The Effect Of Mind-Body-Spirit Therapy On Mood Score In Patients With Chronic Renal Failure With Hemodialysis

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ABSTRACT

Background: The number of new chronic renal failure patients with hemodialysis therapy continues to increase from year to year in Indonesia. When people learn they need to begin dialysis, they typically experience a flurry of emotions. The stress is caused by chronic illness accounts for a wide range of feelings and moods. This includes general irritability, anger and frustration over the problems caused by the illness, and feelings of being hopeless and helpless when faced with a life-threatening disease. Mind-body-spirit therapy (Concepts of Islam) focuses on the ability to manage the mindset and psychic that will affect the physical, attitudes and behavior of individuals in addressing their lives.

Purpose: Giving mind-body-spirit therapy to hemodialysis patients to improve quality of life, given for 4 weeks with the frequency twice a week.

Methods: Pre-experimental study with one group pre-test post-test. The sample of 23 patients with hemodialysis therapy taken by purposive sampling. The FACES test is a visual analog scale representation of mood was used in this study. Early screening on mood was taken in 23 patients (13 men and 10 women, mean age 51.5 years). Mind-body-spirit therapy (Islamic concept) consisted of Tausiyah (cognitive reconstruction), prayer, dhikr and drinking zam-zam water. The mood score was evaluated at week 4 after 4 weeks of treatments. Wilcoxon test results, obtained a significance value of 0,000 (p <0,05). This suggests "there are significant differences in mood conditions before and after the Mind Body Spirit therapy intervention (Islamic Concept)."

Result: After the treatments, there is an increase in the mood score of hemodialysis patients.

Conclusion: A mind-body-spirit therapy of 4 weeks is effective for improving the mood of patients with chronic renal failure with hemodialysis therapy.

Keywords: Mind Body Spirit (Islamic Concepts), Hemodialysis, Mood

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BACKGROUND
The number of new chronic renal failure patients with hemodialysis therapy continues to increase from year to year in Indonesia. The number of new patients by 2015 is 21050 patients and the number of active patients is 30554 from 249 units of hemodialysis. Most of them is patients with End State Renal Disease (ESRD) 89% and followed by patients with Acute Renal Failure (ARF) 7%. In 2015 there were 1243 patients who died with a long-life hemodialysis between 1 - 317 months(Indonesian Renal Registry, 2015).

Dialysis requires significant time and effort. In addition to the considerable time spent traveling to and from appointments and receiving treatment itself, people receiving dialysis must carefully monitor their diet and fluid intake. It’s a lot of work, and it takes time to adapt to the changes. When people learn they need to begin dialysis, they typically experience a flurry of emotions. Often, the first reaction is shock or denial. People may feel numb or fail to accept the reality of the situation. Anger, sadness, worry, and guilt are also common. People may dwell on the past, wondering what they could have done differently (American Psychological Association (APA).

Chen (2010) found the fact that from 200 patients with hemodialysis, 35% had depression, 21% had anxiety, and 21.5% with the idea of suicide.(Chen, et.al., 2010). Moodiness is common among kidney patients. It is often thought to be a result of the following factors: 1) Uremia, or the buildup of waste products in the blood, can be irritating to the nervous system, causing an increase in irritability mostly in the early stages, 2) Some medications may cause moodiness or make you seem depressed, 3) The stress caused by chronic illness accounts for a wide range of feelings and moods. This includes general irritability, anger and frustration over the problems caused by the illness, and feelings of being hopeless and helpless when faced with a life-threatening disease(National Kidney Foundation, 2015).

The National Center for Complementary/Alternative Medicine (NCCAM) uses mind-body-spirit therapy as the alternative complementary therapy. However, from a holistic perspective, spirit is included, as this aspect of human being is an integral part of a number of the therapies, such as prayer, meditation, and yoga. NCCAM defines this category as encompassing therapies that promote the mind’s capacity to have an impact on the functioning of the body. In keeping with the perspective of the inclusion of the spirit, this would also encompass the impact that the spirit can be a physical parameters (Snyder, 2010). Mind-body-spirit therapy (Islamic Concept) is a religious and spiritual methods based on islamice conceptual approach by having a prayer to (Allah Ta'la), opening hearts and communicating with Allah with an Islamic approach to self-healing, establishing a relationship with the creator to strengthen the heart and lean and trust in Allah. The patients seek refuge, be humble and show tenderness and pray to Allah to get healing done by understanding the aspects of wisdom (tausiah), prayer, dzikr and drinking zam-zam water (Cita, 2016).

