

FACTORS RELATED TO DO (DROPPED OUT) TO THE PEOPLE WITH PULMONARY TUBERCULOSIS IN JAYAPURA CLINICSNurmia*¹ and Kuswadi²¹Academy of Nursing of Marten Indey Hospital, Jayapura, Papua, Indonesia.²Office of Health Training of Papua, Indonesia.Article Received on
20 Sept. 2018,Revised on 10 Oct. 2018,
Accepted on 31 October 2018

DOI: 10.20959/wjpr201818-13626

Corresponding Author*Nurmia**Academy of Nursing of
Marten Indey Hospital,
Jayapura, Papua, Indonesia.**ABSTRACT****Background:** Drop Out (DO) in people with Pulmonary TB is TB patients Pulmonary who did not take drugs and drink anti TB for two months in a row. **Purpose:** this research aims to know the factors associated with DO in people with Pulmonary TB Clinics in Jayapura.**Method:** This research use design research survey the analytic approach with a *cross secciona Study*. **The results:** Pulmonary TB sufferers are mostly male (56%), age of productive (15-54) (93%), have a high school education level (49%) and work (56%). Factors related to *DO* in people with Pulmonary TB is drug side effects ($p = 0.001$), PMO support ($p = 0.030$), family support ($p = 0, 001$) and themotivation of sufferers ($p = 0.000$). **Conclusion:** Characteristics of pulmonary TB sufferers are mostly Pulmonary TB sufferers are men (56%), age of productive (15-54) (93%) had a high school education level (49%) and work (56%). There is a connection between drug side effects ($p = 0.001$), the distance from home to clinic ($p = 0.030$), PMO support ($p = 0.017$), family support ($p = 0.001$) and the motivation for medical treatment ($p = 0.000$) and *DO* in people with Pulmonary TB.**KEYWORDS:** Pulmonary TB, Drop Out, Clinics.**INTRODUCTION**

The disease tuberculosis (TB) is an infection that causes public health problem throughout the world. The disease infected much of the population in developing countries. (Safar, M 2011). Tuberculosis of the lungs (Pulmonary TB) is an infectious disease caused by the *Mycobacterium tuberculosis* can be transmitted directly. The main target is the pulmonary organs, but usually about other organs also (Amin Z bahar A, 2009).

Indonesia was still ranked 3rd in the world for the number of TB cases after India and China. Every year there are 250,000 new cases of TB and about 140,000 deaths from TB. In Indonesia tuberculosis is the number one killer among infectious diseases and is the number three cause of death after heart disease and acute respiratory diseases in all ages.

Based on the results of the coverage of the discovery of a case of disease of pulmonary Tuberculosis (Pulmonary TB) in 2011 by Kemenkes RI at 2011 noted the positive discovery of BTA coverage of men and women in Papua a number of sufferers with 2,601 *case detection rate (CDR)* 56.8%. The highest prevalence in the Regency Boven Digoel was 559.3 and lowest in Asmat Regency around 22.22.

Riskesdas (2013) obtain data the Indonesia population prevalence of undiagnosed Tuberculosis by health care personnel years 2007 and 2013 not dissimilar (0.4%). Five provinces the highest TB is West Java, Papua, Jakarta, Indonesia. Banten and West Papua.

According to Widoyono (2008) Pulmonary TB prevention programs nationwide refers to the strategy of *Directly Observed Treatment Shortcourse (DOTS)* recommended by the WHO and proved to be able to break the chains of transmission of Pulmonary TB. The activities and measures undertaken within the Lung TB control programs is by the discovery of sufferers (*casefinding*) are cross-cutting and cross-program actively and passively, and with the treatment of sufferers (*case holding*), namely the supervision of medication, especially at intensive stage by the health planning (schedule home visits, medication, prevention of *Drop Out (DO)*) and conducted observation on side effects.

DO Pulmonary TB is one of the problems in Pulmonary TB control programs. *DO* define as wayward TB patients take drugs and drink, do not take the drugs for two months in a row, or the patient stop treatment without a doctor's instructions. (Kemenkes, 2011).

