Legal research methods are procedures or steps that are considered effective and efficient. Based on the discussion, it is concluded as follows 1)The legal principles of hospital telemedicine include prprinciples of Information and Communication Technology (ICT) utilization, the principle of state and community responsibility, the principle of competence, integrity, and quality, the principle of equality, good faith, independence, and volunteerism as well as legal certainty and the principle of data security and confidentiality as well as standardization, the principle of patient autonomy and freedom to choose technology or technology neutral and the principle of patient interest is prioritized, data protection, IT forensics, best practices, and legal audit standards as well as justice and legal protection principles 2) medical record regulation different countries, namely Indonesia and America. Indonesia does not yet have a law that specifically regulates electronic medical records. Apart from the ITE Law.

**Keywords.** medical records', telemedicine

### **Introduction**

The right to health services is stated in Articles 5 and 6 of the Health Law Number 36 of 2009 concerning Health (hereinafter referred to as the Health Law) which states that everyone has the same rights in obtaining access to resources in the health sector and everyone has the right to obtain safe, quality and affordable health services; and every person has the right to independently and responsibly determine the health services needed for himself. So that the right to health becomes a very basic and important thing for every individual.(Sri Isriaway Fheryal 2015) Patient rights are basically included in human rights. This right includes the right to health which is manifested in the form of the right to health services, as well as the right to self-determination.

Every right is certainly inseparable from obligations. For the fulfillment of these rights, there must be a party who guarantees the implementation of the fulfillment of these rights in the form of legal regulations and obligations. Health is the main pillar of the development of a nation, and is guaranteed by the state, by building and providing good and affordable health care facilities for every individual in Indonesia. Article 47 of the 1945 Constitution reads that "The state is responsible for the provision of adequate health service facilities and public service facilities". Continued in Article 54 of the Health Law, that the implementation of health is carried out in a responsible, safe, quality, as well as equitable and non-discriminatory manner.

Therefore, apart from being a human right of every individual Indonesian, Indonesia is also responsible for the fulfillment of these health services. The state is not only responsible for providing health facilities, but each of these health service facilities must meet good national standards and guarantee quality. (Anon n.d.)

In addition to patient rights which are the embodiment of human rights, there are also various inherited rights, including the right to information and the right to privacy. In order to obtain quality health services, patients also have the right to obtain health information. Article 7 of the Health Law states that everyone has the right to get information and education about balanced and responsible health. The right to information includes information on health education, the state of the illness and other information related to the patient's health. (Anon n.d.) The patient's rights certainly cannot be separated from the doctor's obligations. Patients' rights will not be fully achieved if a doctor does not carry out his obligations, one of which is the obligation to carry out work with the highest standards.

The development of information technology in the world, including Indonesia, in the last decade has progressed very rapidly. The development of information technology directly and rapidly affects all sectors of life and daily activities of Indonesian people. The health sector is inseparable from the development of information technology. Article 167 of the Health Law states that health management is administered by the Government through the management of health administration, health information, health resources, health efforts, health financing, community participation and empowerment, science and technology in the health sector, as well as integrated health legal arrangements. and support each other in order to ensure the achievement of the highest degree of health.

One of the developments in information technology that is currently being discussed and mushroomed is Telemedicine technology. Telemedicine is defined as the provision of health services through audiovisual conference technology between doctors or health practitioners and patients remotely to transmit patient medical data using audiovisual communication using existing telecommunications infrastructure, for example using the internet, satellite and so on. (Anon n.d.) The Internet has been a stable source of medical data previously and is currently being used as a medium for providing online health consultation services between patients and doctors.

Telemedicine technology is expected to help patients and health institutions to share information easily and quickly. Today, the advancement of the world of computer-based Information and Communication Technology (ICT) has developed and become an inseparable part of the world of health. (Anon n.d.) *Telemedicine* can be grouped into interactions of health information transmission between health institutions and long-distance interactions between doctors and patients.

One form of Telemedicine is an application that offers online-based health consultation facilities, where a patient can ask questions about health to doctors through media in the form of an application without face to face. Until now, there have been many health applications in Indonesia that offer this online health consultation facility. In addition to consultations, some applications even make it easier to buy drugs through prescription. This application is often referred to as an online clinic.