OBJECTIVE
This study aims to giving mind-body-spirit therapy to hemodialysis patients to improve quality of life, given for 4 weeks with the frequency twice a week.
METHODS

Patients and study design

The population of this study were chronic renal failure patients underwent hemodialysis therapy at the dialysis unit of an hospital in Yogyakarta Indonesia. Sample if this study were 23 patients selected using Purposive Sampling Techniques. The criteria of patients in this study are 1) Getting treatment according to hospital standards, 2) Can communicate with others, 3) Have good hearing, 4) Islam, 5) Get hemodialysis therapy twice a week, 6) At least 18 years old.

The design of this study is pre-experimental design using one group pre-test and post test design. Interventions were given for one month, each patient received mind-body-spirit (islamic concept) therapy twice a week during the process of hemodialysis therapy.

Data instruments consisted of socio-demographic data and FACES test (a visual analog scale representation of mood). The FACES test is used to collect the data. The mood of patients is evaluated twice. The FACES test instrument is given before intervention of mind-body-spirit and re-evaluated in the 4th week after the intervention of mind-body-spirit therapy.

Mood refers to the internal emotional state of an individual, as I feel happy, I am angry, I feel sad. This is related to emotions and has the same meaning as the state of feeling or emotion (Yosep, 2007). The FACES test is a visual analog scale representation of mood, consisting of seven graded faces, 1 being “happiest mood” and 7 being “saddest mood”. The seven different faces, separately for men and women, were drawn by an Indian artist. The final version of the FACES test was the result of an iterative process in which each face and the sequence of faces were evaluated by male and female community key informants in Goa. The interviewer showed the card with the FACES test (Fig. 1) and asked the subject to select the face which most closely described the way he or she had felt emotionally “these days” (Puertas, 2004).

Fig. 1 The FACES Test
Study protocol

Mind-body-spirit therapy (Islamic Concept) in this research defined as a religious and spiritual methods based on Islamic conceptual approach by having a prayer to (Allah Ta"ala), opening hearts and communicating with Allah with an Islamic approach to self-healing, establishing a relationship with the creator to strengthen the heart and lean and trust in Allah.

Mind-body-spirit therapy (islamic concept) consisted of tausiyah (cognitive reconstruction), prayer, dhikr and drinking zam-zam water, provided for 4 weeks with a frequency of twice a week. Quality of life scores were evaluated at week 4 after 4 weeks of therapy.

1. Tausiyah
This technique is designed to reduce negative thoughts and maladaptive behavior, focusing on the ability to manage mindset and psychics that will have an impact on the physical, attitudes and behavior of individuals in addressing their lives. Patients are given information and understanding about how to respond to life and their sick condition based on the concept of Islam.

2. Pray and dhikr
Perform requests to the highest substance (Allah Ta'la) by opening hearts and communicating with Allah with an Islamic approach for self-healing, and establish a relationship with the creator aiming to strengthen the heart, lean and trust God, seek refuge, be humble and show gentleness of heart before Him, pleading with Him, and praying to God for healing.

3. Drink Zam-Zam Water
Patients started the therapy with a prayer to God (Allah ta'ala). Patients can pray with any other prayer that they want. At the end of each therapy, patients drank 50 ml of zamzam water.

This systematic and structured mind-body-spirit therapy (islamic concept) is explained in a special handbook (one for patients and one for therapists) and adapted for patients with Chronic Kidney Failure. The handbook is based on a model previously tested in patients with chronic renal failure with hemodialysis (Cita, 2016).

Statistical analysis
The data in this study are illustrated by showing the number of subjects, the median of each group, the minimum and maximum of each group and the p-value. The mean and standard deviation values are reported to provide additional information about the characteristics of data distribution, even though the results are not normal. Analysis test in this study used Wilcoxon test analysis

RESULTS
The sample of this study were patients with chronic renal failure underwent hemodialysis therapy twice a week with a minimum three-months of hemodialysis therapy and minimum age of 18 years old. The characteristics of respondents in this study can be seen in table 1.
Table 1 Sociodemography of Total Population (Patients with Chronic Kidney Failure with Hemodialysis)

| Characteristics          | Total Populasi |
|--------------------------|----------------|
|                          | n = 23         |
|                          | Persentase (%) |
| Gender                   |                |
| Male                     | 13             | 56.52          |
| Female                   | 10             | 43.48          |
| Age                      |                |
| Average (Years)          | 51.5           |
| Minimum-maximum (years)  | (25-67)        |
| Marital status           |                |
| Married                  | 22             | 95.65          |
| Single                   | 1              | 4.35           |
| Education                |                |
| Elementary school        | 4              | 17.39          |
| Middle school            | 2              | 8.70           |
| High school              | 13             | 56.52          |
| Postgraduate             | 4              | 17.39          |
| Occupation               |                |
| Government employee      | 7              | 30.43          |
| Private Employee         | 6              | 26.09          |
| Entrepreneur             | 5              | 21.74          |
| Housewife                | 5              | 21.74          |
| Hemodialysis Period      |                |
| 3 month-12 month         | 9              | 39.13          |
| 1-5 year                 | 14             | 60.87          |