The Numbers *DO* Pulmonary TUBERCULOSIS in the city of Jayapura in 2014 is 11% whereas in 2015 increased to 14%, Health Office (The City Of Jayapura, 2016). This condition requires attention, as *DO* in people with Pulmonary TB can be the risk for the occurrence of resistant to anti-TB drugs (OAT). This research aims to know the characteristics and the factors factors that relate to *DO* in people with Pulmonary TB Clinics in Jayapura.

RESEARCH METHODS

This Research used methods of analytical surveys. Research conducted at 6 (six) Clinics in the city of Jayapura. The number of the subject of the research was 100 samples. Data collection is carried out structured interviews and observation. The use of sampling Techniques *purposive sampling*. The test used was statistics *Chi Square* when not qualified, and then used the alternative test.

RESULTS AND DISCUSSION

a. Characteristic of Pulmonary TB Sufferers.

1. Gender

The majority of Pulmonary TB was sufferers-sex male that is 56%. On the Pulmonary TB sufferer groups DO, 54.7% are men and the Pulmonary TB sufferers who do not DO, 58.3% is male. These conditions are Pulmonary TB sufferers appear that men more, both in the group DO or not DO. The results of research conducted by Santha T, et.al (2000) and Sophia V, et.al (2003) also shows the results of Pulmonary TB sufferer that men more than women, so too that DO so DO related to the sex of sufferers.

2. Age.

The Most of the sufferers Pulmonary TB was around age of 15-54 years 93%. On the Pulmonary TB sufferer groups DO, 90.6% were aged 15-54 years and Pulmonary TB sufferers in the Group who did not DO, 97.2% is the age of 15-54 years. 15-54 years of age is the age of productive age having high mobility and activities that allow the age of risk of transmission occurs (exposed). According to WHO (2009), that the incidence of tuberculosis is largely occurring in the age of productive.

Research conducted by Muis (2001) about the compliance of pulmonary TB sufferers seek treatment obtained the results that the productive age more wayward medical treatment Pulmonary TB sufferers compared to that is not productive. This is due to the age of this productive has the level of mobilization and a high activity, because at this old is the age of a child of school age and productive workers so that it was more worried about or give priority to activities of the disease he suffered.

3. Education.

Most of the sufferers Pulmonary TB have the educational level around 49%. On the Pulmonary TB sufferer groups DO, 43.8% was the level of education of administrator and

Pulmonary TB sufferers in the Group that not *DO*, 58.3% have an education level of High School. *Green et al* (1980) States that the level of education is one of the factors of predisposition which can affect the behavior of a person. Level of education can affect the rate of receipt of information, knowledge and attitude of the person. Higher levels of education will have a tendency to be more receptive to the information and have the knowledge and a better attitude.

Research conducted by Mukhsin, et al (2006) the educational level of the relationship with Pulmonary TB sufferers get results that affect education, ketuntasan or Pulmonary TB sufferers to treatment success. The higher the level of education of the sufferer, it will be the better reception of information about treatment and ailment so will get attention in the process of treatment and cure the ailment.

4. Job.

Most of the sufferers of Tuberculosis (TB) is worker around 56%. Pulmonary TB sufferers in the group who *DO* a .60 .9% are employed and Pulmonary TB sufferers in the group who did not *DO*, 47, 2% are working. These conditions are in accordance with the condition of Pulmonary TB sufferer age which most (93%) are aged productive (15-54 years).

Someone who works tend to notice improvements, especially if the worker is as head of the family, it will be able to work to its full potential so little regard for the illness he suffered. At the beginning of treatment (intensive phase) of Tuberculosis of the lungs generally will consume the drug properly and regularly, so that the conditions will be good. In conditions like this one will continue to work back and begin paying attention to the less regularity in consuming anti TB drugs. Research conducted by Yun Emery (2002) stated that the flurry of work as labourers in order to meet the economic needs of the family cause sufferers to hard customize treatment programs with daily activities and forget to drink the cure.

b. Factors related to *DO* of Tuberculosis

1. Side effects of the drug.

It is known that research results 15 people (15%) has/merasakan the presence of side effects of the drug and 85 people (85%) do not have/feel any drug side effects. On the Group *DO*, 15 people (23.4%) have/feel any drug side effects and 49 people (76.6%) do not have/feel any drug side effects. On the group does not *DO* none (0%) who have/feel any drug side effects and 36 people (100%) do not have/feel the existence of drug side effect. The results of test

Chi Square indicates that there is a connection between drug side effects with *DO* in people with Pulmonary TB $p= 0.001$.