Indonesia is an archipelagic country that is developing. With Indonesia's geographical structure consisting of thousands of islands, health care facilities are still not evenly distributed and adequate in some areas. This application that provides online consultation is considered to be able to help bridge the distance and reach the limitations of patients to get these health care facilities. Every development has a good purpose. Online health consultation facilities also have

many positive benefits. In terms of practicality, this online consultation makes it easy for patients everywhere to be able to interact with doctors without having to come to the hospital

One of the services needed in Telemedicine is to record everything about the patient's disease history, starting when the patient arrives, until the end of the treatment stage at a health service facility. In the world of health, these records are known as medical records. (Mutmainnah 2020) RMedical record is a doctor's medical records that are made during the treatment and care relationship between a doctor and a patient. The presence of medical records in terms of medical practice is very important, both for health service facilities in hospitals, clinics, health centers, medical centers, and doctor's practices.

This Medical Record is tangible evidence that describes the correct diagnosis, treatment, treatment, costs and all medical procedures given by the doctor. As a valid evidence, when viewed from a formal and material perspective, this medical record evidence must not only comply with the provisions of the Criminal Procedure Code/Civil, but also comply with standard operating procedures generally applicable in the medical field. Regarding this function, from a legal perspective, this medical record can be used as evidence in the process of law enforcement, medical ethics and medical discipline. Especially in the law enforcement process, this medical record can be accepted as evidence in the process of resolving a legal case, namely to determine the guilt or innocence of a doctor in a legal conflict.

RThe medical record, among others, contains the patient's identity, examination, treatment and other actions and services provided by a doctor to a patient while undergoing treatment at a health service facility (SK Men PAN Number 135 of 2002). (Jusu 2008) DIn every health service facility, medical records must exist to maintain a high quality of professional service, to complement information needs, for the benefit of a substitute doctor who continues patient care, for future reference, and is necessary because of the patient's right to see. (Jusu 2008)

The aims of this study were 1) To determine the legal principles of hospital telemedicine; 2) To find out the arrangement of Medical Records in various countries based on the laws in force in Indonesia; 3) To find out the procedures for organizing Telemedicine Medical Records and 4) To find out the types of Telemedicine services.

### **Methods**

Legal research methods are procedures or steps that are considered effective and efficient. (Soekanto 2015)

### **Result And Discussion**

#### **The Concept of Setting Medical Records (Medical Record) in the Implementation of Telemedicine in Hospitals**

According to Permenkes No. 20 of 2019, Telemedicine services can only be provided by Health Facilities. Even though it is not uncommon for Telemedicine services, such as teleconsultation, to be carried out through other platforms, such as the e-Health application (Halodoc, Alodokter). The Permenkes also only explicitly regulates inter-Fasyankes Telemedicine (hospitals, clinics, health centers). Indonesian Medical Council Regulation (KKI) No. 74/2020 gives permission for doctors and dentists to provide medical services to patients using Telemedicine technology. However, this regulation only allows doctors to provide services through Health Facilities, and not directly. In addition, these regulations only apply during the Covid-19 pandemic.

Health care providers have an obligation to maintain the privacy of their patients' medical data. This includes communication between doctors and patients, as well as other data in the form of images, texts, related videos. Maintaining this privacy and confidentiality is easier to do if health management is carried out entirely in the health facilities (hospitals or clinics), but new problems arise when applying Telemedicine technology.

There are several principles of using Telemedicine in Indonesia as described below.

