



## The Relationship Between Level Anxiety And Sleeping Quality of Breast Cancer Patients In One Day Care Chemotherapy Room

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### INFORMASI

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### ABSTRACT

*Objective: Chemotherapy is one of therapy managements for breast cancer patients. Chemotherapy has some side effects like nausea, gag, alpoesia, etc. Those can increase patients' anxiety. Then, this anxiety will give impact on sleeping quality disoeder. This research aims to identify the anxiety level of breast cancer patients in chemotherapy ODC room.*

*Methods: This research used crossectional design. There are 32 respondents as research sample choosen by purposive sample technic.*

*Results: The result shows that most repondents (68,75 %) didnt feel anxiety, 15,63% got mild anxiety, 9,38% got moderate and severe anxiety, and no one got panic anxiety. Most respondents (71,87) had good sleeping quality and 28,13% had poor sleeping quality. There is no relationship between level anxiety and sleeping quality of cancer patients with P value = 0,182.*

*Conclusion: There is no relationship between level anxiety and sleeping quality of cancer patients. Nurse should do persoal approach to patients who are still having severe anxiety and poor sleeping quality.*

**INTRODUCTION**

Modern life style gives impact on people’s life style changing where they have unhealthy life style, such as eating low fiber and high fat, presevative food, lack of regular excersises in which they can trigger deseases. One of deseases that is caused by unhealthy life style is Cancer. Cancer begins when normal cells are changed by genetic mutation from selular DNA that cause damage of gen which set up the growth and differentiation of cells, therefore the growth and development of cells cannot be controlled (*American Cancer Society (ACS), 2013*). Breast cancer is one of the most invasive cancer on women and become the main cause of death on women caused by cancer (Rasidji, 2012).

ASC (2013) estimates new cases of breast cancer invasive type are around 232.340 cases, *Carcinoma insitu* type (CIS) around 64.640 and around 39.620 women will die because of breast cancer. According to IARC Globocan (2008), there are 138 millions new cases of breast cancer that occur every year and 458 thousands of women dead caused by breast cancer. The amount of breast cancer patients in Indonesia is positioning on the first rank of hospitalized patients i.e. 16,85 % (SIRS, 2007 citide by Depkes RI, 2012). At RSKD Jakarta, the amout of new cases of breast cancer put on the first rank, even its percentage decreasing in 2010 and 2011. Breast cancer becomes the first rank of hospitalized patients in whole hospitals in Indonesia about 16,85% (SIRS, 2007 cited by Depkes RI, 2012).

Some medical management toward breast cancer patients are radiation therapy, chemotherapy, systemic therapy, hormonal therapy, targeted therapy, and sugery. (ACS, 2018). One of the most frequent management is chemotherapy. It is a sistemic therapy by giving sitostatika medicines in order to eliminate cancer cells (Smeltzer & Bare, 2013). The purpose of chemotherapy is to reduce tomor size and to metastasis pecess. But after chemotherathy the negative impacts also arise. Some of the side effects of chemotherapy are hair loss, nausea, gag, mucositis, decreasing hemoglobin, constipation, etc. The effects of chemotherapy depend on the anti- cancer medicine given (Priestman, 2008). Because of the side effects, they cause anxiety toward breast cancer patients.

The result of research done by Sarawati (2008, cited by Hidayah, Widodo and Sobirun, 2013) showed that from eleven respondents who are breast cancer patients 100% felt anxiety in different level, from normal anxiety to worst. According to the research of Hananta, Benita, Barus dan Halim (2014), 67,1%

breast cancer patients feel anxiety. They, depression breast cancer patients, are 4,4 times risky to have sleep problem than they who do not feel depression. According to Handayani and Udani (2017 cited from Purwantari 2013), from 30 sample of breast cancer patients who have chemotherapy show meaningful defference between chemotherapy and patients sleeping quality (P<0,002)

This research aims to identify the relationship between level anxiety and patients sleeping quality of breast cancer patients in One Day Care Chemotherapy room at Panti Rapih Hospital, Yogyakarta.