Side effects of the drug can make someone feel uneasy or disturbed her activities. Side effects are often perceived by TB sufferers are nausea, vomiting and dizziness. The presences of perceived side effects Pulmonary TB sufferer pleh can cause TB sufferers of lung are not regularly consume the drugs.

Research conducted by Ernawatyingsih *et al* (2009) also pointed out that the existence of the side effects of drugs felt by sufferers of Pulmonary TB can affect Pulmonary TB sufferer disobedience in the medication on a regular basis.

Research conducted by the Muture *et a. l* (2011) also stated that the side effects of drugs is one of the risk factors of the sufferers of tuberculosis to be *DO*. Drug side effects may occur after taking medication or due to drinking 2 or more types (Syamsudin, 2011).

2. The distance of the House with the clinic.

The results of the research it is known that there were 11 people (11%) the distance of home with Clinics is a vehicle for 30-60 minutes by vehicle, 56 people (56%) of the distance the House with the Clinics is a vehicle less than 30 minutes and 33 people (33%) distance homes with Clinics is less than 30 minutes.

In the group there were 11 people *DO* (17.2%) the distance of home with Clinics is a vehicle for 30-60 seconds, 34 people (53.1%) the distance of home with Clinics is a vehicle for less than 30 minutes and 19 people (29.7%) the distance of home with The clinic is a walk for less than 30 minutes.

Drop out does not group which were 22 people (61.1%) the distance of home with Clinics is a vehicle for less than 30 minutes and 14 persons (38.9%) of homes with Clinics distance traveled by foot for less than 30 minutes. The *Chi Square* test results indicate that there is a relationship between the distances of the House to the Clinics with Pulmonary TB sufferers in *DO*. $p = 0.030$.

This state corresponds to the theory advanced by Pohan (2004) that access to medical services is the health services could be achieved by the community; reach/was not hindered by the State's geographic, social, economic, organizational and language. One of the

conditions related to health access is a State which can be measured by geographical distance, travel time, type of transport and or other physical barriers can block someone to get health care. This is also conform with research conducted by Aditama (2008) which suggests that the distances between places of treatment and first-time sufferers with home sufferers can affect the level of Pulmonary TB sufferer regularity for medical treatment, most respondents (86%) stated health facilities choose relatively close to his home.

3. Supporting by Medicine Drinking Keeper (PMO).

The results of the research it is known that are 75 people (75%) get good support from the PMO, 23 people (23%) get pretty good support of PMO and 2 (2%) support the less well from the PMO. In the group there were 53 people DO (82.8%) get good support from the PMO, 10 people (15.6%) get pretty good support of PMO and 1 people (1.6%) support the less well from the PMO. DO not group there were 22 people (61.1%) get good support from the PMO, 13 (36.1%) get pretty good support of PMO and 1 person (2.8%) support the less well from the PMO.

Spearman test results shows that there is a relationship between the PMO support with Pulmonary TB sufferer DOpada. $p = 0.017$. PMO's role in providing support in people with Pulmonary TB are indispensable, particularly in providing motivation to recover, the anti-TB drugs consume on a regular basis, the timing for the control back to the clinic. The results of this study in accordance with the results of research conducted by Rachmat Ichlas (2011) stating that there is a connection between the role of the PMO with the healing of Pulmonary TB sufferers. According to Theng, y. L, et al (2014) needs to support that comes from family, friends, doctors and a pulmonary TB sufferers have been cured aims for the care and recovery of the patient.

4. Family Supporting.

The results of the research it is known that there were 61 people (61%) get good support from the family, 36 people (36%) get pretty good support from keluarga and 3 persons (3%) support the less good of the family. A group of 31 people there DO (48.4%) get good support from families, 31 (48.4%) get a good enough support from family and 2 people (3.2%) support the less good of the family. In the Group did not DO there are 30 people (83.3%) get good support from family, 5 people (13.9%) get a good enough support from family and 1 person (2.8%) support the less good of the family.