- a. Prinsip Utilization of Information and Communication Technology (ICT).  
governmenth Indonesia through the Ministry of Health has designed the National Health Information System Network (SIKNAS). fingerbro, this is a virtual connection/network of electronic health information systems managed by the Ministry of Health and can only be accessed when connected.
- b. Principles of State and Community Responsibility  
Doctors as organizers of medical practice have the authority to practice medicine based on permits granted by the government. Permission from the government, is a form of state responsibility to regulate and foster medical practice in Indonesia.(H. Hendrojono Soewono 2007)
- c. Principles of Competence, Integrity and Quality  
Based onmedical practice with telemedicine requires special skills and expertise, so of course these health workers need to be equipped with special knowledge and abilities in the field of telemedicine. Mastery of minimum quality standards by health workers must be proven by a trusted certification system.
- d. Principles of Equality, Good Faith, Independence, and Volunteering and Respect Legal Astian  
ifa health service from a medical facility located abroad as a telemedicine provider wants to open its virtual network.
- e. Principles of Data Security and Confidentiality and Standardization  
Loyalp people have the right to secret their personal health conditions that have been disclosed to health service providers (Article 57 paragraph (1) of Law No. 36 of 2009 concerning Health). In the use of Telemedicine, the protection of patient privacy rights over their health data that is recorded electronically at health care facilities, needs to be regulated so that it is not easily accessed by unauthorized parties. For this reason, it must be carried out by an authorized officer and has a special permit for it.
- f. Principles of Patient Autonomy and Freedom to Choose Technology or Technology Neutral.  
Loyalp the patient has the right to accept or reject part or all of the action for the relief action that will be given to him after receiving and fully understanding the information regarding the action (Article 56 paragraph (1) of Law No. 36 of 2009 concerning Health). Patients also have the freedom to choose technology or be technology neutral. after being given information about the benefits and risks of using the technology. So that whatever decisions are taken by patients, they can equally provide a sense of security, justice, and legal certainty.
- g. The principles of patient interests are prioritized, data protection, IT forensics, best practices, and legal audit and fairness standards.  
Loyalty people if a dispute arises, they can file a lawsuit against the party that operates the Electronic System and/or uses Information Technology that causes losses (Article 38 paragraph (1) of Law Number 11 of 2008 concerning Information and Electronic Transactions). In the process of proving in court, it is very important that the patient's medical data is used as evidence. For this reason, health services using Telemedicine must

pay attention to the provisions on data protection so that if needed in the future it can be used as evidence

h. Legal Protection Principle

Based on Law Number 11 of 2008, any person who commits a legal act as regulated in this Law, both within the jurisdiction of Indonesia and outside the jurisdiction of Indonesia, which has legal consequences in the jurisdiction of Indonesia and/or outside the jurisdiction of the Republic of Indonesia. jurisdiction of Indonesia and harming the interests of Indonesia can be punished.

### **Medical Record Legal Arrangements in Various Countries**

#### **Medical Record Legal Regulations in Indonesia**

The development of this technology ultimately facilitates the process of collecting patient data in a health service. There are several legal basis for the implementation of medical records of health services organized by health service facilities, including hospitals. Article 28 letter h of the 1945 Constitution of the Republic of Indonesia stipulates that,

*"Everyone has the right to live in physical and spiritual prosperity, to have a place to live, and to have a good and healthy living environment and have the right to obtain health services."*

Everyone who resides in Indonesia has the right to receive health services, including the poor as regulated in Law Number 36 Year 2009 concerning Health, "Everyone has the right to health". In Law no. 44 of 2009 Article 29 paragraph 1 letter h regulates the obligation of hospitals to maintain medical records. This provision is also supported by Article 46 of Law Number 29 of 2004 concerning Medical Practice,

- (1) Every doctor and dentist in carrying out medical practice is required to make a medical record
- (2) The medical record as referred to in paragraph (1) must be completed immediately after the patient has finished receiving health services.
- (3) Each medical record must be affixed with the name, time and signature of the officer who provided the service or action.

Meanwhile, medical records are also regulated in Article 5 of the Regulation of the Minister of Health Number 269 of 2008, namely:

- (1) Every doctor and dentist in carrying out medical practice is obliged to make a medical record.
- (2) The medical record as referred to in paragraph (1) must be made immediately and completed after the patient receives the service.
- (3) Preparation of medical records as referred to in paragraph (2) is carried out through recording and documenting the results of examinations, treatment, actions, and other services that have been provided to patients.
- (4) Every record in the medical record must be affixed with the name, time and signature of the doctor, dentist or certain health personnel who provide direct health services.

Medical records are confidential where doctors or hospitals or other health care workers have an obligation to keep all medical record documents confidential which is regulated in Article 48 paragraphs 1 and 2 of Law no. 29/2004 that is,

- (1) Every doctor or dentist in carrying out medical practice is obliged to keep medical secrets.

- (2) Medical secrets can be opened only for the benefit of the patient's health, fulfilling the request of law enforcement officials in the context of law enforcement, the patient's own request, or based on statutory provisions.

On the other hand, the confidentiality of medical records is also regulated in Article 322 paragraphs 1 and 2 of the Criminal Code (KUHP).