**METHOD**

This reaserch used crossectional design. The population is all breast cancrer patients who got chemotherapy in One day Care Chemotherapy room at Panti Rapih Hospital, Yogyakarta in February to April 2019. The research samples are taken using purposive sampling. There are 32 respondents as sample who full fill the inclusi criteria, i.e:

1. The patient has composmentis awareness
2. The patient does not have verbal communication disorders
3. Age between 25-60 years old

The instruments of Data collection use HAM-A (*Hamilton Anxiety Rating Scale*) and PSQI (*Pittsburgh Sleep Quality Index*).

**RESULT**

**Table 1. Characteristics of Breast Cancer Patient At Panti Rapih Hospital, Yogyakarta January – July 2019**

No	Respondent Characteristics	Frequency	
		n	%
1	Gender		
	Male	0	0
	Female	32	100%
2	Age		
	Early Adulthood (26-35 th)	3	9,37%
	Late Adulthood (36-45 th)	5	15,62%
	Early Elderly (46-55 th)	14	43,75%
	Midle Elderly (56-65 th)	8	25%
	Late Elderly (>65 th)	2	6,25%
3	Cancer Stadium		
	Stadium 1	16	3,12%
	Stadium 2	13	40,62%
	Stadium 3	7	21,87%
	Stadium 4	11	34,37%

**Table 2. Anxiety Level of Breast Cancer Patient At Panti Rapih Hospital, Yogyakarta January – July 2019**

Anxiety Level	n	%
None	22	68,75
Mild	5	15,63
Moderate	3	9,38
Severe	2	6,25
Panic	0	0,00

**Table 3. Sleeping Quality of Breast Cancer Patients At Panti Rapih Hospital, Yogyakarta January – July 2019**

Sleeping Quality	n	%
Good	23	71,87
Poor	9	28,13

Result analysis data showed that the average score of respondents anxiety level is 14,38 ( mild anxiety) while the average score for respondents sleeping quality is 4,69 (poor sleeping quality). The statistic test result using *spearman* correlation showed  $P_v=0,182$  ( $P_v > 0,05$ ), can be concluded that there is no significance relationship between anxiety level and sleeping qualities of breast cancer patients who having chemotherapy in Chemotherapy One Day Care Room at Panti Rapih Hospital Yogyakarta.

**DISCUSSION**

The research result shows that most breast cancer respondents are female. This result corresponds to American Cancer Society’s data (ACS, 2019), in which most breast cancer case in America are suffered by female. According to ACS (2019), a woman is hundred times risky suffering from breast cancer rather than a man. According to researcher, one of the factors that influences this condition is estrogen as hormonal factor. Woman have more estrogen than man. The exposure of estrogen to breast cells continuously will trigger division and growth of breast cells. Estrogen can stimulate proliferation of breast epithel cells in two ways i.e. bounding with  $\alpha$  reseptor that cause propagation. The second way, estrogen directly become genotoxic where its metabolit result like estrogen catechol carcinogenic and its oxidation

process results free radicals that cause oxidative lesion to DNA (Sandra, 2011). According to Kaczor (2010), estrogen can cause malignation in breast. It is because estrogen triggers cells proliferation process, angiogenesis and metastasis.

The research result shows that most respondents 68,75 % (22 respondents) had no anxiety, 15,63% (5 respondents) had mild anxiety, 9,38% (3 respondents) had moderate anxiety and 6,25 (2 respondents) had severe anxiety and no one had panic one. According to Stuart (2013) someone’s level maturity will affect on someone’s level anxiety. The older a person is the more constructive his level of energy and maturity in using coping to face his problems. It corresponds to research result that shows most respondents did not feel anxiety and mild anxiety, they are mostly early elderly and late elderly , 46-65 years old.