Spearman's test results shows that there is a relationship between family support with Pulmonary TB sufferers DO on $p = 0.001$. In this research the family members play a role in providing social support to patients, as it gives motivation for the medication regularly, remind the time controls, and pay attention to complaints of Pulmonary TB sufferers because TB sufferers in General Lung will deliver the complaint to the family.

The existence of family support in people with Pulmonary TB TB sufferers will make Her feel comfortable, confident, feel greyed out and loved by the family so the individual dapatmenghadapi the problem with both (Setiadi, 2008). The family can also be a very influential factor in determining the beliefs and values of health for patients with Pulmonary TB, TB sufferers so that Parudapat receive well treatment program. (Niven N, 2000). In the study, v. Soldan à Paz, et al (2013) family members to remind patients to go to the clinic to take their medication and often with them there.

5. Clients Motivation

Results of the research there were 71 people (71%) had a good motivation, 28 people (28%) had a pretty good motivation, and 1 (1%) of the respondents have less motivation either. On the group DO, 35 people (54.7%) had a good motivation, 28 (43.8%) had a pretty good motivation and 1 person (1.5%) had less good motivation. DO does not group, 36 people (100%) have a good motivation. Spearman's test results shows that there is a relationship between the motivation of sufferers with treatment Pulmonary TB sufferers DO. $p = 0.000$.

Pulmonary TB sufferers who have a good motivation for treatment and will be able to complete the treatment well. This can be known at the Pulmonary TB sufferer group did not DO, all (100%) have a good motivation for medical treatment on a regular basis. Green et al (1980) stated that the motivation is part of the predisposing factors that can affect a person's behavior, the better the motivation of someone in a case then the better the result anyway.

The motives or motivations is one of the mechanisms in shaping behavior and is a process of change from within one's self. Motivation is often defined as the impetus arising from the inside of a person who knowingly or unknowingly makes a person behave in order to achieve the objectives corresponding to his needs. (Budioro, 2002). These conditions are in accordance with research conducted by Fauzia N (2010) suggests that patients who have low motivation potentially 27 times to stop TB treatment compared with patients who have high motivation.

SUMMARY

1. Characteristics of pulmonary TB sufferers are mostly Pulmonary TB sufferers are men (56%), age of productive (15-54) (93%) had a HIGH SCHOOL education level (49%) and work (56%).

2. There is a connection between drug side effects ($p = 0.001$), the distance from home to clinic ($p = 0.030$), PMO support ($p = 0.017$), family support ($p = 0.001$) and the motivation for medical treatment ($p = 0.000$) and Pulmonary TB sufferers DO at Clinics in the city of Jayapura.

SUGGESTION

1. Policy makers (Government)

a. Need for increased health promotion to the General Pulmonary tuberculosis sufferers in order for the medication on a regular basis in the clinic

b. The need to increase technical guidance and implementation supervision at regular intervals so that the officers of the pulmonary tuberculosis in Clinics can increase his knowledge of Pulmonary TB.

2. Community Health Centre

a. Need for clarification of health workers about the existence of drug side effects that may arise during the treatment of TB sufferers in order to be able to understand and do not feel panic/restless because adanay drug side effects experienced.

b. Need for the approach to access treatment in people with pulmonary tuberculosis by means of intensifying visits home and community health care program.

c. Need to increase the role of PMO PMO be optimized so that in carrying out its role as overseer of the medication.

d. Need for counseling to the family, especially the head of the family and family members nearby to be able to motivate pulmonary TB sufferers to seek treatment on a regular basis.

e. Need for a concerted effort to increase the motivation of pulmonary TB sufferers with organized activities in the health field involving/TB sufferers include such extension, discussions or meetings between TB sufferers are still treatment with sufferers who have been healed.

3. Next Researcher: Further research needs to be done with the menambhakan other variables and using qualitative research methods to gain a more in-depth information about the factors that cause the occurrence of Pulmonary TB sufferers in DO in the city Jayapura.

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