- (1) Any person who deliberately discloses a secret which according to his position or occupation, whether he is now or in the past, is required to keep it, shall be sentenced to a maximum imprisonment of nine months or a maximum fine of Rp. 9000.
- (2) If this crime is committed against a specified person then the act is only prosecuted on the confession of that person.

At this time, the use of electronic medical records can provide great benefits for health services such as basic service facilities and referrals (hospitals). One of the benefits of using electronic medical records is to increase the availability of electronic patient records in hospitals. It is also beneficial for patients because it increases efficiency in the health care process. (Schnipper et al. 2008) On the other hand, for administrative staff, the use of electronic medical records can facilitate the retrieval of patient information. (Wilcox L n.d.) So that health workers can easily access patient information. Doctors and health workers also benefit from providing health services for their ease of accessing patient information, which in turn helps in clinical decision making, such as establishing a diagnosis, administering therapy, avoiding allergic reactions and drug duplication. (Anon n.d.)

From the aspect of efficiency, the use of electronic medical records has the impact of reducing operational costs and increasing income in health care facilities, especially for hospitals. Electronic medical records also make it easier to access patient data between doctors and health services in reading the patient's medical history without having to check the manual files one by one, making it easier for patients to make changes to doctors or hospitals.

The online system used for this medical record contains information that is collected on a single server and can be used by fellow 2013 users (who have been given access to open it) or what is often termed cloud computing. The National Institute of Standards and Technology (NIST), US Dept. of Commerce defines cloud computing as a model for convenience in accessing the network as needed in one data center. The type of service that is often used is Software as a Service (SaaS), where users can directly use the applications that have been provided and the infrastructure and platforms are managed by other parties. In the ITE Law, the management is called the Electronic System Operator, namely every person, state administrator, business entity, and community that provides, manages, and/or operate the Electronic System, either individually or jointly to users of the Electronic System for their own needs and/or the needs of other parties. If the management of online medical records involves a third party, the party using the management service is called the Operator user as regulated in the ITE Law, the Electronic System Operator Regulation System is also regulated in the Government Regulation of the Republic of Indonesia Number 82 of 2012 concerning the Implementation of Electronic Systems and Transactions, hereinafter referred to as PP PSTE.

While Indonesia does not yet have a law that specifically regulates electronic medical records, it turns out that several countries in the world have regulated this due to the desire of each country to protect the privacy of every citizen, including health history. The Ministry of Health of Singapore regulates the retention period of patient medical records in the Guidelines for The retention Periods of Medical Records 2015 which differentiates the storage period of online medical records and file forms. Each state of the United States also has rules about the

storage of medical records in the Health Information Technology for Economic and Clinical Health Act) of the American Recovery and Reinvestment Act of 2009, California Confidentiality of Medical Information Act, California Civil Code.(Anon n.d.) PaIn December 2012, Austria issued a lawThe law that regulates electronic medical records is the Electronic Health Records Act (EHR-Act).(Anon n.d.)

### **Types of Telemedicine Services**

According to Article 2 of the Regulation of the Minister of Health of the Republic of Indonesia Number 20 of 2019 concerning the Implementation of Telemedicine Services between Health Service Facilities, Telemedicine Services are carried out by health workers who have a license to practice at the health facility organizer. According to Article 2 of the Regulation of the Minister of Health of the Republic of Indonesia Number 20 of 2019 concerning the Implementation of Telemedicine Services between Health Service Facilities, Telemedicine Services are carried out by health workers who have a license to practice at the health facility organizer.

Regulation of the Minister of Health of the Republic of Indonesia Number 20 of 2019 concerning the Implementation of Telemedicine Services Between Health Service Facilities. According to Article 3 of the Regulation of the Minister of Health of the Republic of Indonesia Number 20 of 2019 concerning the Implementation of Telemedicine Services Between Health Service Facilities, there are 5 Telemedicine services that can be provided, namely:

- a. Teleradiology; diagnostic radiology services using image-based electronic transmission from all radiology modalities along with supporting data from the Consultation Requesting Health Facility to the Consulting Health Service Provider to obtain accuracy and accuracy in establishing a diagnosis
- b. Teleelectrocardiography; Electrocardiography services using electronic transmission of images from the Health Service Center requesting the Consultation to the Consulting Health Service Provider
- c. Teleultrasonography; obstetric ultrasound service using electronic transmission of images from the health facility requesting the consultation to the health facility providing the consultation
- d. Clinical teleconsultation; remote clinical consultation services to assist in establishing a diagnosis, and/or provide management considerations/advice in writing, voice, and/or video and must be recorded and recorded in the medical records of other Telemedicine consulting services in accordance with the development of science and technology

According to Article 6 of the Regulation of the Minister of Health of the Republic of Indonesia Number 20 of 2019 concerning the Implementation of Telemedicine Services Between Health Service Facilities, Telemedicine services that can be provided are:

- (1) The Consulting Health Facilities as referred to in Article 5 are in the form of a hospital.
- (2) The hospital as referred to in paragraph (1) is a hospital owned by the Central Government, Regional Government, and private sector that meets the requirements.
- (3) The Health Facilities Requesting Consultation as referred to in Article 5 are in the form of hospitals, first-level Health Facilities, and other Health Facilities.

According to Article 7 of the Regulation of the Minister of Health of the Republic of Indonesia Number 20 of 2019 concerning the Implementation of Telemedicine Services Between Health Service Facilities:

- (1) The Consulting Health Facilities as referred to in Article 5 have the following duties:
  - a) determine human resources in implementing Telemedicine Services;

- b) set standard operating procedures
- c) Telemedicine services through the decision of the head/director of the hospital;
- d) documenting Telemedicine Services in medical records in accordance with the provisions of laws and regulations; and respond to any complaints/suggestions/criticisms on Telemedicine Services from the Health Facilities Requesting Consultation.

(2) The Health Facilities Requesting Consultation as referred to in Article 5 have the following duties:

- a) determine human resources in implementing Telemedicine Services;
- b) establish standard operating procedures for Telemedicine Services through the decision of the Health Facilities leadership;
- c) documenting Telemedicine Services in medical records in accordance with the provisions of laws and regulations; and
- d) provide Telemedicine services in accordance with the cooperation agreement.

Regarding health service activities through telemedicine, health services that can be provided through telemedicine include:

- a. Communication, Information and Education Consultation(KIE)
- b. Clinical consultation

The existence of telemedicine services, distribution of health information can take place more quickly. As long as there is internet access and smart phones, everyone can get health information, health services, drugs, diseases, etc., so that people can take early prevention or get treatment for their illness.

Paramedics in clinics and puskesmas usually only consist of general practitioners, dentists, and midwives. In fact, patients with certain diseases require a consultation or diagnosis from a special doctor who is currently usually found in large hospitals. In addition to having to bother taking patients to large hospitals, of course there are additional costs and it takes more time to queue. With telemedicine services, clinics and health centers have the opportunity to provide special doctor services online. Patients can also get direct directions from special doctors more quickly.

The existence of telemedicine services, doctors can directly direct patients to be taken to which referral hospital. Patients and families no longer need to bother going to the clinic just to look for referrals. With just a smartphone access, the doctor in the telemedicine application will direct which hospital is the right one to treat the patient. Telemedicine can direct you quickly and precisely, which hospital is right for patients with certain diseases.

### **Conclusion**

Based on the discussion, it is concluded as follows 1)The legal principles of hospital telemedicine include principles of Information and Communication Technology (ICT) utilization, the principle of state and community responsibility, the principle of competence, integrity, and quality, the principle of equality, good faith, independence, and volunteerism as well as legal certainty and the principle of data security and confidentiality as well as standardization, the principle of patient autonomy and freedom to choose technology or technology neutral and the principle of patient interest is prioritized, data protection, IT forensics, best practices, and legal audit standards as well as justice and legal protection principles 2) medical record regulation different countries, namely Indonesia and America. Indonesia does not yet have a law that specifically regulates electronic medical records. Apart from the ITE Law. Law Number 36 of 2009 concerning Health, while in America it has been

regulated in all aspects of administering medical records; 3) Telemedicine Medical Record Procedures are explained in the Minister of Health Regulation Number 20 of 2019 which means Telemedicine is the provision of remote health services by health professionals using information and communication technology, including the exchange of information on diagnosis, treatment, disease prevention. and injury, research and evaluation, and continuing education of health service providers for the benefit of improving individual and community health and 4) Telemedicine services between health care facilities.

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