The research result shows that most respondents have good sleeping quality ( 71,87 %) and only 9 respondents (28,13%) had poor seeping quality. One of the things that can influence someone’s good sleeping quality is psychological stress (Potter & Perry, 2010). The research result shows that most respondents (68,75%) did not feel anxiety. In this condition, patients felt more rilex and better sleeping quality. However, *spearman* correlation result showed  $P_v= 0,182$  ( $P_v > 0,05$ ), can be concluded that there is no significance relationship between level anxiety and sleepign quality of breast cancer patients who got chemotherapy in One Day Care Chemotherapy room at Panti Rapih Hospital, Yogyakarta. There ara alot of factors that make level anxiety and sleeping quality have no relationship. Anxiety level is only one of the factors that influence sleeping quality of breast cancer patients who are doing their chemotherapy. Recently, there are a lot of practices like meditation, yoga, music therapy, breathing exercises that can give relaxation to patients so their sleeping have some quality.

**CONCLUSION**

Most respondents (68,75%) didnt feel anxiety, 15,63% felt mild anxiety, 9,38 felt moderate and severe anxiety, and no respondents felt panic. Most respondents (71,87) had good sleeping quality and 28,13% had poor sleeping quality. There is no relationship between anxiety level and sleeping quality of cancer patients with P value = 0,182

**SUGGESTIONS**

1. For Nurse  
Nurse can do personal approach to patient who still

has severe anxiety and poor sleeping quality.

## 2. Further Research

For further researchers can hold qualitative research to figure out deeper and to know the reasons. Besides, can test other factors that influence sleeping quality.

## REFERENCES

- American Cancer Society. 2013. *Breast cancer overview*.  
Retrived from <http://www.cancer.org>.
- American Cancer Society. 2018. *Breast cancer overview*.  
Retrived from <http://www.cancer.org>.
- American Cancer Society. 2019. *Breast cancer overview*.  
Retrived from <http://www.cancer.org>
- Departemen Kesehatan Republik Indonesia. 2012.  
Jika tidak dikendalikan 26 juta orang di dunia menderita kanker. Retrived from <http://www.depkes.go.id>
- Hidayah, S. N., Widodo, S., Shobirun. 2013.  
Pengaruh Tingkat Pengetahuan Tentang Pengobatan Kemoterapi Terhadap Tingkat Kecemasan Pasien Kanker Di Ruang Sitostatika Rumah Sakit Telogorejo Semarang. *Jurnal Karya Ilmiah STIKES Telogorejo*, Vol. 2, No.1.
- Hananta, L., Stella, B., Barus, J., Halim, F. 2014.  
Gangguan Tidur pada Pasien Kanker Payudara di Rumah Sakit Kanker Dharmais Jakarta. *Damianus Journal of Medicine*, Vol. 13, No. 2.
- Handayani, RS. & Udani, G. 2017. Kualitas tidur dan Distress pada Pasien Kanker yang Menjalani Kemoterapi. *Jurnal Ilmiah Keperawatan Sai Betik* Vol. 12 No.1, Hal 66-72.
- Kaczor, Tina. 2010. An Overview of Melatonin and Breast Cancer Exploring Melatonin's Unique Effects on Breast Cancer Cells. *Natural Medicine Journal*, February, Vol 2, Issue 2.
- Potter, P.A. & Perry, A.G. 2010. *Fundamentals of Nursing: Fundamental Keperawatan*. Buku 1. Edisi 7. Jakarta: Salemba Medika.
- Priestman, Terry. (2008). *Cancer chemotherapy in clinical practice*. London: Springer
- Rasidji, Imam. 2010. *Epidemiologi kanker pada wanita*. Jakarta: Sagung Seto.
- Sandra, Yurika. 2011. Melatonin dan Kanker Payudara. *Majalah Kesehatan Pharmamedika*, 3(2) 286-291.
- Smeltzer & Bare. 2013. *Buku Keperawatan Medikal Bedah Bruner & Suddarth*. Jakarta: EGC.
- Stuart, Gail W. 2013. *Principles and Practice of Psychiatric Nursing*. Tenth Edition. Mosby: Elsevier Inc.