Table 2 Overview of Mood Score Changes Before and After Mind Body Spirit Therapy (Islamic Concepts) in Patients with Chronic Kidney Failure with Hemodialysis

| Mood Score After Mind Body Spirit Therapy (MBS) | n | Percentage (%) |
|-------------------------------------------------|---|----------------|
| Decrease                                        | 0 | 0              |
| Steady                                          | 7 | 30.43          |
| Increased                                       | 16| 69.57          |
| Total                                           | 23| 100            |

Table 3 Results of Wilcoxon test analysis on the mood of patients with chronic renal failure before and after given Mind Body Spirit Therapy (Islamic Concept)

| Median (Minimum-Maximum) | n | Mean | SD   | ρ   |
|--------------------------|---|------|------|-----|
| Mood Before MBS Therapy  | 23| 3(1-4)| 2.9  | 1.06| 0.000|
| Mood After MBS Therapy   | 23| 1(1-4)| 1.9  | 1.16|     |
Socio-demographic data from table 1 shows that in this study the average patient’s age was 51 years old and 95.6% were married. The majority of patients underwent hemodialysis for more than one year at 60.87% with a frequency of twice a week.

Table 2 shows that there were changes in mood-score of 23 hemodialysis patients after the intervention of 4 weeks mind-body-spirit (concept of Islam) therapy with frequency of 2 times a week; 69.7% of patients experiencing an increase in mood-score and no changes of mood-score in 30.43% patients.

FACES test is used to measure the mood of patients. Score of 1 is a very pleasant mood condition and a score of 7 reflects very sad mood conditions. Table 3 shows that there is an increase in mood conditions in patients after the intervention of mind-body-spirit (Islamic Concept) therapy with the average score 2.9 (before the intervention) and 1.7 (after the intervention). The minimum and maximum scores were not changed (the minimum score was 1 and the maximum score was 4). But there was a change in the median value. Before the therapy, the median value is 3, and after the therapy, the median value is 1. Wilcoxon test results obtained a significance value of 0.000 (p <0.05). It suggests "there are significant differences in mood conditions before the and after the intervention of Mind-Body-Spirit (Islamic Concept) therapy"

**DISCUSSION**

This study (Table 3) shows there is an effect of Mind-Body-Spirit Therapy (Islamic Concept) on mood-score before and after the therapy. Mind-body-spirit therapy (Islamic Concept) is a religious and spiritual methods based on Islamic conceptual approach by understanding the aspects of wisdom (tausiah) and given information and understanding about how to respond to life and their sick condition based, prayer, dzikr and drinking zam-zam water on the concept of Islam. The key components of spirituality were ‘meaning’, ‘hope’, ‘relatedness/connectedness’, and ‘beliefs/ beliefs systems’. Spirituality has been characterized as the quest for meaning in life, mainly through experiences and expressions of mind, in a unique and dynamic process different for each individual. For many individuals spirituality and religion are important aspects of their existence, constituting a source support contribute to wellbeing and coping with life’s daily difficulties (Fradelos et.al, 2015).

Prayer will lead to self-confidence, a sense of optimism, bring calm, peace and feel the presence of God Almighty so that by remembering, one’s faith will increase and there will be a sense of peace, peace in the soul (Hawari, 2011). If someone does not open his heart to pray and dhikr, then his heart is always hesitant, the feeling is miserable, his mind is frantic, always restless, his desires become weak (Jawas, 2005). When faced with a severe illness, believing the afterlife and that Allah is merciful will decrease fear from nothingness (Yucel, 2010). Spirituality can have an impact on one's coping style that focuses on control of perception (Cornah, 2006).

There were an increase 69.7% dan steady (30.43%) of mood-score after the therapy. Mind-body-spirit (Islamic concept) therapy is a spiritual and religious method for patients in addressing a problem, and the illness they experienced. This therapy directs the attitude, gratitude and prohibition of being hopeless about the pain they experienced. In Islam, all conditions, happiness and sadness are considered good in the presence of Allah Ta’ala if we embrace these conditions, being patient and not despairing. This therapy also provides an understanding that the purpose of someone’s life that will come after death is being in the paradise, so the conditions experienced now in this world is a path for the
heaven if we react patiently, thankfully and pleased with the provisions that God gives us. And this will have a good impact that people will have a peace of mind and free from stressful conditions.

Patients with a lower mood have worse activities of daily living (ADL) and quality-of-life (QOL) than patients with better mood. Patients with a lower mood have got less social support than patients with better mood, including both family support and outside family support. For coping style, patients with a lower mood were more inclined to choose “acceptance-resignation” coping style than patients with better mood, while the result is opposite in “avoidance” coping style. And patients with a better mood have better selfefficacy and ego resiliency than patients with lower mood (Xiaodan, 2017).

The research conducted by Yodchai suggests that religion and spirituality provide powerful coping strategies that can help Thai people with CKD overcome the associated distress and difficulties (Yodchai, 2017). Trusting in God helps them not to become anxious about their illness and what the future may hold. The frequent need to adapt to the changes ESRD causes can create a drain on one’s emotional, physical, and psychological strength, the participants found the use of prayer to be both supportive and strengthening. Prayer was the method most used by study participants to assist them in making the necessary modifications in and throughout the lived experience of the illness (Darrell, 2016).

During illness, patients may be confronted by hopelessness. Nevertheless, in Islamic creed, God is regarded as the best companion and hope in times of adversity, misfortune and fear for God sees us and looks after us and does not allow the activities of the servants to be in futility; and he is kind and generous towards them (quran 14:49). Hopelessness can lead to mental break down. According to the Quran, desperation for the mercy of God is considered paganism and a deadly sin (quran, 12:87). It is quoted by the holy Prophet Muhammad, peace be upon him, that “whenever you are ill, He heartens you to health and long life. However, this heartening does not affect the will of God (Allah); it delights the patient and bring him calmness and relief”.

Marzband (2016) reviewed Quran and Shie’h’s narrations (Hadiths), and found the concept of spiritual care. The research suggested that spiritual care involves spiritual capacities or skills to help patients in achieving purified life (Hayate-tayebeh). This includes providing prayer conditions for patients, giving hope to the patients, helping them to understand the concept of illness, finding hope, nurturing relationships, and caring for patients in end-of-life experiences.

Spiritual well-being was the strongest predictor of mental health, psychological distress, sleep disturbance, and psychosomatic complaints. Poor mental health was associated with lower spiritual well-being (Martinez, B, & Custódio, R 2014). Ebrahimi H, et al. (2014) found a significant relationship between some aspects of quality of life and spiritual well-being. There was a significant positive correlation between spiritual existential aspect of well-being and the dimensions of fatigue, emotional health, social functioning and general health and social performance.

LIMITATION

The limitations of this study were non-random sampling, sample loss due to the fact that some participants lacked inclusion criteria for the study (high or low age and inability to communicate the response to the questionnaire), and also some patients being unwilling to participate in the study, which all may reduce the generalizability of the results.
CONCLUSIONS

Our results provide further evidence and suggest that Mind-body-spirit (Islamic concept) Therapy is religious and spiritual methods associated with quality of life among HD patients. These findings have clinical implications for the health-care team to improve patient’s quality of life by encouraging patients to utilize spiritual and religious resources and incorporating psycho-spiritual interventions to minimize religious struggles among HD patients.

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REFERENCES

American Psychological Association (APA), Living Well On Dialysis Take Charge Of Your Emotions, DPC Education Center, https://www.apa.org/helpcenter/dialysis.pdf

Chen, C.K., Tsai, Y.C., Hsu, H.J., Wu, I.W., Sun, C.Y., Chou, C.C., et al. (2010). Depression and suicide risk in hemodialysis patients with chronic renal failure. Psychosomatics, 51, 528-528 e526

Cita, E.C., Wulandari T & Istanti YP, (2016). Terapi Islamic Self Healing Terhadap Quality of life pada Klien Gagal Ginjal Kronis dengan Terapi Hemodialisa. Muhammadiyah Journal of Nursing, 43-57

Cornah Deborah, 2006 The impact of spirituality on mental health A review of the literature Mentahl Health Foundation ISBN: 978-1-903645-85-7 www.mentalhealth.org.uk

Darrell, L 2016, Faith That God Cares: The Experience of Spirituality with African American Hemodialysis Patients, Social Work & Christianity, 43, 2, pp. 189-212, Academic Search Complete, EBSCOhost, viewed 2 September 2018.

Ebrahimi, H, Ashrafi Z, Eslampanah G 3 , Noruzpur, F 2014 ‘Relationship between spiritual well-being and quality of life in hemodialysis patients’, Journal of Nursing and Midwifery Sciences 2014: 1(3): 41-48

Fradelos, E, C., Tzavella F, Koukia E, Papathanasiou I V., Alikari V, Stathoulis J, Panoutsopoulos G, Zyga S, 2015, ‘Integrating Chronic Kidney Disease Patient’s Spirituality In Their Care: Health Benefits And Research Perspectives’, Mater Sociomed. 2015 Oct; 27(5): 354-358 https://www.ejbmanager.com/mnstemps/16/16-1444047827.pdf

Hawari, D. (2011). Menejemen stress, cemas dan depresi. Jakarta : Balai Penerbit Fakultas Kedokteran UI.

Indonesian Renal Registry, 2015, 9 th Report Of Indonesian Renal Registry Program Indonesian Renal Registry https://www.indonesianrenalregistry.org/data/INDONESIAN%20RENAL%20REGISTRY%202015.pdf
Jawas, Yasid bin Abdul Qadir, 2005 ‘Do’a&Wirid :mengobati guna-guna dan sihir menurut al-Quran dan as-Sunnah’ / Yazid bin Abdul Qadir Jawas.—Jakarta : Pustaka Imam asy-Syafi‘i

Martínez, B, & Custódio, R 2014, 'Relationship between mental health and spiritual wellbeing among hemodialysis patients: a correlation study', Sao Paulo Medical Journal = RevistaPaulista De Medicina, 132, 1, pp. 23-27, MEDLINE with Full Text, EBSCOhost, viewed 16 August 2018.

Marzband,R, Hosseini,SM, 2 & Hamzehgardeshi, Z, 2016 ‘A Concept Analysis of Spiritual Care Based on Islamic Sources’ Religions 2016, 7, 61; doi:10.3390/rel7060061 http://www.mdpi.com/journal/religions

National Kidney Foundation, 2015, ‘A TO Z HEALTH GUIDE Coping Effectively: A Guide for Patients and their Families, https://www.kidney.org/atoz/coping-effectively-guide-patients-and-their-families

Puertas, G, Patel, V, Marshall, T, 2004 Are visual measures of mood superior to questionnaire measures in non-Western settings? Soc Psychiatry Psychiatr Epidemiol 39 : 662–666

Snyder Mariah, Lindquist Ruth, 2010 Complementary& Alternative Therapies in Nursing Sixth Edition Springer publishing Company, LLC 11 West 42nd Street New York, NY 10036 www.springerpub.com E-book ISBN: 978-0-8261-2429-6

Sunaryo, S. (2018). The Influence Of Therapy Do’a In Islam To The Cooperative Clients Skizofrenia Cooperative Water Pathway In Public Health Center Karanganyar, Gandusari Trenggalek, East Java. Journal Of Nursing Practice, 1(2), 1-6. https://doi.org/10.30994/jnp.v1i2.24

United States Renal Data System , 2017 USRDS annual data report: Epidemiology of kidney disease in the United States. National Institutes of Health, National Institute of Diabetes and Digestive and Kidney Diseases, Bethesda, MD, 2017. https://wwwUSRDS.org/2017/view/v1_01.aspx)

Xiaodan, L, Xiaoshi, Y, Li, Y, Quan, Z, Da, S, Xinwang, Z, Tianhua, X, Qiang, L, & Lining, W 2017, 'Prevalence and related factors of depressive symptoms in hemodialysis patients in northern China', BMC Psychiatry, 17, pp. 1-7, Academic Search Complete, EBSCOhost, viewed 2 September 2018.

Yodchai, K, Dunning, T, Savage, S, & Hutchinson, A 2017, ‘The role of religion and spirituality in coping with kidney disease and haemodialysis in Thailand’, Scandinavian Journal Of Caring Sciences, 31, 2, pp. 359-367, Academic Search Complete, EBSCOhost, viewed 2 September 2018.

Yosep I, 2007 Keperawatan Jiwa, Refika Aditama Bandung

Yucel Salih (2010) Prayer And Healing In Islam with addendum of 25 Remedies for the Sick by Said Nursi, Tughra Books 345 Clifton Ave., Clifton, NJ, 07011, USA